To: Kate Starbird[kstarbi@uw.edu]
From: Renee DiResta
Sent: Sat 12/31/2022 7:47:04 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Sat 12/31/2022 7:47:11 PM

Renee DiResta is the Technical Research Manager at Stanford Internet Observatory. She holds a B.S in computer science and political science from SUNY Stony Brook. Her research examines information integrity and propaganda dynamics on social media, with a focus on transformative emerging platforms and technologies.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 28, 2022 3:27 PM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi folks,
I'm checking this back in. I had to remove some content to reduce length (to counter additions from Renee). We're still 145 words over… but only if we count the funding and acknowledgements… and I'm going to ask them not to count those. ;)

I also want to point out that we need biographical information for everyone in the following style. You can add those to the document or just send them over via email and I can add them.

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

Kate

> On Dec 28, 2022, at 2:05 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi folks, I'm checking this out right now to accept Renee's changes. I'll send out a revised version when I'm finished.
>
> Kate
>
> > On Dec 28, 2022, at 11:53 AM, Renee DiResta <rdiresta@stanford.edu> wrote:
> >
> > Confirming some funding wording - Elena is out, but will email on this ASAP. No changes on my end to revision document.

From: Renee DiResta <rdiresta@stanford.edu>
Sent: Wednesday, December 28, 2022 8:25 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>

Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

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this!

Matt

On Dec 3, 2022, at 2:21 PM, Kate Starbird <kstarbi@uw.edu> wrote:

Great news!
It looks like we have a little more work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.

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From: SMS Political Influencers <smspoliticalinfluencers@gmail.com>
Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]
Date: December 3, 2022 at 9:17:20 AM PST
To: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
Cc: Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>

This Message Is From an Untrusted Sender
You have not previously corresponded with this sender.
See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

3-December-2022
Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final

manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

In the appendix, in contrast, the authors present only three sampling criteria, the first two of which are identical to those in the manuscript. The third, however, is different: "Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were occurring.".

This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections. This, of course, is not a problem, if only the authors acknowledge the limitations of this (which I think they should). At the same time, the sampling criteria listed in the manuscript introduce some circular reasoning. The authors write that they deliberately sampled cases based on their ability to "reveal the participatory nature of this campaign." Later, they then conclude the campaign is participatory (a conclusion already laid clear in the sampling criteria).
I think the best solution is to simply acknowledge that these cases were selected due to their high visibility as well as the authors' detailed empirical engagement with the cases, while they took place (a valuable contribution in itself). Doing so, the authors should also acknowledge in the

discussion section that the study cannot conclude how all parts of the #StopTheSteal disinformation campaign operated.

(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:
• I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"
• On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing." To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.

A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the supplementary materials basically works. And I am pretty much convinced by the authors' responses to my previous comments.

I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon. Such as, "in participatory disinformation, some patterns we see include …" with different columns for

behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don't feel adds a great deal. Can we name the patterns clearly enough that they could be readily identified, ideally at scale?

Second, at several points, it would be helpful for the authors to remember, and remind readers, that these are three cases that are perhaps illustrative of the sorts of disinformation that occurred in 2020, but as they note in their letter, they are not representative. I was reminded of this when looking at a passage on p. 21 containing the idea that "elites moved quickly to amplify" disinformation coming from below: this suggests that elites consistently and quickly amplified claims being made by less influential accounts. Is that what you mean to say? I would have thought rather that they more idiosyncratically got wind of a helpful narrative and amplified it. As some of your cases show, in some cases it took a while for really big accounts to jump in. And it is important to remember that these are some of the most 'successful' of the disinformation narratives. And surely the top accounts did not do this for every possible conspiracy theory… so would it be helpful developing a line of thinking about what conditions lead top influencers (macro/mega) to pick up on a given thread? p. 12: "escalatory vector".

Finally, p. 12 uses the term "escalatory vector," which sounds interesting but I don't know what it means!

REVIEWER 3

I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it's a great fit for this paper), and they improved the conclusion by adding context to the "so what" of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

<Participatory-Disinformation-Draft-Final.docx>

To: Kate Starbird[kstarbi@uw.edu]
From: Renee DiResta
Sent: Mon 12/20/2021 10:31:23 PM
Subject: Re: Virality Project - final report review
Received: Mon 12/20/2021 10:32:06 PM

Changes made except for "--In all of the definitional footnotes, I would recommend adding some context along the lines of: "See Appendix X: Definitions for definitions of "misinformation" and "disinformation," as used in this Report." which I flagged for Eden.

I can chat about that financial question whenever; I reread the passage and it definitely says "most" but not all; we can change to "many" or something like that.

51 gave some feedback that the lack of differentiation/well-articulated definition of conspiracy theories in Cpt 4 assumed too much knowledge on behalf of the reader so I tried to make that much clearer and will add some citations to relevant papers when i have another hour; there is also now a section in the conclusion that references the recurrence and suggests a future for prebunking, so I can point to some of Mike's work in that context.

From: Renee DiResta
Sent: Sunday, December 19, 2021 4:08 PM
To: Kate Starbird <kstarbi@uw.edu>
Subject: RE: Virality Project - final report review

Yup, I'll do these tomorrow. Happy to discuss that final point, pretty free next week so just let me know when.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Sunday, December 19, 2021 12:13 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Fwd: Virality Project - final report review

Hi Renee,

Here's the feedback from our lawyers. Are you able to make the suggested changes? And perhaps we should talk about that final point there?
Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: RE: Virality Project - final report review
Date: December 18, 2021 at 9:58:48 PM PST
To: Kate Starbird <kstarbi@uw.edu>
Cc: Julia Carter Scanlan <jccarter@uw.edu>

Kate –

Thanks for sending. I have reviewed all three chapters—they look solid from a legal standpoint. Chapter 1 does a good job of defining the terms and disclosing the underlying facts for the conclusions that follow (which, as we've discussed, helps a lot from the standpoint of defending potential defamation claims). I have just a few minor notes. I'm happy to discuss after I return 12/28. Please also send the additional material when it's ready.

Chapter 1
--In all of the definitional footnotes, I would recommend adding some context along the lines of: "See Appendix X:

Definitions for definitions of "misinformation" and "disinformation," as used in this Report."

--P. 2: "*Plandemic* was a slickly produced video that spun the testimony of a discredited government whistleblower together with health misinformation about COVID-19 to feed a broader conspiratorial tale of profiteering and cover-ups." I strongly suggest adding a citation supporting the highlighted parts.

Chapter 4 Narratives

--FN14: "CHD tends not to be reliable." I would suggest deleting this. It seems like gratuitous poking here, in a way that could play out unhelpfully if there's ever a claim. Alternatively, please add a cross-reference to the later, more expansive discussion of CHD.

--p. 10: The term "Repeat Spreaders" is capitalized. Is it a defined in an earlier chapter I don't have?

Chapter 5
--P. 24: We say Berenson's posts are "posed as 'digging up' …." Could we use a less loaded term than "posed"? I think "couched as" would have the same meaning.
-
-We say in Chapter 1, p. 6: "Smith notes that most of these influencers are not ordinary citizens but individuals or groups who benefit (often, financially) from the spread of health misinformation. That leaves open the suggestion that the influences/actors highlighted in Chapter 5 benefit financially or in some other tangible way from spreading misinformation. If we know that isn't true for any one in particular – that is, if we have information indicating any of them are truly amatuers/volunteers – let's discuss. I would want to at least talk through addressing that point in some fashion.

Thanks.

Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
Tel: (206) 757-8148 | Cel: (206) 369-7476
Email: ericstahl@dwt.com | Website: www.dwt.com
Bio: www.dwt.com/lawdir/attorneys/StahlEric.cfm
Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 15, 2021 9:56 AM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>
Subject: Virality Project - final report review

[EXTERNAL]

Hi Eric,

I hope your trial went well yesterday.

I'm sending over three chapters for our final report for the Virality Project. Chapters 4 and 5 are the two that mention people and organizations by name. Chapter 1 is an intro. My understanding is that Chapter 1 is still in flux a bit as we've asked that the definitions get updated in the text. I think we're currently using an appendix for the definitions. It will be included at the end of Chapter 1 (rather than at the end of the report). I can send you an updated version of Chapter 1 later this week, but wanted to make sure you have the context there before reading Chapters 4 and 5 (which are at or very close to their final state here).

Please let me know if you have any questions. I'll be around and fairly responsive through the end of next week. (And then slightly less responsive Dec 26-Jan2).

Thank you,
Kate

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Cc: Matt DeButts[mdebutts@stanford.edu]; isabellagc2010@gmail.com[isabellagc2010@gmail.com]
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>
> **This Message Is From an Untrusted Sender**
> You have not previously corresponded with this sender.
> See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.
>
> Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.
> 3-December-2022
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>
> We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.
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> IMPORTANT INFORMATION FOR RESUBMISSIONS
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respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

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As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

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REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

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That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

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(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:
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REVIEWER 2

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I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon. Such as, "in participatory disinformation, some patterns we see include …" with different columns for behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don't feel adds a great deal. Can we name the patterns clearly enough that they could be readily identified, ideally at scale?

Second, at several points, it would be helpful for the authors to remember, and remind readers, that these are three cases that are perhaps illustrative of the sorts of disinformation that occurred in 2020, but as they note in their letter, they are not representative. I was reminded of this when looking at a passage on p. 21 containing the idea that "elites moved quickly to amplify" disinformation coming from below: this suggests that elites consistently and quickly amplified claims being made by less influential accounts. Is that what you mean to say? I would have thought rather that they more idiosyncratically got wind of a helpful narrative and amplified it. As some of your cases show, in some cases it took a while for really big accounts to jump in. And it is important to remember that these are some of the most 'successful' of the disinformation narratives. And surely the top accounts did not do this for every possible conspiracy theory… so would it be helpful developing a line of thinking about what conditions lead top influencers (macro/mega) to pick up on a given thread? p. 12: "escalatory vector".

Finally, p. 12 uses the term "escalatory vector," which sounds interesting but I don't know what it means!

REVIEWER 3

I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it's a great fit for this paper), and they improved the conclusion by adding context to the "so what" of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

To: Kate Starbird[kstarbi@uw.edu]
Cc: Matt DeButts[mdebutts@stanford.edu]; isabellagc2010@gmail.com[isabellagc2010@gmail.com]
From: Renee DiResta
Sent: Wed 12/28/2022 7:53:25 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Wed 12/28/2022 7:55:05 PM
Participatory-Disinformation-Draft-Final.docx

Confirming some funding wording - Elena is out, but will email on this ASAP. No changes on my end to revision document.

From: Renee DiResta <rdiresta@stanford.edu>
Sent: Wednesday, December 28, 2022 8:25 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Working on this right now and will send back a version for accepting changes. Don't want to create a version conflict...will send this back to everyone in an hour or so.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, December 27, 2022 8:45 AM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi everyone,
I'm following up on this, because I'd like to get this paper off to the journal ASAP in case they send it back wanting us to cut down the final 200 words (that we're adding for the Acknowledgements). It just needs a little attention from all of you regarding your personal bio and from Renee and Isabella regarding the Funding and Acknowledgements sections on the Stanford side.

I know folks are off this week, but it you could spare about 15 minutes to get these final elements in place, that would be awesome! (I have an avalanche that's going to hit me on January 3 … including another surgery because Matt was right that my finger didn't look right ... and I'm hoping to get this out the door before then.)

Kate

> On Dec 21, 2022, at 5:08 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi everyone,
> Happy holidays! I'm finally getting to these last revisions.
>
> I made the changes they suggested, adding a little limitations section. I've included the revision document here if you're interested. Please let me know if you think I've missed anything.
>
> Also, we need to add our acknowledgements, funding acknowledgements, and author bios (at the end of the document). Can you all add these to the Word document (not the revision document) attached here (and then resend to the group)?
>
> We're now at 9153 if we include the acknowledgments… though they didn't mention including them, so I'm going to pretend those don't count. The rest of the content is <9000 I think. Can one of you double check that?

I'd like to send these over sooner rather than later in case they send it back asking us to get under 9000 w/ acknowledgments.

Best,
Kate

<Participatory-Disinfo-Revision-Document-Final.docx>
<Participatory-Disinformation-Draft-Final.docx>

> On Dec 3, 2022, at 3:11 PM, Matt DeButts <mdebutts@stanford.edu> wrote:
>
> These do seem easier to address! They basically write the "representativeness" section for us. I don't have any suggestions beyond what the reviewers themselveso utlined.
> Kate, do you want help ID'ing quotes to move into the supplementary materials? Or anything else from us? Happy to be moving forward with this!
>
> Matt
>
> > On Dec 3, 2022, at 2:21 PM, Kate Starbird <kstarbi@uw.edu> wrote:
> >
> > Great news!
> > It looks like we have a little more work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.
> >
> > Kate
> >
> > > Begin forwarded message:
> > >
> > > **From:** SMS Political Influencers <smspoliticalinfluencers@gmail.com>
> > > **Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]**
> > > **Date:** December 3, 2022 at 9:17:20 AM PST
> > > **To:** Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
> > > **Cc:** Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>
> > >
> > > **This Message Is From an Untrusted Sender**
> > > You have not previously corresponded with this sender.
> > > See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.
> > >
> > > Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.
> > > 3-December-2022
> > > Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled “Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election” which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

In the appendix, in contrast, the authors present only three sampling criteria, the first two of which are identical to those in the manuscript. The third, however, is different: "Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were occurring.".

This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections. This, of course, is not a problem, if only the authors acknowledge the limitations of this (which I think they should). At the same time, the sampling criteria listed in the manuscript introduce some circular reasoning. The authors write that they deliberately sampled cases based on their ability to "reveal the participatory nature of this campaign." Later, they then conclude the campaign is participatory (a conclusion already laid clear in the sampling criteria).
I think the best solution is to simply acknowledge that these cases were selected due to their high visibility as well as the authors' detailed empirical engagement with the cases, while they took place (a valuable contribution in itself). Doing so, the authors should also acknowledge in the discussion section that the study cannot conclude how all parts of the #StopTheSteal disinformation campaign operated.

(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:
• I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"
• On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process

as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon and subtly challenges this framing.” To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.

A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the supplementary materials basically works. And I am pretty much convinced by the authors’ responses to my previous comments.

I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how “participatory disinformation” occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the “participatory disinformation” phenomenon. Such as, “in participatory disinformation, some patterns we see include …” with different columns for behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don’t feel adds a great deal. Can we name the patterns clearly enough that they could be readily identified, ideally at scale?

Second, at several points, it would be helpful for the authors to remember, and remind readers, that these are three cases that are perhaps illustrative of the sorts of disinformation that occurred in 2020, but as they note in their letter, they are not representative. I was reminded of this when looking at a passage on p. 21 containing the idea that “elites moved quickly to amplify” disinformation coming from below: this suggests that elites consistently and quickly amplified claims being made by less influential accounts. Is that what you mean to say? I would have thought rather that they more idiosyncratically got wind of a helpful narrative and amplified it. As some of your cases show, in some cases it took a while for really big accounts to jump in. And it is important to remember that these are some of the most ‘successful’ of the disinformation narratives. And surely the top accounts did not do this for every possible conspiracy theory… so would it be helpful developing a line of thinking about what conditions lead top influencers (macro/mega) to pick up on a given thread? p. 12: “escalatory vector”.

Finally, p. 12 uses the term “escalatory vector,” which sounds interesting but I don’t know what it means!

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I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it’s a great fit for this paper), and they improved the conclusion by adding context to the “so what” of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Kate Starbird, University of Washington, HCDE and Center for an Informed Public
Renée DiResta, Stanford, Internet Observatory
Isabella Garcia-Camargo, Krebs Stamos Group
Matt Marshall DeButts, Stanford, <

Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This meta-narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — from hyperpartisan media to political operatives to ordinary people — contributed to producing and amplifying misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This meta-narrative, constructed through the aggregation of many sub-narratives alleging a variety of different types of fraud, took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for some, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021.

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon this framing. We expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. While Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives comprising this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit

the 2020 election as a domestic and participatory one. In this paper, we explore both its top-down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of influencers in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast to most research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents', they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including "citizen journalists" (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined journalists and media outlets sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online influencers operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might trend on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the influencer, was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer", to differentiate influence on the basis of follower count.

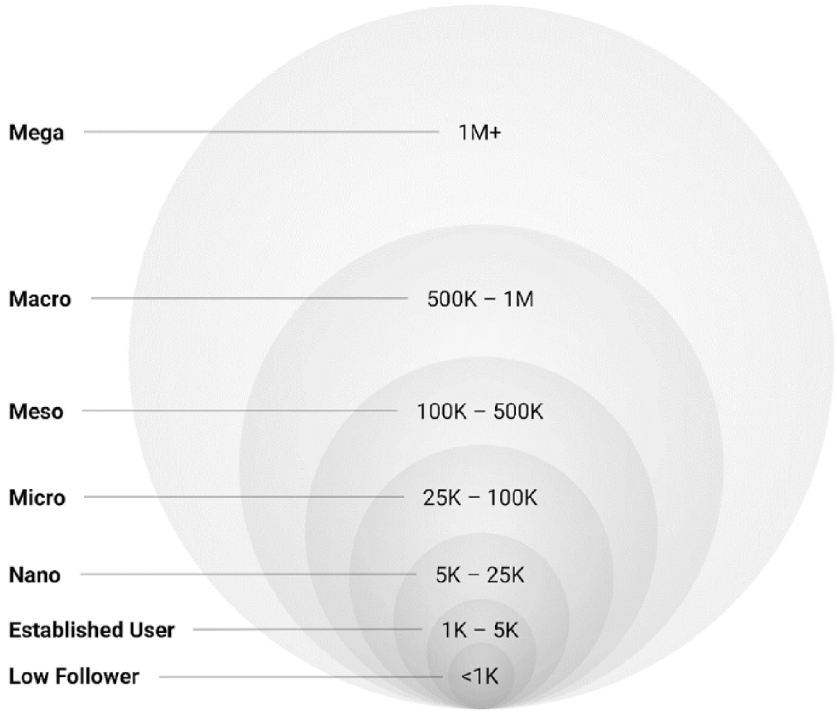

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) our research team were familiar with because we documented them in depth as they were occurring:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether they've been suspended, how they credentialed themselves, their tweet patterns across the Election 2020 discourse, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was then-President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting a false narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for its supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, Elijah Schaffer, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

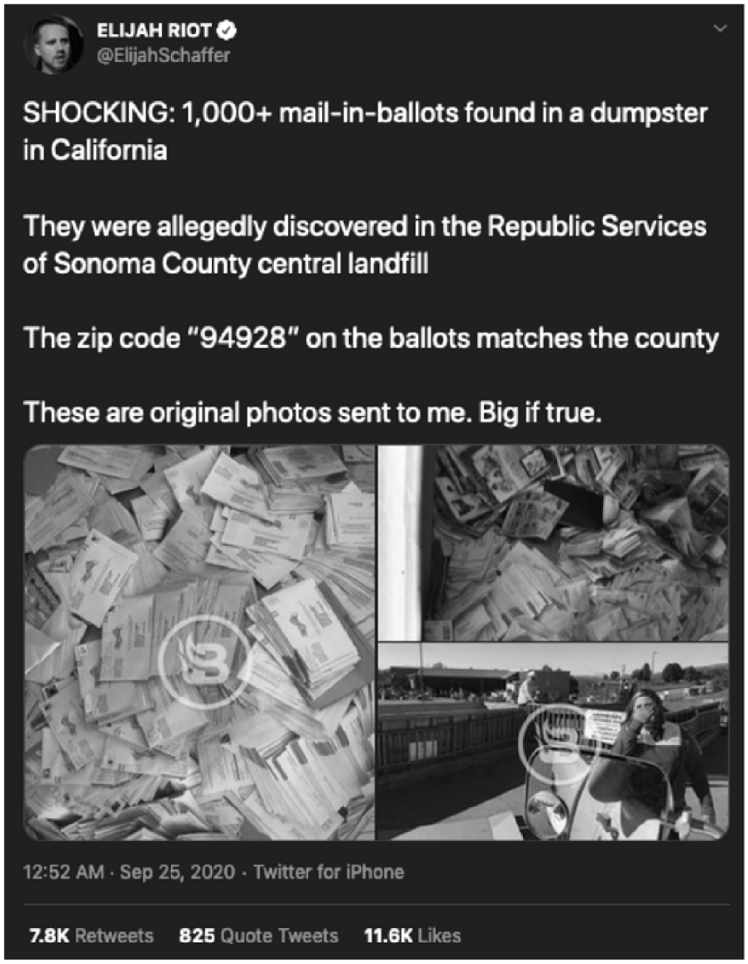

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

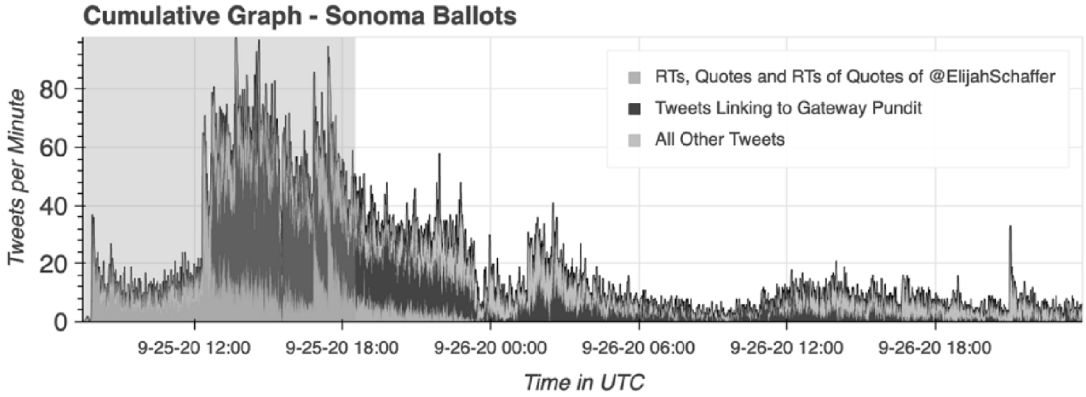

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a "blue-check", had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted influencers for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of "mega influencer" Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

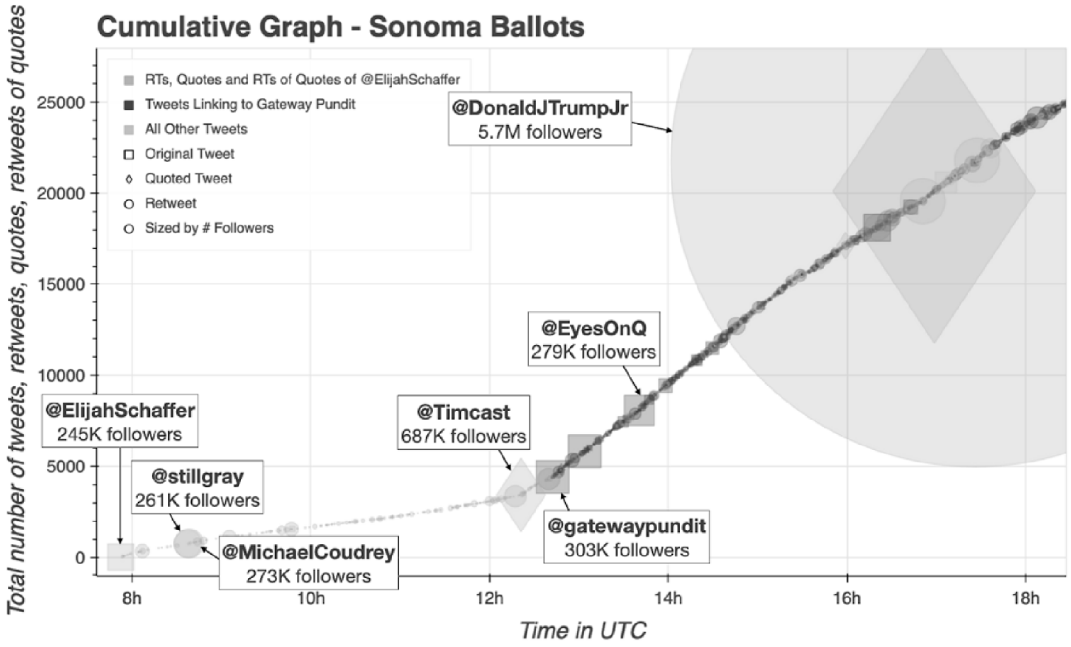

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, ballots rejected automatically were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

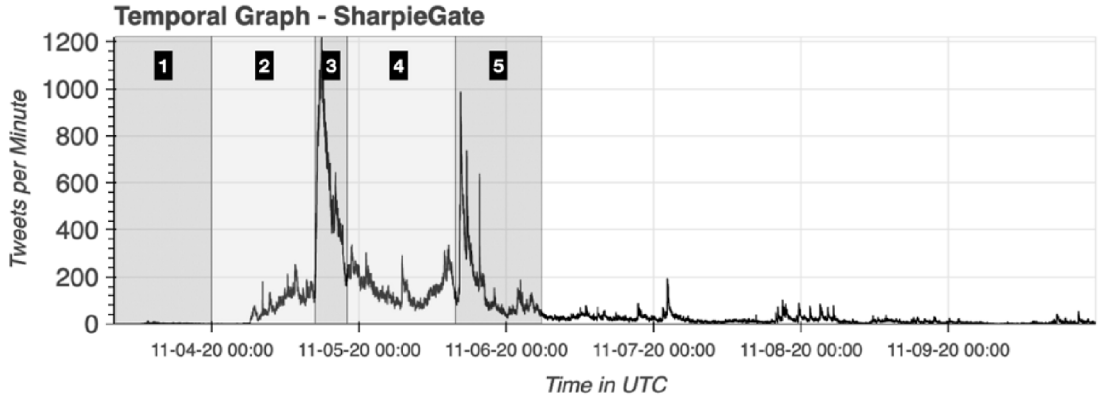

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a "nano" sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

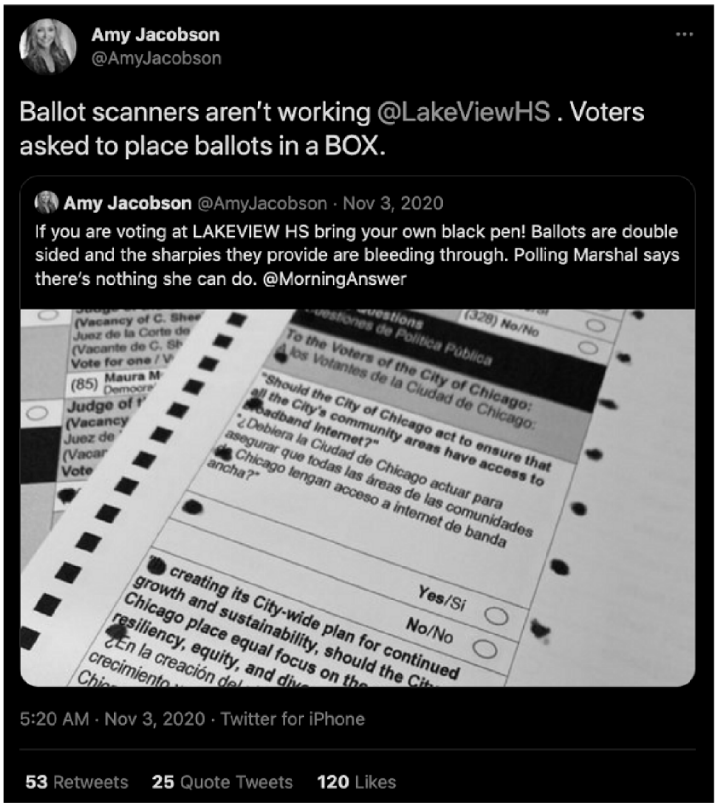

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to "trade up" — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
```

shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

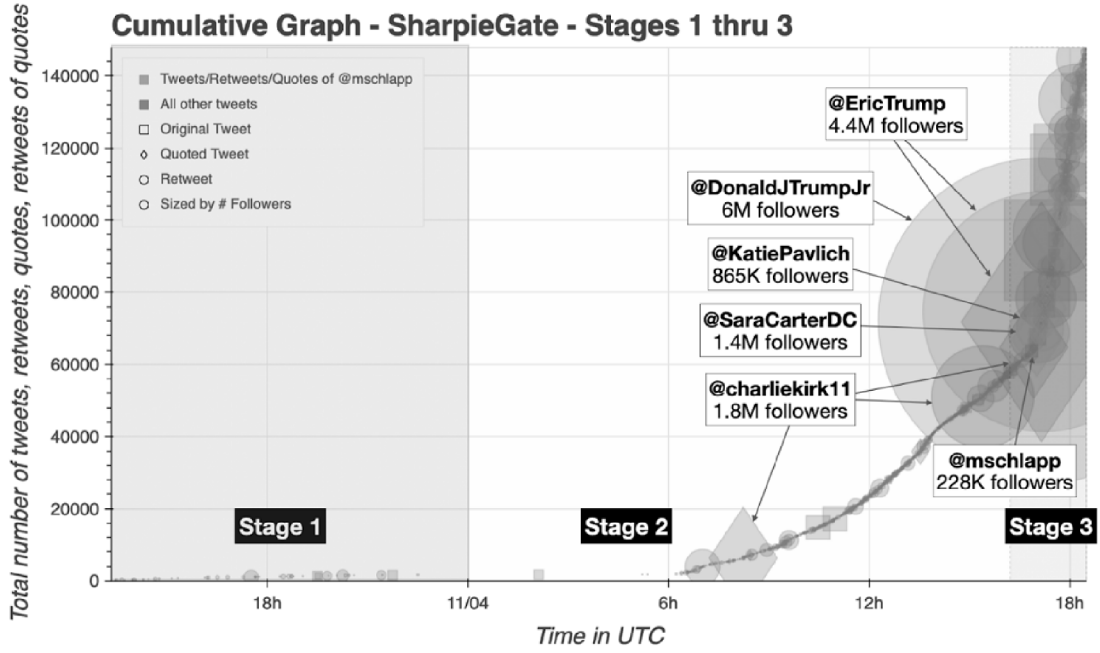

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half,receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

@mschlapp (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), the founder of the “Walkaway” movement @BrandonStraka (640K followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House

@NewtGingrich. Bartiromo's tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October 2020, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including activist media outlet @ProjectVeritas, conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

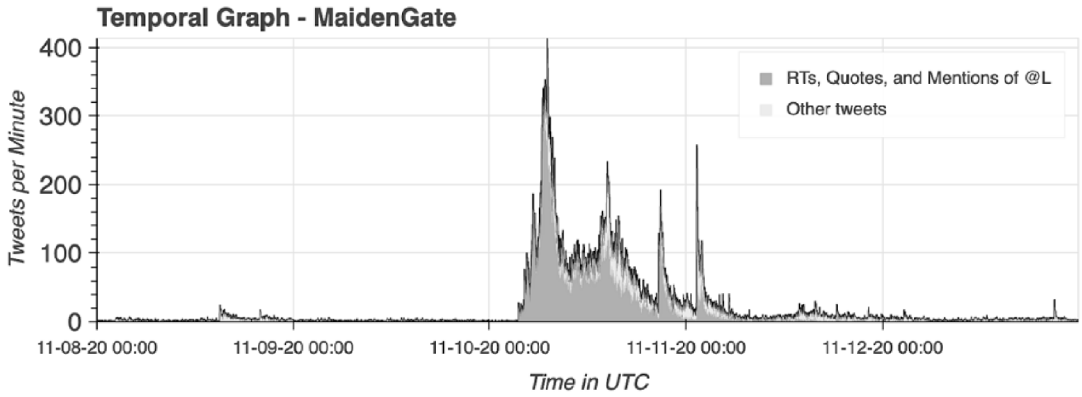

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was "looking into @L's #MaidenGate" and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

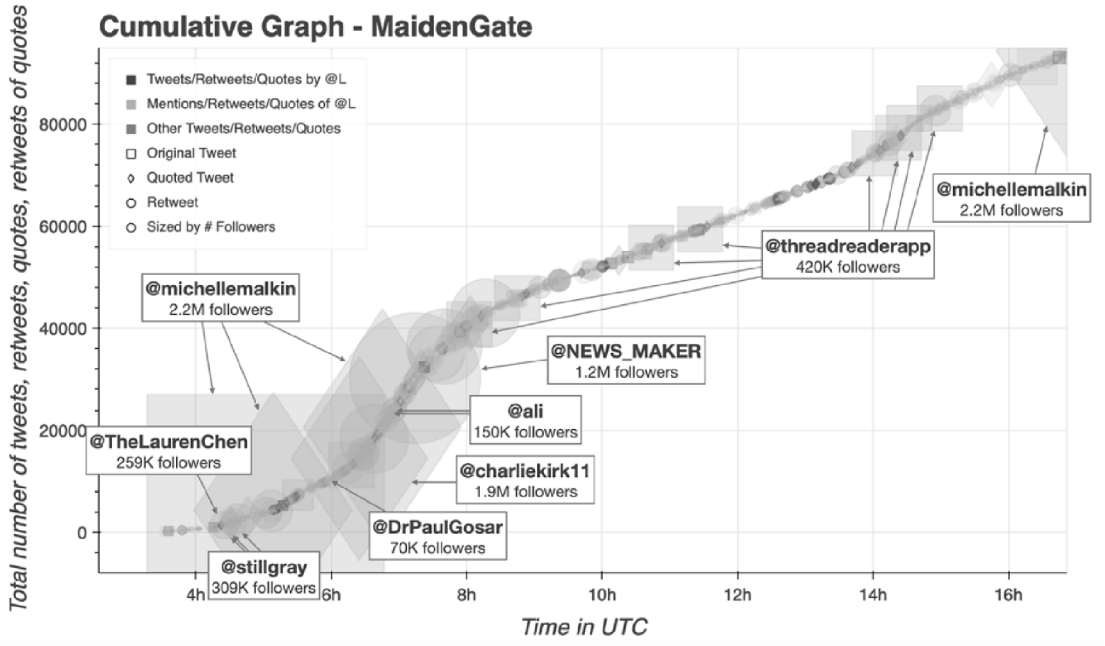

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L's accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation of something big: "We don't know the top of this. This is either a small problem, or it's a problem that will shake America to the core." His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander's growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander's team created a Google Document to consolidate information around the ongoing "investigation." The sheet offered detailed advice for filing complaints about potential voter fraud using one's maiden name, providing links to voter registration websites in dozens of states. Its watermark read "stopthesteal.us", demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly exploring whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media driven or social media driven. Instead, we find something more akin to Chadwick's conceptualization of political organizing within a hybrid media system (Chadwick, 2017) where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. *Political influencers* both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016). This view aligns with previous research on participatory

propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence voters gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers in not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro influencers amplified the experiences of others and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

While this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

8.3 Limitations

This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

10.0 Acknowledgements

The authors thank the many contributors to the Election Integrity Partnership at the Stanford Internet Observatory, University of Washington (UW) Center for an Informed Public, Graphika, and the DFRLab for their help collecting, curating, and conducting initial analysis of the data presented here. We specifically thank Paul Lockaby for Twitter data collection.

11.0 Funding Acknowledgements

This research builds upon rapid response work conducted through the 2020 Election Integrity Partnership (EIP). The EIP received specific funding from Craig Newmark Philanthropies and the Omidyar Group. At UW, EIP rapid response research was also supported by the John S. and James L. Knight Foundation and the William and Flora Hewlett Foundation. At Stanford . The analysis presented here is based upon work supported by the U.S. National Science Foundation under Grant No. 1749815. Any opinions, findings, and conclusions or recommendations expressed in this material are those of the author(s) and do not necessarily reflect the views of the National Science Foundation.

12.0 References

Bastos, M., & Farkas, J. (2019). “Donald Trump is my President!”: The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters*. (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don't. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

<your bibliography here>

To: Irina Raicu[iraicu@scu.edu]
Cc: Kate Starbird[kstarbi@uw.edu]; erik.opsal@nyu.edu[erik.opsal@nyu.edu]; craigsnewlist[craigsnewlist@googlegroups.com]
From: Renee DiResta
Sent: Tue 1/10/2023 8:25:51 PM
Subject: Re: [craigsnewlist] New study on Russian foreign influence
Received: Tue 1/10/2023 8:26:20 PM

I'd love to know HOW to get that out via mass media, because it's been said for years. :) It's just propaganda. The technological means of dissemination changed, the structure and affordances changed, the audience ceased to be passive - technological updates that impacted the format and spread of propaganda, which has always, for centuries, evolved alongside the information environment.
I led one team doing the descriptive work (cited in this paper) for SSCI and we very clearly stated that the IRA memes needed to be viewed in the context of a broader full-spectrum campaign incorporating state media and the GRU as well, *and pickup from American domestic influencers* who processed it for their audiences (well-established frameworks in communication theory etc etc). However, that is not what media chose to focus on -- different outlets picked the parts most likely to get clicks for their audiences.

Our 2018 report said 1) this activity existed, 2) our work should be viewed separately from any conversation related to "collusion" (Mueller was ongoing), and 3) here is what it looks like, **and very little of it was about persuasion**. Despite our best efforts, publishing the report led to years' worth of insinuations - from some of the people presently touting the NYU paper's results as evidence of no impact - that we were Clinton operatives and that I personally believe Russia "swung the election"...something that we actively discounted. I now try to write up stuff in The Atlantic or Wired or in op-ed form now -- so I can put it out in my own words, regardless of media interpretation. I don't know what the answer is.

This topic remains a flashpoint with deep ideological divides.But the reality is that the networks of incentivized folks - who have framed every bit of research at their disposal to retcon literally every aspect of Russian activity under the umbrella of "the Russiagate hoax" - are going to get far more distribution...through those propaganda-friendly structures that have been built up over the last seven years.

On Tue, Jan 10, 2023 at 3:11 PM 'Irina Raicu' via craigsnewlist <craigsnewlist@googlegroups.com> wrote:

> Kate, I would love to read more about your point that we need to "understand disinformation campaigns and propaganda as functioning primarily through structural impacts on discourse, social networks, and now algorithms"; I know you've written about this already, but we need more coverage of this in mass media...
>
> On Tue, Jan 10, 2023 at 11:57 AM Kate Starbird <kstarbi@uw.edu> wrote:
>
> > Happy to promote your pushback! I've long been worried about how this work would be framed by those who wish to deny that Russia interfered or that that interference had ANY impact. Measuring the direct effects of one element of the campaign on voting behavior != measuring the impact of the campaign. Scholars have long known that measuring the direct effects of propaganda in that way is extremely hard — perhaps impossible, because it doesn't account for how propaganda works (by shaping discourse among social groups with 2nd to nth-order effects on political attitudes and political outcomes). It's not surprising that a research study like this couldn't measure such an effect. Nor is it surprising that there are folks who would use that non-finding to argue that since you can't measure that effect, then there was no effect. No matter your rebuttal, I would expect those motivated misinterpretations of your findings to continue.
> >
> > I'd like to (cordially) push back a bit on this first sentence of your announcement.
> >
> > "As folks know, previous research and investigations have concluded that Russian interference in the 2016 election was designed to influence voting behavior."
> >
> > The interference was designed to affect political outcomes, but that doesn't necessarily mean it was designed primarily to influence voting behavior. Shaping discourse, undermining trust in democratic institutions and outcomes, cultivating political leaders. One might argue these impacts were more central than vote totals.
> >
> > And the second sentence: "Despite this massive effort, however, most voters actually had little or no exposure to

Russia's campaign on Twitter in 2016, according to a new study from NYU's CSMaP published this morning in *Nature Communications."*

I might have written, "no direct exposure to the Twitter part of the campaign." And I would argue that almost everyone in America had indirect exposure, certainly to some of the other elements of the campaign, but even to the Twitter campaign, since it shaped discourse at a high level, cultivating influencers in media and politics.

Until we step back and understand disinformation campaigns and propaganda as functioning primarily through structural impacts on discourse, social networks, and now algorithms… we won't be able to measure the effects of these efforts.

Kate

On Jan 10, 2023, at 11:33 AM, Erik Opsal <erik.opsal@nyu.edu> wrote:

Hi all,
As a quick follow up to this: Yesterday, several commentators on Twitter and in the media erroneously used this study to claim that Russia never interfered with the 2016 election or that the influence campaign didn't matter. We've tried to set the record straight with a follow up thread making clear what the paper says and what it doesn't. We'd appreciate your help amplifying this thread on Twitter and Mastodon to push back on these incorrect claims.

Thank you!
Erik

On Mon, Jan 9, 2023 at 1:26 PM Erik Opsal <erik.opsal@nyu.edu> wrote:

Hi everyone,

As folks know, previous research and investigations have concluded that Russian interference in the 2016 election was designed to influence voting behavior. Despite this massive effort, however, most voters actually had little or no exposure to Russia's campaign on Twitter in 2016, according to a new study from NYU's CSMaP published this morning in *Nature Communications.*

Our team of international researchers found that:

- Exposure to Russian coordinated influence accounts was heavily concentrated among a small portion of the electorate – 1 percent of users accounted for 70 percent of exposures.
- This portion was more likely to be highly partisan Republicans, who were exposed to nine times more posts than non-Republicans.
- There were no measurable changes in attitudes, polarization, or voting behavior among those exposed to this disinformation.

Of course, even if Russia's efforts on Twitter didn't change votes, it would be a mistake to conclude the campaign didn't have any impact on the election, or on faith in American electoral integrity. Indeed, as the authors note, Russia's social media campaign may have had its largest effects by convincing Americans that its campaign was successful. Nevertheless, the results provide an important corrective to the view that Russia's foreign influence campaign on social media easily manipulated the attitudes and voting behavior of ordinary Americans.

You can read a summary of the findings at the *Washington Post*.

And if you'd like to help amplify the study, please share these threads on Twitter and Mastodon.

Thank you!

Erik Opsal
Communications Director
NYU's Center for Social Media and Politics
csmapnyu.org | @CSMaP_NYU
M: 763.234.5907

--
You received this message because you are subscribed to the Google Groups "craigsnewlist" group.
To unsubscribe from this group and stop receiving emails from it, send an email to craigsnewlist+unsubscribe@googlegroups.com.
To view this discussion on the web visit https://groups.google.com/d/msgid/craigsnewlist/CACOtSLJr5GiiXb6F%2BqNLseT29kh-_YgkSOh3ssHQ-Pik9dbo7g%40mail.gmail.com.

--
You received this message because you are subscribed to the Google Groups "craigsnewlist" group.
To unsubscribe from this group and stop receiving emails from it, send an email to craigsnewlist+unsubscribe@googlegroups.com.
To view this discussion on the web visit https://groups.google.com/d/msgid/craigsnewlist/5C1B91AB-6B3C-42FC-9AB7-E82C167E230D%40uw.edu.

--
Irina Raicu
Director, Internet Ethics Program
Markkula Center for Applied Ethics

--
You received this message because you are subscribed to the Google Groups "craigsnewlist" group.
To unsubscribe from this group and stop receiving emails from it, send an email to craigsnewlist+unsubscribe@googlegroups.com.
To view this discussion on the web visit https://groups.google.com/d/msgid/craigsnewlist/CAJPPig7k8ZstYfTMxp8UT-tQX-FhgNAZ%3D1EXBH%2Bg9wULKhWwXg%40mail.gmail.com.

To: Kate Starbird[kstarbi@uw.edu]; Katie Stamos[katie@Stamos.org]
From: Alex Stamos
Sent: Sat 12/31/2022 6:28:50 PM
Subject: Dinner at the Stamos House
Received: Sat 12/31/2022 6:28:59 PM

We'll have a casual family dinner at 455 Upland Road, Redwood City and then four of us will head to the Stanford WBB game afterward.

5 Stami + Kate + 18

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 2:31:58 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 2:32:01 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

1 comment

Current research suggests that these large accounts in fact serve a gatekeeping function in rumor "contagion"; influencers, for example, may see claims percolating within their communities (they are often tagged by their followers, who wish to generate lift for the claim), but must decide whether to stake their reputation on pushing a rumor along

Renee DiResta
• 7:26 PM, Sep 7 (PDT)
New

i added this part about the gatekeeping role of the large accounts before getting to the next point, amplification. It may belong below. These feel a little bit mixed to me. Influencers can be originators as easily as media/celebrities, so it might make sense to move that explanation up here?

ReplyOpen [docs.google.com]

4 suggestions

Renee DiResta
• 4:00 PM, Dec 31, 1969 (PST)
New

Delete: *","*

ReplyOpen [docs.google.com]

Renee DiResta
• 4:00 PM, Dec 31, 1969 (PST)
New

Add: *"The use of manipulative tactics elevates rumors rise to the level of a disinformation campaign."*

ReplyOpen [docs.google.com]

Renee DiResta
• 4:00 PM, Dec 31, 1969 (PST)
New

Add: *"Rumors have particular "publics", or communities motivated by distinct interest in the claim (as des…"*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"- behavior that ma"*

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Google LLC, 1600 Amphitheatre Parkway, Mountain View, CA 94043, USA

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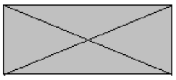

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 2:41:28 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 2:41:30 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

2 comments

(1990?

Renee DiResta

• 7:33 PM, Sep 7 (PDT)

New

mine is 1990 w/note that original french was 1987

ReplyOpen [docs.google.com]

claims

Renee DiResta

• 7:36 PM, Sep 7 (PDT)

New

narratives?

ReplyOpen [docs.google.com]

1 resolved

Suggestions

Renee DiResta

• 7:30 PM, Sep 7 (PDT)

New

Delete: *"The use of manipulative tactics elevates rumors rise to the level of a disinformation campaign."*

Add space

Renee DiResta

• 7:32 PM, Sep 7 (PDT)

New

Rejected suggestion

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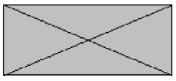

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 2:21:17 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 2:21:20 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

3 comments

The novelty and familiarity dimensions

Renee DiResta
• 11:40 AM, Sep 6 (PDT)
we have framed this elsewhere as familiarity, novelty, and repetition - where the perception of a piling-up of familiar, novel incidents also has an effect. Ballots in a ditch, ballots in a dumpster, ballots on the ground, ballots in Sonoma, ballots in [wherever] all in aggregate combine to reinforce, but also to keep the concern top-of-mind.

Renee DiResta
• 7:17 PM, Sep 7 (PDT)
New
I am not sure whether to add repetition to familiarity or novelty and don't want to disrupt the overall framework you've established here; "one of a rumor's strengths lies in its repetition" appears in the Kapfarer section on DEFUSING rumors, where he argues that denials must be similarly repeated

ReplyOpen [docs.google.com]

We may also see a certain type of rumor diminish in viral potential as it repeats.

Renee DiResta
• 7:03 PM, Sep 7 (PDT)
New
this i am less confident of. i would take out "type" here, I think, because the thing that fizzles is the specific instance, but a new potential manifestation - this time it's Sonoma! - may in fact increase the viral potential b/c of the familiarity + novelty combo (as we then discuss in the next paragraph)

ReplyOpen [docs.google.com]

research

Renee DiResta
• 7:13 PM, Sep 7 (PDT)
New
Centola

ReplyOpen [docs.google.com]

10 suggestions

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"or"* with *"influencers,"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *","*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"they"* with *"rumors"*

ReplyOpen [docs.google.com]

Renee DiResta

• 7:04 PM, Sep 7 (PDT)

New

Add: *"; particularly in the realm of politics, they serve as "the media of what goes unsaid," a community-…"*

Renee DiResta

• 7:17 PM, Sep 7 (PDT)

New

Kapfarer cpt 16 Political Rumors

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"in"* with *"with"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"Current research suggests that these large accounts in fact serve a gatekeeping function in rumor "c…"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"get there,"* with *"reach broader awareness,"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"while the rumor remains confined to a particular community"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"they"* with *"rumors"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"."* with *", as well as within and across distinct"*

ReplyOpen [docs.google.com]

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You have received this email because you are a participant in the updated items or subscribed to notifications on Election MDM Threat Framework [docs.google.com]. Change what Google sends you [docs.google.com]. You cannot reply to this email.

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 2:00:48 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 2:00:50 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

3 suggestions

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"Is there a detail that may increase the likelihood that people will take notice?"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *", ie, "ballots were found""*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *", ie, "they were found in a remote ditch", "they were found in a local dumpster""*

ReplyOpen [docs.google.com]

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You have received this email because you are a participant in the updated items or subscribed to notifications on Election MDM Threat Framework [docs.google.com]. Change what Google sends you [docs.google.com]. You cannot reply to this email.

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 1:49:53 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 1:49:56 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

2 comments

copypasta

Michael Grass
• 2:49 PM, Sep 6 (PDT)
Maybe link to a definition here? https://knowyourmeme.com/memes/copypasta [google.com]

Renee DiResta
• 6:44 PM, Sep 7 (PDT)
New
i think copypasta in the colloquial sense (identical text etc) is now somewhat de-persuasive. "oh it's just bots". It's more the users who add a me-too, the way we saw with Maidengate. They weren't just reposting her language verbatim, they were +1-ing it.

ReplyOpen [docs.google.com]

compelling

Michael Grass
• 2:50 PM, Sep 6 (PDT)
To avoid the repetition of "compelling" here, maybe we use "persuasive" here?

Kate Starbird
• 4:33 PM, Sep 6 (PDT)
Ha... Mike and I are just talking about how "compelling" is the critical word here.

Renee DiResta
• 6:42 PM, Sep 7 (PDT)
New
resonant?

ReplyOpen [docs.google.com]

8 suggestions

Renee DiResta
• 4:00 PM, Dec 31, 1969 (PST)
New
Add: *"that adds tangibility to the claim"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"some form"* with *"content depicting this"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Delete space

Add: *", particularly on social media,"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add space

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"; at a minimum, they may pique the interest of the community and inspire the co-creation of purporte…"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"(1)"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"and (2) the networks of the accounts that participate in sharing it"*

ReplyOpen [docs.google.com]

Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"reso"*

ReplyOpen [docs.google.com]

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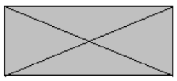

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Thur 9/8/2022 1:40:53 AM
Subject: Election MDM Threat Framework
Received: Thur 9/8/2022 1:40:56 AM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

4 comments

Authoritative Sources

Renee DiResta
• 11:27 AM, Sep 6 (PDT)
could mention media specifically here

Michael Grass
• 2:37 PM, Sep 6 (PDT)
Maybe this --> "Diminished Trust in Media and Authoritative Sources of Information"

Renee DiResta
• 6:36 PM, Sep 7 (PDT)
New
i like that.
there is a whole conceptualization in Kapfarer of rumors as a kind of anti-media, an active rejection of the idea of authoritative sources, pushback against the power dynamics inherent in the very idea of "official events". This may be too in-the-weeds for the intended audience of election officials but it speaks to the tone and tenor of what we see on social media as being something that has far more depth than just being a side effect of a low trust society.

ReplyOpen [docs.google.com]

cite

Renee DiResta
• 11:24 AM, Sep 6 (PDT)
Kapfarer has a fair bit on this, "ambiguous events give rise to rumors" etc throughout chapter 2

Renee DiResta
• 6:29 PM, Sep 7 (PDT)
New
important, ambiguous events give rise to rumors, Kapfarer cpt 1; he cites from Shibutani.

Renee DiResta
• 6:31 PM, Sep 7 (PDT)
New
additionally relevant here: "rumors do not take off from the truth but rather seek out the truth" per the sensemaking point

ReplyOpen [docs.google.com]

Questions for election officials: Do you anticipate (or are you experiencing) an extended time period between the polls closing and the results being announced? Will information conditions change rapidly and updates be necessary? Is there potential for mistakes to be made (that will need to be corrected)? Questions for analysts: Is this rumor taking place during a period of high uncertainty (while we await voting results or an official announcement)? Is it related to a part of the voting process where it is inherently difficult to identify what the “truth” is? Is the core claim “unfalsifiable”?



Kate Starbird

• 3:40 PM, Sep 6 (PDT)

We can also move these to the tables below (and remove these from here).



Renee DiResta

• 6:25 PM, Sep 7 (PDT)

New

i personally like it in line because it gives a tangibility to the concept

ReplyOpen [docs.google.com]

misinformation



Renee DiResta

• 6:24 PM, Sep 7 (PDT)

New

do we want to keep the term, or just "analysts" more broadly?

ReplyOpen [docs.google.com]



9 suggestions



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *“(”* with *“,”*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *“uncertainty”* with *“ambiguity”*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *“,”*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Delete: *"Uncertainty can also be intentionally exploited by malign actors to spread disinformation."*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"Uncertainty can also be intentionally exploited by malign actors to spread disinformation."*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"Media and"*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"of Information"*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"n instance of a"*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Replace: *"ost"* with *"NY"*

ReplyOpen [docs.google.com]



1 resolved

Suggestions



Renee DiResta

• 11:24 AM, Sep 6 (PDT)

Add: *"[by malign actors]"*



Renee DiResta

• 6:30 PM, Sep 7 (PDT)

New

Accepted suggestion

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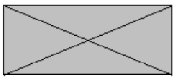

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Tue 9/6/2022 6:44:18 PM
Subject: Election MDM Threat Framework
Received: Tue 9/6/2022 6:44:20 PM

New activity in the following document

Election MDM Threat Framework
[docs.google.com]

4 comments

Authoritative Sources

Renee DiResta
• 11:27 AM, Sep 6 (PDT)
New
could mention media specifically here

ReplyOpen [docs.google.com]

cite

Renee DiResta
• 11:24 AM, Sep 6 (PDT)
New
Kapfarer has a fair bit on this, "ambiguous events give rise to rumors" etc throughout chapter 2

ReplyOpen [docs.google.com]

Renee DiResta
• 11:25 AM, Sep 6 (PDT)
New
Maricopa County was prebunking the mail-in-ballots-look-Dem-and-then-things-swing issue on Twitter last night, if we would like to use tangible examples

ReplyOpen [docs.google.com]

Engagement potential is largely determined by the content of a specific rumor

Renee DiResta
• 11:34 AM, Sep 6 (PDT)
New
and also by the audience size or position in network of the account sharing it; rhetoric & resonance matters but engagement potential is also dependent on who is doing the pickup and what their reach potential is.

ReplyOpen [docs.google.com]

2 suggestions



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"[by malign actors]"*

ReplyOpen [docs.google.com]



Renee DiResta

• 4:00 PM, Dec 31, 1969 (PST)

New

Add: *"by a trusted source"*

ReplyOpen [docs.google.com]

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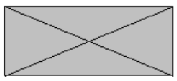

To: Kate Starbird[kstarbi@uw.edu]
From: Renee DiResta
Sent: Mon 12/20/2021 12:08:55 AM
Subject: RE: Virality Project - final report review
Received: Mon 12/20/2021 12:09:37 AM

Yup, I'll do these tomorrow. Happy to discuss that final point, pretty free next week so just let me know when.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Sunday, December 19, 2021 12:13 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Fwd: Virality Project - final report review

Hi Renee,

Here's the feedback from our lawyers. Are you able to make the suggested changes? And perhaps we should talk about that final point there?
Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: RE: Virality Project - final report review
Date: December 18, 2021 at 9:58:48 PM PST
To: Kate Starbird <kstarbi@uw.edu>
Cc: Julia Carter Scanlan <jccarter@uw.edu>

Kate –

Thanks for sending. I have reviewed all three chapters—they look solid from a legal standpoint. Chapter 1 does a good job of defining the terms and disclosing the underlying facts for the conclusions that follow (which, as we've discussed, helps a lot from the standpoint of defending potential defamation claims). I have just a few minor notes. I'm happy to discuss after I return 12/28. Please also send the additional material when it's ready.

Chapter 1
--In all of the definitional footnotes, I would recommend adding some context along the lines of: "See Appendix X: Definitions for definitions of "misinformation" and "disinformation," as used in this Report."

--P. 2: "*Plandemic* was a slickly produced video that spun the testimony of a discredited government whistleblower together with health misinformation about COVID-19 to feed a broader conspiratorial tale of profiteering and cover-ups." I strongly suggest adding a citation supporting the highlighted parts.

Chapter 4 Narratives

--FN14: "CHD tends not to be reliable." I would suggest deleting this. It seems like gratuitous poking here, in a way that could play out unhelpfully if there's ever a claim. Alternatively, please add a cross-reference to the later, more expansive discussion of CHD.

--p. 10: The term "Repeat Spreaders" is capitalized. Is it a defined in an earlier chapter I don't have?

Chapter 5
--P. 24: We say Berenson's posts are "posed as 'digging up' …." Could we use a less loaded term than "posed"? I think "couched as" would have the same meaning.
-
-We say in Chapter 1, p. 6: "Smith notes that most of these influencers are not ordinary citizens but individuals or

groups who benefit (often, financially) from the spread of health misinformation. That leaves open the suggestion that the influences/actors highlighted in Chapter 5 benefit financially or in some other tangible way from spreading misinformation. If we know that isn't true for any one in particular – that is, if we have information indicating any of them are truly amatuers/volunteers – let's discuss. I would want to at least talk through addressing that point in some fashion.

Thanks.

Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
Tel: (206) 757-8148 | Cel: (206) 369-7476
Email: ericstahl@dwt.com | Website: www.dwt.com
Bio: www.dwt.com/lawdir/attorneys/StahlEric.cfm
Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 15, 2021 9:56 AM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>
Subject: Virality Project - final report review

[EXTERNAL]

Hi Eric,

I hope your trial went well yesterday.

I'm sending over three chapters for our final report for the Virality Project. Chapters 4 and 5 are the two that mention people and organizations by name. Chapter 1 is an intro. My understanding is that Chapter 1 is still in flux a bit as we've asked that the definitions get updated in the text. I think we're currently using an appendix for the definitions. It will be included at the end of Chapter 1 (rather than at the end of the report). I can send you an updated version of Chapter 1 later this week, but wanted to make sure you have the context there before reading Chapters 4 and 5 (which are at or very close to their final state here).

Please let me know if you have any questions. I'll be around and fairly responsive through the end of next week. (And then slightly less responsive Dec 26-Jan2).

Thank you,
Kate

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Tue 9/6/2022 6:45:23 PM
Subject: Election MDM Thre... - we have framed this elsewhere as fami...
Received: Tue 9/6/2022 6:45:25 PM

Renee DiResta added a comment to the following document

Election MDM Threat Framework
[docs.google.com]

1 comment

The novelty and familiarity dimensions

Renee DiResta

• 11:40 AM, Sep 6 (PDT)

New

we have framed this elsewhere as familiarity, novelty, and repetition - where the perception of a piling-up of familiar, novel incidents also has an effect. Ballots in a ditch, ballots in a dumpster, ballots on the ground, ballots in Sonoma, ballots in [wherever] all in aggregate combine to reinforce, but also to keep the concern top-of-mind.

Open [docs.google.com]

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To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (via Google Docs)
Sent: Sat 9/3/2022 4:33:43 PM
Subject: Document shared with you: "Copy of [EIP-810] - SHARPIEGATE analysis"
Received: Sat 9/3/2022 4:33:47 PM

Renee DiResta shared a document



Renee DiResta (rdiresta@stanford.edu) has invited you to **edit** the following document:


Copy of [EIP-810] - SHARPIEGATE analysis
[docs.google.com]



Renee DiResta is outside your organization.

Open [docs.google.com]

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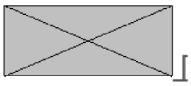
[
[workspace.google.com]

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (via Google Docs)
Sent: Sat 9/3/2022 4:33:03 PM
Subject: Document shared with you: "Copy of [EIP-810] - allegations thatballots completed with Sharpies will not be counted (Shasta County, CA)"
Received: Sat 9/3/2022 4:33:07 PM

Renee DiResta shared a document



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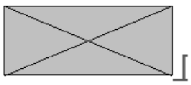
[
[workspace.google.com]

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Renee DiResta (Google Docs)
Sent: Sat 9/3/2022 1:32:07 AM
Subject: Influencer - Revi... - I think we need to delete this senten...
Received: Sat 9/3/2022 1:32:09 AM

Renee DiResta replied to a comment in the following document

Influencer - Revision
[docs.google.com]

1 comment

Research on the social media influencer has examined not just the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics

Matt DeButts

• 11:07 AM, Aug 31 (PDT)

I think we need to delete this sentence or cite something

Renee DiResta

• 6:27 PM, Sep 2 (PDT)

New

https://www.sciencedirect.com/science/article/pii/S1471772717303470 [google.com] mobilizing activism

Solis covers selling products.
McGregor covers political campaigns.

Open [docs.google.com]

Google LLC, 1600 Amphitheatre Parkway, Mountain View, CA 94043, USA

You have received this email because you are subscribed to all discussions on Influencer - Revision [docs.google.com]. Change what Google sends you [docs.google.com]. You can reply to this email to reply to the discussion.

To: Shelby Grossman[shelbygrossman@stanford.edu]
Cc: Alex Stamos[stamos@stanford.edu]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Mon 9/12/2022 4:36:16 PM
Subject: Re: Moderate panel at Trust & Safety Research Conference?
Received: Mon 9/12/2022 4:36:18 PM

Hi Shelby,
Sorry for the slow reply! Thanks for the invitation. I'd be happy to moderate this panel!

A few questions: How long does each presenter get? Is there a time-keeper or is that me? Do I have to coordinate with the presenters, e.g. to get their bios, or is that managed by someone else?

Kate

On Sep 7, 2022, at 2:23 PM, Shelby Grossman <shelbygrossman@stanford.edu> wrote:

Hi Kate,

Would you be interested in moderating this panel at the Trust & Safety Research Conference? https://www.tsresearchconference.org/events/trust-safety-across-platforms [tsresearchconference.org] (Thursday, Sept. 29 at 1pm)

This would involve doing brief intros for the panelists, and facilitating questions from the audience. You would also be welcome to ask any questions of your own / make brief synthesis comments.

Best,
Shelby

--
Shelby Grossman
Research Scholar
Stanford Internet Observatory
WhatsApp/Signal: +1-781-249-2131

To: kstarbi@uw.edu[kstarbi@uw.edu]
From: Nina Jankowicz
Sent: Mon 10/3/2022 12:45:30 AM
Subject: You made the watchlist
Received: Mon 10/3/2022 12:45:40 AM

Sent from Yahoo Mail on Android [go.onelink.me]

To: Alex Stamos[stamos@stanford.edu]
Cc: Buder, James K (ATG)[james.buder@atg.wa.gov]; Flanagan, Sarah[sarah.flanagan@pillsburylaw.com]
From: Kate Starbird
Sent: Thur 9/30/2021 9:48:23 PM
Subject: Re: [A/C Priv] Email to EIP on Veritas
Received: Thur 9/30/2021 9:48:24 PM

Hi Alex,
We just released this statement to our team (with input from our legal and communications teams at UW). I'm bolding the statement that we're using for media at this time.

CIP Community:

Many of you might have seen the story that GeekWire published this morning about a pending lawsuit filed by Project Veritas against the University of Washington and Stanford University.

We are aware of this legal action, and we believe these claims have no merit. We are prepared to make that case in court.

Because this is ongoing litigation, it is important that any communications about this be directed to CIP leadership. If you receive any outreach from the media or the press, please direct them to me or Michael Grass (megrass@uw.edu), and we will handle them.

In addition, please be mindful and aware that your personal social media activity, as well as any emails related to your UW work and from your UW accounts, could be considered public records and may be used in legal proceedings. We encourage you to be mindful and thoughtful about what you choose to communicate in these forums.

We will take a few minutes at the beginning of our lab meeting next week to answer any questions you might have about this. If you'd like to chat sooner, please don't hesitate to reach out to any of the CIP leadership.

With thanks,

Kate

On Sep 30, 2021, at 2:42 PM, Alex Stamos <stamos@stanford.edu> wrote:

Kate,

Politico has asked us for comment on the lawsuit and will run a story imminently. I wanted to get an email out to all of EIP to make sure we don't have individuals talking about this on social media, as that could really hurt the legal case.

1. Does this email look ok to you?
2. What's the comms contact at UW I can include?

Call if you need: 415-378-9580
-Alex

To: All EIP Members at Four Institutions
From: Alex Stamos

Dear Colleagues-

As you will likely hear soon from media sources, Project Veritas filed a lawsuit against Stanford University and the University of Washington in Federal Court last night, claiming that our blog post on their claims of ballot harvesting constitutes defamation.

We strongly deny their claims and stand behind our work. Both universities will vigorously fight this issue in court.

As this is likely to cause several media cycles of commentary, it is imperative that you do not comment publicly or respond to any requests for comment. Please do not discuss this lawsuit or Project Veritas on social media. Both universities have approved statements that they can send on behalf of EIP. The emails for the correct communications contacts are below.

As is always the case with lawsuits, it is also important to keep our internal discussions of this matter to a minimum. We all have very important work to do on the current disinformation environment, and we should not let this lawsuit distract us from the contributions we continue to make.

If you have any questions, you can contact myself or Kate Starbird and ask to speak to us and the attorneys.

Thank you for your partnership during 2020 and beyond.

Sincerely,
Alex

For Stanford affiliates, direct any press inquiries to EJ Miranda <ejmirand@stanford.edu>
For UW affiliates, direct any press inquiries to XXX
Other EIP members can decide to not comment or send reporters to either university spokesperson.

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Alex Stamos[stamos@stanford.edu]
From: Kate Starbird
Sent: Wed 2/24/2021 5:54:41 PM
Subject: Fwd: Attorney-Client Privileged - EIP review, chapters 2-4
Received: Wed 2/24/2021 5:54:50 PM
Christine Kruger shared"http://Attorney.ReviewCopy of Chapter3 comprehensive draft 4842-8404-0414 v.1.docx" with you.eml
Attorney.Review.Chapter 4 Structure and Dynamics.docx

Hi Renee,
Passing on the notes from chapters 2-4. It looks like he has some specific instructions and recommended edits. I can take on Chapter 4 (and 5 when it comes in). Are you able to address his comments/recommendations from chapters 2/3?

Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: Attorney-Client Privileged - EIP review, chapters 2-4
Date: February 24, 2021 at 9:47:45 AM PST
To: "Buder, James K (ATG)" <james.buder@atg.wa.gov>, Kate Starbird <kstarbi@uw.edu>

Kate, James –

I have completed my legal review of chapters 2 through 4. (I hope it's ok that I am sending my comments somewhat piecemeal. The legal issues here aren't huge, but I realize addressing some of them may take time to process, and I am mindful of your pending publishing deadline.)

There are only a few recurring recommendations. You will see that I suggest adding factual citations in a number of places, particularly where we are making representations about identified individuals or posts. I'm also recommending some extra care with how we describe Parler (e.g., I suggest not calling it a "fringe" site); and Project Veritas (e.g., I flagged places where we describe it as exclusively a "disinformation" outlet – it would be safer to go with "mis- or disinformation," if that's accurate). If you want to discuss these or any other changes, or need a further explanation of what I'm thinking, just let me know.

Chapter 2 – I have just have one small note. On page 7, I would revise the sentence referencing Parler like so: "The low percent of tickets for Parler, which is not as easy to observe, should not necessarily be interpreted as Parler having less misinformation."

Chapter 3 – The file is too large to email. The attached message from Christine Kruger has a Dropbox with a Word version that has my redlines and comments. Let me know if you have any trouble accessing. (Also note –this Word doc is from an earlier version of chapter 3, but the portions I edited are the same as in the most recent (pdf) version Kate sent me.)

Chapter 4 – My comments are in the attached Word doc. (As before, I cleared redlines/comments in the doc so all of the edits you see are mine.)

Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
Tel: (206) 757-8148 | Cel: (206) 369-7476
Email: ericstahl@dwt.com | Website: www.dwt.com
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From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, February 23, 2021 4:12 PM
To: Stahl, Eric <ericstahl@dwt.com>

Cc: Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: Re: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric,

Thanks for this. I'll push this out to our collaborators and work on addressing your comments ASAP.

(And sorry for the formatting issues.)

Kate

> On Feb 23, 2021, at 8:51 AM, Stahl, Eric <ericstahl@dwt.com> wrote:
>
> Kate, James:
>
> Here is my legal review of Chapter 1. I have just a handful of comments, but they go to the critical issue we discussed previously: disclosing the basis for determining that something is false/misleading. I think a version of the explanation for how you checked veracity is included in the definition of "Tickets" (which is in the definitional section at the very end of the full draft). But I recommend incorporating the explanation up front, as part of the description of the methodology in the first chapter.
>
> Also note, the Word version of this chapter had a number of editorial comments and redlines. I deleted those, so the comments and redlines in the attached are mine.
>
> Please let me know if you have any questions. I'm continuing my review. Thanks.
Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
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To: Stahl, Eric[ericstahl@dwt.com]
From: Christine Kruger (via Dropbox)
Sent: Wed 2/24/2021 4:09:44 PM
Subject: Christine Kruger shared"http://Attorney.ReviewCopy of Chapter3 comprehensive draft 4842-8404-0414 v.1.docx" with you
Received: Wed 2/24/2021 4:09:51 PM

[EXTERNAL]



Hi Eric,

Christine Kruger (christinekruger@dwt.com) invited you to edit the file "**Attorney.Review Copy of Chapter 3 comprehensive draft 4842-8404-0414 v.1.docx**" on Dropbox.

View file

Enjoy!
The Dropbox team

Report to Dropbox

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ATTORNEY-CLIENT PRIVILEGED
LEGAL REVIEW

Chapter 4: Structure and Dynamics (Tactics)

Chapter 4: Structure and Dynamics (Tactics)

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4 Summary

1 Introduction

In this chapter, we attempt to understand *how* false and misleading narratives about the 2020 election, highlighted in Chapter 3, took shape and spread across a multiplatform information ecosystem. During the 2020 election, misinformation was shared across a range of social media—from broadly popular platforms like Facebook, Instagram, Twitter, and YouTube, to niche sites like Reddit, to up-and-coming sites like Periscope and Tiktok, to more "alt-platforms" such as Parler, and to message boards such as the chans or thedonald.win. These diverse platforms were leveraged in distinct and often complementary ways by those spreading false and misleading information about the election. Additionally, algorithmic curation systems shape the dynamics of social networks, and behaviors that manifest across them, as engagement begets algorithmic amplification, complicating the story of how content is created, disseminated, and reaches end users. Here we examine the underlying structure of this ecosystem—the different platforms involved, and the way information moves between them. We consider the affordances of their features, which enable communities to form, and enable individuals to activate those communities.

Much of the misinformation narratives that we articulated in Chapter 3 involved the active participation of ordinary people. But rank-and-file accounts and influencers alike strive to capture the attention of larger and larger audiences, in a bid, ultimately, to gain the power that such attention confers.[1] For each social platform, we consider the "work" that is done to create and spread narratives—what we might infer as tactics as well as other dynamics—to describe how these false narratives developed, and to highlight the techniques used to produce them, spread them, and sustain them over time.

2 Cross-Platform Information Sharing

Each platform enables different kinds of social and information interactions; for example, TikTok's user base has a large youth component, and Parler has positioned itself as a destination for conservative users who have experienced—or have perceived they have experienced—censorship on other platforms.[2] Many of these platforms allow content sharing from other platforms, and from the broader information space that includes countless websites, from established news media outlets to conspiracy theory blogs. And though journalists and researchers sometimes draw a distinction between social media and mass media, in a broader view, there are myriad connections between them, as, for example, cable news pundits craft their evening shows based on content that went "viral" that day on social media.[3]

In addition, internet usage statistics suggest that most online information participants—or "users"—are not siloed in a single platform, but turn to different platforms for different reasons.[4] Political activists and others who wish to shape public opinion also employ multiplatform strategies, leveraging different platforms for different parts of their information strategies, and often intentionally moving content from one platform to another.

To facilitate our study of cross-platform misinformation, we grouped tickets created during our monitoring period into incidents: the information cascades that relate to a specific information event or claim, as described in Chapter 3 and discussed more fully in Chapter 5. We used a mixed-method approach to analysis, combining real-time forensic documentation of individual tickets with follow-up qualitative and quantitative analyses of specific incidents and narratives.

---

[1] Charlie Warzel, "I Talked to the Cassandra of the Internet Age," *New York Times*, February 4, 2021, https://www.nytimes.com/2021/02/04/opinion/michael-goldhaber-internet.html.
[2] Greg Roumeliotis,et al., "Exclusive: US opens national security investigation into TikTok - sources," Reuters, November 1, 2019, https://www.reuters.com/article/us-tiktok-cfius-exclusive/exclusive-u-s-opens-national-security-investigation-into-tiktok-sources-idUSKBN1XB4IL.
[3] Yochai Benkle,r et al., "Mail-in Voter Fraud: Anatomy of a Disinformation Campaign," Berkman Center Research Publication No. 2020-6, Berkman Klein Center, October 2, 2020, doi.org/10.2139/ssrn.3703701.
[4] Andrew Perrin and Monica Anderson, "Share of US adults using social media, including Facebook, is mostly unchanged since 2018," Pew Research Center, April 10, 2019, https://www.pewresearch.org/fact-tank/2019/04/10/share-of-u-s-adults-using-social-media-including-facebook-is-mostly-unchanged-since-2018/; Xuan Zhao, Cliff Lampe, and Nicole B. Ellison, "The Social Media Ecology: User Perceptions, Strategies and Challenges," *Proceedings of the 2016 CHI Conference on Human Factors in Computing Systems* (May 2016): 89–100, doi.org/10.1145/2858036.2858333.

We observed that interactions between platforms created emergent cross-platform dynamics. For example, while Facebook was a place to reach large audiences and organize action, Twitter was a place to mobilize and "eventize" longer-form content stored elsewhere. Platform policies shaped some of these dynamics: moderation could lead to inter- and intraplatform spread, as users shared screenshots of deleted content or posted it to platforms with less stringent policies. Below we describe the roles that each platform plays in the election-related mis- and disinformation ecosystem.

[[INFOGRAPHIC DESIGNER WORK WILL GO HERE]]

2.1 Facebook's Role: Public Posts to Reach Large Audiences; Groups for Organizing Protests

Facebook remains a widely popular social media platform, averaging around 2.7 billion active users across the globe.[5] For media outlets, information operators, and even ordinary people, Facebook represents an opportunity to reach large audiences. Public Pages can attract millions of followers, turning their creators into influencers with reach potential on par with some mass media outlets. Groups can be places where people congregate—in public and "private"—around a range of affinities. Through sharing functionality, content can move freely and rapidly between Groups, Pages, and personal accounts and their socially connected graphs. Though our view into Facebook was limited to public content, we were still able to document the platform's role in the spread of several false and misleading narratives.

Facebook Pages as a Place to Reach Massive Audiences
A number of partisan media and other right-wing influencers who appeared in our data collection used their Facebook Pages to spread false and misleading information about the election. Often, this was part of a multiplatform media strategy. On Facebook, this content received significant engagement, including tens of thousands of reshares for some posts and moving from public Pages to personal Facebook feeds.

Facebook Groups as a Place to Share Rumors and Organize
Facebook Groups, both public and private, served as virtual places to come together and share stories of perceived election fraud and to organize a collective response. Perhaps the most successful was the STOP THE STEAL Facebook Group (discussed in detail in Chapter 3). The public Group started as a place to share stories, both first- and secondhand, about a potential "stolen election"—stories that were subsequently reshared through Facebook and cross-posted to other platforms. It grew rapidly, reaching 320,000 users in less than a day, assisted by cross-posted advertisements from right-wing influencers on Twitter.[6] It, along with other Facebook

[5] H. Tankovska, "Number of monthly active Facebook users worldwide as of 4th quarter 2020," Statista, February 2, 2021, "https://www.statista.com/statistics/264810/number-of-monthly-active-facebook-users-worldwide/.
[6] Sheera Frankel, "The Rise and Fall of the 'Stop the Steal' Facebook Group," *Washington Post*, November 5, 2020, https://www.nytimes.com/2020/11/05/technology/stop-the-steal-facebook-group.html.

Groups, quickly evolved into a place to organize protests; as some of the rhetoric grew violent and election workers were threatened, Facebook removed STOP THE STEAL less than a day after launch. Nevertheless, similar groups, albeit at smaller scales, continued to emerge after this takedown, as people looked for places to gather and ways to coordinate protest. In one case, a Group of individuals organized a peaceful protest using a private Facebook Group.[7] But their call-to-action was spread publicly and lost contextualizing information along the way, which led to a more chaotic protest.

2.2 Twitter's Role: Mobilizing Content from Other Platforms; Connecting to Media Outlets and other Influencers; Networked Framing

Mobilizing Content from Other Platforms

In the cross-platform spread of misinformation about the election, the Twitter platform served several diverse roles. A primary role was as a place to draw attention to content such as news articles, videos, and livestreams hosted elsewhere in the media ecosystem. The real-time nature of the platform provided an opportunity to connect existing content to the current news cycle, while platform affordances like short-form messaging and hashtag referencing enabled seemingly disparate narratives to be cross-referenced and integrated from other sources. In particular, cross-posting from YouTube to Twitter was salient in our election integrity incidents, as shown in Figure 4-1.

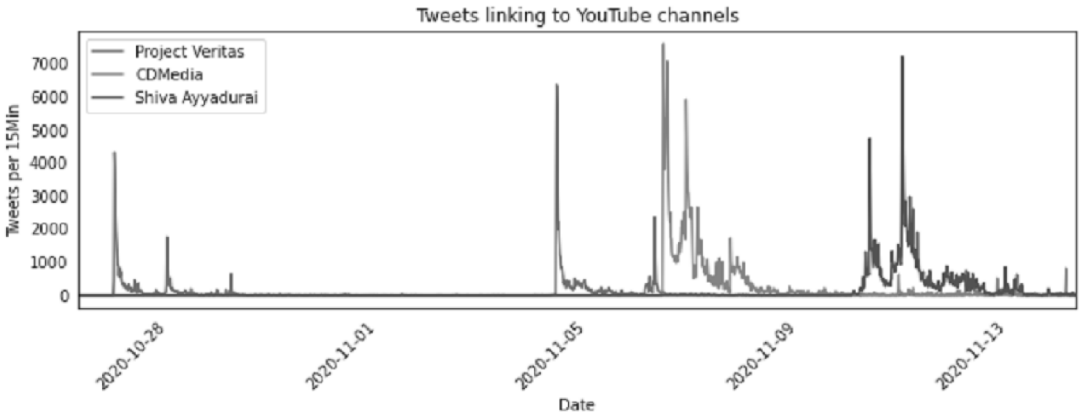

Figure 4-1: Temporal graph of tweets and retweets linking to prominent YouTube channels over time, in tweets per 15 minutes, for three prominent repeat spreaders (described in Chapter 5).

By cross-posting their videos to Twitter, repeat spreaders worked to popularize videos alleging election fraud. In some cases, the Twitter spikes align closely with the release of a new video. The tweets linking to Project Veritas, a right-leaning activist media group, follow this pattern—each burst is related to a different video. In other cases, e.g., tweets linking to compilation videos produced by right-leaning CDMedia and Dr. Shiva Ayyadurai (a coronavirus

[7] Brandy Zadrozny and Ben Collins, "Facebook anti-lockdown group mobilizes to drive people to vote-counting location in Detroit," NBC News, November 4, 2020, https://www.nbcnews.com/politics/2020-election/live-blog/2020-11-04-trump-biden-election-results-n1246346/ncrd1246485.

and election-related conspiracy theorist and anti-vaccine activist, also known as Dr. Shiva), the same video is mobilized (re-introduced and widely spread) multiple times. Information cascades related to content from Project Veritas and Ayyadurai are described in Chapter 5.

YouTube was not the only platform to serve as host for long-form videos subsequently linked to Twitter to reach a larger audience. For example, Ayyadurai's statistics-based content was regularly hosted on Periscope but cross-posted on Twitter to expand viewership and connect with other incidents using hashtags and tagging influential users.

Connecting to Influencers

Twitter also allowed prominent spreaders of election-related misinformation to direct the attention of their own large audiences, as well as other influencers, to a specific piece of content; the content was then amplified across platforms by this audience of influential users, journalists, and politicians, including President Trump, his campaign team, and his family.

The cross-platform nature of this amplification draws attention to the dynamics of "networked framing" (Box 4.1). Twitter often served as the focal point for these collective narratives. In addition to the size of its audience, the platform's mobile connectivity enabled disconnected fraud narratives to be drawn together and assembled into specific frames (i.e., widespread election fraud) using content from other websites and social media platforms.

For example, the Hammer and Scorecard/Dominion narratives described in Chapter 3 began with claims of poll glitches in online conversations on websites and Twitter, then spread through YouTube videos and the use of hashtags related to the incident on Twitter and other platforms, such as Parler and Reddit. From there, high-profile accounts drew further attention to the incidents, as did hyperpartisan news websites like The Gateway Pundit, which used Twitter to promote its article discussing the incident.[8] This collective Dominion narrative spread has since grown, having been subsequently promoted by the Proud Boys, The Western Journal, and Mike Huckabee across a number of platforms, including Facebook, Twitter, Instagram, Telegram, Parler, and Gab.[9] On each platform, these narratives remain tethered together by relying on the Twitter hashtags #dominionvotingsystems and #dominionsoftware. By bouncing unreliable evidence back and forth from Twitter to other social media platforms, what were initially unremarkable incidents confined to local counties became a national story, much like the Stop The Steal and Sharpiegate narratives.

Megathreads

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[8] Jim Hoft, "Update: Corrupted Software that Stole 6,000 Votes From Trump in Michigan County — Shut Down for TWO HOURS in Red Counties in Georgia on Election Day," The Gateway Pundit, November 6, 2020, https://www.thegatewaypundit.com/2020/11/update-corrupted-software-stole-6000-votes-trump-michigan-county-shut-two-hours-red-counties-georgia-election-day/

[9] Proud Boys Uncensored (@ProudBoysUncensored), Telegram, https://t.me/ProudBoysUncensored/5255; The Western Journal (@WesternJournal), "The same software was used in 64 other counties," Facebook, November 6, 2020, https://www.facebook.com/123624513983/posts/10159192437198984; Mike Huckabee, "The same software was used in 64 other counties," Facebook, November 6, 2020, https://www.facebook.com/6934857868/posts/10157985115072869.

An additional technique unique to Twitter, due to its specific affordances around threading and content temporality, was the use of "megathreads"—dozens or even hundreds of tweets connected through reply-chains—to connect a mix of real incidents as well as false and misleading claims into a long narrative alleging fraud and attempting to delegitimize the election. One such thread featured detailed allegations of fraud, state-by-state, through over 100 author-appended replies to a single tweet, linking to a number of external website sources and content on other social media platforms. These types of threads leverage platform-specific design affordances: the list-based nature of megathreads allows them to be recycled in terms of their visibility and engagement each time a new item is added to the list.

Cross-Platform Sharing to Evade Moderation on Twitter

For both Twitter megathreads and single posts spreading misinformation, the cross-platform nature of these narratives also limited the efficacy of the platform's response. We saw numerous cases in which misinformation first shared on Twitter continued to spread on other platforms even after it was removed—in some cases, a simple screenshot of the since-removed tweet was shared elsewhere—as illustrated in Figure 4-2.

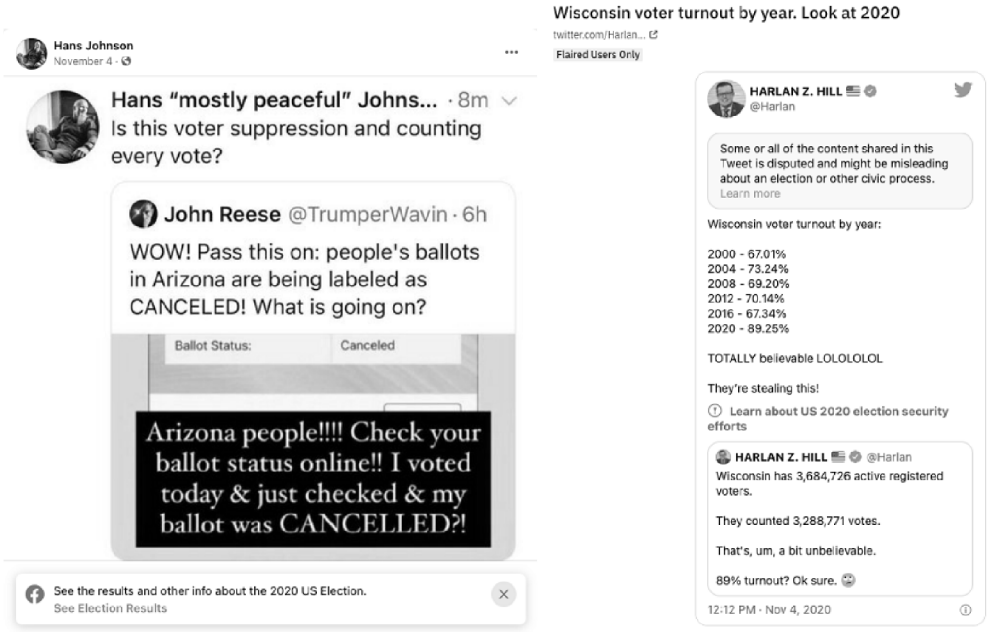

Figure 4-2: Screenshots of cross-posting on Facebook (left) and Reddit (right).

On the left, we see a Facebook user posting a screenshot of his own reply on Twitter to perpetuate a disproven narrative even after it was removed on Twitter. On the right we find a similar instance on Reddit, where a tweet by political consultant Harlan Hill alleging a stolen election was hidden behind a label on Twitter but is presented in full on Reddit.

In these ways and others, Twitter served to perpetuate and amplify misinformation narratives despite efforts to limit its involvement.

2.3 YouTube's Role: A Resource for Livestreams, Compilations, and Mobilizations

Most major platforms now have the capacity for sharing video; however, YouTube exists as a uniquely popular platform for videos that are long-format and can be monetized. While search and recommendation functions exist within YouTube, traffic is often driven from other platforms. During the 2020 election, YouTube provided a space for video-format misinformation that could be shared easily across platforms. The platform functioned both to provide official and familiar-looking "evidence" for misleading narratives and to consolidate otherwise disparate narratives as part of a broader picture.

Compilation and Long-Form Videos
One effective form of YouTube content—in terms of spreading misleading narratives about the election—were compilations, or videos that synthesized content across different events and narratives.[10] Though these longer videos may not have the potential for mass virality, they exist as touchstones for other misinformation superspreaders to continuously refer back to—from other locations in the information ecosystem—as supportive evidence of the veracity of their narratives.

These YouTube videos presented challenges to media literacy. They were typically produced by partisan news outlets or users and organizations with a large presence on other platforms. These groups harnessed high production quality and verified accounts to create videos that either misled the public through deceptive editing or compiled multiple false and misleading narratives. Mainstream, cable, and hyperpartisan news outlets alike host content on YouTube, and much of it has a similar format, look, and feel. For example, Project Veritas's videos often begin with host James O'Keefe sitting in what appears to be a well-established newsroom, and Shiva Ayyadurai's videos present him as an expert source on a television news show.

Another consequence of the long-form, multinarrative nature of YouTube videos is that misinformation—and even more so, disinformation—can be difficult for the general public to discern. A video containing several distinct narratives would require substantial time on the part of a scrupulous viewer to evaluate. This long-winded approach to misinforming can overwhelm, creating the impression of election fraud without the viewer critically evaluating, or even remembering, the slate of "evidence."

Livestreams
YouTube is also used to build an audience for a unique type of content producer—the livestreamer.[11] Several of the top accounts in our YouTube analyses are conservative

[10] This type of video, such as ones shared by CDMedia and Shiva Ayyadurai, bears similarity to the image-based "evidence collages" documented by Krafft and Donovan; see P. M. Krafft and Joan Donovan, "Disinformation by Design: The Use of Evidence Collages and Platform Filtering in a Media Manipulation Campaign," *Political Communication* 37, no. 2 (March 2020): 194-214, doi.org/10.1080/10584609.2019.1686094.
[11] Samantha Bradshaw, et al., "Election Delegitimization: Coming to You Live," Election Integrity

influencers who have used YouTube Live to build their following and subsequently spread misinformation. These include right-wing pundit Stephen Crowder, who hosts a daily livestreamed commentary show, and Dr. Ayyadurai. The YouTube Live feature (and its counterparts on other platforms, such as Facebook Live) create complex moderation challenges for platforms wishing to minimize misinformation, as the streams are often boosted in the moment by platform algorithms, though there is little opportunity to address claims in real time. Videos often persist on the platform permanently, where they continue to rack up views. However, in their permanent state they may be labeled. The top-viewed video in our data sample, for instance, is a livestream by Stephen Crowder titled "Live Updates: Democrats Try to Steal Election!?" that aired on November 4 and has subsequently gained over 5 million views. It was eventually labeled: "Robust safeguards help ensure the integrity of election results."

2.4 Long Tail Platforms for Unique Formats and Niche Communities

As mainstream platforms tend to exhibit some content moderation, these actions feed into narratives of "censorship," leading some users to seek alternative forums. These range from smaller platforms like TikTok, to almost entirely unmoderated spaces like 8Kun and Discord, to places where moderation is more aligned around a partisan ideology, like Parler and some subreddits. The entirely unregulated spaces function as a breeding ground for more extreme narratives involving the Deep State, QAnon, and encouragement of political violence. However, these platforms' relatively small user base necessitates misinformation leaking or being ported into more mainstream sites in order for it to have impact.

Misinformation Narratives Reappearing on TikTok

One phenomenon we observed was content that originated on other platforms such as Twitter, Facebook, and Instagram, then reappeared on TikTok. A common tactic was the use of TikTok's "green screen" feature, where users create a video with an uploaded image, screen capture, or video as the background. For example, as displayed in Figure 4-3, tweets that shared misleading graphs aimed to delegitimize the election results in Michigan and Wisconsin were reshared as backgrounds on TikTok where users discussed the conspiracies.

Partnership, November 17, 2020, https://www.eipartnership.net/rapid-response/election-delegitimization-coming-to-you-live.



Figure 4-3: A TikTok user reshares a tweet displaying misleading graphs to support the false narrative that the results in Michigan and Wisconsin have been rigged. The video received 29,000 views, 1,751 comments, and 4,159 shares before being taken down.

Sometimes, content was actioned by one platform while it persisted unactioned on another. Figure 4-4 below shows how one user, when TikTok took down a debunked video, used the platform's green screen function to direct his followers to the same video on Instagram. TikTok and Instagram have since removed both videos.



Figure 4-4: Cross-platform spread of a now-debunked video. Top left, a video allegedly showing burning ballots is posted to 8Kun on November 3, 2020, 11:27 am PT. Top right, a screen capture of the video that was posted to 8Kun. Bottom left, the next day at 2:00 pm PT, TikTok user Cuddy Camaro (@camarocuddy) posts a video using the 8kun video as his green screen. In the video, Camaro states that TikTok won't let him upload the video, so he directs people to his Instagram account (@cuddycamaro), where he has posted the video. Bottom right, on

Instagram, his post with the video received over 133,000 views by November 4, 2020, 5:00 pm PT, before it was taken down a few hours later.

Instagramming Screenshots of Posts on Other Platforms

Similar to TikTok, misleading content about the election on other platforms appeared later on Instagram. For example, several of the highly engaged-with Instagram posts from repeat spreaders consisted of screenshots of tweets—often tweets authored by other people. Many of these images included additional visual effects, such as added or crossed-out text, to reinforce, refine, or counter the meaning or framing in the original content. Some of the most influential repeat spreaders used Instagram as part of a multiplatform strategy, adapting their content to Instagram's image-based format.

Parler as an Emerging Meeting Place for Right Wing Influencers and Audiences

Parler was another smaller, emergent platform that came to play a significant role in the 2020 election as a community for pro-Trump activism and perpetuation of pro-Trump conspiracy theories post-election.[12] Unlike other platforms involved in the active, participatory cross-platform information flows described in this section, Parler largely served as something of an echo chamber set apart from the major platforms. While content from websites, Twitter, and YouTube were shared *to* Parler, the reverse was infrequent.

Parler was established in 2018 as a "censorship-resistant" platform catering to right-leaning users and funded by conservative donors, including Rebekah Mercer. Its founders and early adopters—such as part-owner and prominent pro-Trump policital commentator Dan Bongino—recruited its userbase from right-leaning audiences who had come to feel that mainstream platforms were censoring them. Several of Parler's earliest prominent accounts were individuals who had, in fact, been deplatformed on mainstream social media for specific rules violations, such as Alex Jones and Roger Stone.[13] Users joined in bursts that were often tied to a particular allegation of censorship; in late June 2020, for example, when Twitter's application of a fact-check label to President Trump's tweets outraged his fan base, and again, in October 2020, when mainstream platforms chose to down-rank or not host private adult content from Hunter Biden's laptop. On Parler, such content was easy to find. Parler's commitment to not fact-check any information meant that some of the wilder conspiracy theories and rhetoric about stolen elections—particularly rhetoric with violent undertones—were contextualized, throttled, or taken down by major platforms but moved freely within the Parler community. Members of communities on larger platforms, such as Facebook Groups, recognized this; we observed users within Groups that focused on election rumors and

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[12] David Thiel, et al., "Contours and Controversies of Parler," Stanford Internet Observatory, January 28, 2021, https://cyber.fsi.stanford.edu/io/news/sio-parler-contours.

[13] Casey Newton, "How Alex Jones lost his info war," The Verge, August 7, 2018, https://www.theverge.com/2018/8/7/17659026/alex-jones-deplatformed-misinformation-hate-speech-apple-facebook-youtube; Makena Kelly, "Facebook bans Roger Stone after linking him to fake accounts," The Verge, July 8, 2020, https://www.theverge.com/2020/7/8/21317905/facebook-roger-stone-instagram-removed-proud-boys-far-right-manipulation.

misinformation encouraging other members to create Parler accounts so that they could talk about the claims there.

Parler's user base saw significant growth in the days after the election.[14] Many of its users joined because of their belief in conspiratorial narratives such as Hammer and Scorecard, which remained popular on Parler nearly two months after the election. However, Parler lacked certain features, such as Groups and the ability to sort by top posts, that have made its larger competitors more effective as places to convene for online activism. After its decision not to moderate violent content in the days leading up to the January 6 insurrection at the Capitol, it also struggled to retain hosting: Amazon, Apple, and Google each took action to remove it from their infrastructure, and it was only back online, with a new hosting service, as of February 16, 2021.

Messaging Tools

Beyond platforms, false and misleading claims also proliferated via messaging tools. For example, multiple Miami residents received texts claiming that antifa and BLM protestors planned to terrorize the Miami area following the election. This example highlights how misinformation can be highly localized and originate from sources other than social or broadcast media.

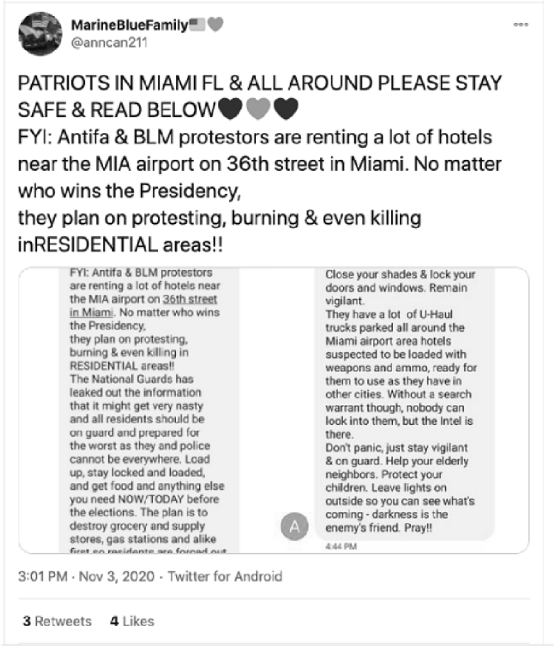

Figure 4-5: A text sent to some Miami residents falsely warning about antifa and BLM protesters.

[14] Thiel, et al., "Contours and Controversies of Parler."

2.5 Cross-Platform Migration as a Demand-Side Issue

Not only did content move across platforms—users themselves moved as well. Researchers often focus on the supply-side of mis- and disinformation—such as how misinformation spreads and its prominence during election cycles.[15] In the 2020 election, the response of social media users to content moderation policies—namely, migrating to alternative platforms such as Parler—foregrounded the *demand* side of misinformation as well.

In line with their content moderation policies, and as described in Chapters 2 and 6, Twitter and Facebook used labeling and content removal to limit election-related misinformation on their websites. A subset of social media users responded to such moderation with claims of liberal censorship, and migrated to platforms with weaker content moderation policies, like Parler. Parler CEO John Matze said that more than 4.5 million new people signed up for the platform in about a week. While it's yet to be seen whether Parler's newfound popularity will continue (some evidence suggests Parler has seen a drop in usage from its pre-election days, and the platform has only recently regained a hosting service after the major ones dropped it), the migration suggests that content moderation by the major platforms won't solve the misinformation crisis entirely.

3 Dynamics of 2020 Election Misinformation

3.1 The Timeline

Misleading information about the 2020 election followed interesting temporal dynamics. In Chapter 3 we trace the evolution of the narratives—stories created by misinformation echoed past stories and gave momentum to the next wave; here, we follow *how* those stories traveled across the election misinformation landscape over time. During the pre-election period, efforts to preemptively delegitimize the election often appeared to be top-down, spreading through right-wing media and accounts of political figures.[16] But they were also, in many cases, decentralized, with one-off incidents bubbling up through social media before reaching influencers and their large audiences. Together, these dynamics worked to foment a general distrust in the election.

Election Day served as a day of data collection for partisan actors, who would later leverage individual tweets and stories as evidence for broader claims. Motivated by growing fears of a "rigged" election, a large number of people went to the polls looking for evidence of voting fraud. Many documented and used social media to share their experiences of perceived and real issues with the voting process, sharing videos, images, and personal accounts. Politically motivated individuals watching from home on social media contributed by amplifying content that aligned with their views or goals.

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[15] Nir Grinberg, et al., "Fake News on Twitter during the 2016 U.S. election," *Science* 363, no. 6425 (January 2019): 374–378, doi.org/10.1126/science.aau2706.
[16] Benkler, et al., "Mail-in Voter Fraud: Anatomy of a Disinformation Campaign."

In the week after Election Day, pro-Trump political operatives, right-wing media outlets, and other content creators—primarily though not exclusively on the political right—assembled evidence from Election Day into larger narratives attempting to delegitimize the results. Armchair statisticians combed available vote tallies looking for anomalies that could be framed as potential fraud. YouTube opportunists made long-form videos connecting different incidents to the "electoral fraud" metanarrative. Though initially chaotic, the information space began to concentrate on smaller incidents that were swept into larger narratives or growing conspiracy theories.

Post election, false claims and misleading narratives began to coalesce around allegations of fraud in swing-state cities that favored Biden. Subsequent court cases seeking to throw out votes in these areas based on the allegations shed light on the motivation for this refocusing. A common tactic involved linking statistical evidence with unfounded claims of vote-tabulation fraud. Diffuse pre- and post-election narratives were blended and presented as walls of evidence. Donald Trump and members of his legal team were instrumental in pushing these narratives, strategically employing them in an effort to overturn the results of the election through legal proceedings. Now, we can see some storylines have taken root, developing into more hardened conspiracy theories that may linger for years to come.

One remarkable phenomenon is the persistence of certain narratives—e.g., that the election would be "rigged"—from the start of our data collection through the end. These narratives were already prevalent when we began our work in August, and as we write this report, participation in the narratives challenging the integrity of the 2020 election is ongoing, with new "evidence" still being added to the conversation, even as the discourse has converged around a few specific conspiracy theories. Research suggests that the conspiracy-theory type of misinformation will have the most staying power—as opposed to more ephemeral rumors that were quickly determined to be false.[17] In particular, claims that are difficult to verify and theories that are impossible to falsify—for example, theories that software on voting machines switches votes without leaving a trace—will likely continue to spread for years to come. These conspiracy theories can become the tools of future disinformation campaigns, and they risk long-term effects such as the continued delegitimization of democratic institutions.

3.2 Participatory Mis- and Disinformation

Our analysis demonstrates that the production and spread of misinformation and disinformation about Election 2020—including false narratives of a "stolen election"—was participatory. In other words, these dynamics were not simply top-down from elites to their audiences, but were bottom-up as well, with members of the "crowd" contributing in diverse ways—from posting raw content, to providing frames for that content, to amplifying aligned messages from both everyday members of the crowd and media (including social media) elites.

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[17] Jim Maddok, et al., "Characterizing Online Rumoring Behavior Using Multi-Dimensional Signatures," *Proceedings of the 18th ACM Conference on Computer Supported Cooperative Work & Social Computing* (February 2015), doi.org/10.1145/2675133.2675280.

Repeatedly, our data reveal politically motivated people sincerely introducing content they mistakenly believed demonstrated real issues with election integrity: from the user who claimed back in early September that a ballot in their name had been sent to their parent's home in another state (weeks before ballots had actually been mailed out); to the man who thought that old ballots (from 2018) in a dumpster were evidence of 2020 mail-in ballot fraud; to the person who thought they were capturing video evidence of a poll worker illegally moving ballots on Election Day (it was a photographer moving his gear); to people who were given Sharpies to complete their ballots and mistakenly believed their votes therefore would not be counted.

Well-meaning, though often politically motivated, individuals repeatedly introduced this content into the broader information sphere, often via social media. In each of these incidents, the person originally reporting the issue (and many of those who passed it along) may have sincerely thought they had found evidence of voter fraud. However, it is also likely—especially considering what we know about confirmation bias[18]—that political views and prevailing narratives about potential election fraud both contributed to these individuals' misinterpretation of what they were experiencing and motivated them to share the content.

<Box 4.1>

Networked Framing: How Right-Wing Media and Social Media Influencers Helped to Frame "Evidence" of Ballot and Voting Issues as "Election Fraud"

In Chapter 3, we noted the role of "framing," or providing scaffolding for selected information to shape how people interpret the world, in helping to create and sustain the false "stolen election" narrative. Traditional notions of framing often place the power of creating and communicating frames within the domain of media elites.[19] With the rise of participatory media and disruption of the historical role of "gatekeepers," researchers have documented the phenomenon of "networked framing," where diverse members of online communities—including political and media elites, social media influencers, and to some extent anyone with a social media account—collaborate to create and propagate certain frames.[20]

In our analyses, we repeatedly saw this kind of networked framing in action. Diverse social media users—from anonymous accounts with small followings, to blue-check social media influencers, to accounts associated with hyperpartisan media outlets—were consistently helping to do the work of "framing" by assigning intent to, or exaggerating, real-world events in their posts, in such a way as to fit the narrative of election fraud. Though networked framing practices could be seen, to some extent, on "both sides" of the political spectrum, our data show that right-

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[18] D.J. Flynn, Brendan Nyhan, and Jason Reifler, "The Nature and Origins of Misperceptions: Understanding False and Unsupported Beliefs about Politics," *Advances in Political Psychology* 38, no.1 (January 26, 2017): 127-150, doi.org/10.1111/pops.12394.

[19] Pamela J. Shoemaker and Timothy Voss, *Gatekeeping Theory* (Routledge, 2009), doi.org/10.4324/9780203931653.

[20] Sharon Meraz and Zizi Papacharissi, "Networked Gatekeeping and Networked Framing on #Egypt," *The International Journal of Press/Politics* 18, no. 2 (2013): 138-166, doi.org/10.1177/1940161212474472.

wing networks were far more active and influential (in terms of dissemination) in discourse that threatened election integrity (see Chapter 5, Figure 5-1).

One example of this networked framing activity occurred in late September 2020, when a batch of mail—originally reported to have absentee ballots—was discovered in a ditch in Greenville, Wisconsin.[21]

There was not, nor has there been discovered since, any evidence that this mail-dumping incident was politically motivated. Despite the lack of any evidence, this event was quickly picked up and positioned within the voter fraud frame—and the story eventually propagated widely within that frame, reinforcing the false perception of mail-in voting contributing to widespread election fraud.

The story of ballots in a ditch first appears (in significant numbers) in our data through an article on The Gateway Pundit,[22] which often works by selecting content from other sources and positioning that content within their highly political frames. In this case, The Gateway Pundit repurposed an article from a local (FOX11) news outlet.[23] In addition to embedding the content of that borrowed article in its text, The Gateway Pundit article added four sentences of original content.

Its first sentence, which appeared above the borrowed content, made the framing clear. Without any evidence connecting the incident to anyone with a political motive, The Gateway Pundit's article began with: "Democrats are stealing the 2020 election." Next were two sentences making factual claims borrowed from the FOX11 article—that two trays of mail had been found and that they included absentee ballots. And finally the article attempted to make a connection between that mail and Democrats by stating that "The USPS unions support Joe Biden."

Those four sentences and the borrowed content are the entire article. Without evidence, it frames the improperly discarded mail as election "stealing" by Democrats. That article—and therefore that frame—spread widely on Twitter. It was tweeted/retweeted nearly 25,000 times. In total, we collected 60,000 tweets that referenced the incident.

The early propagation of the narrative was assisted by @Rasmussen_Poll (through an original tweet linking to The Gateway Pundit's article) and @EricTrump (through a retweet). Other online

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[21] Ian Kennedy, et al., "Emerging Narratives Around 'Mail Dumping' and Election Integrity," Election Integrity Partnership, September 29, 2020, https://www.eipartnership.net/rapid-response/mail-dumping; WBAY News Staff, "Absentee ballots among mail found along Outagamie County highway," WBAY Wisconsin, updated September 24, 2020, https://www.wbay.com/2020/09/24/absentee-ballots-mail-found-along-outagamie-county-ditch/; Casey Nelson, "Postal Service Investigating Mail Found in Greenville Ditch," WYDR Wisconsin, September 23, 2020, https://943jackfm.com/2020/09/23/postal-service-investigating-mail-found-in-greenville-ditch/.

[22] Jim Hoft, "Breaking: US Mail Found in Ditch in Rural Wisconsin - Included Absentee Ballots," The Gateway Pundit, September 23, 2020, https://www.thegatewaypundit.com/2020/09/breaking-us-mail-found-ditch-greenville-wisconsin-included-absentee-ballots/.

[23] FOX11 News staff, " Mail found in ditch in Greenville," WLUK Wisconsin, September 23, 2020, https://fox11online.com/news/local/mail-found-in-ditch-in-greenville.

accounts picked up and advanced that voter fraud frame, calling it "LEFTIST VOTER FRAUD" and stating through a hashtag that "#DemocratsAreCheaters."

A few prominent social media accounts picked up the story with a slightly more subtle framing. For example, the tweet below, posted by another verified repeat spreader account, does not explicitly claim voter fraud, but shapes the interpretive frame toward "voter fraud"—or at the very least toward doubting the integrity of mail-in voting—by highlighting that the mail was "FOUND IN DITCH" and that it included "ABSENTEE ballots."



Figure 4-6: Tweet from Chuck Callesto framing a mail-dumping issue as an election integrity concern.

This event—and its framing as a "voter fraud" issue—eventually made it into a public statement by Kayleigh McEnany, White House press secretary.[24]

This example demonstrates how hyperpartisan media and other prominent social media users on the political right reframed events in misleading ways to feed false narratives of widespread election fraud by Democrats. It also reveals another dynamic that we saw repeatedly across these incidents, where local media coverage was opportunistically appropriated and often recontextualized to fit election fraud narratives.

Similarly, the Sharpiegate narrative (described in detail in Chapter 3) took shape through networked framing. Early tweets—from voters in various locations on Election Day—highlighted somewhat open-ended concerns about Sharpies bleeding through ballots. Tweets and retweets framing the concerns as potential voter fraud were often generated by less prominent accounts, including voters describing perceived issues with their own ballots and "grassroots" political activists relaying and occasionally reframing those concerns. Often, accounts with smaller follower numbers would add @mentions of more prominent accounts to try to gain their attention and potentially gain traction for their content through a high-profile retweet or quote tweet. Those influencers and political media elites then used the claims to bolster the "rigged election" narrative.

Together, these examples show how networked framing—including selecting certain pieces of evidence and placing it within the voter fraud frame—was not the exclusive terrain of high-profile

[24] Patrick Marley, "Mail found in Greenville ditch did not include any Wisconsin ballots," *Milwaukee Journal Sentinel*, updated October 1, 2020, https://www.jsonline.com/story/news/politics/elections/2020/10/01/mail-found-greenville-ditch-did-not-include-any-wisconsin-ballots/5883960002/.

accounts, but also incorporated the work of voters motivated to share their experiences and politically active social media users helping to identify and amplify potential cases of voter fraud.

[END CALL-OUT]

For example, President Trump's many statements (including tweets) about the election being "rigged' may have sufficiently primed his supporters to be on the lookout for evidence of election fraud by the time the Trump campaign's "Army for Trump" called for them to perform as formal and informal poll observers. The primary objective of these militarized calls to action was to motivate and organize the mass collection of purported "evidence" of election fraud. The social media data we collected reveal a large number of people searching for, and often mistakenly "finding," evidence of the election fraud they believed was occurring—and then, in a case of participatory disinformation, actively sharing and resharing this kind of content.

Once introduced onto social media, these cases of false witnesses of "election fraud" were frequently picked up and amplified by influencers and rank-and-file accounts alike. Often, the person who introduced the content or another active social media user would try to call the attention of more prominent influencers to potentially relevant content by reposting with tags and/or mentions of more large-audience accounts. Those more influential accounts—often accounts of hyperpartisan media, conservative political figures, and other elite right-wing influencers—played the role of assembling this content to fit the larger narratives (e.g., a "rigged election") and of spreading it to increasingly large audiences.

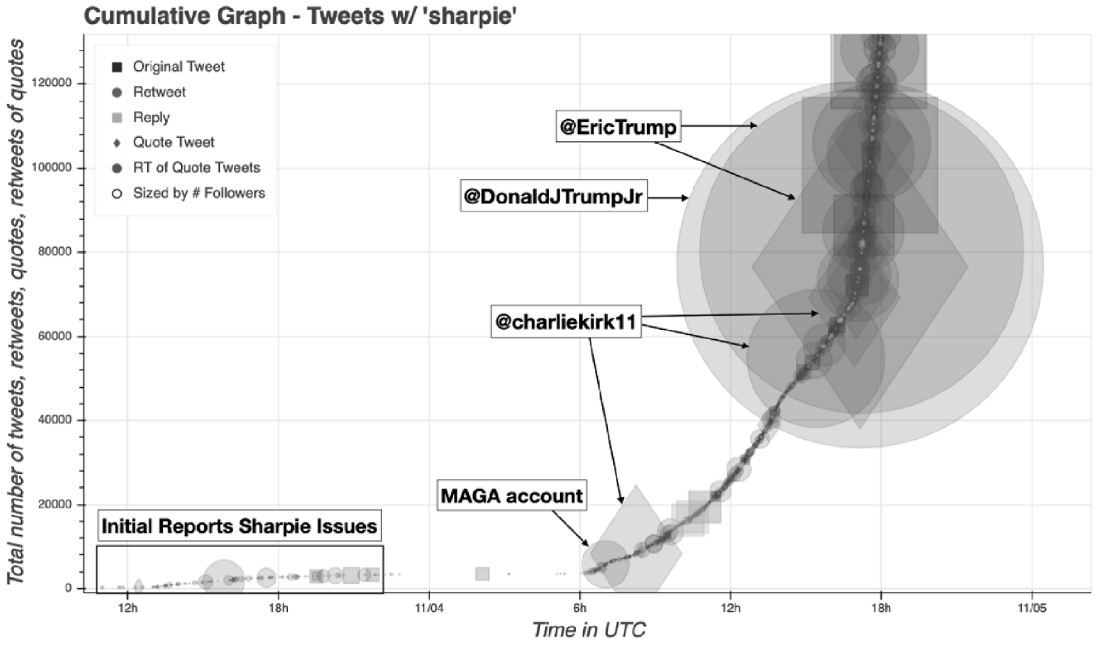

Figure 4-7: Cumulative graph of Sharpie tweets on November 3 (Election Day) and November 4. Individual tweets are plotted at the time they were shared and sized by the number of followers of the account posting them. Color and shape represent tweet type: original tweets in green squares, reply tweets in yellow squares, retweets in blue circles, quote tweets in red diamonds, and retweets of quote tweets in red circles.

Figure 4-7, the cumulative graph of the early spread of "Sharpiegate" rumors, shows the process of participatory disinformation. The conversation started relatively small—with many small-follower accounts often tweeting their own experiences—and then began to gain traction through quote tweets and retweets by accounts with increasingly large audiences, eventually taking off with the help of President Trump's two adult sons.

In dozens of election-integrity incidents, these false or misleading narratives eventually reached the inner echelons of the Trump campaign. In a few notable cases, we saw the narratives move beyond social media into large television audiences through President Trump's debate performances

Friend-of-a-Friend Narratives

One type of participatory misinformation we saw was the "friend-of-a-friend" story.[25] These pieces of evidence, which were often wrapped into larger narratives about disenfranchisement or election fraud, reference a story that the person "heard" from someone else, and the content can extend to increasing degrees of separation—the "friend-of-a-friend." One story asserted that a person's friend had voted for Biden and the machine changed her vote to Trump (see Figure 4-8).



Figure 4-8: A tweet claiming that a voting machine changed their friend's vote from Trump to Biden.

This story spread on Facebook and Twitter, and likely appeared elsewhere as well. We saw a similar dynamic, though to a smaller extent in terms of spread, around claims that a Trump supporter had been redirected to the wrong polling location (see Figure 4-9).

[25] Kolina Koltai, Jack Nasetta, and Kate Starbird, "'Friend of a Friend' Stories as a Vehicle for Misinformation," Election Integrity Partnership, October 26, 2020, https://www.eipartnership.net/rapid-response/friend-of-a-friend-stories-as-a-vehicle-for-misinformation.



Figure 4-9: A tweet claiming that a friend was sent to the wrong voting location.

The spread of these stories has a couple of common drivers. First, "friend" can take on new meaning in online spaces, where an otherwise stranger posting to a Facebook Group can be considered a "friend" whose message is worth spreading. This can result in often well-meaning (or at least not ill-intentioned) people passing along content ("sharing is caring") that people think will be informative or otherwise helpful to others. Second, friend-of-a-friend rumors can be intentionally copied and pasted, sometimes with small changes to minor details—referred to as copypasta—to give the sense that a large number of people have experienced a rare event. The Sharpiegate story also spread through friend-of-a-friend posts; we collected hundreds of tweets mentioning a friend whose ballot was cancelled due to the use of Sharpies.



Figure 4-10: A tweet claiming that use of a Sharpie cancelled their vote.

In actuality, the online database provided the status of voters' mail-in ballots, which were cancelled when they chose to vote in person.

3.3 The Use of Bad Statistics to Sow Doubt in Election Results

Elections produce vast quantities of data, from national Electoral College totals to fine-grained, precinct-level results. The sociological processes that underlie voting patterns are complex and varied, and are impacted by both structural features (i.e., the shape and size of precincts), voting process (i.e., access and eligibility), and the political landscape (i.e., candidates and issues). Each of these factors, and more, introduce patterns and benign irregularities into voting data that can be difficult or impossible to tease apart.

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LEGAL REVIEW

In the wake of the 2020 election, the scale and irregular nature of voting data was weaponized to create statistical disinformation in order to undermine confidence in the result. One of the more common tactics was to analyze precinct-level vote totals using Benford's law. In brief, Benford's law makes predictions about the frequency of first and/or second digits in a dataset. Violations of these predictions have been used to some success as a tool for detecting financial fraud, and have gained traction in recent years as a potential mechanism for determining electoral fraud, despite well-documented theoretical and practical limitations.[26]

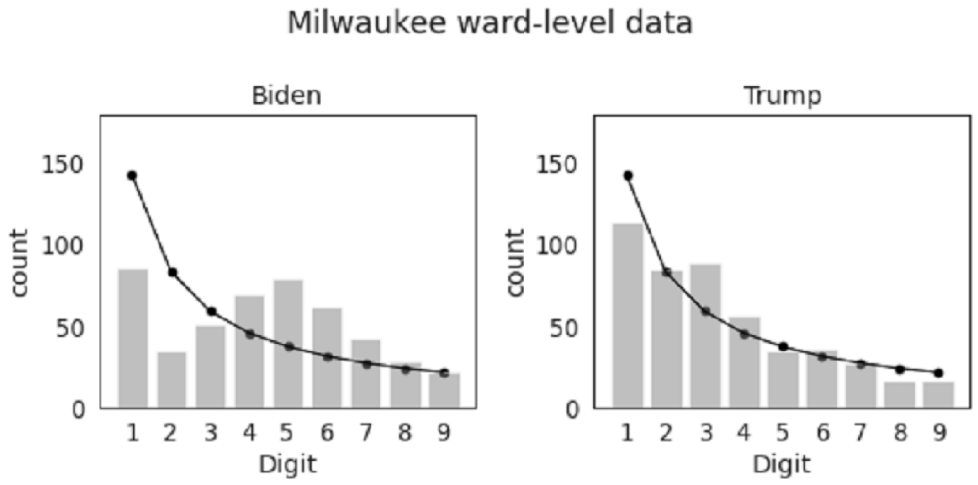

Figure 4-11: Ward-level analysis of first digits of vote totals in Milwaukee in the 2020 election, redrawn from original data but similar to observed misinformation. The line indicates Benford's law, whereas the bars indicate the observed frequencies of first digits from 1 to 9.

One prominent example of disinformation invoking Benford's law involved the vote totals for wards in Milwaukee, Wisconsin, as seen in Figure 4-11. While Trump's vote totals approximated Benford's law, Biden's had a surplus of digits 4 through 6, and a dearth of digits 1 and 2. This was promoted as definitive evidence of election fraud on both far-right websites and social media platforms like Reddit, Facebook, and Twitter. However, the true cause was much more benign. The excess digits are a signal of Biden's lead and average precinct size, and not indicative of fraud.[27] More generally, Benford's law is not expected to be followed when data do not span several orders of magnitude or for voting processes in general.[28]

The misinformation surrounding Benford's law follows a familiar pattern. A statistical model sets up an (often flawed) expectation of how voting data should appear. Violations of this expectation occur, either due to chance (i.e., checking many locations), a mismatch between the data and model's assumptions, or an inappropriate application of the statistical model. Ethical, well-meaning statisticians discovering an irregularity would then get to work understanding whether it

[26] Joseph Deckert, Mikhail Myagkov, and Peter C. Ordeshook, "Benford's Law and the Detection of Election Fraud," *Political Analysis* 19, no. 3 (Summer 2011): 245-268, doi.org/10.1093/pan/mpr014.
[27] The median number of votes for Biden was 577 as a consequence of averaging 73% of the vote in districts with a median size of 829 reported votes.
[28] Deckert, et al., "Benford's Law and the Detection of Election Fraud."

arose as a problem with the model (i.e., failing to account for demographics), the data (i.e., a rounding/processing error), an honest mistake, or in rare cases, fraud. In cases of misinformation, irregularities are taken as prima facie proof of fraud.

In another example, Shiva Ayyadurai posted a fraught analysis, choosing variables that artificially created the impression that Trump did poorly in more Republican areas to suggest voting machines were changing votes to Joe Biden. He further used the imposed negative slope to estimate purported switched votes, which fed into misleading narratives about Dominion voting software (discussed in more detail in Chapter 3).

These are two of many ways in which election data was weaponized to promote false narratives of widespread electoral fraud. This tactic is particularly challenging, as it simultaneously creates the impression of widespread fraud while leveraging statistical analyses that average citizens cannot reasonably be expected to critique, leading them to accept claims of technical meddling at face value. Debunking can be challenging even for statistically proficient academics, as no affordable academic-facing API exists to gather election data in real time. We observed that when data is available, it can require unique solutions to access and clean into a usable format (i.e., scraping PDFs or websites). In many cases, data were simply unavailable, were of low quality (e.g., just percentages), or would require ethically or legally questionable scraping. Freed from legal and data-quality constraints, purveyors of statistical disinformation remain at an advantage.

3.4 Organized Outrage: Online Misinformation's Offline Impact

The spread and impact of misinformation is not merely confined to the online world. Indeed, many of the narratives we explored explicitly called for, and resulted in, offline actions. Pre-election, this was seen most clearly in the #ArmyforTrump hashtag, in which the Trump campaign and right-leaning influencers directed supporters to sign up to become poll watchers for the campaign and to submit purported evidence of electoral fraud to the campaign team. Trump's legal campaign in the weeks post-election repeatedly relied upon questionable public testimonies of fraudulent behaviors in legal challenges to courts across the country. These affidavits and public testimonies are the consequence of the public priming of fraud pushed by the #ArmyforTrump campaign (along with the many other election fraud narratives discussed in this paper), and a weaponization of the information elicited through the digital misinformation campaign.

Similarly, misinformation narratives that arose on Election Day itself led to in-person organized outrage, as seen most notably around the #Sharpiegate conspiracy. Despite swift debunking from election officials in Arizona, the #Sharpiegate theory gained traction across local Facebook Groups and on Twitter. This culminated in protestors gathering outside the vote counting center in Maricopa County shouting about the conspiracy and chanting to "stop the count."

Similar protests in swing states across the country were coordinated by social media misinformation campaigns like #Sharpiegate and the more national Stop The Steal campaign. The protests not only targeted key election sites but were organized more generally in larger

cities across the US, including large-scale demonstrations in Washington, DC. These in-person events gave new life to election misinformation, cementing its believability by affording them physical presence and further weakening the ability of fact-checkers to counter their spread. The organized outrage facilitated by blue-check influencers thus leveraged misinformation to organize mass protests that further delegitimized the electoral process and its results.

3.5 From Manipulating the Information System to Leveraging the Legal System

Mis- and disinformation that originated and spread online eventually gained an offline presence in the courts. Buried in the litany of lawsuits filed by the Trump campaign in the post-election period were the same participatory disinformation cascades traceable to online right-wing networks. Many of the same false claims and misleading narratives we covered in our real-time analysis fed the Trump administration's metanarrative of widespread election fraud. Right-wing groups friendly to the President's cause filed lawsuits that built on these narratives as purported evidence of the illegitimacy of the election.

One prominent example of this behavior is exemplified in the false—now recanted—affidavit provided by an Erie, Pennsylvania, post office worker and publicized by Project Veritas.[29] Initially, the sworn affidavit contained allegations that the USPS had repeatedly backdated ballots—claiming that as evidence of widespread fraud. Later, the worker went on record with the House Oversight Committee to recant his allegation (though Project Veritas denies the veracity of his recantation). Despite the fallout, the air of legitimacy attached to a legal document may benefit proponents of online disinformation campaigns and reinforce the "truth" of a particular narrative.[30]

In another case, also in Pennsylvania, Republican representative Mike Kelly filed a state lawsuit that challenged the constitutionality of the state's 2019 mail-in voting statute. In its statement of facts, the original complaint discussed a number of unsupported claims that had circulated throughout online communities, including, for example, claims about "unsolicited ballots" (¶ 56–57) and an attempt by the 2019 Pennsylvania legislature to subvert the legitimacy of future elections by setting in motion a plan to shift to universal mail-in voting (¶ 82–84).[31] The Pennsylvania Commonwealth rejected his claims; on appeal before the State Supreme Court,

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[29] House Committee on Oversight and Reform (@OversightDems), "BREAKING NEWS: Erie, Pa. #USPS whistleblower completely RECANTED his allegations of a supervisor tampering with mail-in ballots after being questioned by investigators, according to IG" Twitter thread, November 10, 2020, https://twitter.com/OversightDems/status/1326289047933816836; Luke Broadwater, "Postal worker withdraws claim that ballots were backdated in Pennsylvania, officials say," *New York Times*, November 10, 2020, https://www.nytimes.com/2020/11/10/technology/postal-worker-withdraws-claim-that-ballots-were-backdated-in-pennsylvania-officials-say.html.

[30] Isabella Garcia-Camargo, et al., "Project Veritas #BallotHarvesting Amplification," Election Integrity Partnership, September 29, 2020, https://www.eipartnership.net/rapid-response/project-veritas-ballotharvesting.

[31] Kelly v. Commonwealth of Pennsylvania, No. 68 MAP 2020 (Pa. Nov. 28, 2020), https://www.democracydocket.com/wp-content/uploads/sites/45/2020/11/2020-11-21-Kelly-v.-Commonwealth-Complaint-620MD20-PFR.pdf.

Kelly's action doubly failed.[32] Had Kelly succeeded in his quest to invalidate the statute, over two million Pennsylvania ballots would have been thrown out.

Finally, a handful of legal actions also incorporated bad statistics common among online proponents of disinformation. One particularly visible example of this phenomenon comes by way of a complaint filed by Sidney Powell,[33] a vocal Trump supporter,[34] in the US District Court for the Northern District of Georgia. Powell filed similar complaints in other key battleground states; all have since been dismissed.[35] In these complaints, Powell's team relied on the misinterpretations and/or misrepresentations of deviations from Benford's Law discussed above.[36] Although experts agree that these deviations are not evidence of electoral fraud,[37] the online misinformation transformed into "IRL" disinformation through Powell's now-defunct legal actions.

In sum, popular narratives that emerged from these participatory disinformation campaigns were repeatedly mobilized as "evidence" in the courts. Although the actions brought were often dismissed as baseless, this phenomenon is unlikely to disappear in years to come.

4 Summary

The work of producing and spreading misleading narratives about the 2020 election was cross-platform, leveraging diverse platforms in complementary ways to seed, amplify, and mobilize content while adapting around efforts by the platforms to address misinformation. The work was both top-down, with President Trump and right-wing media establishing the initial frames of "voter fraud" and "election rigging," and bottom-up, with armies of volunteers providing content and analysis to develop specific narratives to fit those frames. With his many "RIGGED!" tweets,

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[32] Appeal of Kelly v. Commonwealth of Pennsylvania , http://www.pacourts.us/assets/files/setting-7862/file-10781.pdf?cb=1f7217; Emergency Application for Stay of Court's Order, Kelly v. Commonwealth of Pennsylvania, December 2, 2020, http://www.pacourts.us/assets/files/setting-7862/file-10804.pdf?cb=8238e2; Kelly v. Commonwealth of Pennsylvania, US Supreme Court Order in Pending Case, December 8, 2020, https://www.supremecourt.gov/orders/courtorders/120820zr_bq7d.pdf.

[33] "Pearson v. Kemp (Sidney Powell 2020 Election Lawsuit) - Various Motions & Orders," Scribd, November 27, 2020, https://www.scribd.com/document/486403022/Pearson-v-Kemp-Sidney-Powell-2020-Election-Lawsuit-Various-Motions-Orders#from_embed.

[34] Jeremy W. Peters and Alan Feuer, "What We Know About Sidney Powell, the Lawyer Behind Wild Voting Conspiracy Theories," *New York Times*, December 8, 2020, https://www.nytimes.com/article/who-is-sidney-powell.html.

[35] Alison Durkee, "Sidney Powell's Voter Fraud Claims Fail in All Battleground States as Arizona and Wisconsin Judges Reject Cases," *Forbes*, December 9, 2020, https://www.forbes.com/sites/alisondurkee/2020/12/09/sidney-powells-voter-fraud-claims-fail-for-third-time-as-arizona-judge-rejects-case/.

[36] Joe Bak-Coleman, "Vote Data Patterns used to Delegitimize the Election Results," Election Integrity Partnership, November 6, 2020, https://www.eipartnership.net/rapid-response/what-the-election-results-dont-tell-us.

[37] Reuters Staff, "Fact check: Deviation from Benford's Law does not prove election fraud," Reuters, November 10, 2020, https://www.reuters.com/article/uk-factcheck-benford/fact-check-deviation-from-benfords-law-does-not-prove-election-fraud-idUSKBN27Q3AI.

starting long before the election, and his Army for Trump advertisements, President Trump didn't just prime his audience to be receptive to false narratives of election fraud—he inspired them to produce those narratives and then echoed those false claims back to them. Everyday people, likely motivated by their political views, went online to share content highlighting what they believed to be voting irregularities. Hyperpartisan news and social media influencers played a role in selection, amplification, and framing, assembling the "evidence" of the crowd to fit their narratives and then mobilizing that content across platforms. Those narratives led to real-world efforts in the form of protests and legal action, both of which set the course toward the events at the US Capitol on January 6.

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Alex Stamos[stamos@stanford.edu]
From: Kate Starbird
Sent: Tue 2/23/2021 11:59:22 PM
Subject: Fwd: SAAG work for the iSchool's Center for an Informed Public
Received: Tue 2/23/2021 11:59:24 PM
Attorney Review.Chapter 1 Write-Up.docx

Hi Renee (and Alex),
I'm forwarding this on to you… it's our lawyer's review of Ch 1 (comments in Word).
One element of the feedback is fairly straightforward… to lift the definitions into a more visible location (perhaps adding to the text of the chapter).

The other element may be more difficult. He's asking for us to add more content about how we vetted and determined if a piece of content or claim was misinformation or disinformation. That was his main piece of feedback. I can try to add his comments to the Google doc, if you'd like. Let me know if you want to discuss how we incorporate what he's looking for into the report.

Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: RE: SAAG work for the iSchool's Center for an Informed Public
Date: February 23, 2021 at 8:51:54 AM PST
To: Kate Starbird <kstarbi@uw.edu>, "Buder, James K (ATG)" <james.buder@atg.wa.gov>

Kate, James:

Here is my legal review of Chapter 1. I have just a handful of comments, but they go to the critical issue we discussed previously: disclosing the basis for determining that something is false/misleading. I think a version of the explanation for how you checked veracity is included in the definition of "Tickets" (which is in the definitional section at the very end of the full draft). But I recommend incorporating the explanation up front, as part of the description of the methodology in the first chapter.

Also note, the Word version of this chapter had a number of editorial comments and redlines. I deleted those, so the comments and redlines in the attached are mine.

Please let me know if you have any questions. I'm continuing my review. Thanks.

Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
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Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Monday, February 22, 2021 10:07 AM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: Re: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric (and others),

There's a Google folder with a PDF version of the full report:
https://drive.google.com/drive/folders/1-9Wfsw7XBqgo0GMWRf-MoERy-QfKLQSG?usp=sharing

There's also a folder there with PDFs to individual chapters.

We're still doing work to clean up the formatting and make everything pretty, but the content should all be in place.

The goal is to release early next week (Monday). Please let me know if you have any questions or concerns.

Best,
Kate

On Feb 20, 2021, at 7:51 AM, Kate Starbird <kstarbi@uw.edu> wrote:

We're still waiting for the folks at Stanford to put everything together into a full draft. I'll send it over as soon as it's ready. Sorry for the delay.

On Feb 17, 2021, at 2:37 PM, Stahl, Eric <ericstahl@dwt.com> wrote:

Thanks Kate. I'll look for the updated version.

Eric

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, February 17, 2021 1:32 PM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: Re: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric (and others),

I want to give a heads up on timing. We're still working through some of the content, but it looks like we'll have a full version of the final report ready by Friday (with the goal of releasing publicly on March 3, likely with some advance copies going out to journalists 1-2 days prior).

That will hopefully leave some time next week to work through any remaining issues that you identify. (We've tried to address some of your initial concerns from your first read — and I added several detailed definitions w/ citations that I hope will be helpful as well.)

Please let me know if you have any questions or concerns. And thanks again for your help with this!

Kate

On Feb 11, 2021, at 11:13 AM, Kate Starbird <kstarbi@uw.edu> wrote:

4;30 works.

My phone # is [redacted]. But I will call you then.

Kate

On Feb 10, 2021, at 8:35 PM, Stahl, Eric <ericstahl@dwt.com> wrote:

Thanks Kate. This is helpful. I don't think we need to loop in the Stanford team but it would be good for us to chat. Could we speak at 4:30 on Thursday? Let me know where I can reach you, or please call me at 206.757.8148.

Just to be clear, I don't see any unmanageable legal issue here. I might end up recommending some additional discussion about the methodology/criteria for inclusion (though I'm not there yet). I am raising the issue now just so I have a better understanding of what's behind the report – it will make the legal review more efficient and effective. Thanks.

Eric

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, February 10, 2021 7:29 PM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: Re: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric,

I'd be happy to chat about this.

My understanding is the definitions of what a ticket is and how they were identified is in Chapters 1 and 2. But looking closely at that, there isn't much about the process for determining veracity. That process occurred outside of our analysis team work at UW… it was handled by the

Stanford team (Tier 1). Our role was to analyze how a claim or narrative spread, not to determine veracity. Although my recollection is that, before reporting on any narrative/analysis, we would work to find information debunking a claim in local media outlets or fact-checking websites. If we couldn't find debunking information, we might report something as unfounded. That's the process we used for our analyses, but we'd need to talk with the Tier 1 folks to better understand how the first layer of filtering went (because that feeds into the rest of the statistics we report).

The definition of disinformation (as defined in academic and historical texts) might complicate this further.

Misinformation = false information
Disinformation = false or misleading information, intentionally spread, for an objective (financial or political); disinformation often exists not as a single piece of content, but as a campaign; and it layers true, plausible, or non-falsifiable information with falsehoods. So, something can be part of a disinformation campaign without necessarily being false or falsifiable.

For "the big lie" (the false election fraud narrative that most of this research falls within) — a lot of what we saw was misleading, rather than outright false. Or something that sought to amplify small irregularities to give a false appearance of massive voter fraud.

One issue may be that parts of the paper conflate misinformation (false information) with disinformation (false or misleading information — which is closer to how we defined tickets). So perhaps there's value in talking about that if you think there would be a legal implication.

I can meet tomorrow at 11at or after 4pm. I might be able to pull in one of our collaborators at Stanford… or perhaps we should have a full meeting with their team (and perhaps with their lawyers) to work through both issues: the ticketing process and whether "misinformation" is the umbrella term we want to use.

Kate

> On Feb 10, 2021, at 6:19 PM, Stahl, Eric <ericstahl@dwt.com> wrote:
>
> I have a question that would be helpful for me to talk through before I dive into Chapter 3. This might be easier to discuss on a short call (or if this

is addressed somewhere in the report, please point me to it).

The question is, how do the authors of the EIP report determine that a statement is false/disinformation or worthy of a "ticket"? And, relatedly, is there an articulable standard that researchers in the field apply in making that determination?

Here's where I'm going with this. One way that a publisher can escape liability for defamation, even for publishing a false statement, is by showing that it acted with the appropriate level of diligence/lack of fault. A public figure – say, James O'Keefe – has to prove that the publisher knew the statement was false, or recklessly disregarded the truth (that's the actual malice standard; plaintiffs can almost never prove). But private figures have a lesser burden; they can recover if the publisher acted negligently – that is, unreasonably under the circumstances – in publishing the false statement.

The scenario I have in mind is a claim by a private individual alleging that EIP falsely accused them of tweeting disinformation – ie, the thing they published turns out to be true. Falsely accusing someone of being a liar is potentially defamatory. Again, the James O'Keefes or Gateway Pundits of the world – public figures – likely lose that claim under the actual malice standard. But for everyone else, it's a negligence standard. That standard is well established in journalism: if the reporter checks their facts, pursues reasonable leads and doesn't ignore relevant sources, they likely will be off the hook for defamation even if the story is erroneous. I'm trying to work through what the analog might be for the EIP report. I see the references in Chapter 1 that the EIP is "not a fact-checking partnership." That's fine. But it would be helpful to know how you decide something is false, and what's considered reasonable in this field.

Is there someone I can discuss this with? I'm available tomorrow between 1 and 3 pm or after 4:30, or part of Friday as well. Thanks.

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Bio: www.dwt.com/lawdir/attorneys/StahlEric.cfm
Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

From: Julia Carter Scanlan <jccarter@uw.edu>
Sent: Saturday, February 06, 2021 1:03 PM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Kate Starbird <kstarbi@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: RE: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric,

I've just heard from Kate that it's likely we'll have more finalized text by tomorrow. I think we'll probably want a full review of chapters 3, 4, 5. But we're happy to provide the full report to make sure you have the necessary context. We'll get the materials over to you as soon as they're ready.

That's great to hear about the state Bench-Bar-Press as well! One of our pillars is law and policy, so we've been actively engaged in conversations with legal scholars and policy makers since our launch and have additional plans to expand on that in the years to come. It's such a critical part of addressing this challenge.

Many thanks!

Julia

From: Stahl, Eric <ericstahl@dwt.com>
Sent: Friday, February 5, 2021 6:10 PM
To: Julia Carter Scanlan <jccarter@uw.edu>
Cc: Kate Starbird <kstarbi@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: RE: SAAG work for the iSchool's Center for an Informed Public

Julia,

Nice to meet you, and I look forward to working in this as well. As I mentioned to James, I have been enthused by CIP's work since hearing about it at the state Bench-Bar-Press presentation (I think that was right around the time the center launched).

If it's not too much trouble, Word is an easier format for me to review. It would also be helpful for me to have access to the full report for context – I don't need that in Word, and I won't spend time reviewing the full document, but it will help orient me to see the whole work if it's available.

Thanks.

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From: Julia Carter Scanlan <jccarter@uw.edu>
Sent: Friday, February 05, 2021 5:19 PM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Kate Starbird <kstarbi@uw.edu>; Jevin West <jevinw@uw.edu>; Buder, James K (ATG) <james.buder@atg.wa.gov>
Subject: SAAG work for the iSchool's Center for an Informed Public

[EXTERNAL]

Hi Eric,

We're looking forward to working with you on the legal review of the forthcoming final report from the Election Integrity Partnership. We're looking to publish the report on February 16, but really appreciate your insight before then on the text. Please don't hesitate to let us know what we can provide to make this as easy as possible for you.

There are two chapters ready for review; they currently live in a Google doc. Do you have a preference on format? If Google doc is okay, we'll go ahead and send you those links/enable you to access. If you'd prefer a Word doc, let me know and we can send over in that format.

Many thanks! Let me know if there is any further information or details that we can provide.

Happy weekend,

Julia

JULIA CARTER SCANLAN (she/her)
Director of Strategy and Operations | Center for an Informed Public
University of Washington
206.897.1798 / Box 352115 / cip.uw.edu
News & Insights: Sign up for the CIP's newsletter
Follow the CIP on Facebook and Twitter

To: Matthew Masterson[mmasterson@microsoft.com]
Cc: Julia Carter[jccarter@uw.edu]; mica42[mica42@uw.edu]; Sue Glueck (CELA)[Sue.Glueck@microsoft.com]; Maeve Whelan-Wuest (Harvey Nash)[v-maevew@microsoft.com]
From: Kate Starbird
Sent: Fri 9/30/2022 7:01:37 PM
Subject: Re: Briefing on EIP and UW Election Work
Received: Fri 9/30/2022 7:01:38 PM

Sorry Matt! We're putting out some fires this week (while attending Trust and Safety down at Stanford) … so the email inbox is a bit overwhelmed right now.. Will loop back around on Monday with some potential times!

Sent from my iPhone

> On Sep 30, 2022, at 10:50 AM, Matthew Masterson <mmasterson@microsoft.com> wrote:
>
> Re-upping this email. Totally understand if you all don't have the bandwidth to support but wanted to try. Thanks!
>
> Matt
>
> Get Outlook for iOS [aka.ms]

From: Matthew Masterson
Sent: Tuesday, September 27, 2022 12:00:11 PM
To: kstarbi <kstarbi@uw.edu>; Julia Carter <jccarter@uw.edu>; Mike Caulfield: <mica42@uw.edu> <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>
Subject: Briefing on EIP and UW Election Work

Kate,

Reaching out to see if you and the team are willing and able to do a briefing to our Microsoft Information Integrity community regarding the work of EIP, the recently released threat framework and possible narratives heading into the 2022 mid-terms. For background the community is made up of Microsoft employees that work on issues of information integrity. This includes members of product teams, lawyers supporting teams, Clint Watts and team, etc. We try to bring in our trusted external partners to discuss the work they are doing in order to deepen the community's understanding of the current trends and challenges in the space.

As far as timing we can work around your schedule. Our preference is to hold these meetings around 9:00am PT and we would like to have the meeting prior to the election. If you are able and interested to support just send over some possible dates and times and we'll get it scheduled. Also, if you want to add Stanford SIO to the briefers that is wonderful as well. Up to you.

Thank you in advance for your time.

Matt

Matt Masterson
Director of Information Integrity
Democracy Forward Team (CELA)
mmasterson@microsoft.com

To: mmasterson@microsoft.com[mmasterson@microsoft.com]
From: Kate Starbird
Sent: Tue 9/27/2022 5:00:16 PM
Subject: Delayed Response | Media Contact Re: Briefing on EIP and UW Election Work
Received: Tue 9/27/2022 5:00:16 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Elena Cryst[ecryst@stanford.edu]
Cc: Jeffrey T. Hancock[hancockj@stanford.edu]; Alex Stamos[stamos@stanford.edu]; Shelby Grossman[shelbygrossman@stanford.edu]
From: Kate Starbird
Sent: Tue 3/7/2023 9:35:45 PM
Subject: Re: Invitation to keynote at Trust and Safety Research Conference
Received: Tue 3/7/2023 9:36:01 PM

Probably Thursday.
Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 7, 2023, at 9:56 AM, Elena Cryst <ecryst@stanford.edu> wrote:

Dear Kate,

Fantastic news. We cannot wait to have you. We'd love to schedule a call in April to discuss topic and format. In the meantime it would just be helpful to know if you have a preference for Thursday (opening) or Friday (closing)? Thank you,

--
Elena Cryst

From: Kate Starbird <kstarbi@uw.edu>
Date: Tuesday, March 7, 2023 at 9:18 AM
To: Elena Cryst <ecryst@stanford.edu>
Cc: Jeffrey T. Hancock <hancockj@stanford.edu>, Alex Stamos <stamos@stanford.edu>, Shelby Grossman <shelbygrossman@stanford.edu>
Subject: Re: Invitation to keynote at Trust and Safety Research Conference

Hi Elena et al.,

Thank you for the invitation. Yes, I'm happy to give a Keynote at the Trust and Safety Research Conference. Please let me know what you need from me next!

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 7, 2023, at 9:00 AM, Elena Cryst <ecryst@stanford.edu> wrote:

Dear Professor Starbird,

I'm reaching out on behalf of Professor Jeff Hancock and Alex Stamos to invite you to keynote the second annual Trust and Safety Research Conference at Stanford University on September 28-29, 2023. This conference will bring together researchers in academia, industry, and civil society working on issues around online harm, platform manipulation, and platform policy. Your experience would provide an excellent perspective at the conference. We would be happy to structure the keynote in a way that best works for you (some options could include a talk of between 30 and 60 minutes; or a fireside chat with one of the conference conveners). The keynote would either be the opener for the conference, on the morning of September 28, or the close of the conference on the afternoon of September 29. We will provide airfare and accommodations, as well as a ticket for both days of the conference. We are also

happy to extend complementary tickets for students and postdocs from your lab. We apologize that Stanford limits us to only providing economy class airfare to visitors.

We appreciate your consideration of this request. Please let us know if you have any questions or if you would like to hop on a call to discuss your potential participation. If you are able, we would appreciate a response by March 17th, although we understand if that may not be possible.

Thank you,

—

Elena Cryst, MBA (she/her)
Deputy Director
Stanford Internet Observatory

https://io.stanford.edu

To: Elena Cryst[ecryst@stanford.edu]
Cc: Jeffrey T. Hancock[hancockj@stanford.edu]; Alex Stamos[stamos@stanford.edu]; Shelby Grossman[shelbygrossman@stanford.edu]
From: Kate Starbird
Sent: Tue 3/7/2023 5:17:45 PM
Subject: Re: Invitation to keynote at Trust and Safety Research Conference
Received: Tue 3/7/2023 5:17:56 PM

Hi Elena et al.,
Thank you for the invitation. Yes, I'm happy to give a Keynote at the Trust and Safety Research Conference. Please let me know what you need from me next!

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

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We appreciate your consideration of this request. Please let us know if you have any questions or if you would like to hop on a call to discuss your potential participation. If you are able, we would appreciate a response by March 17th, although we understand if that may not be possible.

Thank you,

—

Elena Cryst, MBA (she/her)
Deputy Director
Stanford Internet Observatory

https://io.stanford.edu

To: Jeff Hancock[hancockj@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]
Cc: Mike Caulfield[mica42@uw.edu]; Julia Carter Scanlan[jccarter@uw.edu]
From: Kate Starbird
Sent: Mon 4/24/2023 3:51:12 PM
Subject: Rumors have rules (in NASEM Issues)
Received: Mon 4/24/2023 3:51:23 PM
47-49_Spiro & Starbird - Rumors 2.pdf

"Rumors have rules"

EMMA S. SPIRO AND KATE STARBIRD

Rumors Have Rules

Decades-old research about how and why people share rumors is even more relevant in a world with social media.

Around the time the US government was testing nuclear bombs on Bikini Atoll in the spring of 1954, residents of Bellingham, Washington, inspected their windshields and noticed holes, pits, and other damage. Some blamed vandals, perhaps teenagers with BB guns. Once Bellingham residents reported the pits, people in nearby towns inspected their windshields and found similar damage. Could sand fleas have caused it? Or cosmic rays? As more people examined their windshields and found more pits, a frightening hypothesis emerged: nuclear fallout from government hydrogen bomb testing. Within a week, people around Seattle, 90 miles away, were reporting damage as well.

But the rumors faded almost faster than they began as scientists and local authorities refuted the most prominent theories. What would become known as the "Seattle windshield pitting epidemic" became a textbook example of how rumors propagate: a sort of contagion, spread through social networks, shifting how people perceive patterns and interpret anomalies. Car owners saw dings that they'd previously overlooked and shared observations with others, who repeated the process.

Today this phenomenon would probably be described using the terms *misinformation*, *disinformation*, and perhaps *fake news*. Certainly, communication has changed dramatically since party-line telephone calls and black-and-white television, but scholarship from that era holds critical insights that are essential to the digital era. The study of rumors, which surged around World War II, is still very relevant.

Our team of researchers at the University of Washington have been investigating these issues for more than a decade. Initially, we centered our research on rumors. But we shifted focus in 2016 as public and academic attention lasered onto misinformation and social media manipulation. By 2020, our collaborators in an effort called the Election Integrity Partnership had developed an analytical framework that allowed dozens of students to scour social media platforms in parallel, feeding information to trained researchers for analysis and to authorities and communicators for potential mitigation. As we worked to build ways to quickly prioritize unsubstantiated claims about election processes and results, we found that the terms *misinformation* and *disinformation* were often cumbersome, confusing, or even inaccurate. But we came full circle in 2022, during a second iteration of our collaboration on election integrity, because the concept of rumors worked easily and consistently to assess the potential for unsubstantiated claims to go viral online.

We are convinced that using rumor as a conceptual framework can enhance understanding of today's information systems, improve official responses, and help rebuild public trust. In 2022, we created a prioritization tool around the concept of rumors. The idea was to help anticipate rumors that could undermine confidence in the voting process and assess whether a given rumor would go viral. Much of the concept's utility is that responders can engage with an information cascade before veracity or intent can be determined. It also encourages empathy by acknowledging the agency of people spreading and responding to rumors, inviting serious consideration of how they can contribute to the conversation.

A brief history of rumors

In the scholarly literature, *misinformation* refers to content that is false but not necessarily intentionally so; *disinformation*, which has roots in Soviet propaganda strategies, refers to false or misleading content intentionally seeded or spread to deceive. These terms are useful for certain problematic content and behavior, but they are increasingly politicized and contested. Mislabeling content that turns out to be valid—or potentially valid, like the theory that COVID-19 began with a so-called lab leak—violates public trust, undermines authorities' credibility, and thwarts progress on consequential issues like strengthening democracy or public health. In contrast, the label of *rumor* does not declare falsity or truth.

Rumoring can be especially valuable when official sources are incentivized to hide information—for example, when an energy company is withholding information about pollution,

or when a government agency is covering up incompetence. Branding expert Jean-Noël Kapferer posits that rumors are best understood not as leading away from truth, but as seeking it out.

Historically, researchers defined rumors as unverified stories or "propositions for belief" that spread from person to person through informal channels. Rumors often emerge during crises and stressful events as people come together to make sense of ambiguous, evolving information, especially when "official" information is delayed. In this light, the numerous rumors that spread in the early days of the pandemic about its origins, impacts, and potential antidotes are unsurprising.

Both the production and spread of rumors are often taken as a natural manifestation of collective behavior with productive informational, social, and psychological roles. For instance, rumors help humans cope with anxiety and uncertainty. A population coming to terms with the risks of nuclear weapons could find a way to voice fears by seeing dings in the windshields of their Ford Thunderbirds and Chevrolet Bel Airs. Recognizing these informational and emotional drivers of rumoring can support more empathetic—and perhaps more effective—interventions.

Recentering rumor

When our research team tracked the use of social media in the 2010 Deepwater Horizon oil spill and the 2013 Boston Marathon bombings, we grounded our work in scholarship of offline rumors. Both events catalyzed numerous rumors: conspiracy theories warning about an impending sea floor collapse, crowd-sleuthed identifications of (innocent) suspects. We uncovered similar patterns in dozens of subsequent events where rumors circulated on social media, including a WestJet plane hijacking (that did not happen), multiple mass shootings in the United States, the downing of Malaysian Airlines flight 17 over Ukraine, and terrorist attacks in Sydney, Australia, in 2014 and Paris, France, in 2015.

Our rumor threat framework draws on much of the foundational social science research in rumoring to create the analytic categories, labeled "Dimensions" in Figure 1. These include underlying conditions (such as uncertainty or trust in official information), features of the rumor (such as novelty and emotional valence), and system effects (such as position in a social network). Both *uncertainty* and *significance* are rooted in the "basic law of rumor" introduced by scholars Gordon W. Allport and Leo Postman in 1946: the strength of a rumor is proportional to its significance to the listener multiplied by the ambiguity of the evidence around it. The condition of *diminished trust* stems from an idea of sociologist Tomatsu Shibutani from 1966, that informal communication surges in the absence of timely official information. The *familiarity/repetition* dimension arises from the "illusory truth effect," identified in the 1970s, that repetition increases believability. The seemingly contradictory feature of *novelty* tracks to work in 1990 showing that rumors lose value over time.

Assessing these dimensions helps predict which rumors will become viral. Take the 1950s Seattle windshield pitting epidemic: the underlying conditions included *high uncertainty* about both the cause of the windshield damage and the risks of nuclear fallout. The features of the rumor included *high significance* if the nuclear connection were true; *substantial novelty*, as both car ownership and concerns about nuclear weapons had become widespread in the years since World War II; *high emotional valence* pegged to nuclear fears as well as property damage; and *compelling evidence*, since people could see dings on their own cars and photographs of others. The system effects included *participatory potential* as people inspected and discussed their own cars. And, if contemporaneous accounts are true, the rumor declined because of high trust in the authorities who were debunking it.

Consider the COVID-19 pandemic. Every dimension of our framework shows rumor-promoting conditions. A novel virus with uncertain causes, serious consequences, unknown spreading mechanisms, and few remedies scores high in every category. Trust in government and local health officials started out low and declined from there. Impacts include lost lives, jobs, disrupted routines, and isolation—all of which heighten emotions. As for participation, many people all over the world were stuck in their homes and converged on familiar social platforms to share home remedies, hunts for toilet paper, stories of sick loved ones, reactions to lockdowns, and more, often with first-person accounts and video testimonials. Of course, some actors—both organized and disorganized—strategically manipulated information systems to gain attention, sell products, and push political agendas.

Ready for use

We initially developed this framework for research to guide our "rapid response" research. After conversations with local and state election officials who were struggling for guidance about when and how to address false claims about their processes and procedures, we adapted the framework for their perspective. Since then, we have presented it to a small number of local and state election officials for feedback. We aim to develop, deploy, and evaluate trainings based on the framework for 2024.

Though we developed techniques to classify rumors specifically for elections, we see potential for much wider application. Communicators can use the framework to assess vulnerability to rumors and to prepare for outbreaks or other foreseeable crises. Evaluating rumors across multiple dimensions for potential virality can be more useful than deciding whether to apply a label like misinformation or disinformation. It may not be worth drawing attention to a rumor likely to lapse, but it would be valuable to correct a harmful false rumor with high spread potential before it gets started. Such insights can inform how to focus crisis communication, platform moderation, or fact-checking resources.

Our framework may point to other actors and incidents

Figure 1: **THE RUMOR THREAT FRAMEWORK HELPS ASSESS WHETHER AN EVENT WILL GENERATE VIRAL RUMORS AND WHICH RUMORS WILL SPREAD**

GROUP	DIMENSIONS	DESCRIPTION
INFORMATION AND EVENT CONDITIONS	Uncertainty	As events (infections, train wrecks, elections) unfold, uncertainty powers both generation and spread of rumors. For specific rumors, ambiguous evidence will lead to more spread.
	Diminished Trust	Diminished trust in "official" information providers (government, media, etc.) pushes people towards more informal communication channels, catalyzing rumoring.
CONTEXTUAL FEATURES	Significance / Impact	The strength of a specific rumor is proportional to its importance in the lives of those spreading it. Events with greater potential impact on people's lives will catalyze more, and more viral, rumors.
	Familiarity / Repetition	A common set of building blocks underlie many rumors, which may make them resonate with familiarity. This, plus repetition, can enhance plausibility and boost spread.
	Novelty	People spread rumors to inform and entertain. Crises and other emergent events provide novel content that can be assembled into rumors.
	Emotional Valence	Rumors that stimulate strong emotions—including anger, fear, and outrage—will be more likely to spread. Events that stimulate strong emotions may catalyze the creation of viral rumors.
	Compelling-ness of Evidence	Evidence that piques interest and adds tangibility—e.g., first-person accounts, photos, and videos—will catalyze the creation and enhance virality of rumors.
	Participatory Potential	Rumors that allow people to participate—to add evidence or share their experiences and interpretations—are likely to spread further.
SYSTEMS EFFECTS	Position within the Social Network	Social networks shape the spread of rumors. Rumors will spread further if they reach central or high-audience nodes in a network or move from one network to another (e.g., a rumor in an anti-vaccine network jumps into ethnonationalist networks).
	Algorithmic or Network Manipulation	In online environments, rumors can be intentionally seeded or spread for strategic gain. Often those efforts game underlying networks and recommendation systems.

that require further consideration. For instance, online communities that actively engage in conspiracy theorizing are poised to project a common set of ideas onto events' causes and impacts. And sometimes the sorts of rumors an event will spawn are predictable. For those responding to the toxic train wreck in East Palestine, Ohio, for example, public discourse around oil spills and chemical accidents could reveal what likely rumors and conspiracy theories might appear.

Certainly, this framework cannot capture everything worthy of consideration. Practitioners should examine potential virality in tandem with the potential for harm. There are probably also productive approaches for refocusing the lens around misinformation and disinformation. For example, the term *misinformation* likely remains a better fit for describing false claims spread through low-quality scientific journals, and *propaganda* might better capture concerted efforts to manipulate the masses. *Disinformation* is useful for intentionally misleading and clearly manipulative campaigns.

However, we suspect the power of the rumor concept applies more broadly than misinformation and disinformation. Rather than going straight to the question of what to refute, authorities and analysts would first consider the role that a rumor is playing within the community—an approach that invites deeper insight.

Making the right calls on information is crucial because these phenomena are now inherently adversarial. Mistakenly assessing intent or accuracy can cause a responder to lose credibility. One overarching benefit of a framework like ours is that journalists, authorities, and researchers can get a handle on ever-shifting flows of ambiguous information without risking a reputation-damaging mistake.

More than that, by inviting a stance that seeks to engage with rumors rather than correct misinformation, the framework could make responses more resistant to bad-faith criticism. It could also allow communicators to acknowledge their own uncertainty, recognize the potential information in communities' rumors, and help rebuild lost trust. We hope this framework around rumors, and what others might build from it, can support quick, effective responses.

Emma S. Spiro *is an associate professor at the Information School at the University of Washington.* ***Kate Starbird*** *is an associate professor in the Department of Human Centered Design & Engineering at the University of Washington.*

To: Jeff Hancock[hancockj@stanford.edu]
Cc: Julia Carter Scanlan[jccarter@uw.edu]; Renee DiResta[rdiresta@stanford.edu]; Mike Caulfield[mica42@uw.edu]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Mon 4/10/2023 8:02:17 PM
Subject: Re: Next steps with EIP and Pew
Received: Mon 4/10/2023 8:02:29 PM

Good new is… Jeff and I have the same calendar constraints… so something on Monday, Friday, or Thursday afternoon in early May would work best for me. Unless I'm visiting DC that week, but I don't have a lot of control over that at the moment. ;)

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Apr 10, 2023, at 12:29 PM, Jeff Hancock <hancockj@stanford.edu> wrote:

I think that's a great idea. The first week of May is better for me as I have travel the last week of April (but I can try to make it work). I teach Tues & Thurs mornings, and Wed is pretty bad overall.
--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Mon, Apr 10, 2023 at 11:28 AM Julia Scanlan <jccarter@uw.edu> wrote:

Hi Jeff, Renee, Elena, and Mike:

Kate and I have been chatting about the grant from Pew Charitable Trusts to the CIP and to SIO and potential next steps to begin to lay the foundation for a renewal. As you might recall, the current grant has an end-date of 8/31/23. If we ask for a renewal, it would ideally provide funding through early 2025.

We thought it might be useful to tee up a meeting with Maria and the others on the Pew team for the end of April or early May. We could jointly present some slides that focus on our efforts and takeaways from 2022 as well as tee up our plans and vision for 2024. We'd likely want to schedule one internal pre-meeting sync with this group before that meeting to talk through the approach and come to consensus on what we should highlight in the presentation.

Let me know your thoughts. If we're in agreement with this approach, I can work on getting something on the calendar, both for the pre-meeting and the meeting with the Pew team.

Many thanks,

Julia

JULIA SCANLAN (she/her)

Director for Strategy and Operations | Center for an Informed Public

University of Washington

206.897.1798 / Box 351205 / cip.uw.edu

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Follow the CIP on Facebook and Twitter



To: Martin Riedl[martin.riedl@utexas.edu]
Cc: Samuel Christopher Woolley[swoolley@utexas.edu]; Renee DiResta[rdiresta@stanford.edu]; Josephine Lukito[jlukito@utexas.edu]
From: Kate Starbird
Sent: Fri 3/24/2023 5:47:37 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Fri 3/24/2023 5:47:48 PM

Sounds good. Thank you, everyone!
Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 23, 2023, at 3:11 PM, Martin Riedl <martin.riedl@utexas.edu> wrote:

Hi Kate and Renee:
I just wanted to let y'all know that we now also heard back from SM+S Editor-in-Chief, Dr. Papacharissi, who said that this shouldn't be a problem. Once you submit the article, you can simply leave out the name of this author, and only populate author fields for Starbird, DiResta and DeButts. I'll keep you posted when the tab is online.

Best,
Martin

On Thu, Mar 23, 2023 at 9:51 AM Martin Riedl <martin.riedl@utexas.edu> wrote:

Thank you, Kate - I will make sure to update this in all places.
Best wishes,
Martin

On Wed, Mar 22, 2023 at 7:46 PM Kate Starbird <kstarbi@uw.edu> wrote:

Thank you all for being so understanding!
Author order will be Kate Starbird, Renee DiResta and Matt DeButts.

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 22, 2023, at 5:57 AM, Martin Riedl <martin.riedl@utexas.edu> wrote:

Hi Kate and Renee:
Apologies for my delay in responding, I'm currently ooo but will be more available tomorrow.

I am so sorry to hear about the harassment - that truly sounds terrifying and we will make sure to do whatever is needed. Removing an author's name should not be an issue. As of right now, I'm waiting for the go-ahead from the journal so I can tell everyone to upload their papers; once you will be uploading your manuscript and when you fill out the author details on the journal website, you will be able to only include the names of authors who you want to appear on the final published manuscript.

Since we do cite and briefly summarize each article in our introduction to the special issue, if you could let me know the final list of authors & author order through email, that would be very helpful so I can adjust in our own manuscript copy.

I would also like to loop EiC Zizi Papacharissi in, just so she is aware, and since we've shared the accepted manuscript titles and author names with her before. Many thanks!

Best,
Martin

On Mon, Mar 20, 2023 at 11:20 AM Samuel Christopher Woolley <swoolley@utexas.edu> wrote:

> Hi Kate,
> Thanks for reaching out. I'm really sorry to hear about the continued harassment. I've dealt with some research-related vitriol recently and very much understand.
> I'm 100% fine with moving this author's name from the manuscript, given the circumstances.
> Martin, is this logistically feasible given where we are w/ SM+S and the release of the special issue?
> I will let you communicate further with Kate and Renee about this--but thumbs up from my end re doing whatever is needed.
> Best,
> Sam

--
Martin Johannes Riedl, Ph.D.
Postdoctoral Fellow and Knight Research Associate | Center for Media Engagement
Research Associate | Technology and Information Policy Institute
The University of Texas at Austin
Pronouns: he, him, his

Recent research:
The mobilization of social media influencers in the political arena
Signaling news outlet trust in a Google knowledge panel
Audio misinformation on WhatsApp

This message is from an external sender. Learn more about why this matters.

--
Martin Johannes Riedl, Ph.D.
Postdoctoral Fellow and Knight Research Associate | Center for Media Engagement
Research Associate | Technology and Information Policy Institute
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Pronouns: he, him, his

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--
Martin Johannes Riedl, Ph.D.
Postdoctoral Fellow and Knight Research Associate | Center for Media Engagement
Research Associate | Technology and Information Policy Institute

The University of Texas at Austin
Pronouns: he, him, his

Recent research:
How disinformation on WhatsApp went from campaign weapon to governmental propaganda in Brazil
The mobilization of social media influencers in the political arena
Signaling news outlet trust in a Google knowledge panel

To: Martin Riedl[martin.riedl@utexas.edu]
Cc: Samuel Christopher Woolley[swoolley@utexas.edu]; Renee DiResta[rdiresta@stanford.edu]; Josephine Lukito[jlukito@utexas.edu]
From: Kate Starbird
Sent: Wed 3/22/2023 10:46:07 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Wed 3/22/2023 10:46:18 PM

Thank you all for being so understanding!
Author order will be Kate Starbird, Renee DiResta and Matt DeButts.

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 22, 2023, at 5:57 AM, Martin Riedl <martin.riedl@utexas.edu> wrote:

Hi Kate and Renee:
Apologies for my delay in responding, I'm currently ooo but will be more available tomorrow.

I am so sorry to hear about the harassment - that truly sounds terrifying and we will make sure to do whatever is needed. Removing an author's name should not be an issue. As of right now, I'm waiting for the go-ahead from the journal so I can tell everyone to upload their papers; once you will be uploading your manuscript and when you fill out the author details on the journal website, you will be able to only include the names of authors who you want to appear on the final published manuscript.

Since we do cite and briefly summarize each article in our introduction to the special issue, if you could let me know the final list of authors & author order through email, that would be very helpful so I can adjust in our own manuscript copy.

I would also like to loop EiC Zizi Papacharissi in, just so she is aware, and since we've shared the accepted manuscript titles and author names with her before. Many thanks!

Best,
Martin

On Mon, Mar 20, 2023 at 11:20 AM Samuel Christopher Woolley <swoolley@utexas.edu> wrote:

Hi Kate,
Thanks for reaching out. I'm really sorry to hear about the continued harassment. I've dealt with some research-related vitriol recently and very much understand.
I'm 100% fine with moving this author's name from the manuscript, given the circumstances. Martin, is this logistically feasible given where we are w/ SM+S and the release of the special issue?
I will let you communicate further with Kate and Renee about this--but thumbs up from my end re doing whatever is needed.
Best,
Sam

--
Martin Johannes Riedl, Ph.D.
Postdoctoral Fellow and Knight Research Associate | Center for Media Engagement
Research Associate | Technology and Information Policy Institute
The University of Texas at Austin
Pronouns: he, him, his

Recent research:

The mobilization of social media influencers in the political arena
Signaling news outlet trust in a Google knowledge panel
Audio misinformation on WhatsApp

To: Martin Riedl[martin.riedl@utexas.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; Josephine Lukito[jlukito@utexas.edu]; Samuel Christopher Woolley[swoolley@utexas.edu]
From: Kate Starbird
Sent: Sun 3/19/2023 2:59:19 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Sun 3/19/2023 2:59:31 PM

Hi folks,
I'm writing to check the status of this and ask for some advice. Our research is increasingly leading to harassment. One of the authors on the paper — who contributed a small amount to the initial framing, but whose work was largely cut from the final paper — is worried about her name appearing as an author. Would there be any pathways to removing her name from the manuscript?

Her contributions were almost entirely on our Parler analysis which we removed from the final paper.

I've be happy to chat about this by phone (18).

Thank you for your consideration.

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

Please note that, as an employee of a public university, your communications with me are subject to public records requests.

On Jan 26, 2023, at 3:00 PM, SMS Political Influencers <smspoliticalinfluencers@gmail.com> wrote:

This Message Is From an Untrusted Sender
You have not previously corresponded with this sender.
See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.
26-Jan-2023

Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

It is a pleasure to accept your manuscript entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" in its current form for publication in our special issue on political influencers in Social Media and Society.

We outline the next procedural steps below - please let us know if you have any questions.

1. Since Sage processes articles as they come in, and immediately pushes them out to production once uploaded, we are aiming for all special issue articles to be submitted by authors through the journal website at around the same time.

2. Based on the current stage of development of the special issue, and in coordination with all other authors, we expect to send out a notification for you to upload your manuscript to the journal website in late February/early March.

3. Please do not upload your final manuscript to the journal's site until you have heard from us - we will let you know once you may proceed.

4. The editorial team at Social Media + Society will set up a tab for authors to use when uploading manuscripts. Once your article is submitted, it will immediately go to production.

5. Please note that the online submission system of Social Media + Society enforces a cap on word length of abstracts at 250 words. If your abstract currently exceeds 250 words, please revise it accordingly, to prepare your manuscript for submission.

We are excited that your manuscript is part of our special issue, and want to thank you for your great contribution to the journal.
Kindly,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

To: Rebecca Kern[rkern@politico.com]
Cc: Samantha Chan[SChan@92NY.org]; Aleah Vassell[aleah@aiforthepeopleus.org]; Sawyer Besser[sawyerbe@uw.edu]; Candace DeLeon[reneedirestapa@gmail.com]; Britta Conroy-Randall[BConroy@92NY.org]; mutale@aiforthepeopleus.org[mutale@aiforthepeopleus.org]; Renee DiResta[renee.diresta@gmail.com]
From: Kate Starbird
Sent: Tue 3/7/2023 9:19:22 PM
Subject: Re: Request from Panelists for State of America Summit
Received: Tue 3/7/2023 9:19:47 PM

* Disinformation is "participatory" — spread through both top-down and bottom up processes, with everyday people spreading (and even producing) false/misleading claims. Witting agents, unwitting crowds … and "the willing".
* ChatGPT opens up new possibilities for manipulators and complicates efforts to address disinformation — witting agents can more easily produce and spread misleading content (e.g. placing similar but different enough posts and articles across disparate accounts an/or websites); to flood information systems with BS and reduce trust in information systems;

* ChatGPT systems may also be targeted for information operations as bad actors seek to train those systems to generate content aligned with their objectives. Scholars have been warning about embedded biases in AI systems… often attributed them to unintentional causes. But we can also imagine manipulators intentionally shaping AI.

* Debate about whether addressing influence operations should be considered part of cybersecurity. But hacking systems is more easily problematized (e.g. by legal frameworks) than hacking minds.

* Those who benefit from the online manipulation and the spread of disinformation will attempt to frame efforts to counter their tactics as "biased" and/or "censorship" … those efforts are in high gear at the moment.

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 6, 2023, at 1:52 PM, Rebecca Kern <rkern@politico.com> wrote:

Hi everyone,
I'm looking forward to our conversation on Friday afternoon. As a way for me to prepare since the subject matter of our panel topic is broad, I wanted to see if Kate, Mutale and Renee could share a few bullet points on topics you'd like to discuss, which can inform my questions. Here's our panel topic:

What's at the Intersection of Journalism, Disinformation, and Cybersecurity?

In a digital age plagued by misinformation, what is the future of free speech? Join us for a discussion on the complex relationship between misinformation, journalism, cybersecurity and free speech in today's digital landscape. How do we address the challenges of misinformation and propaganda in the free press and its impact on democratic societies? How can cybersecurity preserve the freedom of expression and protect against malicious cyber actors? And what can AI technology like ChatGPT teach us about how to stop the spread of misinformation in the future?

I've created a Google Doc that's publicly accessible and if you guys can add your thoughts in there or feel free to email me directly before **Friday at noon** so I can be sure to include your perspectives as I write my questions.

Thanks,

--

Rebecca Kern
Tech Reporter
POLITICO
rkern@politico.com
703-653-0116

From: Samantha Chan <SChan@92NY.org>
Date: Wednesday, February 15, 2023 at 7:26 PM
To: Rebecca Kern <rkern@politico.com>, Aleah Vassell <aleah@aiforthepeopleus.org>, Sawyer Besser <sawyerbe@uw.edu>, Candace DeLeon <reneedirestapa@gmail.com>
Cc: Britta Conroy-Randall <BConroy@92NY.org>, Kate Starbird <kstarbi@uw.edu>, mutale@aiforthepeopleus.org <mutale@aiforthepeopleus.org>, Renee DiResta <renee.diresta@gmail.com>
Subject: RE: State of America summit

EXTERNAL SENDER: Use caution with links and attachments.

Hi Everyone,

Thank you for confirming your availability. I'll be sending out a zoom invite for **March 10th at 3:00 PM ET** for the panel recording. Excited to have you all on board.

Let me know if you have any questions.

Best,
Samantha

From: Rebecca Kern <rkern@politico.com>
Sent: Monday, February 13, 2023 2:59 PM
To: Samantha Chan <SChan@92NY.org>; Aleah Vassell <aleah@aiforthepeopleus.org>; Sawyer Besser <sawyerbe@uw.edu>; Candace DeLeon <reneedirestapa@gmail.com>
Cc: Britta Conroy-Randall <BConroy@92NY.org>; Kate Starbird <kstarbi@uw.edu>; mutale@aiforthepeopleus.org; Renee DiResta <renee.diresta@gmail.com>
Subject: Re: State of America summit

Thanks – those dates work for me – I'd prefer Fri. March 10 btwn 2:30 -5 p.m. EST b/c Fridays tend to be less busy with the Congressional schedule. But I should also be able to make later in the Thurs. March 9 2:30-5 p.m. timeframe work as well.

Many thanks!
--

Rebecca Kern
Tech Reporter
POLITICO
rkern@politico.com
703-653-0116

From: Samantha Chan <SChan@92NY.org>
Date: Monday, February 13, 2023 at 12:42 PM
To: Aleah Vassell <aleah@aiforthepeopleus.org>, Sawyer Besser <sawyerbe@uw.edu>, Candace DeLeon <reneedirestapa@gmail.com>, Rebecca Kern <rkern@politico.com>
Cc: Britta Conroy-Randall <BConroy@92NY.org>, Kate Starbird <kstarbi@uw.edu>,mutale@aiforthepeopleus.org <mutale@aiforthepeopleus.org>, Renee DiResta <renee.diresta@gmail.com>
Subject: State of America summit

EXTERNAL SENDER: Use caution with links and attachments.

Hello,

We're excited to have you all speak at the State of America Summit! With all speakers confirmed, can we get the following from you all?

- If you haven't already shared it with us, can you send us your headshot and bio to post on our summit event page?
    - This is a sample of the headshots and bios from last year's summit
- Let me know what your availability is for a 45-minute session to record the panel. We've selected some dates based on dates based on current availability, if there are still conflicts, we can suggest other dates.
    - March 8th 2:30-5PM ET
    - March 9th 2:30-5PM ET
    - March 10th 2:30 – 5PM ET

Let me know if you have any questions!

Samantha Chan
Program Manager
Newmark Civic Life Series of Recanati Kaplan Talks
Belfer Center for Innovation & Social Impact
408.931.0006

<image001.png>

To: Beth Goldberg[bethgoldberg@google.com]
Cc: Jeff Hancock[hancockj@stanford.edu]; Daniel Bateyko[dbateyko@stanford.edu]; Mike Caulfield[mica42@uw.edu]; Renee DiResta[renee.diresta@gmail.com]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Mon 4/3/2023 5:18:41 PM
Subject: Re: Election Prebunking Process & Next Steps
Received: Mon 4/3/2023 5:18:52 PM

I'm going to suggest Mike as the PI on this from UW's end. I can help with the parts that he might be less familiar with (IRBs).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Apr 3, 2023, at 8:19 AM, Beth Goldberg <bethgoldberg@google.com> wrote:

Thanks, Dan, for rallying us around a time, Fridays work for me with a slight preference for 10 (sorry Jeff!) but I can do either.
Kate, I'd forgotten about spring break (hope it was a nice respite!) so no problem on the delay. On funding, I'm fine with that arrangement to not fund time for UW. We'll still need to sort out contracting for the study in general and payment for the video creation and testing costs.

I'd love to have at least one project management counterpart (PI or otherwise) who can drive this project forward (think contracting, IRB, pre-registration, etc). For example, I typically work with post-docs or profs on sabbatical for this. If that's not Kate or Mike at the moment, maybe you all can discuss who that main point of contact might be?

Thanks and see you Friday!
Beth

On Fri, Mar 31, 2023 at 9:32 PM Jeff Hancock <hancockj@stanford.edu> wrote:

Thanks Dan. I can make most Fridays work but there are several this quarter in which I'm traveling. Either the 10 or 1 PST options work for me, with a preference for 1.
--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Fri, Mar 31, 2023 at 4:39 PM Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all,

Beth, Jeff, 10:00-10:30am PST on Fridays works for Kate, Mike, Renee, and I for a standing check-in – is that a suitable time? If not, Friday at 1:00pm PST is also a possibility.

Please let me know if that's a conflict, otherwise looking forward to chatting with you all next week!

Best,
Dan

From: Daniel Bateyko <dbateyko@stanford.edu>
Date: Monday, March 27, 2023 at 12:33 PM
To: Kate Starbird <kstarbi@uw.edu>, Beth Goldberg <bethgoldberg@google.com>, Mike Caulfield <mica42@uw.edu>, Jeffrey T. Hancock <hancockj@stanford.edu>
Cc: Renee DiResta <renee.diresta@gmail.com>, Elena Cryst <ecryst@stanford.edu>
Subject: Re: Election Prebunking Process & Next Steps

Hi all,

I suspect we'd also benefit from moving out the time to another week, so I'm going to go ahead and cancel. Judging from our calendars, we're available for a 30 min call between these times:

9:00-10:30am Mondays

10:00-11:00am Fridays

@Beth Goldberg, @Kate Starbird, @Mike Caulfield, @Jeffrey T. Hancock, do you have time for a standing meeting Mondays 9:30-10:00am PST? If not, is there another time from those above that would work?

@Kate Starbird, @Mike Caulfield, let's sync up on coding – I'm behind on our plans, but I'd love to pitch in and I have bandwidth this week.

As ever,
Dan

From: Kate Starbird <kstarbi@uw.edu>
Date: Monday, March 27, 2023 at 12:18 PM
To: Beth Goldberg <bethgoldberg@google.com>
Cc: Daniel Bateyko <dbateyko@stanford.edu>, Jeffrey T. Hancock <hancockj@stanford.edu>, Renee DiResta <renee.diresta@gmail.com>, Mike Caulfield <mica42@uw.edu>, Elena Cryst <ecryst@stanford.edu>
Subject: Re: Election Prebunking Process & Next Steps

His Beth,

I just followed up with Mike and it looks like we'll be co-leading on the UW side. I'm pretty sure we're not going to want payment. We'd rather fund our time on this from our existing funds (from philanthropic sources, likely Knight, Hewlett, and/or Newmark funding) if that's okay with you all. In terms of funding the creation of content, we'd rather that happen external to us, if possible.

We're also wondering if we could delay a week while we get our ducks in a row and find another time (starting next week) when we can both attend. For me, Monday or Friday mornings are probably the only viable option due to my teaching and service schedule.

Sorry for the hassle. Between wrapping up the EIP and starting a new quarter, things are little messy here at the moment.

Best,

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 27, 2023, at 8:19 AM, Kate Starbird <kstarbi@uw.edu> wrote:

Our team has been on Spring break, so not much progress since last time we met. I may have to co-PI with Mike Caulfield on the UW side. I'm teaching this quarter and won't be able to attend the Tues morning meetings (as they conflict with my class).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 27, 2023, at 7:50 AM, Beth Goldberg <bethgoldberg@google.com> wrote:

Hi all, checking in before our meeting tomorrow to see if you've had a chance to code trope frequency or decide on contracting and payment arrangements?

It would also help me to know who the PI is - it'd help to have consistent communication between our biweekly meetings so we can move this project ahead.

Thanks,

Beth

On Tue, Mar 14, 2023 at 1:51 PM Beth Goldberg <bethgoldberg@google.com> wrote:

You were missed, Dan, Mike and Renee! Here's a distillation of what we discussed and next steps:

- **We will prioritize narrative tropes that are *prevalent* and likely to show up *nationwide*, eg:**
    - tricky ballots
    - mysterious late ballots or "found ballots" // mail-in ballots
    - moving ballots around eg unmarked white vans
    - Ballot mules / fake ballot drops
    - Vote drops / jumps, official counts vs projections - 'you've seen these graphs before, here's what actually happens when the line spiked'

- We can structure our timelines to **have 2+ videos ready in time for specific primaries** (eg a mix of battleground and less contested) but do not need to formulate videos for specific states. In fact, it'll make us appear less politically biased if we test a representative sample of americans and show the videos to all americans on youtube.

- Next steps:
    - SIO+UW will **code tropes by frequency** in 2020 and 2022 to inform which we select
    - SIO+UW **decide contracting and payment arrangements**
        - eg google could pay for video production and ads, but not for the academic lab test.
        -
    - Regroup in 2 weeks Mar 28 to align on: contracting/payment, top choice tropes, and outcome variables of interest

On Tue, Mar 14, 2023 at 12:16 PM Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all, I'll be out of the office today and unfortunately unable to join. Excited to see this exchange of ideas and to catch up on the conversation when I'm back in.

Best,
Dan

From: Jeff Hancock <hancockj@stanford.edu>
Date: Tuesday, March 14, 2023 at 9:43 AM
To: Beth Goldberg <bethgoldberg@google.com>
Cc: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <renee.diresta@gmail.com>, Mike Caulfield <mica42@uw.edu>, Daniel Bateyko <dbateyko@stanford.edu>, Elena Cryst <ecryst@stanford.edu>
Subject: Re: Election Prebunking Process & Next Steps

Hi Beth,

Thanks so much for all this background information. I've gone through it all and have a much better understanding of the steps we'd need to do. I continue to think that pre-bunking and some of the tropes we've identified are a good fit.

Here's a link to the tropes table (see p.2). The tropes manuscript is still in pretty rough early stages (though we're using your paper as a template Beth!). We can share that when we've made more progress, but I think that the table should have enough info for us to get started on.

I'll sadly be virtual as well today.

--Jeff

Jeff Hancock

Harry and Norman Chandler Professor of Communication

Founding Director, Stanford Social Media Lab

Stanford University

On Wed, Mar 1, 2023 at 11:58 AM Beth Goldberg <bethgoldberg@google.com> wrote:

Hi all,

Good to see you yesterday. I'm sharing context on the proposed approach to prebunking elections so that we can get specific on our next call Mar 14 about tropes and outcome variables we want to focus on. No need to follow this format exactly, but below is one way we could work together.

Process used in past prebunking campaigns (details in Practical Guide to Prebunking Misinfo and Science paper)**.**

1. Conduct research to catalog prevalent misinformation tropes / narratives / techniques ✅

2. Contract with university partners, then subcontract with a creative agency to develop prebunking videos. Collaboratively develop videos.

3. Test videos in RCT for outcomes including a) discernment of the technique/trope and b) behavioral intent to share misinfo

4. Test videos on YouTube by showing them to people via ads (which entails buying ads like any other 3P advertiser). Use YouTube's single question survey function ("custom brand lift") to evaluate discernment, pictured here evaluating discernment of the technique fearmongering:

<image.png>

Example prebunking videos:

- 30s vaccine hesitancy videos
- 60s anti-refugee misinformation videos
- 30-90s rhetorical technique videos

Next steps:

- Jeff to share election tropes paper draft
- Mar 14 call agenda:
    - pick a primary race that we want to pilot test in
    - then identify which tropes are likely to be most prevalent in that state
    - identify which outcome variables to test (if time)

Questions and suggestions welcome - see y'all in 2 weeks!
Beth

Error! Filename not specified.

Beth Goldberg (she/her)
Head of Research & Development
google.com/jigsaw

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(*generated by Renee to track sections/length)*

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To our readers,

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The Election Integrity Partnership

The Election Integrity Partnership was supported by students, staff and researchers from the four partners organizations:

Stanford Internet Observatory	University of Washington Center for an Informed Public	Graphika	DFRLab
Samantha Bradshaw	Joseph Bak-Coleman	Joseph Carter	Eric Baker
Daniel Bush	Andrew Beers	Avneesh Chandra	Graham Brookie
Jack Cable	Nicole Buckley	Shawn Eib	Emerson Brooking
Caleb Chiam	Michael Caufield	Rodrigo Ferreira	Kelsey Henquinet
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Isabella Garcia-Camargo	Kate Starbird	Léa Ronzaud	Leon
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This report was edited by Eden Beck. The Election Integrity Partnership would like to thank Matthew Masterson for additional feedback.

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Chapter 1: The Election Integrity Partnership

1 Introduction

The 2016 Presidential Election in the United States demonstrated to the world the potential of wide-scale information operations. Since 2016, these efforts have grown, often aimed at developed democracies and operated by state adversaries and domestic activists alike. Misinformation and disinformation can disenfranchise voters and diminish trust in the results of electoral contests, thus eroding public confidence in the integrity of democratic processes and leadership transitions overall. For the purposes of this report, we use "misinformation" as an umbrella term to describe intentional or unintentional false, misleading, or exaggerated information or claims, while "disinformation" is false or misleading information that is purposefully seeded or spread for an objective.[1]

Elections in the United States are highly decentralized.[2] Over 10,000 individual jurisdictions—covering state, county, and municipal levels—are responsible for administering the vote on Election Day. Voter registration systems and databases are centralized at the state level and shared with counties and municipalities. Vote casting, in contrast, is organized at the local level, with each locality able to choose its own vote recording and tabulation systems and responsible for educating voters about that system.[3] There is no centralized support to aid this vast number of jurisdictions in identifying and responding to emerging election-related mis- and disinformation.

In 2020, adding to the complexity, the global COVID-19 pandemic forced rapid changes to voting procedures. States and counties had to quickly adapt their electoral processes to new public health guidelines. Existing state laws on election procedure were in many cases not adaptable to the emergency conditions, leading to late executive and legislative action and court decisions.[4] Voters, many of whom were sheltering at home, followed election conversations on broadcast as well as social media. This included searching for information about where and how to vote in light of pandemic restrictions.

---

[1] See Appendix A: Definitions for a detailed definition of both Misinformation and Disinformation.
[2] Michael McFaul, ed., *Securing American Elections: Prescriptions for Enhancing the Integrity and Independence of the 2020 U.S. Election and Beyond* (Stanford, CA: Cyber Policy Center, June 2019), https://fsi-live.s3.us-west-1.amazonaws.com/s3fs-public/stanford_cyber_policy_center-securing_american_elections.pdf.
[3] Herbert Lin, et al., "Increasing the Security of the U.S. Election Infrastructure" in *Securing American Elections* (Stanford, CA: Cyber Policy Center, June 2019), 17.
[4] In Wisconsin, for example, federal district court judge William Conley ruled to extend the acceptance date of absentee ballots from November 3 to November 9, citing that "Wisconsin's election system sets [voters] up for failure in light of the near certain impacts of this ongoing pandemic." The judge put his order on hold to give the Wisconsin State Legislature time to appeal. The Circuit court ultimately overruled the lower court ruling and time ran out for the Wisconsin legislature to legislate or appeal an exception to state election law. See Democratic National Committee v Bostelmann, No. 20-2835 (7th Cir. October 8, 2020); Amy Howe, "Court declines to reinstate COVID-19 accommodations for elections in Wisconsin," SCOTUSblog, October 26, 2020, 11:28 PM, https://www.scotusblog.com/2020/10/court-declines-to-reinstate-covid-19-accommodations-for-elections-in-wisconsin/.

The initial idea for the Partnership came from four students that the Stanford Internet Observatory (SIO) funded to complete volunteer internships at the Cybersecurity and Infrastructure Security Agency (CISA) at the Department of Homeland Security. Responsibility for election information security is divided across government offices: CISA has authority to coordinate on cybersecurity issues related to the election, the FBI to investigate cyber incidents and enforce election laws, and intelligence agencies to monitor for foreign interference, yet no government agency in the United States has the explicit mandate to monitor and correct election mis- and disinformation. This is especially true for election disinformation that originated from within the United States, which would likely be excluded from law enforcement action under the First Amendment and not appropriate for study by intelligence agencies restricted from operating inside the United States. As a result, during the 2020 election, local and state election officials, who had a strong partner on election-system and overall cybersecurity efforts in CISA, were without a clearinghouse for assessing mis- and disinformation targeting their voting operations. The students approached SIO leadership in the early summer, and, in consultation with CISA and other stakeholders, a coalition was assembled with like-minded partner institutions.

The Election Integrity Partnership (EIP) was officially formed on July 26, 2020—100 days before the November election—as a coalition of research entities who would focus on supporting real-time information exchange between the research community, election officials, government agencies, civil society organizations, and social media platforms.

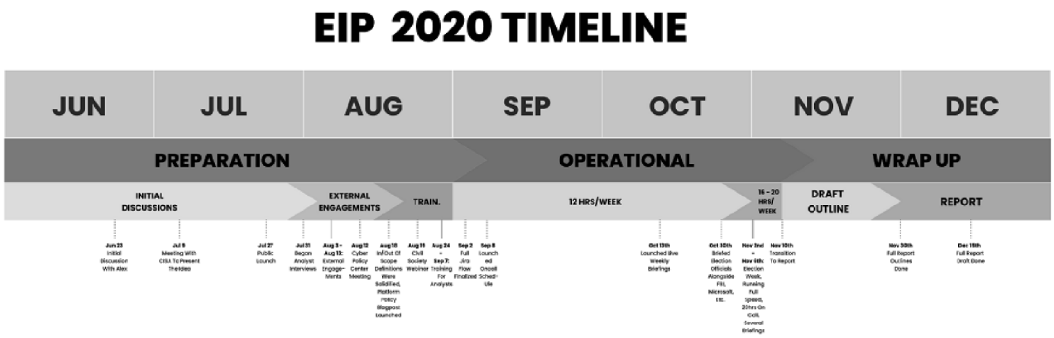

Figure 1-1: Timeline of the Election Integrity Partnership's work.

2 The EIP: Partner Organizations and Structure

The Partnership was formed between four of the nation's leading institutions focused on understanding misinformation and disinformation in the social media landscape: the Stanford Internet Observatory, Graphika, the Atlantic Council's Digital Forensic Research Lab, and the University of Washington's Center for an Informed Public.

The **Stanford Internet Observatory** (SIO) was founded in June 2019 to study the misuse of the internet to cause harm, formulate technical and policy responses to said misuse, and teach the next generation how to avoid the mistakes of the past. Under the direction of former Silicon Valley cybersecurity executive Alex Stamos, the Observatory had a specific interest in applying the learnings of major technology platforms from the 2016 election to prevent a repeat in future years. The Observatory sits at Stanford's Cyber Policy Center under the direction of Professors Nate Persily and Dan Boneh.

The Internet Observatory engaged its team of seven staff researchers and five postdoctoral scholars, and hired a team of 38 undergraduate and graduate research assistants from Stanford to serve as analysts on the project.

The **University of Washington Center for an Informed Public** (CIP) was founded in December 2019 with the mission of marshalling the resources of a public university to address mis- and disinformation through research, education, policy development, and outreach. The Center's interdisciplinary faculty brought deep methodological expertise at systematically analyzing "big" social data at macro-, meso-, and micro- scales to track the spread of misinformation online, and contextual expertise in online disinformation.

The CIP contributing team consisted of five founding faculty members, several faculty affiliates, three postdoctoral researchers (all of whom started after the Partnership launched), 10 undergraduate and PhD students from the University of Washington, a data engineer, and a communications specialist.

Graphika is a social media analytics firm trusted by Fortune 500 companies, human rights organizations, and universities to map and navigate complex social media landscapes. The company was founded in 2013 by Dr. John Kelly, a pioneer in this field and source of expert testimony on foreign interference in the 2016 US presidential election before the Senate Select Committee on Intelligence. Graphika helps partners around the world to discover how communities form online and map the flow of influence and information within large-scale social networks. It reports on information operations carried out by various foreign actors around the world. In addition, Graphika regularly briefs the House and Senate Intelligence Committees on a range of topics, including the growth of the QAnon movement and the spread of misinformation around COVID-19.

Graphika's team consisted of 15 analysts, data scientists, and open source investigators. This unique combination of skills and expertise enables Graphika to take an innovative approach to detecting and monitoring disinformation.

The **Digital Forensic Research Lab** (DFRLab) was founded at the Atlantic Council in 2016 to operationalize the study of disinformation by exposing falsehoods and fake news, documenting human rights abuses, and building digital resilience worldwide. Its mission is to identify, expose, and explain disinformation where and when it occurs using open source research, create a new

model of expertise adapted for impact and real-world results, and forge digital resilience at a time when humans are more interconnected than at any point in history.

DFRLab's team consisted of its director, a research fellow, and digital forensic research assistants who brought their years of experience identifying and analyzing disinformation online to the Partnership.

The EIP was not set up as a legal entity; rather, it was a consortium based on good-faith agreements. While future models should certainly consider more formal arrangements, the time-sensitive nature of the project required organizations to rely on the trust and rapport that each entity had built through several years of collaboration.

3 The EIP: Goals and Scope

The stated objective of the EIP was to detect and mitigate the impact of attempts to prevent or deter people from voting or to delegitimize election results.[5] The EIP was not a fact-checking partnership, and was not focused on debunking misinformation more generally; our analysis of a narrative's veracity relied on external fact-checks from election officials, fact-checking organizations, local media, or mainstream outlets. In addition, our objective explicitly excluded addressing comments made about candidates' character or actions and was focused narrowly on content tending to suppress voting, reduce participation, confuse voters as to election processes, or delegitimize election results without evidence.

GOALS OF THE ELECTION INTEGRITY PARTNERSHIP		
Goal 1: **Identify misinformation** before it goes viral.	Goal 2: Share clear, accurate **counter-messaging**.	Goal 3: Increase **transparency** into what actually happened during the 2020 elections.
Activities		
• Establish a collaboration between the top misinformation research organizations • Operationalize the misinformation research process with tiered research and workspace management systems • Train analysts to identify cross-platform trends for	• Build critical bridges between elections officials, platforms, and civil society organizations • Provide local and state officials with a partner that could research and help mitigate misinformation about their local operations • Generate rapid research findings that have the	• Collect data in real-time for empirical analysis that would be difficult after the fact • Build an annotated database of archived misinformation content • Provide visibility across multiple platforms in a way that is more difficult for a company's in-house

[5] "Announcing the EIP," Election Integrity Partnership, July 27, 2020, https://www.eipartnership.net/news/announcing-the-eip.

earlier platform notification and action when appropriate	• ability to disrupt the misinformation environment in real time	• team to perform
Outputs		
• Flag policy violations to platforms • Communicate to stakeholders	• Live media briefings • Blog posts • Tweet threads	• Final report • Dataset of content for future academic use

To determine what was in and out of scope for the EIP, one of our first tasks was to build a framework that identified potential targets of election-related mis- and disinformation. This resulted in the identification of four core categories:

SCOPE OF THE ELECTION INTEGRITY PARTNERSHIP			
Procedural Interference: Misleading or false information about the actual election procedures. Content directly related to dates and components of the voting process that prevents people from engaging in the electoral process.	**Participation Interference**: Related to voter intimidation. Content that deters people from voting or engaging in the electoral process.	**Fraud:** Content that encourages people to misrepresent themselves to affect the electoral process or illegally cast or destroy ballots.	**Delegitimization of Election Results:** Content aiming to delegitimize election results on the basis of false or misleading claims.
Example Content			
Content that misleads voters about how to correctly sign a mail-in ballot. Content that encourages voters to vote on a different	Content that affects the desire or perceived safety of voters engaging in the electoral process. Misleading or false information about the	Offers to buy or sell votes with cash or gifts. Calls for non citizens to vote.	Claims of fraud or malfeasance with inaccurate or missing evidence.

day.	length of lines at a polling station, to deter in-person voting.		

In addition to mapping out the EIP's scope, this content-centric framework enabled us to evaluate and compare platform policies across 15 different popular social media platforms in the US and to make specific platform policy recommendations[6] Additionally, the framework is intended to be a resource for civil society, government, academia, and the public to understand what election-related speech popular platforms will moderate.

3.1 Organizational Structure and Workflow Management

One of the innovative aspects of the EIP was its internal research structure, which had to operationalize the misinformation research process in such a way as to best leverage the capabilities of the partner organizations. There is often an abundance of data involved in the analysis of information operations, and the process of following threads can take weeks or months. In order to meet the need for real-time analysis while maintaining the high quality of investigations each partner holds itself to, the team developed a tiered analysis model that leveraged "on-call" staffing of different analyst types.

[6] The platforms we evaluated are: Facebook, Instagram, Twitter, YouTube, Pinterest, Nextdoor, TikTok, Snapchat, Parler, Gab, Discord, WhatsApp, Telegram, Reddit, and Twitch. We published our initial evaluation on August 18, 2020, and updates on September 4, September 11, October 14, October 19, October 27, and October 28, 2020. Twitch was added to our list of evaluated platforms during our blog post update on October 27. Each update reflected changes in platforms' published policies. See "Evaluating Election-Related Platform Speech Policies," Election Integrity Partnership, October 28, 2020, https://www.eipartnership.net/policy-analysis/platform-policies.

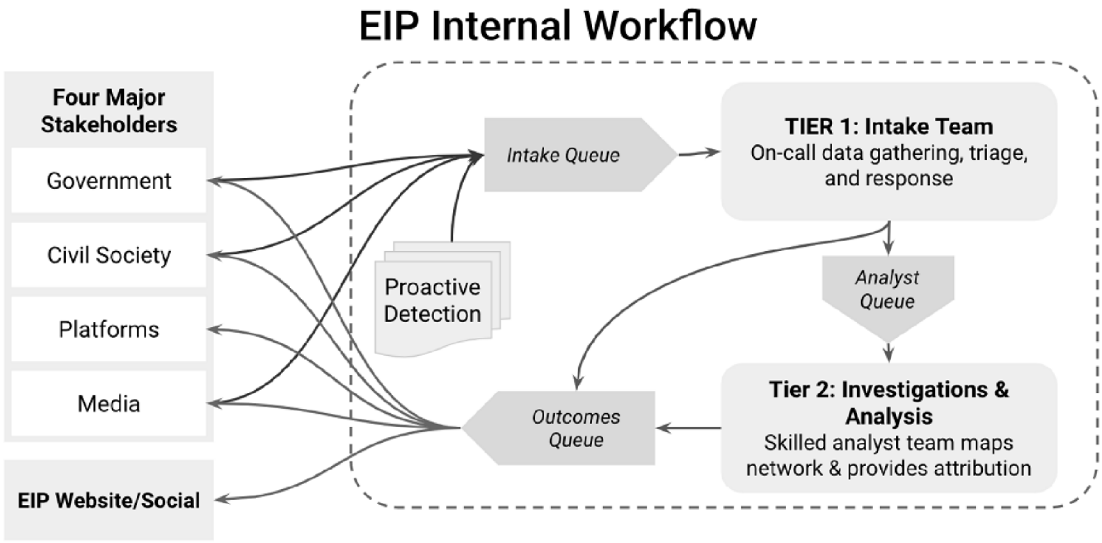

Figure 1-2: The EIP internal workflow. Filed tickets moved through the listed queues per the directional arrows.

The EIP tracked its analysis topics and engaged with outside stakeholder organizations using an internal ticketing workflow management system.[7] Each identified informational event was filed as a unique *ticket* in the system. Tickets were submitted by both trusted external stakeholders (detailed in Section 4 below) and internal EIP analysts. For example, an email from an external stakeholder to the dedicated tip line would automatically generate a ticket to the internal team for quick response. Similarly, if during online monitoring an analyst came across a piece of content that looked suspicious or might be an instance of election-related misinformation, that analyst would open a ticket on the case and put it in the analyst queue for investigation. A single ticket could map to one piece of content, an idea or narrative, or hundreds of URLs pulled in a data dump. The ticket tracked analysts' research into this event, comments from platform partners, and other developments. Related tickets were then grouped into distinct information events or *incidents*, described more in Chapter 5.[8]

3.2 Analysis Tiers

Each ticket traveled through a series of analysis queues before reaching a final resolution. In the investigation process, analysts completed specific forms that contained a series of required fields detailing the information incident and documented essential data such as target audience, subject, engagement, and spread. The overall research process was broken down into three phases: detection, assessment, and mitigation.

[7] The EIP used Jira Service Desk software for the project. The team chose Jira because it supported a large team and allowed the addition of workflows that require both robust customer management capabilities and organizational features to reflect the numerous roles needed to respond to any inbound request. Licenses and technical support were provided under Atlassian's community license program.
[8] See Appendix A: Definitions for a detailed definition of both Events and Incidents.

- **Tier 1: Detection —** Tier 1 was tasked with conducting the initial analysis on and archiving of potential incidents. These analysts would also search for potential in-scope content by tracking public content related to an assigned state or interest group in order to surface incidents. To ensure coverage in the monitoring process, each analyst was assigned to a specific state or interest group, which they would develop expertise in and follow for potential emerging narratives throughout the project. These analysts classified tickets as in and out of scope for further analysis and closed incidents for which further investigation or external communication was not needed. They also made initial recommendations on the prioritization of tickets, assigning high, medium, and low severity based on the risk of the content itself and on its spread across platforms.
- **Tier 2: Assessment —** This team was staffed by senior analysts from each partner organization. Analysts used open source intelligence and other social media analysis methods to delve deeper into the initial analysis from Tier 1. This included looking for evidence of coordination, potential foreign interference, or further dynamics related to a given incident. This tier of analysts could recommend actions, such as communication to external partners, as appropriate.
- **Tier 3 (Managers): Mitigation —** This team consisted of leadership from each partnership organization, who signed off on the communication recommendations from Tier 2 senior analysts. The manager had the ability to tag platform partners on a ticket for action. They also communicated with the EIP's partners in government, and could request further information from election officials if necessary. Once a ticket reached Tier 3, the manager decided whether to put it into a holding queue for ongoing monitoring, assign the ticket back to a Tier 2 analyst to produce a public blog post or Twitter thread discussing the issue, or close a ticket if it had been resolved.

Team members from each of these tiers were divided into on-call shifts. Each shift was four hours long and led by one on-call manager. It was staffed by a mix of Tier 1 and Tier 2 analysts in a 3:1 ratio, ranging from five to 20 people. Analysts were expected to complete between two to five shifts per week. The scheduled shifts ran from 8:00 am to 8:00 pm PT for most of the nine weeks of the partnership, ramping up only in the last week before the election from 12-hour to 16- to 20-hour days with all 120 analysts on deck.

3.3 Election Day-Specific Structures

On Election Day and in the days immediately following, EIP monitoring intensified significantly. Over the two-month-long period from September 3 (the first day of EIP activity) to November 1, EIP researchers had logged 269 tickets. In the three-day period that followed—November 2 to November 4—EIP researchers logged an additional 240 new tickets, as well as monitoring and revising old cases as they were packaged into new narratives. This dramatic increase in tempo required changes to how the EIP identified and evaluated misinformation incidents.

In order to manage an anticipated increase in incidents on Election Day itself, the EIP established five working groups, each organized and led by relevant subject matter experts:

- *State and Regional Monitoring* focused on monitoring narratives related to polling locations in battleground states, particularly Pennsylvania, Wisconsin, Florida, and Minnesota. This work was conducted by means of curated CrowdTangle, Twitter, and Junkipedia lists.
- *"Targeted Group" Monitoring* focused on identifying misinformation that seemed to specifically target an ethnic or diaspora community in the United States. This included the Black community, which was the subject of extensive disinformation campaigns in 2016, as well as Chinese- and Spanish-language content.
- *Influencers and Young Electorate Monitoring* focused on first-time voters, particularly members of Generation Z. This work was conducted by way of close analysis of TikTok and Instagram trends.
- *Political Extremism Monitoring* focused on communities that had previously endorsed political violence, particularly those adjacent to White-identitarian causes. This work was conducted by comprehensive monitoring across 4chan, 8kun, Gab, and Parler. Researchers additionally monitored open Telegram channels and Discord servers linked to extremist causes.
- *Livestream Monitoring* focused on rapidly identifying trending livestreams, which were anticipated to involve both polling location activity and (later) election night protests. This work required tracking popular livestreams across Facebook Live, Periscope, YouTube Live, and Twitch.

These working groups would provide the foundation of EIP monitoring efforts in both the Election Day and post-Election Day periods.

4 External Stakeholders

The EIP served as a connector for many stakeholders, who both provided inputs to and received outputs of the internal analysis structure described above. External stakeholders included government, civil society, social media companies, and news media entities.

Outside government and civil society partners could create tickets or send notes to EIP analysts, and they used these procedures to flag incidents or emerging narratives to be assessed by EIP analysts. Sometimes the flags were out of scope, such as an instance of general political misinformation that was not election related. In these cases, this decision by our team was communicated to the reporting partner and the incident was closed. For all that were in scope, the EIP quickly analyzed them and then provided outputs to external stakeholders. Some of these cases flagged by outside partners involved the EIP participating in informing the public of a finding, which was done by way of a rapid-response blog post or Twitter thread, or a discussion during our regularly scheduled media briefings.

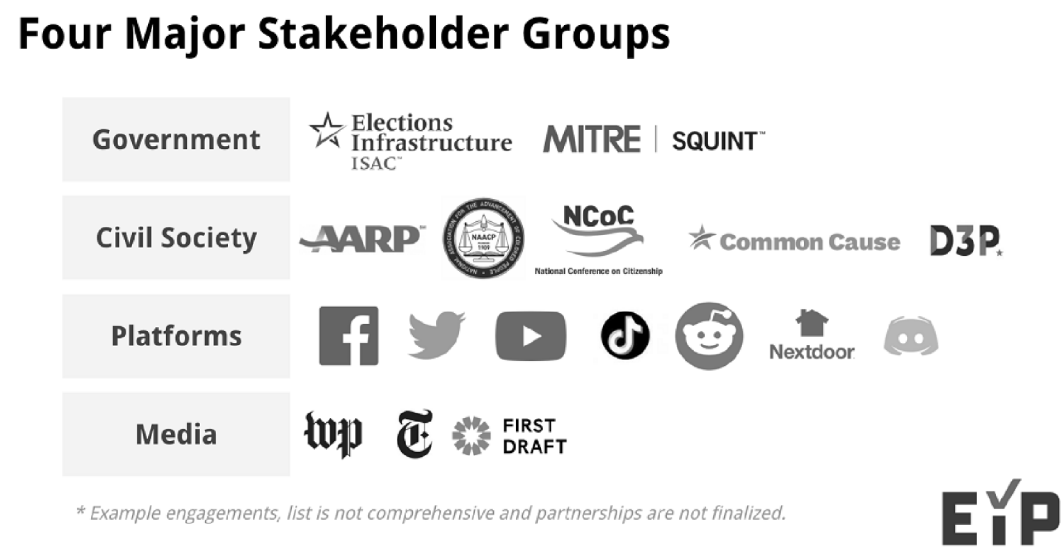

Figure 1-3: Major stakeholder groups that collaborated with the EIP.

4.1 Government

Given the decentralized nature of election administration, government entities at the local, state, and federal level are all responsible in some way for election security and thus countering election-related mis- and disinformation.

Prior to the 2016 election, the federal government played a very limited role in election security. Russian interference in the 2016 US presidential election took the form of several Russia-linked entities engaged in a broad interference effort that included information operations and targeting of election infrastructure as well as hack-and-leak attacks. Operatives of the Russia-based Internet Research Agency used social media to degrade Americans' confidence in their own democratic process. Since 2016, the US government has declared election systems critical infrastructure and politicians have called for a "whole-of-society" approach to countering attacks against them.[9]

EI-ISAC: Coordination Across State And Local Government

Since the 2016 election, while government entities at all levels have stepped up election security efforts, addressing election-related misinformation has remained a gap. For the 2020 election, reporting falsehoods about the election to social media platforms represented significant logistical and jurisdictional challenge. The Election Infrastructure Information Sharing and Analysis Center (EI-ISAC), an independent organization run by the non-profit Center for Internet

[9] Sean Lyngaas, "Sen. Warner calls for a 'whole-of-society' U.S. cyber doctrine," CyberScoop, December 7, 2018, https://www.cyberscoop.com/sen-warner-calls-whole-society-u-s-cyber-doctrine/.

Security (CIS) that connects state and local governments as well as relevant private companies, helps coordinate election security efforts broadly, and in this election cycle served as a singular conduit for election officials to report false or misleading information to platforms. By serving as a one-stop reporting interface, the EI-ISAC allowed election officials to focus on detecting and countering election misinformation while CIS and its partners reported content to the proper social media platforms. Additionally, the Countering Foreign Influence Task Force (CFITF), a subcomponent of CISA, aided in the reporting process and in implementing resilience efforts to counter election misinformation.

The EIP engaged with government stakeholders primarily to provide analytical capability and context around election-related misinformation. Content reported by election officials to the EI-ISAC was also routed to the EIP ticketing system. This allowed analysts to find similar content, ascribe individual content pieces to broader narratives, and determine virality and cross-platform spread if applicable. This analysis was then passed back to election officials via the EI-ISAC for their situational awareness, as well as to inform potential counter-narratives. Additionally, if the EIP detected potential election-related misinformation that targeted a particular region, analysts sent a short write-up through the EI-ISAC to the relevant election official, often to refute a viral claim to demonstrate to a platform that a piece of content was indeed a falsehood and therefore in violation of its civic integrity policy. In this way, the EIP demonstrated the upside of using the EI-ISAC coordinating body to connect platforms with authoritative voices to determine truth on the ground and help election officials effectively counter viral falsehoods about election infrastructure.

4.2 Civil Society

Civil society organizations fill critical roles in promoting civic engagement, and in organizing and sharing information with their communities. The EIP engaged with civil society organizations to share findings and build perspective across geographies and demographics. Civil society collaborators submitted tips through the trusted partner tip line and interacted with the EIP research team through briefings, partner meetings, and shared findings. The Partnership engaged with Common Cause,[10] national and regional chapters of the NAACP,[11] the Healthy Elections Project,[12] MITRE,[13] and regional chapters of the AARP[14] (discussed in more detail below). Some collaborators were integrated into the Jira platform for tip reporting, while others preferred to engage in a more informal capacity such as via email. Onboarded members were able to submit tickets for analysis and receive feedback from the EIP analysts.

The AARP collaboration was maintained by the Center for an Informed Public and was notable because it involved empowering and training retired adults to identify false or misleading information as part of a “Factcheck Ambassador” training program. The EIP worked primarily with the Washington State chapter of the AARP, but informational training sessions were shared

[10] Common Cause, https://www.commoncause.org/our-work/voting-and-elections/.
[11] NAACP, https://naacp.org.
[12] Stanford-MIT Healthy Elections Project, https://healthyelections.org/.
[13] MITRE, https://www.mitre.org.
[14] AARP, https://www.aarp.org.

with other chapters around the country.[15]

Another noteworthy civil society partner was the National Conference on Citizenship, specifically through their Junkipedia team.[16] Junkipedia is a research tool created by the Algorithmic Transparency Institute, a project of the National Conference on Citizenship, to collect problematic social media content. The tool served dual purposes: first, through its own network of journalists and reporters, it surfaced content for analysis, providing visibility into more geographies and communities; and second, it facilitated research and detection by EIP analysts, who were able to use Junkipedia's list creation features to track account activity on TikTok and YouTube.

4.3 Media

Media coverage of misinformation can serve to debunk false claims and put public pressure on platforms to take action on problematic content. Although mis- and disinformation monitoring and analysis work is valuable on its own, communications with media organizations increased the impact of the EIP's research. The EIP's rapid-response research and analysis work necessitated an adaptive, rapid-response communications strategy in order to share timely insights and key mis- and disinformation concepts with journalists and news outlets. Investigating and reporting on mis- and disinformation is complex and comes with unique challenges.[17] The EIP held regular news briefings in which analysts and team leads prioritized describing and contextualizing the misinformation incidents documented in tickets. Journalists who attended the briefings could then reach, educate, and inform the communities they served, contextualizing and countering misleading narratives as they saw fit. Over the time of the EIP's operation, this process resulted in over 60 articles that specifically cited the EIP's work or its researchers.[18]

A thoughtful media strategy was key to our reach and impact as an organization. We met the needs of media stakeholders in three primary ways—public research briefings, responding to media requests, and in-depth collaborations.

Public Research Briefings

On October 13, 2020, the EIP hosted the first in a series of weekly research briefings designed to share the Partnership's rapid-response research and policy analysis more broadly ahead of Election Day. Before each briefing, the EIP used its Twitter account, @2020Partnership, to announce the briefing and promote attendance. These briefings, scheduled for 30 minutes, were hosted virtually on Zoom and featured short presentations from various EIP researchers and

[15] Elliot Trotter, "CIP, AARP Washington Factcheck Ambassador Trainings help retirees sort fact from fiction," University of Washington Center for an Informed Public, December 16, 2020, https://www.cip.uw.edu/2020/12/16/cip-aarp-washington-factcheck-ambassador-trainings/.
[16] "About Junkipedia," https://www.junkipedia.org/about.
[17] Melinda McClure Haughy, et al., "On the Misinformation Beat: Understanding the Work of Investigative Journalists Reporting on Problematic Information Online," *Proceedings of the ACM on Human-Computer Interaction* no. 4, Article 133 (October 2020), https://doi.org/10.1145/3415204.
[18] See Appendix B for a list of media citations.

analysts. Each briefing reserved time for members of news organizations to ask questions of researchers involved with the Partnership. The briefings were considered "on the record," meaning that anything shared or said during the course of the presentations or from the question-and-answer session could be used and directly quoted from by journalists for their reporting. The Q&A format allowed EIP researchers and analysts to cover a lot of ground in a relatively short amount of time while also allowing journalists to gain additional insights from the other questions asked by reporters from other news organizations. As interest in the EIP's work grew and reports of false and misleading information increased dramatically, briefings increased from once a week to several times a week.

The briefings were open to the public. The first briefing hosted approximately 12 journalists, but as interest in the EIP's work grew, so did briefing attendance, with an average of 120 attendees on election week briefings and a peak of 174 attendees at the briefing the day after the election. After each briefing, the EIP communications lead followed up with journalists in attendance.

On Election Day, the EIP hosted a morning and afternoon briefing to report on observations of activity that day. Reporters and editors from the *Washington Post*, the *New York Times*, the *Wall Street Journal*, *USA Today*, *MIT Tech Review*, *Bloomberg Business*, the Associated Press, Reuters, National Public Radio, *Politico*, NBC News, The Markup, The Information, PBS NewsHour, BBC News, Agence France Presse, the *Telegraph*, and Cyberscoop, just to name a few, regularly attended.

Responding to Media Requests

Throughout the course of the EIP's work ahead of and after Election Day, our communications lead also fielded inbound requests from the press to assist in assessing specific developing stories. Some of these journalists were dedicated to the "misinformation beat," while others covered peripheral beats such as the election, politics, technology, etc.

The UW team took the lead in tracking and responding to media requests that came in across the Partnership and connecting with the appropriate EIP researcher. For instance, journalists interested in misinformation-related policies developed by social media companies were directed to Stanford Internet Observatory, which closely monitored and analyzed guidelines put forward by platforms. Similarly, journalists interested in EIP research about "repeat spreaders" on Twitter who regularly shared false claims or misleading information about voting procedures were connected with members of the UW team, who were tracking and analyzing how that type of misinformation was shared and amplified.

In-Depth Collaborations

In the days leading up to the election, we set up collaborations with a few journalists who had experience covering the "misinformation beat." These differed from media requests; in these cases, we set up Slack channels and Google documents to think through trends and emerging data with the journalists, who were also experts on online misinformation. For instance, the UW team fielded more specialized research requests from NBC News, which has dedicated

numerous newsroom resources to reporting on mis- and disinformation issues. NBC's Brandy Zadrozny did some of the most substantive reporting on election-related mis- and disinformation ahead of and after Election Day, bolstered by some of the EIP's specialized research. Her election week story about election fraud narratives was driven by this in-depth collaboration.[19] Sheera Frenkel of the *New York Times* spent Election Day co-located with EIP researchers from Stanford Internet Observatory, with COVID-19 precautions in place. She published an early piece about the emerging "Stop the Steal" narrative, with quotations from an SIO researcher.[20]

The EIP also spent time assisting a local journalist writing specifically about election misinformation in Michigan for the *Detroit Free Press,* whose reporting was funded through a short-term grant from the American Press Institute. The reporter, Ashley Nervobig, attended numerous research briefings ahead of Election Day and was interested in the EIP's "What to Expect" report that outlined the types of disinformation and misinformation that researchers anticipated to emerge and take root before, during, and after Election Day.[21] A November 17, 2020, article in the *Detroit Free Press* looked at how many of the EIP's pre-election predictions around voting-specific misinformation emerged in Michigan, where incorrect claims and distorted narratives ran rampant in the days and weeks that followed voting.[22] That *Detroit Free Press* article, featuring interviews with EIP researchers, was republished by *USA Today*[23] and other news publications in the USA Today Network, including the *Arizona Republic*. Although many national newsrooms have one or multiple journalists focused on misinformation, Nerbovig was among the few regional reporters dedicated to covering misinformation from a local perspective, which encouraged us to make researchers available to her as she developed her story.

The EIP's outreach efforts with journalists and media organizations were valuable because they enabled timely sharing of insights and in-depth analysis with the public, policymakers, and social media platforms. During uncertain times, many people turn to journalists. At the same time, journalists themselves were seeking sound information to better contextualize the dynamics of how mis- and disinformation are shared and amplified. By prioritizing informing and educating journalists through these media efforts, the EIP was able to have a quick and widespread impact.

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[19] Brandy Zadrozny, "Misinformation by a thousand cuts: Varied rigged election claims circulate," NBC News online, November 11, 2020, https://www.nbcnews.com/tech/tech-news/misinformation-thousand-cuts-varied-rigged-election-claims-circulate-n1247476.

[20] Sheera Frenkel, "The Rise and Fall of the 'Stop the Steal' Facebook Group," *New York Times*, November 5, 2020, https://www.nytimes.com/2020/11/05/technology/stop-the-steal-facebook-group.html.

[21] Kate Starbird, et al., "Uncertainty and Misinformation: What to Expect on Election Night and Days After," Election Integrity Partnership, October 26, 2020, https://www.eipartnership.net/news/what-to-expect.

[22] Ashley Nervobig, "'Not a whole lot of innovation': 2020 election misinformation was quite predictable, experts say," *The Detroit Free Press*, November 17, 2020, https://www.freep.com/story/news/politics/elections/2020/11/17/2020-presidential-election-misinformation-predictable-experts/6322926002/.

[23] Ashley Nervobig, "'Not a whole lot of innovation': 2020 election misinformation was quite predictable, experts say." *USA Today*, November 17, 2020, https://www.usatoday.com/story/news/politics/elections/2020/11/17/2020-presidential-election-misinformation-predictable-experts/6322926002/.

4.4 Platforms

The EIP established relationships with social media platforms to enable direct flagging of incidents for evaluation if content or behavior appeared to violate the platform policies discussed earlier in this chapter. Platform partners could be added to any ticket, allowing them to see the summary assessment, public comments, and any relevant URLs. At the start of the EIP analysis period, platforms were onboarded, and specific contacts were added to our workspace management system. If content was identified as violating platforms' published content policies,[24] the platform was notified through Jira. If questions arose, a Manager could communicate with the platform representative in the ticket comments. Analysts would then monitor and update the ticket if the content in question was labeled or removed.

5 Example Ticket Process

To illustrate the scope of collaboration types we've discussed above, the following case study documents the value derived from the multi-stakeholder model that the EIP facilitated. On October 13, 2020, a civil society partner submitted a tip via their submission portal about well-intentioned but misleading information in a Facebook post. The post contained the following image:

[24] Election Integrity Partnership, "Evaluating Election-Related Platform Speech Policies," Election Integrity Partnership, October 28, 2020, https://www.eipartnership.net/policy-analysis/platform-policies.



Figure 1-4: Image included in a tip from a civil society partner.

In their comments, the partner stated, "In some states, a mark is intended to denote a follow-up: this advice does not apply to every locality, and may confuse people. A local board of elections has responded, but the meme is being copy/pasted all over Facebook from various sources." A Tier 1 analyst investigated the report, answering a set of standardized research questions, archiving the content, and appending their findings to the ticket. The analyst identified that the text content of the message had been copied and pasted verbatim by other users and on other platforms. The Tier 1 analyst routed the ticket to Tier 2, where the advanced analyst tagged in the platform partners Facebook and Twitter, so that these teams were aware of the content and could independently evaluate the post against their policies. Recognizing the potential for this narrative to spread to multiple jurisdictions, the Manager added in the CIS partner as well to provide visibility on this growing narrative and share the information on spread with their election official partners. The manager then routed the ticket to ongoing monitoring. A Tier 1 analyst tracked the ticket until all platform partners had responded, and then closed the ticket as resolved.

6 Practical Lessons Learned

The EIP was a first-of-its-kind collaboration between multiple stakeholder types who shared the goal of understanding, and being positioned to rapidly and effectively counter, election-related misinformation. There were several key lessons learned that may be helpful toward informing similar efforts in the future:

6.1 Pre-Election Period

1. **Detailed enumeration and comparison of platform policies lead to tangible positive changes.** When the EIP was formed in the summer of 2020, while platforms had articulated civic integrity policies in disparate blog posts and user agreements, no authoritative side-by-side comprehensive comparison of policies around election-related misinformation, or civic integrity, had been published. One of the first efforts of the Partnership was to collect these policies and compare them side-by-side. Part of this work was bucketing the policies into types of misinformation based on effect on civic integrity, an effort that paid dividends later as the EIP internally determined which types of election-related misinformation were or were not in scope.

2. **Publication of predicted narratives on the eve of the election enabled effective "pre-bunking."** On October 26 the EIP published a blog post predicting the manner and focus of misinformation that its analysts and researchers believed were likely to pervade social media on Election Day and shortly after.[25] This piece was informed not only by experience from past elections, but from observations accrued during the months of monitoring and analysis. Most of the predictions turned out to be accurate. This post, and the subsequent targeted stakeholders briefings around it, provided a rare opportunity to "pre-bunk" narratives before they reached the mainstream. This sort of effort may be useful in effectively mitigating the effects of misinformation in the future.[26]

3. **Using per-content tickets to represent incidents presented challenges for tracking larger narratives**. As noted in this chapter, the EIP often started analysis by examining content on a very granular level—a ticket might initially represent a single post. On the positive side, this approach allowed for nimble Tier 1 analysis, and the Jira platform allowed for aggregation as needed. On the negative side, this approach made tracking narratives significantly more difficult, especially those dormant for a period of time before resurfacing in many online locations at once. Narratives usually spanned multiple types of content pieces across multiple platforms over a broad period of time. While the EIP analysts would eventually merge or link tickets into a broader narrative ticket, this process was labor intensive, and ran the risk of content data getting lost in the effort.

6.2 Election Day and Afterward

1. **Communication with the media via public briefings and one-on-one collaborations strengthened the Partner's legitimacy, bolstered real-time information exchange, and helped educate and inform the public.** Before Election Day, the EIP's communication goal was to secure substantive early media attention to lay the

[25] Kate Starbird, et al., "Uncertainty and Misinformation: What to Expect on Election Night and Days After," Election Integrity Partnership, October 26, 2020, https://www.eipartnership.net/news/what-to-expect.
[26] Brian Freidberg, et al., "A Blueprint for Documenting and Debunking Misinformation Campaigns," *Nieman Reports* (October 202, 2020), https://niemanreports.org/articles/a-blueprint-for-documenting-and-debunking-misinformation-campaigns/.

foundation for follow-up media coverage, efforts that would define the EIP's nonpartisan work and expertise. A September 28, 2020, editorial in the *New York Times*[27] is an example of how early attention in a national news outlet helped raise the EIP's profile. As the election progressed, the Partnership held briefings more frequently and reached a larger audience. These events, and the one-on-one collaborations described above, enabled journalists to contextualize events and trends and communicate them to the larger public.

2. **The cadence and resource demands of rapid analysis increased as the election cycle progressed, leading to challenges in the logistics of EIP research.** The members of the EIP span the mis- and disinformation research community, which has primarily focused on retrospective analysis. In contrast, demands of the EIP publication schedule represented a novel operational challenge for all organizations involved in a few key ways. First, the EIP analysis and a commitment to quick turnaround required drawing conclusions based on incomplete and rapidly updating information. Second, the EIP's regular public briefings required updating conclusions and predictions in an episodic manner. Third, the academic system that dictates the professional lives of many of the EIP's analysts and managers led to challenges in synchronizing the rhythm of EIP work across member organizations.

7 Reading This Report

This report—the conclusion to the Election Integrity Partnership's work—summarizes and details the Partnership's findings since its formation on July 26, 2020. Chapter 2 lays out the metrics and statistics from EIP's detection period, which are the foundation of further analysis. Chapter 3 examines the key false and misleading narratives that emerged and evolved over the course of the 2020 election and after, and Chapter 4 looks at the tactics used to spread the narratives across the information ecosystem. We take a broader perspective in Chapter 5, looking at "repeat spreaders"—actors that repeatedly promoted numerous false and misleading narratives. In Chapter 6, we review social media platforms' election-related policies and discuss how those policies were applied. We conclude the report in Chapter 7 by providing policy recommendations, based on the findings of our work, to government entities, media outlets, platforms, and civil society organizations.

[27] The Editorial Board of the *New York Times*, "What's the Plan if Trump Tweets That He's Won Re-election?" *New York Times*, September 27, 2020, https://www.nytimes.com/2020/09/27/opinion/social-media-trump-election.html.

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Appendix:

News Articles citing the EIP during the active project period, listed in chronological order:

- **Route Fifty** | Aug. 12, 2020: "New Coalition Wants to Help in Fight Against Election Misinformation"
- **Stanford News** | Sept. 28, 2020: "The 2020 U.S. election, issues and challenges"
- **The New York Times** | Sept. 28, 2020: "Editorial: What's the Plan if Trump Tweets That He's Won Re-election?"
- **The New York Times** | Sept. 29, 2020: "Project Veritas Video Was a 'Coordinated Disinformation Campaign,' Researchers Say"
- **Santa Rosa Press-Democrat** | Sept. 30, 2020: "A tall tale about election fraud"
- **The Washington Post** | Oct. 8, 2020: "Facebook bans marketing firm running 'troll farm' for pro-Trump youth group"
-
- **Bloomberg News** | Oct. 5, 2020: "Facebook, Twitter Are Failing to Curb Voting-By-Mail Falsehoods"
- **Business Day (South Africa)** | Oct. 5, 2020: "Facebook, Twitter have hands full with postal voting misinformation"
- **The Daily Beast** | Oct. 13, 2020: "Far-Right Social Media Sites Packed With Foreign Clickbait"
- **Bloomberg News** | Oct. 13, 2020: "Fake News Hub from 2016 Election Thriving Again, Report Finds"
- **Associated Press** | Oct. 13, 2020: "Report: Social media influencers push voting misinformation"
- **NBC News** | Oct. 15, 2020: "For Trump's 'rigged' election claims, an online megaphone awaits"
- **CyberScoop** | Oct. 20, 2020: "Why social media disinformation poses such a security threat"
- **MIT Technology Review** | Oct. 21, 2020: "Efforts to undermine the election are too big for Facebook and Twitter to cope with"
- **National Public Radio** | Oct. 21, 2020: "Voters In Florida And Alaska Receive Emails Warning 'Vote For Trump Or Else!'"
- **Fast Company** | Oct. 23, 2020: "Facebook is still failing to take down ads that question the election's integrity"
- **GeekWire** | Oct. 26, 2020: "Scholars tracking social media see efforts to delegitimize election, imperiling democracy"
- **Science** | Oct. 26, 2020: "As U.S. election nears, researchers are following the trail of fake news"
- **MIT Technology Review** | Oct. 26, 2020: "What to expect on election day"
- **CyberScoop** | Oct. 29, 2020: "Don't let election-themed misinformation fool you. Here's what to watch out for."
- **KIRO-TV Seattle** | Oct. 30, 2020: "UW social media expert: Election misinformation is an 'attack on democracy'"

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- **Oklahoma Watch** | Oct. 30, 2020: "These Oklahoma Politicians Gave Misinformation a Boost"
- **National Public Radio** | Nov. 1, 2020: "Researchers Prepare For Deluge Of Election Night Misinformation"
- **Stanford News** | Nov. 2, 2020: "Disinformation investigators: Stanford students sleuth for false, misleading reports on how to vote."
- **The Washington Post** | Nov. 2, 2020: "The Post's View: Election Day promises to be full of misinformation. Here's how we can all stop its spread."
- **The New York Times** | Nov. 3, 2020: "After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows"
- **Protocol** | Nov. 3, 2020: "Meet the researchers and activists fighting misinformation"
- **The Washington Post** | Nov. 4, 2020: "Trump's early victory declarations test tech giants' mettle in policing threats to the election"
- **The Washington Post** | Nov. 4, 2020: "Trump's campaign and family boost bogus conspiracy theories in a bid to undermine vote count"
- **Detroit Free Press** | Nov. 8, 2020: "Antrim County figures prominently in election conspiracy theory"
- **Le Monde** | Nov. 8, 2020: "Elections américaines : « La désinformation a pris un rôle de premier plan »"
- **Reuters** | Nov. 8, 2020: "Fact check: Deviation from Benford's Law does not prove election fraud"
- **Bridge Michigan** | Nov. 9, 2020: "Human error, Dominion voting equipment fuel false fraud claims in Michigan"
- **The Washington Post** | Nov. 9, 2020: "Twitter and Facebook warning labels aren't enough to save democracy"
- **The Washington Post** | Nov. 10, 2020: "Georgia fight shows how Trump's unfounded election fraud claims are splitting GOP"
- **The Washington Post** | Nov. 10, 2020: "The Post's View: Trump is the problem when it comes to disinformation. So what now?"
- **National Public Radio** | Nov. 10, 2020: "From Steve Bannon To Millennial Millie: Facebook, YouTube Struggle With Live Video"
- **CQ Roll Call** | Nov. 10, 2020: "Twitter, Facebook face rocky future post-Donald Trump"
- **Bloomberg News** | Nov. 11, 2020: YouTube Election Loophole Lets Some False Trump-Win Videos Spread"
- **NBC News** | Nov. 11, 2020: "Misinformation by a thousand cuts: Varied rigged election claims circulate"
- **The Washington Post** | Nov. 12, 2020: "Trump's attacks on election outcome prolong tech's emergency measures"
- **Newsweek** | Nov. 12, 2020: "Fact Check: Did Dominion Voting Systems Cause Widespread Voter Fraud, As Trump Claims?"
- **NBC News** | Nov. 12, 2020: "Biden picks chief of staff while misinformation wildfire fuels Trump's refusal to concede"
- **Americas Quarterly** | Nov. 12, 2020: "Misinformation Is Threatening Brazil's Elections, Too"

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- **Politico Morning Tech** | Nov. 13, 2020: "Where Biden's new chief of staff stands on tech"
- **Bloomberg News** | Nov. 14, 2020: 'Follow me on Parler' is new mantra for users aggrieved by Facebook"
- **South China Morning Post** | Nov. 16, 2020: "Dis-United States: Biden's team faces reality of rule during Trumpism"
- **Detroit Free Press** | Nov, 17, 2020: "Russian ballot-stuffing video goes viral again, and other predictable things about 2020 misinformation"
- **The Associated Press** | Nov. 20, 2020: "Who needs Russia? Loudest attacks on US vote are from Trump"
- **The New York Times** | Nov. 20, 2020: "Trump allies are among the frequent purveyors of election misinformation"
- **The New York Times** | Nov. 23, 2020: "How Misinformation 'Superspreaders' Seed False Election Theories"
- **Voice of America** | Nov. 24, 2020: "Russian Influence Peddlers Carving Out New Audiences on Fringes"
- **The Wall Street Journal** | Dec. 11, 2020: "Social Media in 2020: A Year of Misinformation"
- **MLive** | Jan. 4, 2021: "Misinformation and conspiracies took starring role in Michigan's political movements"
- **Computer Weekly** | Jan. 8, 2021: "Tech sector reacts to Trump social media bans"
- **The New York Times** | Jan. 8, 2021: "Trump Isn't the Only One"
- **National Public Radio** | Jan. 8, 2021: "Twitter Permanently Suspends Trump, Citing 'Risk Of Further Incitement Of Violence'"
- **The Missoulian** | Jan. 9, 2021: "Riot blame-shifting leaks into Montana social media"
- **The Washington Post** | Jan. 16, 2021 "Misinformation dropped dramatically the week after Twitter banned Trump and some allies"
- **CNET** | Jan. 16, 2021: "After Twitter banned Trump, misinformation plummeted, says report"
- **Variety** | Jan. 17, 2021: "After Twitter Banned Donald Trump, Election Misinformation Online Plunged Dramatically"
- **Mountain View Voice** | Jan. 21, 2021: "Can social media giants stop an insurrection before it happens?"
- **Nature** | Feb. 4, 2021: "Tracking QAnon: how Trump turned conspiracy-theory research upside down"

To: Beth Goldberg[bethgoldberg@google.com]
Cc: Daniel Bateyko[dbateyko@stanford.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Renee DiResta[renee.diresta@gmail.com]; Mike Caulfield[mica42@uw.edu]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Mon 3/27/2023 7:18:09 PM
Subject: Re: Election Prebunking Process & Next Steps
Received: Mon 3/27/2023 7:18:20 PM

His Beth,
I just followed up with Mike and it looks like we'll be co-leading on the UW side. I'm pretty sure we're not going to want payment. We'd rather fund our time on this from our existing funds (from philanthropic sources, likely Knight, Hewlett, and/or Newmark funding) if that's okay with you all. In terms of funding the creation of content, we'd rather that happen external to us, if possible.

We're also wondering if we could delay a week while we get our ducks in a row and find another time (starting next week) when we can both attend. For me, Monday or Friday mornings are probably the only viable option due to my teaching and service schedule.

Sorry for the hassle. Between wrapping up the EIP and starting a new quarter, things are little messy here at the moment.

Best,

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

> On Mar 27, 2023, at 8:19 AM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Our team has been on Spring break, so not much progress since last time we met. I may have to co-PI with Mike Caulfield on the UW side. I'm teaching this quarter and won't be able to attend the Tues morning meetings (as they conflict with my class).
>
> Kate Starbird
> Associate Professor, UW HCDE
> Co-Founder and Faculty Director of the UW Center for an Informed Public
> kstarbi@uw.edu
>
> > On Mar 27, 2023, at 7:50 AM, Beth Goldberg <bethgoldberg@google.com> wrote:
> >
> > Hi all, checking in before our meeting tomorrow to see if you've had a chance to code trope frequency or decide on contracting and payment arrangements?
> > It would also help me to know who the PI is - it'd help to have consistent communication between our biweekly meetings so we can move this project ahead.
> > Thanks,
> > Beth
> >
> > On Tue, Mar 14, 2023 at 1:51 PM Beth Goldberg <bethgoldberg@google.com> wrote:
> >
> > You were missed, Dan, Mike and Renee! Here's a distillation of what we discussed and next steps:
> > - **We will prioritize narrative tropes that are *prevalent* and likely to show up *nationwide*, eg:**
> >   - tricky ballots
> >   - mysterious late ballots or "found ballots" // mail-in ballots
> >   - moving ballots around eg unmarked white vans

- Ballot mules / fake ballot drops
- Vote drops / jumps, official counts vs projections - 'you've seen these graphs before, here's what actually happens when the line spiked'

- We can structure our timelines to **have 2+ videos ready in time for specific primaries** (eg a mix of battleground and less contested) but do not need to formulate videos for specific states. In fact, it'll make us appear less politically biased if we test a representative sample of americans and show the videos to all americans on youtube.

- Next steps:
  - SIO+UW will **code tropes by frequency** in 2020 and 2022 to inform which we select
  - SIO+UW **decide contracting and payment arrangements**
    - eg google could pay for video production and ads, but not for the academic lab test.
  - Regroup in 2 weeks Mar 28 to align on: contracting/payment, top choice tropes, and outcome variables of interest

On Tue, Mar 14, 2023 at 12:16 PM Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all, I'll be out of the office today and unfortunately unable to join. Excited to see this exchange of ideas and to catch up on the conversation when I'm back in.

Best,
Dan

From: Jeff Hancock <hancockj@stanford.edu>
Date: Tuesday, March 14, 2023 at 9:43 AM
To: Beth Goldberg <bethgoldberg@google.com>
Cc: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <renee.diresta@gmail.com>, Mike Caulfield <mica42@uw.edu>, Daniel Bateyko <dbateyko@stanford.edu>, Elena Cryst <ecryst@stanford.edu>
Subject: Re: Election Prebunking Process & Next Steps

Hi Beth,

Thanks so much for all this background information. I've gone through it all and have a much better understanding of the steps we'd need to do. I continue to think that pre-bunking and some of the tropes we've identified are a good fit.

Here's a link to the tropes table (see p.2). The tropes manuscript is still in pretty rough early stages (though we're using your paper as a template Beth!). We can share that when we've made more progress, but I think that the table should have enough info for us to get started on.

I'll sadly be virtual as well today.

--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Wed, Mar 1, 2023 at 11:58 AM Beth Goldberg <bethgoldberg@google.com> wrote:

Hi all,

Good to see you yesterday. I'm sharing context on the proposed approach to prebunking elections so that we can get specific on our next call Mar 14 about tropes and outcome variables we want to focus on. No need to follow this format exactly, but below is one way we could work together.

Process used in past prebunking campaigns (details in Practical Guide to Prebunking Misinfo and Science paper**).**

1. Conduct research to catalog prevalent misinformation tropes / narratives / techniques ☑

2. Contract with university partners, then subcontract with a creative agency to develop prebunking videos. Collaboratively develop videos.

3. Test videos in RCT for outcomes including a) discernment of the technique/trope and b) behavioral intent to share misinfo

4. Test videos on YouTube by showing them to people via ads (which entails buying ads like any other 3P advertiser). Use YouTube's single question survey function ("custom brand lift") to evaluate discernment, pictured here evaluating discernment of the technique fearmongering:

<image.png>

Example prebunking videos:

- 30s vaccine hesitancy videos
- 60s anti-refugee misinformation videos
- 30-90s rhetorical technique videos

Next steps:

- Jeff to share election tropes paper draft
- Mar 14 call agenda:
    - pick a primary race that we want to pilot test in
    - then identify which tropes are likely to be most prevalent in that state
    - identify which outcome variables to test (if time)

Questions and suggestions welcome - see y'all in 2 weeks!
Beth

Beth Goldberg (she/her)
Head of Research & Development
google.com/jigsaw

To: Beth Goldberg[bethgoldberg@google.com]
Cc: Daniel Bateyko[dbateyko@stanford.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Renee DiResta[renee.diresta@gmail.com]; Mike Caulfield[mica42@uw.edu]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Mon 3/27/2023 3:19:04 PM
Subject: Re: Election Prebunking Process & Next Steps
Received: Mon 3/27/2023 3:19:15 PM

Our team has been on Spring break, so not much progress since last time we met. I may have to co-PI with Mike Caulfield on the UW side. I'm teaching this quarter and won't be able to attend the Tues morning meetings (as they conflict with my class).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Mar 27, 2023, at 7:50 AM, Beth Goldberg <bethgoldberg@google.com> wrote:

Hi all, checking in before our meeting tomorrow to see if you've had a chance to code trope frequency or decide on contracting and payment arrangements?
It would also help me to know who the PI is - it'd help to have consistent communication between our biweekly meetings so we can move this project ahead.
Thanks,
Beth

On Tue, Mar 14, 2023 at 1:51 PM Beth Goldberg <bethgoldberg@google.com> wrote:

You were missed, Dan, Mike and Renee! Here's a distillation of what we discussed and next steps:

- **We will prioritize narrative tropes that are *prevalent* and likely to show up *nationwide*, eg:**
  - tricky ballots
  - mysterious late ballots or "found ballots" // mail-in ballots
  - moving ballots around eg unmarked white vans
  - Ballot mules / fake ballot drops
  - Vote drops / jumps, official counts vs projections - 'you've seen these graphs before, here's what actually happens when the line spiked'

- We can structure our timelines to **have 2+ videos ready in time for specific primaries** (eg a mix of battleground and less contested) but do not need to formulate videos for specific states. In fact, it'll make us appear less politically biased if we test a representative sample of americans and show the videos to all americans on youtube.

- Next steps:
  - SIO+UW will **code tropes by frequency** in 2020 and 2022 to inform which we select
  - SIO+UW **decide contracting and payment arrangements**
    - eg google could pay for video production and ads, but not for the academic lab test.
  - Regroup in 2 weeks Mar 28 to align on: contracting/payment, top choice tropes, and outcome variables of interest

On Tue, Mar 14, 2023 at 12:16 PM Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all, I'll be out of the office today and unfortunately unable to join. Excited to see this exchange of ideas and to catch up on the conversation when I'm back in.

Best,
Dan

From: Jeff Hancock <hancockj@stanford.edu>
Date: Tuesday, March 14, 2023 at 9:43 AM
To: Beth Goldberg <bethgoldberg@google.com>
Cc: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <renee.diresta@gmail.com>, Mike Caulfield <mica42@uw.edu>, Daniel Bateyko <dbateyko@stanford.edu>, Elena Cryst <ecryst@stanford.edu>
Subject: Re: Election Prebunking Process & Next Steps

Hi Beth,

Thanks so much for all this background information. I've gone through it all and have a much better understanding of the steps we'd need to do. I continue to think that pre-bunking and some of the tropes we've identified are a good fit.

Here's a link to the tropes table (see p.2). The tropes manuscript is still in pretty rough early stages (though we're using your paper as a template Beth!). We can share that when we've made more progress, but I think that the table should have enough info for us to get started on.

I'll sadly be virtual as well today.

--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Wed, Mar 1, 2023 at 11:58 AM Beth Goldberg <bethgoldberg@google.com> wrote:

Hi all,

Good to see you yesterday. I'm sharing context on the proposed approach to prebunking elections so that we can get specific on our next call Mar 14 about tropes and outcome variables we want to focus on. No need to follow this format exactly, but below is one way we could work together.

Process used in past prebunking campaigns (details in Practical Guide to Prebunking Misinfo and Science paper)**.**

1. Conduct research to catalog prevalent misinformation tropes / narratives / techniques ☑

2. Contract with university partners, then subcontract with a creative agency to develop prebunking videos. Collaboratively develop videos.

3. Test videos in RCT for outcomes including a) discernment of the technique/trope and b) behavioral intent to share misinfo

4. Test videos on YouTube by showing them to people via ads (which entails buying ads like any other 3P advertiser). Use YouTube's single question survey function ("custom brand lift") to evaluate discernment, pictured here evaluating discernment of the technique fearmongering:

<image.png>

Example prebunking videos:

- 30s vaccine hesitancy videos
- 60s anti-refugee misinformation videos
- 30-90s rhetorical technique videos

Next steps:

- Jeff to share election tropes paper draft
- Mar 14 call agenda:
    - pick a primary race that we want to pilot test in
    - then identify which tropes are likely to be most prevalent in that state
    - identify which outcome variables to test (if time)

Questions and suggestions welcome - see y'all in 2 weeks!
Beth

Beth Goldberg (she/her)
Head of Research & Development
google.com/jigsaw

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Thur 12/29/2022 12:35:24 AM
Subject: Re: Outreach from FIRE
Received: Thur 12/29/2022 12:35:26 AM

Hi Renee, I did find a contact at FIRE. I'm wondering if you have advice on how to frame the email. I never responded to them, so I need to do a bit of repair. But maybe I'm getting into the TMI here. And any chance you have some ideas about how to approach the "ask" at the end?

Hi Sabrina,

Thank you for reaching out! And sorry for the very slow response on this — things were a bit hectic at that moment. I really appreciate your outreach and the statement that FIRE made regarding our public records requests. Unfortunately, these requests have had a severe negative impact on our research over the last few months, both in terms of siphoning off resources and in terms of chilling our collaborations, even internally at the University of Washington. As it turns out, there's not much our University can do to resist them and the laws in Washington don't do much to protect faculty members (for example, by excluding current research or protecting our research participants). We did learn that student communications are protected, which is a relief. Our biggest worry about these requests is around how pieces will be leaked out, taken out of context, and used to direct harassment towards our research team.

In the intervening months, we've learned more about what is driving these requests — including conspiracy theories built upon gross mischaracterizations of our research into election mis/disinformation in 2020 and my role on an external advisory committee to the DHS CISA office. These conspiracy theories appear to be driving a strategic meta-narrative, disingenuously framed as addressing "censorship", that seeks to undermine research and interventions re: online manipulation and to reframe the events of January 6. Indeed, our funding at the National Science Foundation has been integrated into these theories and that organization is experiencing pressure to stop funding research like ours.

Stepping back, there seems to be an opportunity to have a constructive conversation about balancing research and interventions re: online manipulation with freedom of speech concerns, but that potentially constructive conversation Is being hijacked by a political movement ...

Kate

On Oct 9, 2022, at 11:54 AM, Sabrina Conza <sabrina.conza@thefire.org> wrote:

Hello Professor Starbird,

I wanted to let you know that FIRE is planning to write a letter to the University of Washington concerning its decision to allow faculty academic records to be requested. If you have questions or concerns with us writing to the University of Washington, please don't hesitate to reach out.

I should caution that while many of our staff members have a legal background, nothing in our correspondence, website, or other work should be taken to constitute legal advice or to mean that we've formed an attorney-client relationship.

That said, we take your privacy seriously. We won't share non-public information that you provide about this matter without your explicit permission. The only exception would be if we were legally required to disclose that information — for example, if we were compelled by a court order — and, even in that case, we would keep you informed of any required disclosure or attempt to compel disclosure.

If you have any questions at all about our plans to write to the University of Washington or how we might be able to help, please don't hesitate to ask. I look forward to hearing back from you.

Sincerely,

Sabrina Conza
Program Officer, Campus Rights Advocacy
Foundation for Individual Rights and Expression
700 Pennsylvania Avenue SE
Suite 340
Washington, D.C. 20003
(215) 717-3473
sabrina.conza@thefire.org

On Thu, Oct 6, 2022 at 5:01 PM Sabrina Conza <sabrina.conza@thefire.org> wrote:

Dear Professor Starbird –

I'm with the Foundation for Individual Rights and Expression [thefire.org], a non-partisan [thefire.org] non-profit that aims to defend and sustain the individual rights of all Americans to free speech and free thought. I saw that the university is allowing individuals to records request your research. FIRE argues that faculty records should not be requestable.

We often help others facing similar situations, whether through writing private letters to the institution, public advocacy or commentary in the media, or attempting to find an attorney who could provide advice or representation.

For example, we pushed back [thefire.org] on efforts to restrict critical race theory or social justice education in Iowa [thefire.org] and Idaho [thefire.org], fought for [thefire.org] professors punished for distributing parody flyers criticizing a conservative colleague, and defended others for critically discussing race [thefire.org], lampooning white nationalists [thefire.org], or criticizing gentrification [thefire.org]. (For more information, please see our FAQ [thefire.org].)

I should caution that while many of our staff members have a legal background, nothing in our correspondence, website, or other work should be taken to constitute legal advice or to mean that we've formed an attorney-client relationship.

We take your privacy seriously. We won't share non-public information that you provide about this matter without your explicit permission. The only exception would be if we were legally required to disclose that information — for example, if we were compelled by a court order — and, even in that case, we would keep you informed of any required disclosure or attempt to compel disclosure.

If you have any questions at all about how we might be able to help, please don't hesitate to ask. I look forward to hearing back from you.

Sincerely,

Sabrina Conza
Program Officer, Campus Rights Advocacy
Foundation for Individual Rights and Expression
700 Pennsylvania Avenue SE
Suite 340
Washington, D.C. 20003
(215) 717-3473
sabrina.conza@thefire.org

To: stamos@stanford.edu[stamos@stanford.edu]
From: Kate Starbird
Sent: Sat 12/31/2022 6:29:00 PM
Subject: Delayed Response | Media Contact Re: Dinner at the Stamos House
Received: Sat 12/31/2022 6:29:00 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: SMS Political Influencers[smspoliticalinfluencers@gmail.com]
Cc: Renee DiResta[rdiresta@stanford.edu]; Martin Riedl[martin.riedl@utexas.edu]; Josephine Lukito[jlukito@utexas.edu]; Samuel Christopher Woolley[swoolley@utexas.edu]
From: Kate Starbird
Sent: Mon 1/2/2023 8:01:53 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Mon 1/2/2023 8:02:05 PM
Participatory-Disinformation-Influencers-Final-anonymized.docx
Participatory-Disinfo-Revision-Document-Final.docx
Participatory-Disinformation-Influencers-Final-ks.docx

Hello editors,
Thank you again for the constructive critiques and suggestions. We've attached a final anonymized version of our paper, revised to address the final reviewer concerns, and where changes are highlighted in blue text. We've included a change document, describing how we addressed each of the final concerns. We've also attached a final full version, with authors and funding and acknowledgements and all of that.

Please let us know what the next steps are. Thank you all for all of your work putting this issue together!

Cheers,
Kate

On Dec 3, 2022, at 9:17 AM, SMS Political Influencers <smspoliticalinfluencers@gmail.com> wrote:

3-December-2022
Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

In the appendix, in contrast, the authors present only three sampling criteria, the first two of which are identical to those in the manuscript. The third, however, is different: "Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were occurring.".

This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections. This, of course, is not a problem, if only the authors acknowledge the limitations of this (which I think they should). At the same time, the sampling criteria listed in the manuscript introduce some circular reasoning. The authors write that they deliberately sampled cases based on their ability to "reveal the participatory nature of this campaign." Later, they then conclude the campaign is participatory (a conclusion already laid clear in the sampling criteria).
I think the best solution is to simply acknowledge that these cases were selected due to their high visibility as well as the authors' detailed empirical engagement with the cases, while they took place (a valuable contribution in itself). Doing so, the authors should also acknowledge in the discussion section that the study cannot conclude how all parts of the #StopTheSteal disinformation campaign operated.

(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:

• I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"
• On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing." To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.

A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the supplementary materials basically works. And I am pretty much convinced by the authors' responses to my previous comments.

I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon. Such as, "in participatory disinformation, some patterns we see include …" with different columns for behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don't feel adds a great deal. Can we name the patterns clearly enough that they could be readily identified, ideally at scale?

Second, at several points, it would be helpful for the authors to remember, and remind readers, that these are three cases that are perhaps illustrative of the sorts of disinformation that occurred in 2020, but as they note in their letter, they are not representative. I was reminded of this when looking at a passage on p. 21 containing the idea that "elites moved quickly to amplify" disinformation coming from below: this suggests that elites consistently and quickly amplified claims being made by less influential accounts. Is that what you mean to say? I would have thought rather that they more idiosyncratically got wind of a helpful narrative and amplified it. As some of your cases show, in some cases it took a while for really big accounts to jump in. And it is important to remember that these are some of the most 'successful' of the disinformation narratives. And surely the top accounts did not do this for every possible conspiracy theory… so would it be helpful developing a line of thinking about what conditions lead top influencers (macro/mega) to pick up on a given thread? p. 12: "escalatory vector".

Finally, p. 12 uses the term "escalatory vector," which sounds interesting but I don't know what it means!

REVIEWER 3

I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it's a great fit for this paper), and they improved the conclusion by adding context to the "so what" of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

Revision Document
We thank reviewers, again, for their critiques and suggestions for improvement.

Below, we've documented our final changes to response to reviewer recommendations. We also made several small, superficial changes to the wording – particular around defining and more carefully using the term, "meta-narrative".

R1/R2: Revise our explanation for "why these examples" to align with the appendix and move away from representativeness.	Adjusted the three selection criteria in the Methods in the paper to align with the Appendix. Removed the sentence on representativeness. Added the following (below the case descriptions): Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.
R1/R2: Add a limitations section.	Added a limitations section: This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.
R1: I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"	Updated per recommendation.
R1: On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing." To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.	Revised to: "Our research builds upon this framing."
R2: The first is that I do feel we could still get	R2 had solid suggestions for additional

more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon.	content in the Discussion, but we are unable to make those additions due to word limits. We will save that for future work.

Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Kate Starbird, University of Washington, HCDE and Center for an Informed Public
Renée DiResta, Stanford University, Internet Observatory
Isabella Garcia-Camargo, Stanford University
Matt Marshall DeButts, Stanford University

Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This meta-narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — including hyperpartisan media and political operatives — worked alongside ordinary people to produce and amplify misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This meta-narrative, an amalgamation of many distinct narratives featuring claims of fraud, took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for many, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021 (U.S. House, 2022).

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon this framing. We expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. While Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives comprising this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-

down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to self-described "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of influencers in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast to most research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents', they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including "citizen journalists" (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined journalists and media outlets sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online influencers operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might trend on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the influencer, was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer", to differentiate influence on the basis of follower count.

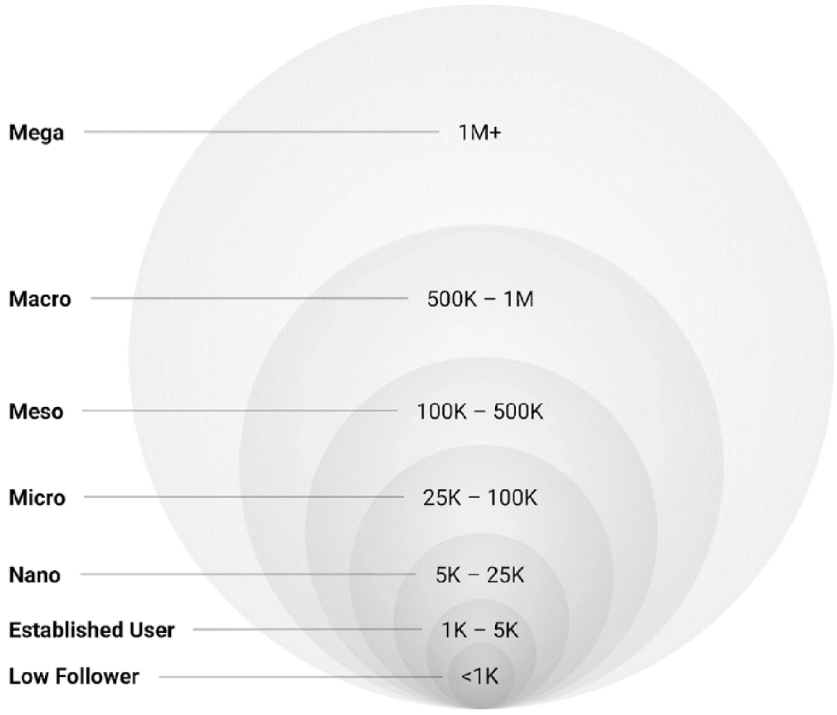

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) our research team were familiar with because we documented them in depth as they were occurring:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether they've been suspended, how they credentialed themselves, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting the false meta-narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

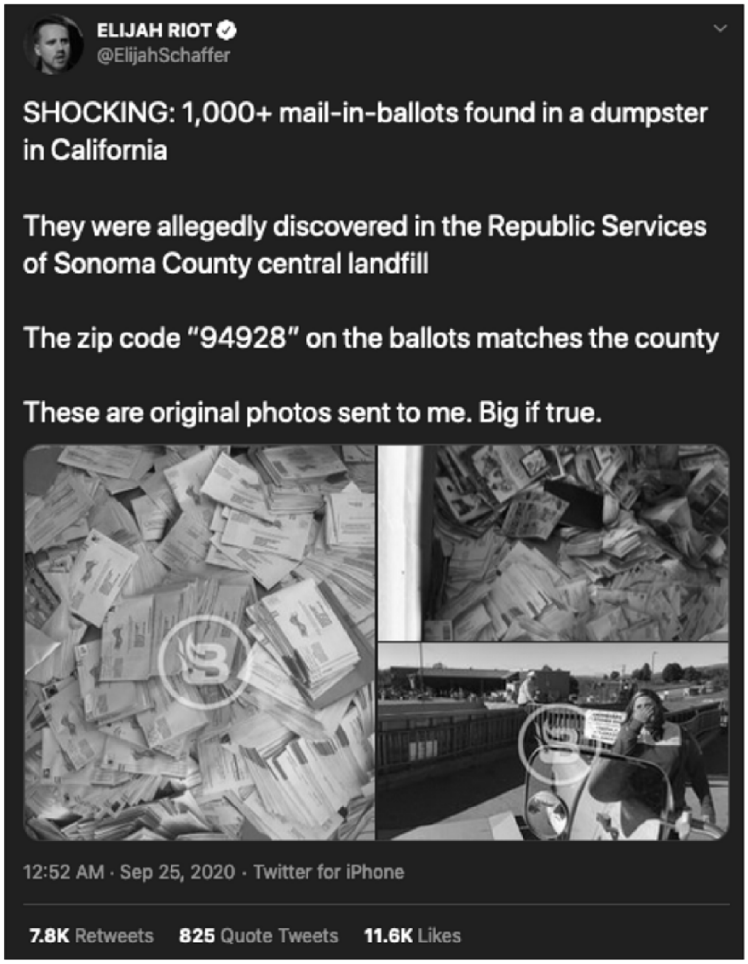

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

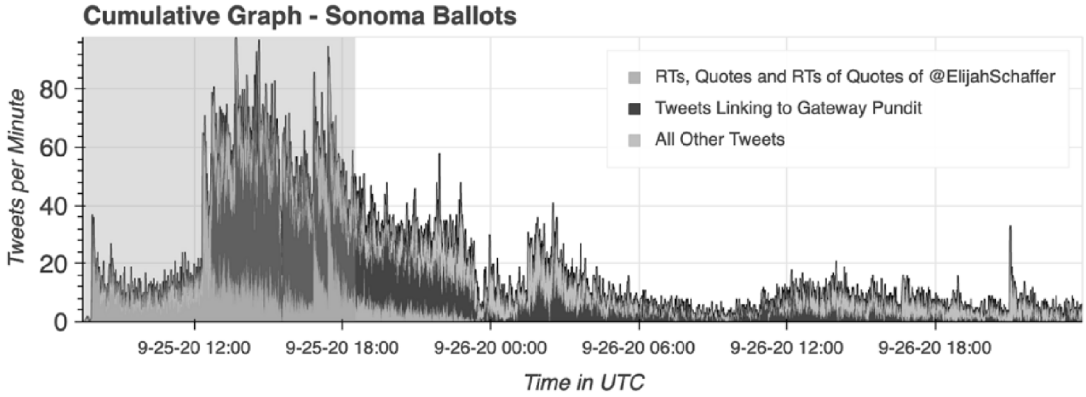

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a blue-check, had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted influencers for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of mega influencer Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

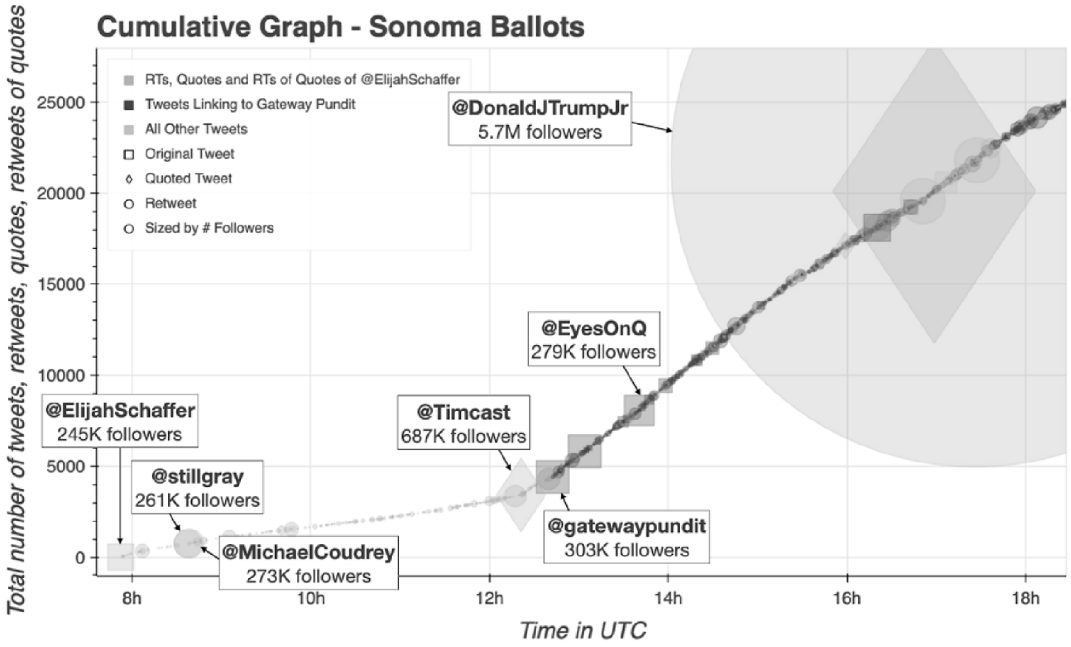

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet, a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, rejected ballots were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

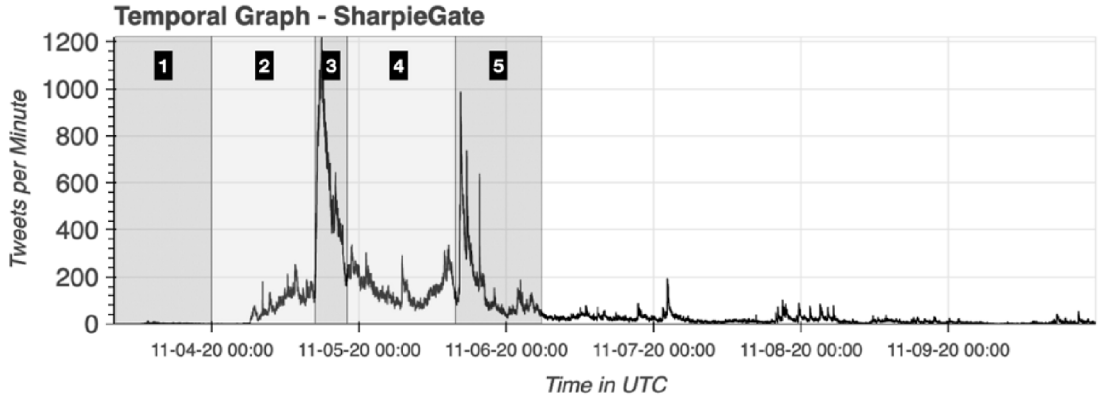

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a nano-sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

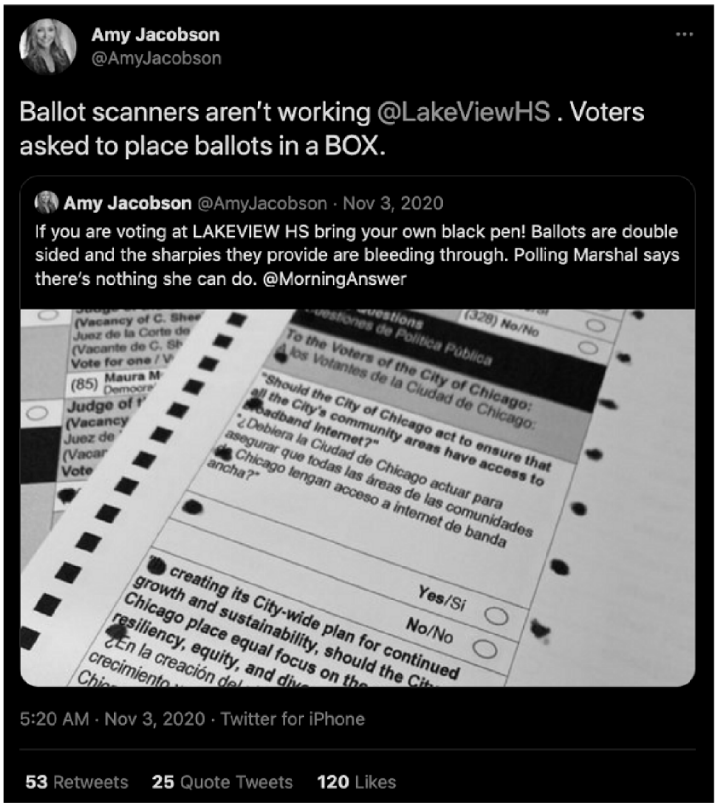

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to trade up — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
```

shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

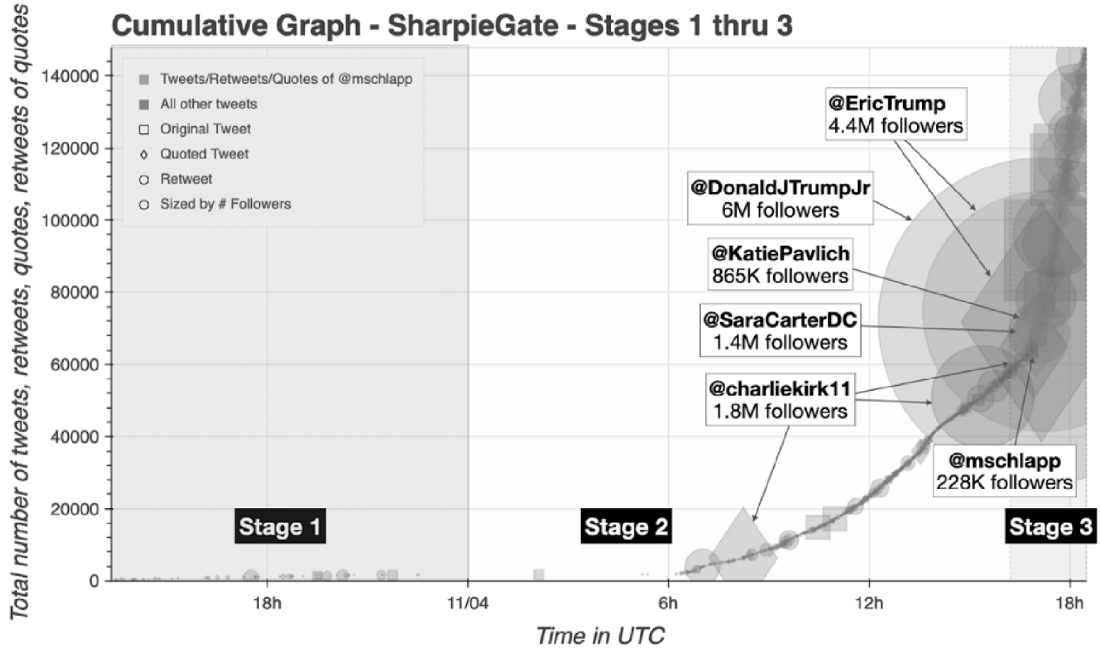

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half, receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

> **@mschlapp** (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House @NewtGingrich. Bartiromo’s tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October 2020, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

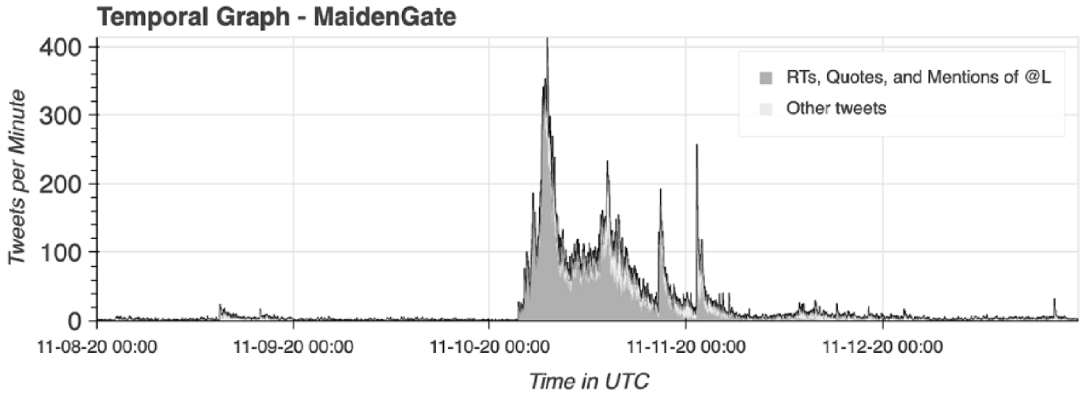

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal

movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was “looking into @L's #MaidenGate” and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

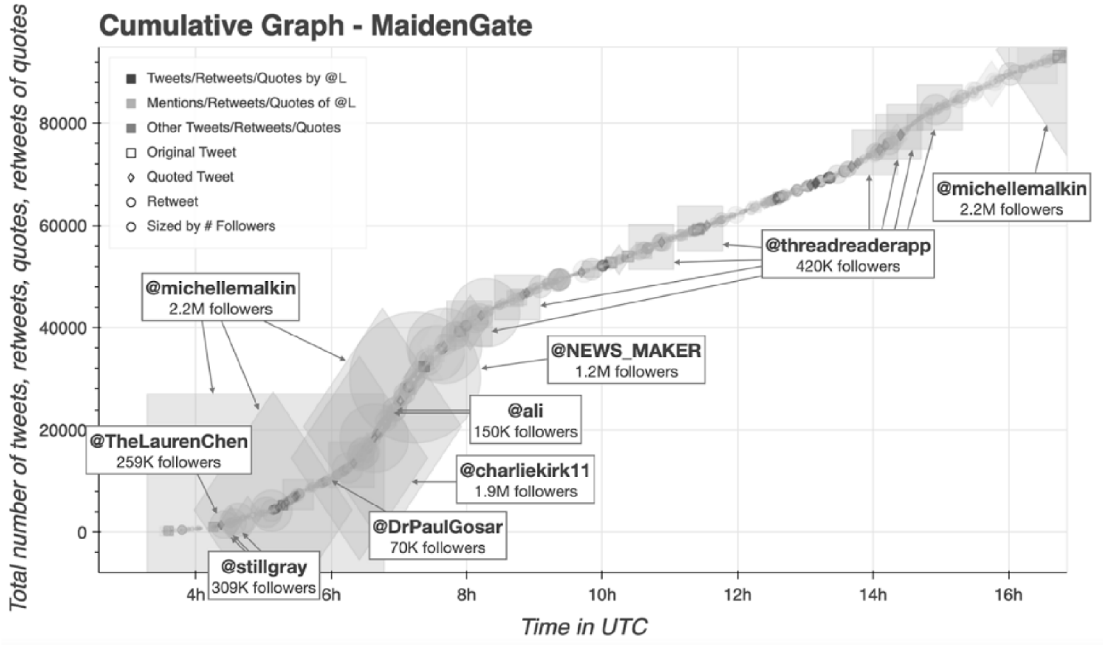

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L’s accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation: “We don’t know the top of this. This is either a small problem, or it’s a problem that will shake America to the core.” His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander’s growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander’s team created a Google Document to consolidate information around the ongoing “investigation.” The sheet offered detailed advice for filing complaints about potential voter fraud using one’s maiden name, providing links to voter registration websites in dozens of states. Its watermark read “stopthesteal.us”, demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media-driven or social media-driven. Instead, we find something more akin to Chadwick's (2017) conceptualization of political organizing within a hybrid media system where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. Political influencers both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016). This view aligns with previous research on participatory propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged

election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers in not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared

understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro-influencers amplified the experiences of others and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

Though this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

8.3 Limitations

This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the

expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

10.0 Acknowledgements

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12.0 References

Bastos, M., & Farkas, J. (2019). "Donald Trump is my President!": The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters.* (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

U.S. House. (2022, December). Select Committee to Investigate the January 6th Attack on the United States Capitol. *Final Report*. Available: https://january6th.house.gov/sites/democrats.january6th.house.gov/files/Report_FinalReport_Jan6SelectCommittee.pdf

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don't. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

Renee DiResta is the Technical Research Manager at Stanford Internet Observatory. She holds a B.S in computer science and political science from SUNY Stony Brook. Her research examines information integrity and propaganda dynamics on social media, with a focus on transformative emerging platforms and technologies.

Isabella Garcia-Camargo contributed to this paper during her time as a Research Assistant with the Stanford Internet Observatory. She holds a B.S. in Computer Science with a focus on AI from Stanford University.

Matt DeButts is a PhD candidate and Knight-Hennessy Scholar in the Department of Communication at Stanford University. DeButts earned an MA in China Studies at Peking University, and previously worked as a journalist in Beijing, China, writing for outlets including Foreign Policy and the Los Angeles Times. His research focuses on media and propaganda in the United States and China.

To: Matt DeButts[mdebutts@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Thur 4/6/2023 2:37:54 AM
Subject: Re: SM+S // Political Influencers SI // Please upload your acceptedarticle
Received: Thur 4/6/2023 2:38:05 AM

Hi Matt! We did get it. I'm planning on submitting over the weekend. I'll let you two know if there's anything I need! Happy to get on the phone to chat to fill you in on the other piece.

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Apr 5, 2023, at 5:52 PM, Matt DeButts <mdebutts@stanford.edu> wrote:

Did you guys get this email? Also — I think they left off Bella's name?
Matt

Begin forwarded message:

From: SMS Political Influencers <smspoliticalinfluencers@gmail.com>
Subject: SM+S // Political Influencers SI // Please upload your accepted article
Date: April 4, 2023 at 9:48:00 PM PDT
To: Martin Riedl <martin.riedl@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>

Dear author:

We are thrilled to finally have the go-ahead for uploading accepted manuscripts for our special issue on political influencers to the *Social Media + Society* website.

Please go ahead and upload your files **by the end of next week (April 16)** under the following link: https://mc.manuscriptcentral.com/SMAS

We realize this is a quick turnaround, but as previously mentioned, in order for articles to be published around the same time, it is imperative that they all go through production at the same time.

Please feel free to reach out if you have any questions about this, or if issues arise as you upload your files (martin.riedl@utexas.edu).

As you click through the interface, you will be asked to select among a set of options (Original Article, Review, Essay, and a few different special issues - please select the last one, "Special Issue: Political Influencers," at the very bottom).
<Screen Shot 2023-04-04 at 17.12.32.png>

Once your article is submitted, it will immediately go to production (therefore, anonymization is not necessary at this stage). As mentioned before, invited content such as special issues are exempt from APC charges.

At the bottom of this note, you can find a list of all accepted articles that are in the special issue.

The manuscript titles, author names, and author order are based on our most recent correspondence; should you find any error, please let us know as soon as possible so we can still correct during proofing.

We are very excited for this special issue to be published, and want to thank you once again for your excellent contribution.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

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Social Media + Society Special Issue on Political Influencers

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Introduction

Riedl, M.J., Lukito, J., & Woolley, S. (2023). Political influencers on social media: An introduction. *Social Media + Society*.

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Manuscripts

Starbird, K., DiResta, R., & DeButts, M. M. (2023). Influence and improvisation: Participatory disinformation during the 2020 U.S. Election. *Social Media + Society*.

Stewart, N. K., Al-Rawi, A., Celestini, C., & Worku, N. (2023). Hate influencers' mediation of hate on Telegram: "We declare war against the anti-white system." *Social Media + Society*.

Boichak, O. (2023). Mapping the Russian political influence ecosystem: the Night Wolves biker gang. *Social Media + Society*.

Harris, B. C., Foxman, M., & Partin, W. C. (2023). "Don't make me ratio you again": How political influencers encourage platformed political participation. *Social Media + Society*.

Schützeneder, J., & Sehl, A. (2023). Political knowledge to go: An analysis of selected political influencers and their formats in the context of the 2021 German federal election. *Social Media + Society*.

Nyangulu, D., & Sharra, A. (2023). Agency and incentives of diasporic political influencers on Facebook Malawi. *Social Media + Society*.

Liang, F., & Lu, S. (2023). The dynamics of event-based political influencers on Twitter: A longitudinal analysis of influential accounts during Chinese political events. *Social Media + Society*.

Tang, J. L. (2023). Issue communication network dynamics in connective action: The role of non-political influencers and regular users. *Social Media + Society*.

To: Daniel Bateyko[dbateyko@stanford.edu]; 51 @uw.edu]; 51 @uw.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; Jeff Hancock[hancockj@stanford.edu]
From: Kate Starbird
Sent: Mon 2/6/2023 10:12:33 PM
Subject: Telegram research conversation?
Received: Mon 2/6/2023 10:12:34 PM

Hi Dan,

51

(I'm ccing Renee and Jeff for visibility here.)

Thanks!
Kate

To: Renee DiResta[rdiresta@stanford.edu]
Cc: [redacted]@uw.edu]; [redacted]@uw.edu]
From: Kate Starbird
Sent: Tue 2/21/2023 9:37:12 PM
Subject: Conversation and possible collaboration around de-platforming
Received: Tue 2/21/2023 9:37:23 PM

Hi Renee,

Following up on our conversation this morning, [redacted]

Cheers,
Kate

To: Daniel Bateyko[dbateyko@stanford.edu]
Cc: Renee DiResta[renee.diresta@gmail.com]; Alex Loddengaard[lodbot@uw.edu]; Lia Bozarth[liafan@uw.edu]; David Thiel[dthiel@stanford.edu]; Ronald Edward Robertson[ronalder@stanford.edu]; 51 @uw.edu]; 51 51 @uw.edu]
From: Kate Starbird
Sent: Mon 2/13/2023 11:25:03 PM
Subject: Re: Telegram Data Collection Pipeline
Received: Mon 2/13/2023 11:25:05 PM

Thanks Dan…. That's super helpful context. Our list is curated, yours is snowball. That may mean we have some apples and oranges there and we might not want to combine.

Kate

On Feb 13, 2023, at 1:55 PM, Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all,

I'm looping in David Thiel, who can answer the questions about infrastructure.

As for sharing the list of EIP-related Telegram channels, I defer to Renee! Our channel sample comes from our snowball sampling method. The data is specific to an academic paper we're working on and may be too opinionated for your purposes. Also, I shared a sample of the list with 51 (cc'd) a while back, but that may have been too hasty on my part; I realize now we want to be methodical about share access and controls.

Best,
Dan

From: Kate Starbird <kstarbi@uw.edu>
Date: Friday, February 10, 2023 at 10:51 AM
To: Renee DiResta <renee.diresta@gmail.com>
Cc: Alex Loddengaard <lodbot@uw.edu>, Lia Bozarth <liafan@uw.edu>, Daniel Bateyko <dbateyko@stanford.edu>
Subject: Re: Telegram Data Collection Pipeline

Bumping this up to Renee who can hopefully connect us with the right folks over there, maybe David as well?

Kate

On Feb 9, 2023, at 5:03 PM, Lia Bozarth <liafan@uw.edu> wrote:

Hi Dan,

CIP is in the process of building up infrastructure to support collecting data from Telegram. Do you or one of your data engineers have time to meet with me to discuss Stanford's currentTelegram data collection pipeline and best practices? Specifically, we are working with Telethon (https://docs.telethon.dev/en/stable/). We have 1 client so far and are able to stream data from a small number of channels. But, we have the following questions/roadblocks:

1. What are the best practices for rate limits (FloodWaitError)? There are no clear guidelines from Telegram. From what I've seen, folks set a max wait time and just terminate the client if the max wait time is exceeded. Did you find better approaches here?
2. How are you handling sampling of channels? Is it mostly done through message.fwd_from field or something else?
    a. Kate mentioned that you have already accumulated a list of channel ids that you may be able to share with us?
3. It seems that we must have an active client to download media from Telegram. So, we are thinking about having a client running in the background (or, consumer-side of the ETL process) dedicated to downloading media? I'm wondering if you've found a better strategy here.

We will provision more phones to expand our data collection soon. As such, I'd really appreciate it if we could have a meeting together to discuss the things we are planning on doing with Telegram and get some feedback to help reduce unnecessary headaches.

Looking forward to hearing back from you!

Best regards,
Lia
Data Engineer at CIP

To: Renee DiResta[renee.diresta@gmail.com]
Cc: Alex Loddengaard[lodbot@uw.edu]; Lia Bozarth[liafan@uw.edu]; Daniel Bateyko[dbateyko@stanford.edu]
From: Kate Starbird
Sent: Fri 2/10/2023 6:51:10 PM
Subject: Re: Telegram Data Collection Pipeline
Received: Fri 2/10/2023 6:51:14 PM

Bumping this up to Renee who can hopefully connect us with the right folks over there, maybe David as well?

Kate

On Feb 9, 2023, at 5:03 PM, Lia Bozarth <liafan@uw.edu> wrote:

Hi Dan,

CIP is in the process of building up infrastructure to support collecting data from Telegram. Do you or one of your data engineers have time to meet with me to discuss Stanford's currentTelegram data collection pipeline and best practices? Specifically, we are working with Telethon (https://docs.telethon.dev/en/stable/). We have 1 client so far and are able to stream data from a small number of channels. But, we have the following questions/roadblocks:

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We will provision more phones to expand our data collection soon. As such, I'd really appreciate it if we could have a meeting together to discuss the things we are planning on doing with Telegram and get some feedback to help reduce unnecessary headaches.

Looking forward to hearing back from you!

Best regards,
Lia
Data Engineer at CIP

To: [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; cgiles@stanford.edu[cgiles@stanford.edu]
Cc: Daniel Bateyko[dbateyko@stanford.edu]; Mike Caulfield[mica42@uw.edu]; Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Tue 12/27/2022 5:00:44 PM
Subject: EIP Final Report - Chatper
Received: Tue 12/27/2022 5:00:48 PM

Hi folks, I hope you're all having a great winter break! I'm checking in and putting out some feelers for beginning to get Chapter 4 into place.

[This is a copy of the message that I put in the EIP Slack, because I'm not sure everyone is checking that.]

Big props to the folks who contributed to getting the Twitter/incident dataset curated.

[redacted]

Here's a reminder of the current draft outline with assignments: https://docs.google.com/document/d/1CYOog7Mn45CnP9L9POOw7a282bMkmzc0p9ugWRprFaw/edit#heading=h.54d51tin6w3f

I'm reluctant to try to schedule a meeting with everyone this week, but I'd love to get an asynchronous update from each of you regarding your progress and ETAs for your different pieces. If your name is attached to a specific section with other names, I'd love to have you all connect with each other, even briefly, to discuss an analysis plan for your section.

I hope you are warm and dry and not snowed in somewhere back east!

Kate

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 12/28/2022 4:25:30 PM
Subject: Delayed Response | Media Contact Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]
Received: Wed 12/28/2022 4:25:30 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Daniel Bateyko[dbateyko@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; [redacted]
From: Kate Starbird
Sent: Fri 12/9/2022 9:59:57 PM
Subject: Re: EIP 2022 final report, Chapter 4 organizing
Received: Fri 12/9/2022 9:59:59 PM

Thanks Dan!
Hi folks, remember to check the Stanford Slack channel regularly for updates there!

Kate

On Dec 9, 2022, at 12:54 PM, Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi Kate, I've invited everyone to a Slack channel for the final report (#final-report) and set up another channel others on this thread can join (#final-report-chapter-4). Everyone on this thread should have access.

Best,
Dan

From: Kate Starbird <kstarbi@uw.edu>
Sent: Friday, December 9, 2022 12:49 PM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: [redacted]
Subject: Re: EIP 2022 final report, Chapter 4 organizing

Renee/Dan, can your team set up a Slack channel for this chapter writing and make sure our team has access?

Kate

On Dec 8, 2022, at 8:16 PM, Renee DiResta <rdiresta@stanford.edu> wrote:

Chris is cgiles@stanford.edu

[redacted]

51

On Dec 8, 2022, at 4:39 PM, Kate Starbird <kstarbi@uw.edu> wrote:

Hi folks,

I'm reaching out regarding the EIP final report and in particular around writing up Chapter 4: An Evolving Media Ecosystem. Each of you is currently mentioned in the initial outline as potentially interested or having the right skill set to contribute to some part of this chapter.

Here's the very rough draft outline:
https://docs.google.com/document/d/1CYOog7Mn45CnP9L9POOw7a282bMkmzc0p9ugWRprFaw/edit

Here's our working folder:
https://drive.google.com/drive/u/0/folders/1eiJ6oiunCy2DcBvholXYYR6xQ9X2Ne11

Timing: We're on a somewhat tight schedule, and hoping to have a fairly detailed outline and writing plan by January 2. I recognize that many of us have competing schedules and disjointed windows for contributing. I have a significant chunk of time during the final week of December. Others may have more time now and less time then. So, we may need to get creative in terms of coordinating and contributing — and much of it will likely be asynchronous. But I'm confident that we can manage!

Renee (or Dan), can you send me Chris Giles's email address so that I can include him in this email thread?

Question 1: For the UW folks, can you please email me back to let me know if you'd like to be a part of this effort.

Question 2: Should we set up a Slack channel rather than an email thread for this group? It would likely be on the Stanford Slack instance. Would that work for UW folks? Dan, could you help set that up and make sure all of our Chapter 4 team members have access?

Question 3: My understanding is that we have some dependencies on the data curation process that 51 are leading. Can one of the three of you provide a brief update of where that stands and when we might have the final queries in place?

Question 4: If there is someone you think should be on this thread who isn't (because they have something to contribute here), can you please let me know!

Kate

To: Renee DiResta[rdiresta@stanford.edu]
Cc: [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; Daniel Bateyko[dbateyko@stanford.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]l@uw.edu]
From: Kate Starbird
Sent: Fri 12/9/2022 8:49:46 PM
Subject: Re: EIP 2022 final report, Chapter 4 organizing
Received: Fri 12/9/2022 8:49:48 PM

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Kate

To: Renee DiResta[rdiresta@stanford.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]:@uw.edu]; Daniel Bateyko[dbateyko@stanford.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]; [redacted]@uw.edu]
From: Kate Starbird
Sent: Fri 12/9/2022 12:39:06 AM
Subject: EIP 2022 final report, Chapter 4 organizing
Received: Fri 12/9/2022 12:39:08 AM

Hi folks,

I'm reaching out regarding the EIP final report and in particular around writing up Chapter 4: An Evolving Media Ecosystem. Each of you is currently mentioned in the initial outline as potentially interested or having the right skill set to contribute to some part of this chapter.

Here's the very rough draft outline:
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Question 3: My understanding is that we have some dependencies on the data curation process that [redacted] are leading. Can one of the three of you provide a brief update of where that stands and when we might have the final queries in place?

Question 4: If there is someone you think should be on this thread who isn't (because they have something to contribute here), can you please let me know!

Kate

To: Kate Starbird[kstarbi@uw.edu]
From: Renee DiResta
Sent: Thur 12/29/2022 11:22:31 PM
Subject: Re: Outreach from FIRE
Received: Thur 12/29/2022 11:22:36 PM

I think this looks good. Slightly reduced version with updated last paragraph. Should invite the people who wrote those blog posts to the table as well:

Thank you for reaching out! And sorry for the very slow response— things were a bit hectic at that moment. I really appreciate your outreach and the statement that FIRE made regarding our public records requests. Unfortunately, these requests have had a severe negative impact on our research over the last few months, both in terms of siphoning off resources and chilling collaborations, even internally at the University of Washington. As it turns out, there's not much our University can do to resist them and the laws in Washington don't do much to protect faculty members (for example, by excluding current research or protecting research participants). We did learn that student communications are protected, which is a relief. Our biggest worry about these requests is around how pieces will be leaked out, taken out of context, and used to direct harassment towards our research team.

In the intervening months, we've learned more about what is driving these requests — including conspiracy theories built upon gross mischaracterizations of our research into election mis/disinformation in 2020 and my role on an external advisory committee to the DHS CISA office. These conspiracy theories claim to be addressing "censorship", but they foundationally misunderstand and/or misrepresent the research and intervention proposals in our work on online manipulation.

I'd like to connect with FIRE around this, on a call ideally, because the question of how to balance research and interventions re: online manipulation with freedom of speech concerns and transparency is an important one. Having this important conversation instead be hijacked by a political movement will further entrench people's opinions along political lines, and that does not serve the public interest. Do you have some time to connect in early January around this? We would love to include [Name] and [Name] as well, to address some of the concerns they've written about.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 28, 2022 4:35 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: Outreach from FIRE

Hi Renee, I did find a contact at FIRE. I'm wondering if you have advice on how to frame the email. I never responded to them, so I need to do a bit of repair. But maybe I'm getting into the TMI here. And any chance you have some ideas about how to approach the "ask" at the end?

Hi Sabrina,

Thank you for reaching out! And sorry for the very slow response on this — things were a bit hectic at that moment. I really appreciate your outreach and the statement that FIRE made regarding our public records requests. Unfortunately, these requests have had a severe negative impact on our research over the last few months, both in terms of siphoning off resources and in terms of chilling our collaborations, even internally at the University of Washington. As it turns out, there's not much our University can do to resist them and the laws in Washington don't do much to protect faculty members (for example, by excluding current research or protecting our research participants). We did learn that student communications are protected, which is a relief. Our biggest worry about these requests is around how pieces will be leaked out, taken out of context, and used to direct harassment towards our research team.

In the intervening months, we've learned more about what is driving these requests — including conspiracy theories built upon gross mischaracterizations of our research into election mis/disinformation in 2020 and my role on an external

advisory committee to the DHS CISA office. These conspiracy theories appear to be driving a strategic meta-narrative, disingenuously framed as addressing "censorship", that seeks to undermine research and interventions re: online manipulation and to reframe the events of January 6. Indeed, our funding at the National Science Foundation has been integrated into these theories and that organization is experiencing pressure to stop funding research like ours.

Stepping back, there seems to be an opportunity to have a constructive conversation about balancing research and interventions re: online manipulation with freedom of speech concerns, but that potentially constructive conversation Is being hijacked by a political movement ...

Kate

On Oct 9, 2022, at 11:54 AM, Sabrina Conza <sabrina.conza@thefire.org> wrote:

Hello Professor Starbird,

I wanted to let you know that FIRE is planning to write a letter to the University of Washington concerning its decision to allow faculty academic records to be requested. If you have questions or concerns with us writing to the University of Washington, please don't hesitate to reach out.

I should caution that while many of our staff members have a legal background, nothing in our correspondence, website, or other work should be taken to constitute legal advice or to mean that we've formed an attorney-client relationship.

That said, we take your privacy seriously. We won't share non-public information that you provide about this matter without your explicit permission. The only exception would be if we were legally required to disclose that information — for example, if we were compelled by a court order — and, even in that case, we would keep you informed of any required disclosure or attempt to compel disclosure.

If you have any questions at all about our plans to write to the University of Washington or how we might be able to help, please don't hesitate to ask. I look forward to hearing back from you.

Sincerely,

Sabrina Conza
Program Officer, Campus Rights Advocacy
Foundation for Individual Rights and Expression
700 Pennsylvania Avenue SE
Suite 340
Washington, D.C. 20003
(215) 717-3473
sabrina.conza@thefire.org

On Thu, Oct 6, 2022 at 5:01 PM Sabrina Conza <sabrina.conza@thefire.org> wrote:

Dear Professor Starbird --

I'm with the Foundation for Individual Rights and Expression [thefire.org], a non-partisan [thefire.org] non-profit that aims to defend and sustain the individual rights of all Americans to free speech and free thought. I saw that the university is allowing individuals to records request your research. FIRE argues that faculty records should not be requestable.

We often help others facing similar situations, whether through writing private letters to the institution, public advocacy or commentary in the media, or attempting to find an attorney who

could provide advice or representation.

For example, we pushed back [thefire.org] on efforts to restrict critical race theory or social justice education in Iowa [thefire.org] and Idaho [thefire.org], fought for [thefire.org] professors punished for distributing parody flyers criticizing a conservative colleague, and defended others for critically discussing race [thefire.org], lampooning white nationalists [thefire.org], or criticizing gentrification [thefire.org]. (For more information, please see our FAQ [thefire.org].)

I should caution that while many of our staff members have a legal background, nothing in our correspondence, website, or other work should be taken to constitute legal advice or to mean that we've formed an attorney-client relationship.

We take your privacy seriously. We won't share non-public information that you provide about this matter without your explicit permission. The only exception would be if we were legally required to disclose that information — for example, if we were compelled by a court order — and, even in that case, we would keep you informed of any required disclosure or attempt to compel disclosure.

If you have any questions at all about how we might be able to help, please don't hesitate to ask. I look forward to hearing back from you.

Sincerely,

Sabrina Conza
Program Officer, Campus Rights Advocacy
Foundation for Individual Rights and Expression
700 Pennsylvania Avenue SE
Suite 340
Washington, D.C. 20003
(215) 717-3473
sabrina.conza@thefire.org

To: Isabella Gc[isabellagc2010@gmail.com]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 1/2/2023 7:42:25 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Mon 1/2/2023 7:42:28 PM

Perfect timing! Just dropping them into the final document now!

Kate

On Jan 2, 2023, at 11:33 AM, Isabella Gc <isabellagc2010@gmail.com> wrote:

This Message Is From an Untrusted Sender
You have not previously corresponded with this sender.
See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

Hi Kate - so sorry about that - here is my bio:
Isabella Garcia-Camargo supported this paper during her time as a Research Assistant with the Stanford Internet Observatory. She holds a B.S. in Computer Science with a focus on AI from Stanford.

Let me know if this needs to be edited to include more, I was a bit worried about affiliations w/ my current role because there is a weeks long approval period for anything (and I started that after we finished the paper).

On Mon, Jan 2, 2023 at 11:24 AM Kate Starbird <kstarbi@uw.edu> wrote:

BELLA! We need a short bio for you, like the one below. Please send ASAP so I can submit. I have a full day of meetings tomorrow and surgery on Wednesday — and I need to get this out the door before all this hits!

Kate

On Dec 31, 2022, at 11:47 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Renee DiResta is the Technical Research Manager at Stanford Internet Observatory. She holds a B.S in computer science and political science from SUNY Stony Brook. Her research examines information integrity and propaganda dynamics on social media, with a focus on transformative emerging platforms and technologies.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 28, 2022 3:27 PM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com<isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi folks,
I'm checking this back in. I had to remove some content to reduce length (to counter additions from Renee). We're still 145 words over… but only if we count the funding and acknowledgements… and I'm going to ask them not to count those. ;)

I also want to point out that we need biographical information for everyone in the following style. You can add those to the document or just send them over via email and I can add them.

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

Kate

On Dec 28, 2022, at 2:05 PM, Kate Starbird <kstarbi@uw.edu> wrote:

Hi folks, I'm checking this out right now to accept Renee's changes. I'll send out a revised version when I'm finished.

Kate

On Dec 28, 2022, at 11:53 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Confirming some funding wording - Elena is out, but will email on this ASAP. No changes on my end to revision document.

From: Renee DiResta <rdiresta@stanford.edu>
Sent: Wednesday, December 28, 2022 8:25 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com<isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Working on this right now and will send back a version for accepting changes. Don't want to create a version conflict...will send this back to everyone in an hour or so.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, December 27, 2022 8:45 AM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com<isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi everyone,
I'm following up on this, because I'd like to get this paper off to the journal ASAP in case they send it back wanting us to cut down the final 200 words (that we're adding for the Acknowledgements). It just needs a little attention from all of you regarding your personal bio and from Renee and Isabella regarding the Funding and Acknowledgements sections on the Stanford side.

I know folks are off this week, but it you could spare about 15 minutes to

get these final elements in place, that would be awesome! (I have an avalanche that's going to hit me on January 3 … including another surgery because Matt was right that my finger didn't look right ... and I'm hoping to get this out the door before then.)

Kate

> On Dec 21, 2022, at 5:08 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi everyone,
> Happy holidays! I'm finally getting to these last revisions.
>
> I made the changes they suggested, adding a little limitations section. I've included the revision document here if you're interested. Please let me know if you think I've missed anything.
>
> Also, we need to add our acknowledgements, funding acknowledgements, and author bios (at the end of the document). Can you all add these to the Word document (not the revision document) attached here (and then resend to the group)?
>
> We're now at 9153 if we include the acknowledgments… though they didn't mention including them, so I'm going to pretend those don't count. The rest of the content is <9000 I think. Can one of you double check that?
>
> I'd like to send these over sooner rather than later in case they send it back asking us to get under 9000 w/ acknowledgments.
>
> Best,
> Kate
>
> <Participatory-Disinfo-Revision-Document-Final.docx>
> <Participatory-Disinformation-Draft-Final.docx>
>
> > On Dec 3, 2022, at 3:11 PM, Matt DeButts <mdebutts@stanford.edu> wrote:
> >
> > These do seem easier to address! They basically write the "representativeness" section for us. I don't have any suggestions beyond what the reviewers themselveso utlined.
> > Kate, do you want help ID'ing quotes to move into the supplementary materials? Or anything else from us? Happy to be moving forward with this!
> >
> > Matt
> >
> > > On Dec 3, 2022, at 2:21 PM, Kate Starbird <kstarbi@uw.edu> wrote:
> > >
> > > Great news!
> > > It looks like we have a little more

work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.

Kate

Begin forwarded message:

From: SMS Political Influencers <smspoliticalinfluencers@gmail.com>
Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]
Date: December 3, 2022 at 9:17:20 AM PST
To: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
Cc: Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>

This Message Is From an Untrusted Sender
You have not previously corresponded with this sender.
See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

3-December-2022
Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be

included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

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As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

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I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

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adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be “representative of the kinds of narratives that spread” and (4) cases had to “reveal the participatory nature of this campaign”.

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This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections.

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(2) Limitations

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A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the

supplementary materials basically works. And I am pretty much convinced by the authors' responses to my previous comments.

I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon. Such as, "in participatory disinformation, some patterns we see include …" with different columns for behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don't feel adds a great deal. Can we name the patterns clearly enough that they

could be readily identified, ideally at scale?

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Finally, p. 12 uses the term “escalatory vector,” which sounds

interesting but I don't know what it means!

REVIEWER 3

I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it's a great fit for this paper), and they improved the conclusion by adding context to the "so what" of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

<Participatory-Disinformation-Draft-Final.docx>

To: Maria Bianchi Buck[mbianchibuck@electionperformance.org]
Cc: Elena Cryst[ecryst@stanford.edu]; rdiresta@stanford.edu[rdiresta@stanford.edu]; stamos@stanford.edu[stamos@stanford.edu]; Julia Carter Scanlan[jccarter@uw.edu]; Matt Mulkey[mmulkey@pewtrusts.org]; Michael Grass[megrass@uw.edu]
From: Kate Starbird
Sent: Fri 10/7/2022 7:30:07 PM
Subject: Re: Scheduling a check in on EIP work
Received: Fri 10/7/2022 7:30:08 PM

Hi Maria,
We're up and running. Currently working with my "Tier 2" team on a blog post about conspiracy theories around Louis DeJoy. We have another post going out this afternoon on rumors surrounding "non citizen voting". And another one of our teams is working on something around "poll books". And there's the stuff around Konnech as well. We're monitoring and figuring out how to respond. We've logged 1000 different "items" and we're planning on launching our weekly report next week.

At UW, our communications contact is Michael Grass, cced above. He may be able to point to some of our outputs.

Best,
Kate

On Oct 7, 2022, at 10:34 AM, Maria Bianchi Buck <mbianchibuck@electionperformance.org> wrote:

Good morning!

I can't believe that it's already October! I know that this is an incredibly busy time for the EIP teams, but I'd love to find a time to check in with your teams over the next week or two now that both grants are executed. I'd like to hear how the work is going, and whether there's any additional support that our team can provide. Please let me know if there are any times over the next two weeks that might work for you.

As a separate request, I'd like to introduce Matt Mulkey from the Pew Communications Team, and to request that you help connect us to the best communications point of contact for both team. Our communications team is building a rapid-response list with all of our grantees to address external inquiries, media coverage or other events that may arise, and keep us all the same page in a volatile and fast-moving news environment. Matt will follow up with contact details for Pew's communications leads and a request for the contact information we'd like for each university team. Our communications team is also happy to advise or assist with communications or marketing plans you're developing for grant deliverables. We can engage EPP's partner organizations to explore ways they can support your communications plans, too. As your work continues, just let Matt know when such conversations would be timely and convenient.

Thank you!

Maria Bianchi Buck

To: isabellagc2010@gmail.com[isabellagc2010@gmail.com]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 1/2/2023 7:24:28 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Mon 1/2/2023 7:24:31 PM

BELLA! We need a short bio for you, like the one below. Please send ASAP so I can submit. I have a full day of meetings tomorrow and surgery on Wednesday — and I need to get this out the door before all this hits!

Kate

> On Dec 31, 2022, at 11:47 AM, Renee DiResta <rdiresta@stanford.edu> wrote:
>
> Renee DiResta is the Technical Research Manager at Stanford Internet Observatory. She holds a B.S in computer science and political science from SUNY Stony Brook. Her research examines information integrity and propaganda dynamics on social media, with a focus on transformative emerging platforms and technologies.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 28, 2022 3:27 PM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi folks,
I'm checking this back in. I had to remove some content to reduce length (to counter additions from Renee). We're still 145 words over… but only if we count the funding and acknowledgements… and I'm going to ask them not to count those. ;)

I also want to point out that we need biographical information for everyone in the following style. You can add those to the document or just send them over via email and I can add them.

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

Kate

> On Dec 28, 2022, at 2:05 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi folks, I'm checking this out right now to accept Renee's changes. I'll send out a revised version when I'm finished.
>
> Kate

On Dec 28, 2022, at 11:53 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Confirming some funding wording - Elena is out, but will email on this ASAP. No changes on my end to revision document.

From: Renee DiResta <rdiresta@stanford.edu>
Sent: Wednesday, December 28, 2022 8:25 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Working on this right now and will send back a version for accepting changes. Don't want to create a version conflict...will send this back to everyone in an hour or so.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, December 27, 2022 8:45 AM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Matt DeButts <mdebutts@stanford.edu>; isabellagc2010@gmail.com <isabellagc2010@gmail.com>
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID [28]

Hi everyone,
I'm following up on this, because I'd like to get this paper off to the journal ASAP in case they send it back wanting us to cut down the final 200 words (that we're adding for the Acknowledgements). It just needs a little attention from all of you regarding your personal bio and from Renee and Isabella regarding the Funding and Acknowledgements sections on the Stanford side.

I know folks are off this week, but it you could spare about 15 minutes to get these final elements in place, that would be awesome! (I have an avalanche that's going to hit me on January 3 … including another surgery because Matt was right that my finger didn't look right ... and I'm hoping to get this out the door before then.)

Kate

> On Dec 21, 2022, at 5:08 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi everyone,
> Happy holidays! I'm finally getting to these last revisions.
>
> I made the changes they suggested, adding a little limitations section. I've included the revision document here if you're interested. Please let me know if you think I've missed anything.
>
> Also, we need to add our acknowledgements, funding acknowledgements, and author bios (at the end of the document). Can you all add these to the Word document (not the revision document) attached here (and then resend to the group)?
>
> We're now at 9153 if we include the acknowledgments... though they didn't mention including them, so I'm going to pretend those don't count. The rest of the content is <9000 I think. Can one of you double check that?
>
> I'd like to send these over sooner rather than later in case they send it back asking us to get under 9000 w/ acknowledgments.

Best,
Kate

<Participatory-Disinfo-Revision-Document-Final.docx>
<Participatory-Disinformation-Draft-Final.docx>

> On Dec 3, 2022, at 3:11 PM, Matt DeButts <mdebutts@stanford.edu> wrote:
>
> These do seem easier to address! They basically write the "representativeness" section for us. I don't have any suggestions beyond what the reviewers themselveso utlined. Kate, do you want help ID'ing quotes to move into the supplementary materials? Or anything else from us? Happy to be moving forward with this!
>
> Matt
>
> > On Dec 3, 2022, at 2:21 PM, Kate Starbird <kstarbi@uw.edu> wrote:
> >
> > Great news!
> > It looks like we have a little more work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.
> >
> > Kate
> >
> > > Begin forwarded message:
> > >
> > > **From:** SMS Political Influencers <smspoliticalinfluencers@gmail.com>
> > > **Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]**
> > > **Date:** December 3, 2022 at 9:17:20 AM PST
> > > **To:** Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
> > > **Cc:** Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>
> > >
> > > **This Message Is From an Untrusted Sender**
> > > You have not previously corresponded with this sender.

See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

3-December-2022

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Best wishes,

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outline in the following.

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Finally, p. 12 uses the term "escalatory vector," which sounds interesting but I don't know what it means!

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Cc: Renee DiResta[rdiresta@stanford.edu]; Martin Riedl[martin.riedl@utexas.edu]; Josephine Lukito[jlukito@utexas.edu]; Samuel Christopher Woolley[swoolley@utexas.edu]
From: Kate Starbird
Sent: Wed 12/28/2022 11:31:34 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Wed 12/28/2022 11:31:35 PM

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Question as we're finalizing our manuscript… is the word limit inclusive of Acknowledgements and the Funding statement? Or just the main text + abstract + references?

Kate

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This Message Is From an Untrusted Sender
You have not previously corresponded with this sender.
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From: Kate Starbird
Sent: Wed 12/28/2022 10:05:21 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
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Also, we need to add our acknowledgements, funding acknowledgements, and author bios (at the end of the document). Can you all add these to the Word document (not the revision document) attached here (and then resend to the group)?

We're now at 9153 if we include the acknowledgments… though they didn't mention including them, so I'm going to pretend those don't count. The rest of the content is <9000 I think. Can one of you double check that?

I'd like to send these over sooner rather than later in case they send it back asking us to get under 9000 w/ acknowledgments.

Best,
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<Participatory-Disinfo-Revision-Document-Final.docx>
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> > > **This Message Is From an Untrusted Sender**
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> > >
> > > Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.
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We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

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Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

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(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

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From: Kate Starbird
Sent: Wed 12/28/2022 11:27:07 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Wed 12/28/2022 11:27:12 PM
Participatory-Disinformation-Influencers-Final-ks.docx

Hi folks,
I'm checking this back in. I had to remove some content to reduce length (to counter additions from Renee). We're still 145 words over… but only if we count the funding and acknowledgements… and I'm going to ask them not to count those. ;)

I also want to point out that we need biographical information for everyone in the following style. You can add those to the document or just send them over via email and I can add them.

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

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Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

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<Participatory-Disinformation-Draft-Final.docx>

Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

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Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This meta-narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — including hyperpartisan media and political operatives — worked alongside ordinary people to produce and amplify misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This meta-narrative, an amalgamation of many distinct narratives featuring claims of fraud, took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for many, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021 (U.S. House, 2022).

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon this framing. We expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. While Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives comprising this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-

down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to self-described "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of influencers in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast to most research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents', they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including "citizen journalists" (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined journalists and media outlets sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online influencers operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might trend on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the influencer, was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer", to differentiate influence on the basis of follower count.

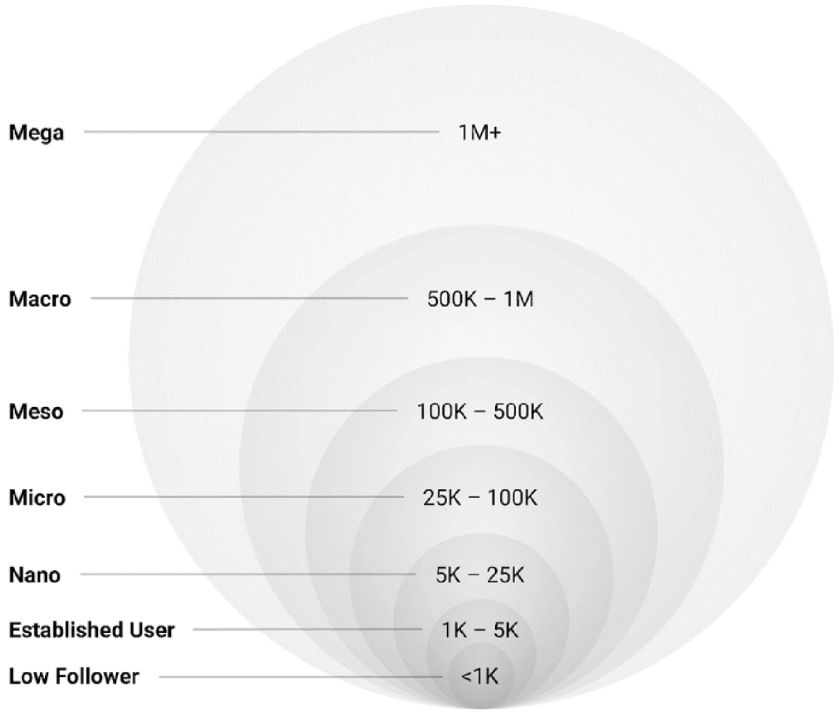

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) our research team were familiar with because we documented them in depth as they were occurring:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether they've been suspended, how they credentialed themselves, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting the false meta-narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

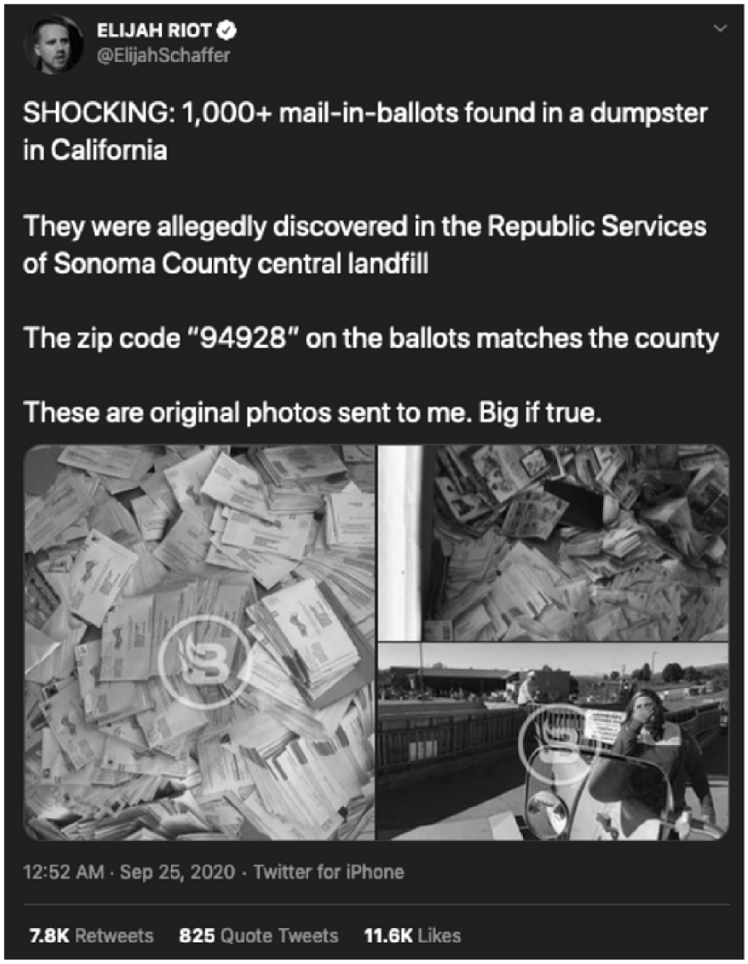

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

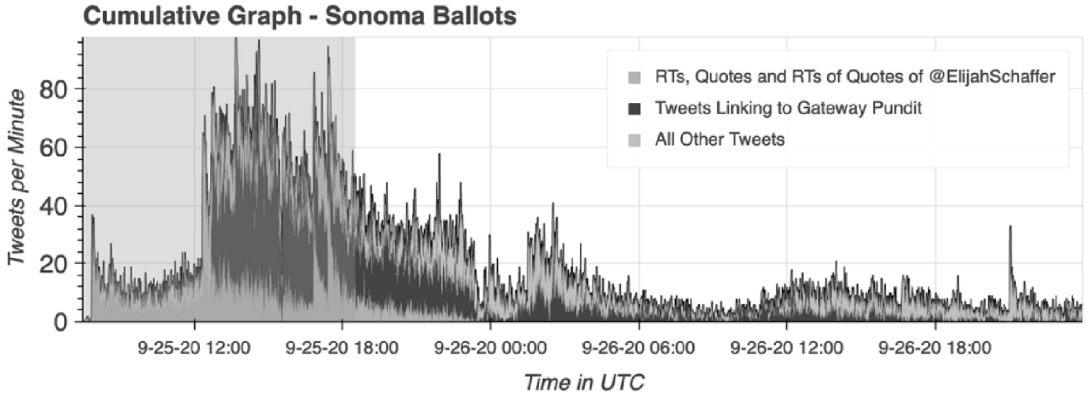

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a blue-check, had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted influencers for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of mega influencer Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

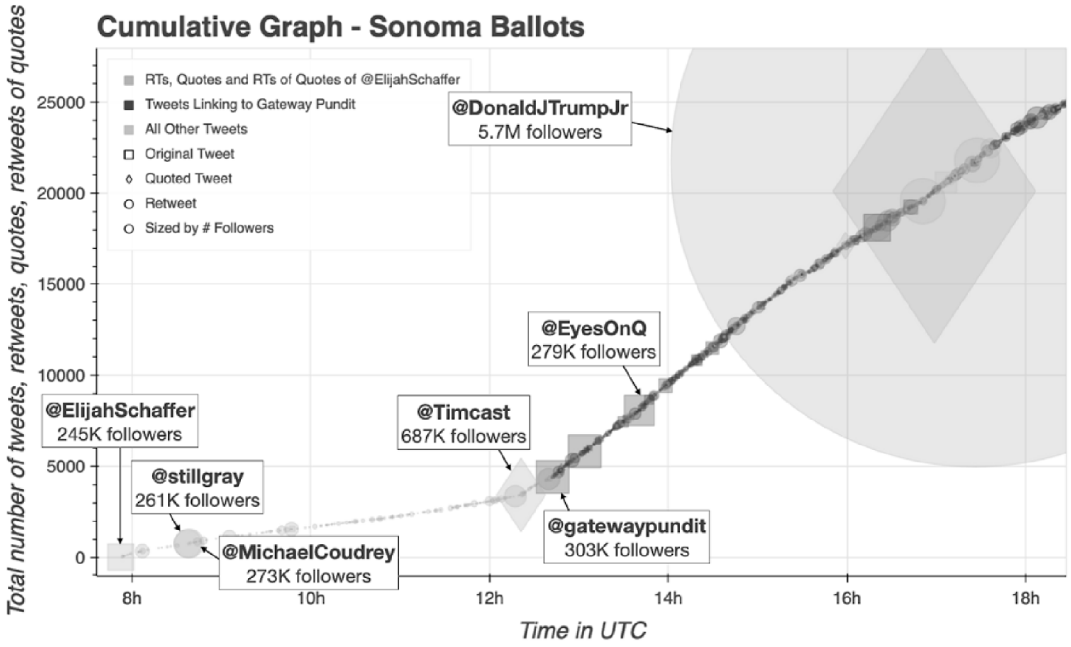

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet, a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, rejected ballots were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

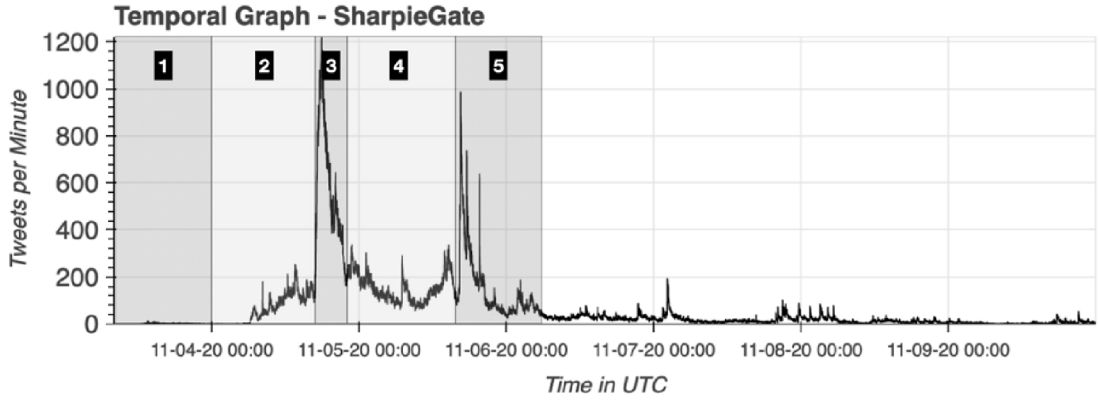

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a nano-sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

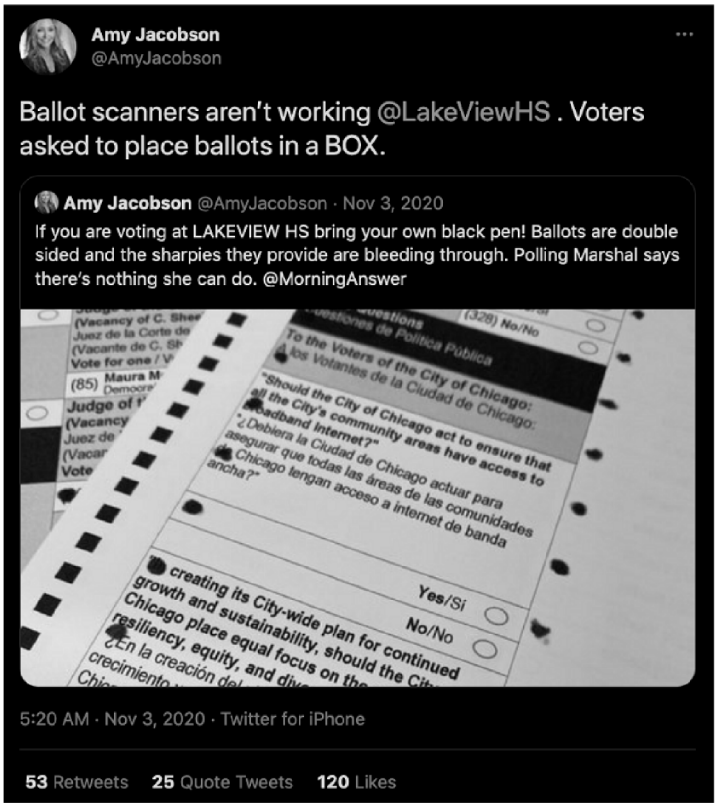

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to trade up — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

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Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
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shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

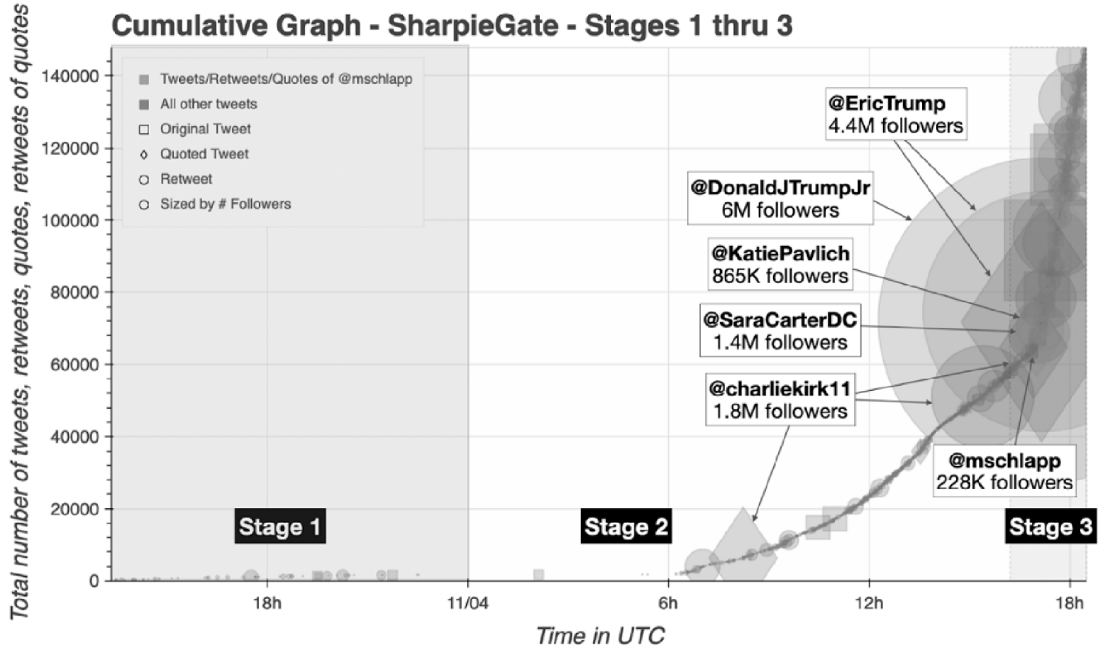

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half, receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

@mschlapp (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House @NewtGingrich. Bartiromo’s tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October 2020, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

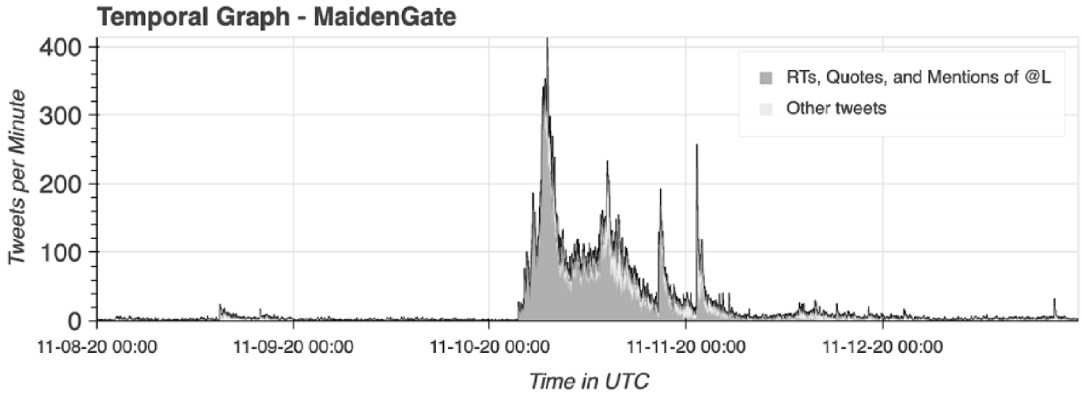

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal

movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was “looking into @L's #MaidenGate” and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

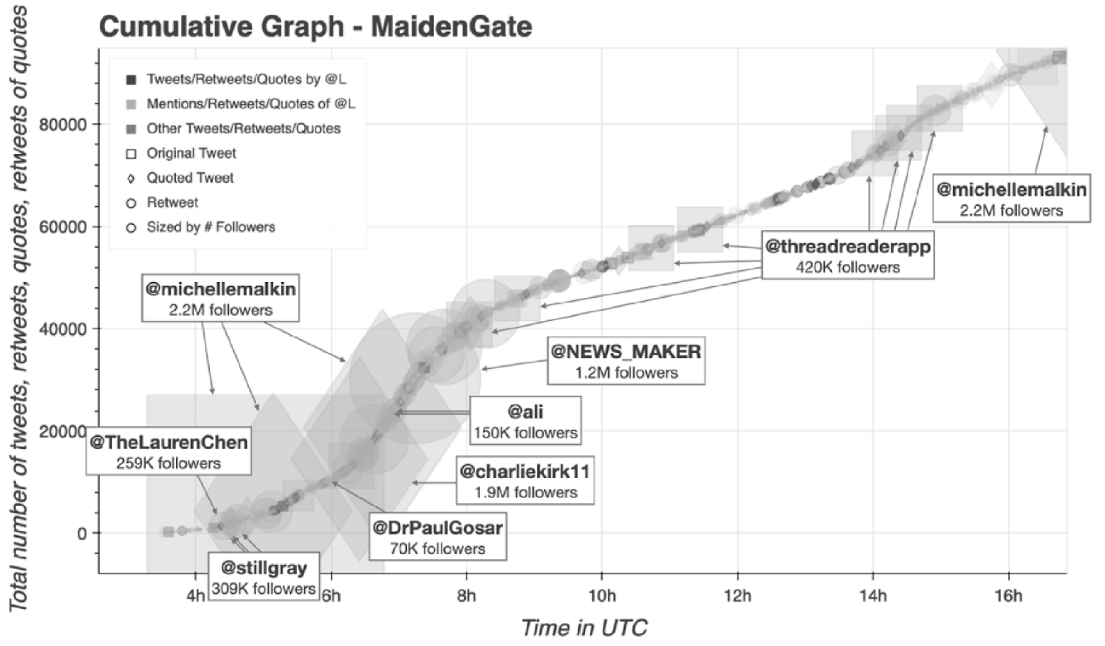

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L’s accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation: “We don’t know the top of this. This is either a small problem, or it’s a problem that will shake America to the core.” His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander’s growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander’s team created a Google Document to consolidate information around the ongoing “investigation.” The sheet offered detailed advice for filing complaints about potential voter fraud using one’s maiden name, providing links to voter registration websites in dozens of states. Its watermark read “stopthesteal.us”, demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media-driven or social media-driven. Instead, we find something more akin to Chadwick's (2017) conceptualization of political organizing within a hybrid media system where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. Political influencers both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016). This view aligns with previous research on participatory propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged

election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers in not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared

understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro-influencers amplified the experiences of others and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

Though this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

8.3 Limitations

This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the

expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

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12.0 References

Bastos, M., & Farkas, J. (2019). "Donald Trump is my President!": The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters.* (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

U.S. House. (2022, December). Select Committee to Investigate the January 6th Attack on the United States Capitol. *Final Report*. Available: https://january6th.house.gov/sites/democrats.january6th.house.gov/files/Report_FinalReport_Jan6SelectCommittee.pdf

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don't. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

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Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

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Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — from hyperpartisan media to political operatives to ordinary people — contributed to producing and amplifying misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This narrative took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for some, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021.

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon this framing. We first expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. Additionally, while Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives that constituted this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time

conservative political operatives, to "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of "influencers" in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast to most research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and *participatory* nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents' of those campaigns, they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative)

dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including "citizen journalists" (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined "journalists" and "media outlets" sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online "influencers" operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might "trend" on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the "influencer", was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer", to differentiate influence on the basis of follower count.

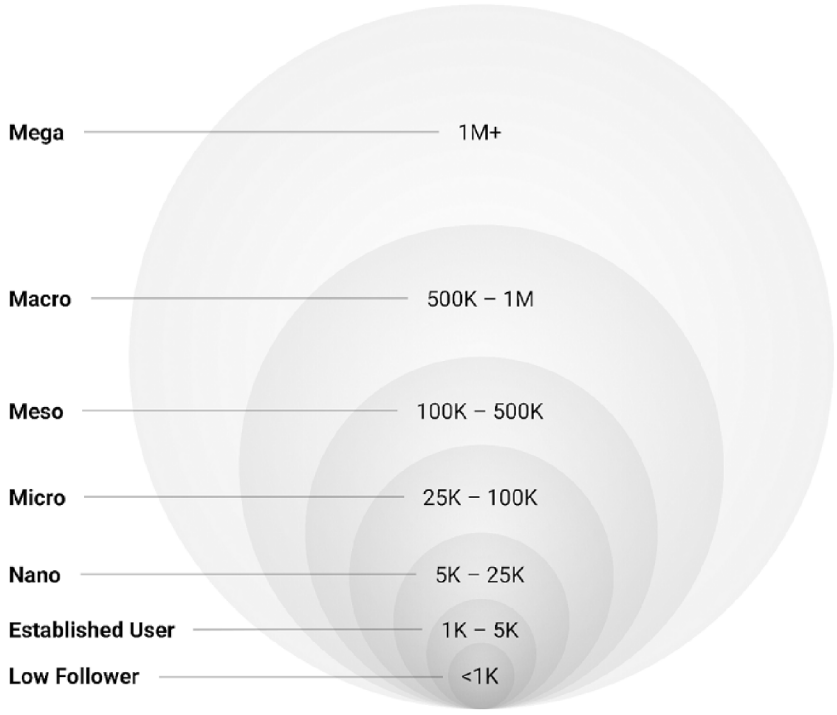

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) our research team were familiar because we documented these specific cases in depth as they were occurring:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether or not they've been suspended, how they credentialed themselves, their tweet patterns across the Election 2020 discourse, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was then-President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting a false narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for its supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, Elijah Schaffer, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

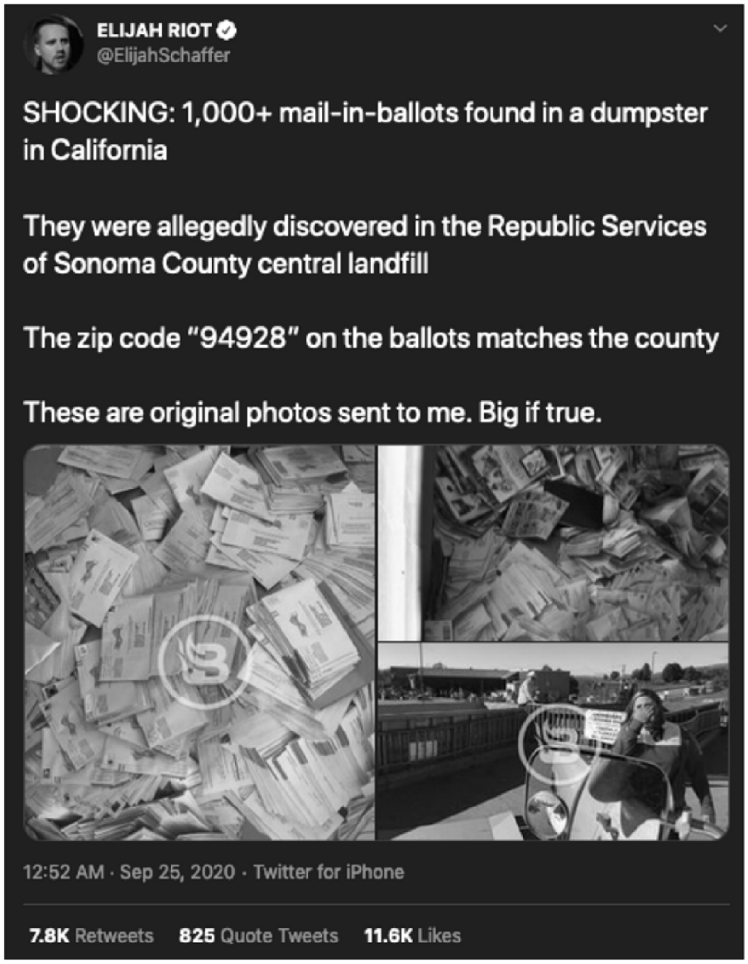

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

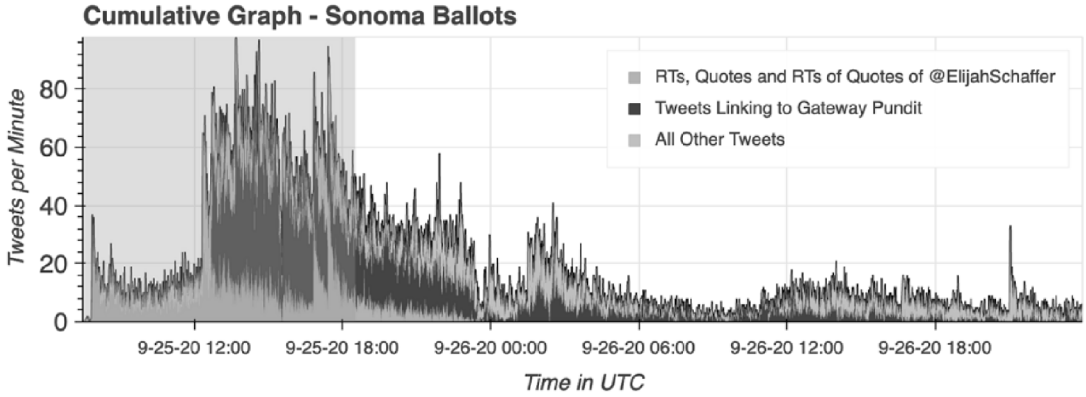

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a "blue-check", had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted "influencers" for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of "mega influencer" Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

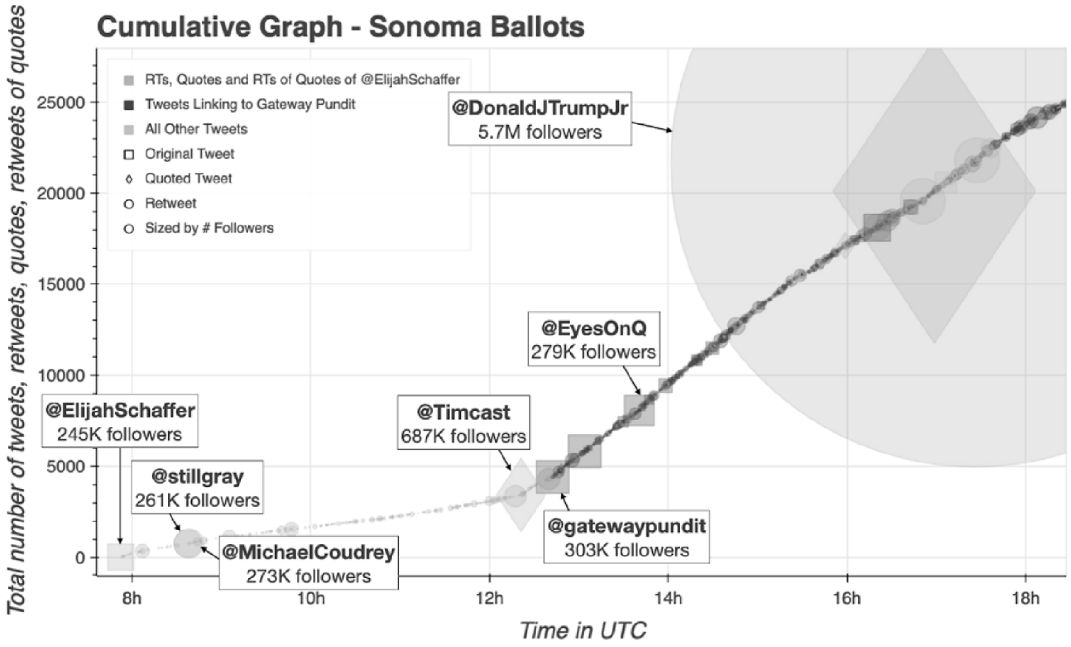

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, ballots rejected automatically were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

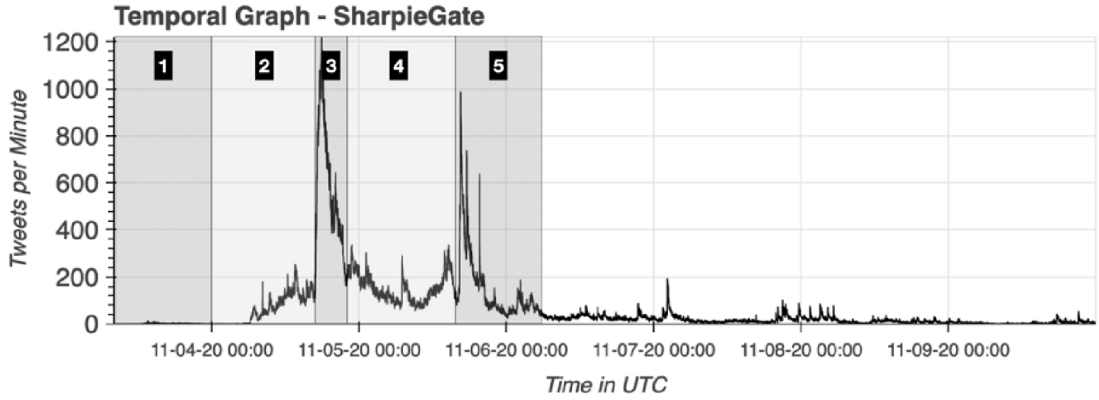

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a "nano" sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

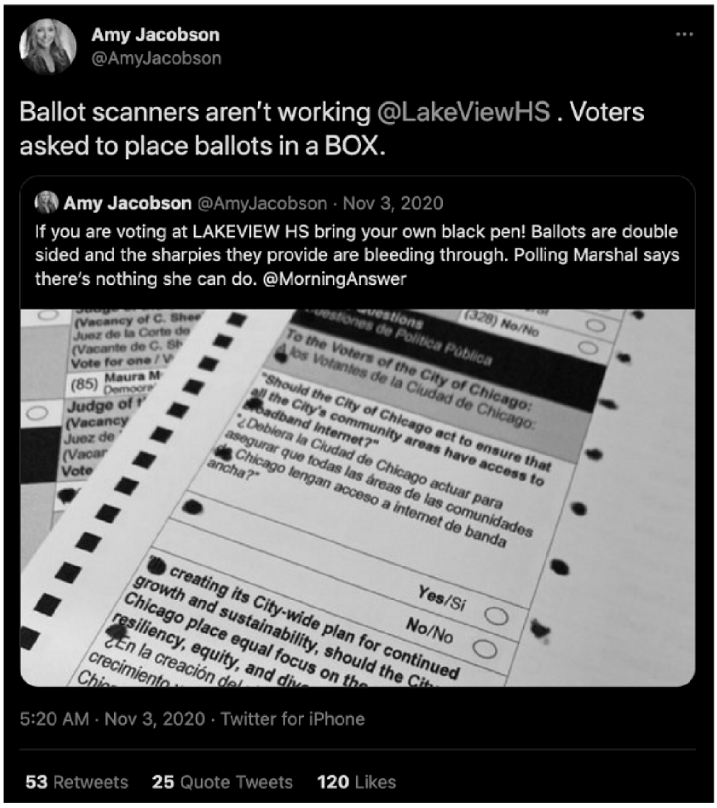

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to "trade up" — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
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shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

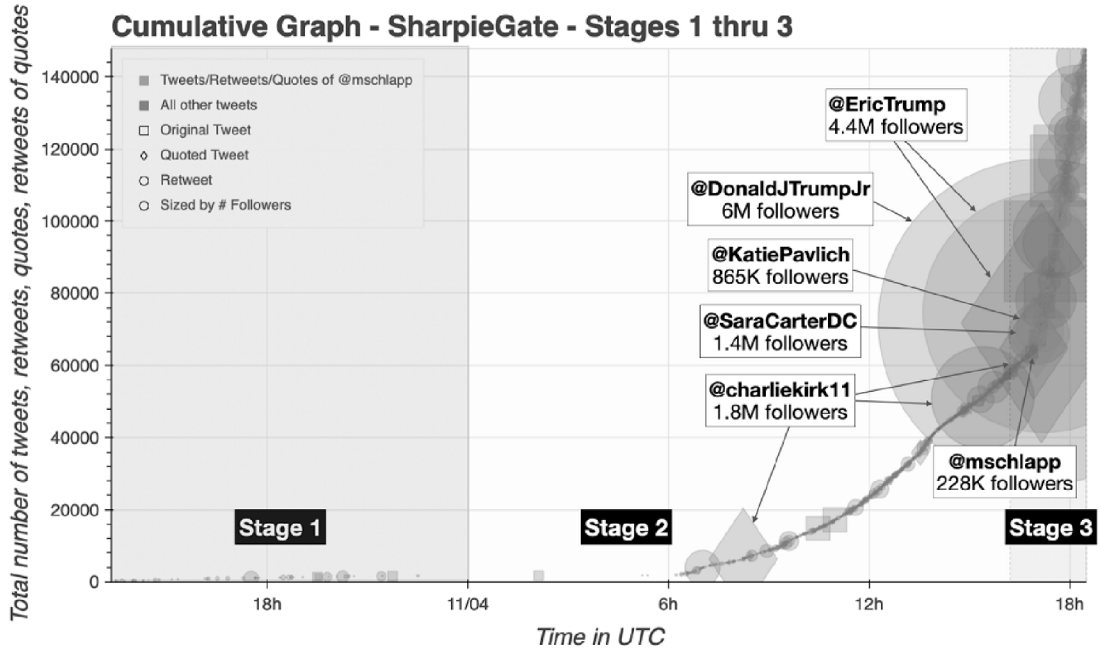

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half,receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

> **@mschlapp** (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), the founder of the “Walkaway” movement @BrandonStraka (640K followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House

@NewtGingrich. Bartiromo's tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including activist media outlet @ProjectVeritas, conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

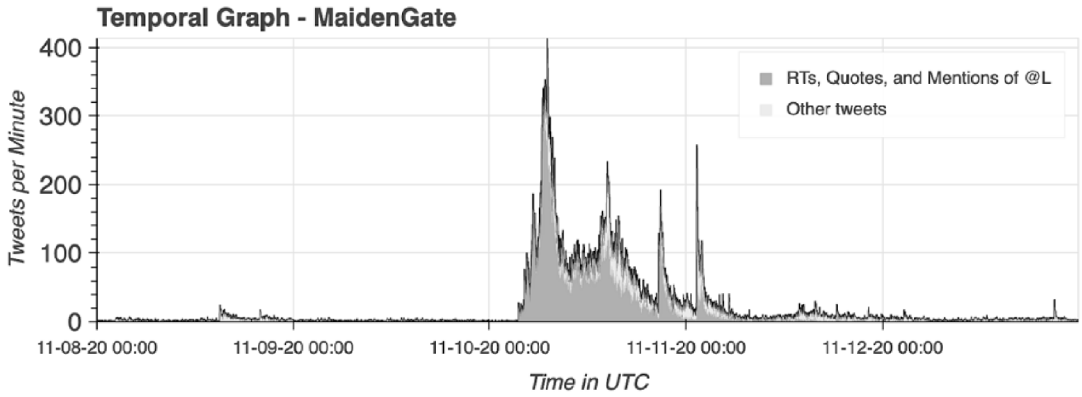

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was "looking into @L's #MaidenGate" and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

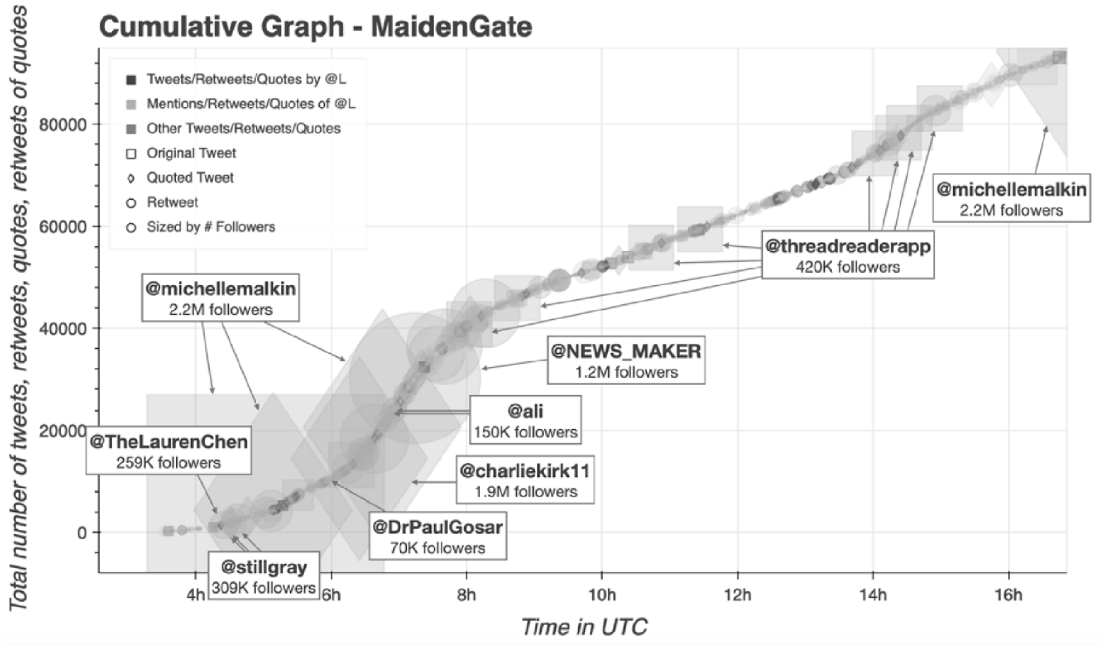

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L's accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation of something big: "We don't know the top of this. This is either a small problem, or it's a problem that will shake America to the core." His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander's growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander's team created a Google Document to consolidate information around the ongoing "investigation." The sheet offered detailed advice for filing complaints about potential voter fraud using one's maiden name, providing links to voter registration websites in dozens of states. Its watermark read "stopthesteal.us", demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly exploring whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media driven or social media driven. Instead, we find something more akin to Chadwick's conceptualization of political organizing within a hybrid media system (Chadwick, 2017) where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. *Political influencers* both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016) . This view aligns with previous research on participatory

propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence they gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro influencers amplified the experiences of others, and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

While this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

8.3 Limitations

This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

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12.0 References

Bastos, M., & Farkas, J. (2019). “Donald Trump is my President!”: The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters*. (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don't. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

13.0 Biographies

Kate Starbird is an Associate Professor at Human Centered Design & Engineering and Director of the Center for an Informed Public at the University of Washington. Starbird received her doctoral degree in 2012 from the University of Colorado Boulder. Her research examines the spread of online rumors, misinformation, and disinformation during crises and breaking news events.

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To: Renee DiResta[rdiresta@stanford.edu]; Matt DeButts[mdebutts@stanford.edu]; isabellagc2010@gmail.com[isabellagc2010@gmail.com]
From: Kate Starbird
Sent: Sat 12/3/2022 10:21:40 PM
Subject: Fwd: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Sat 12/3/2022 10:21:41 PM

Great news!
It looks like we have a little more work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.

Kate

Begin forwarded message:

From: SMS Political Influencers <smspoliticalinfluencers@gmail.com>
Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]
Date: December 3, 2022 at 9:17:20 AM PST
To: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
Cc: Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>

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Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

3-December-2022
Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving

your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

In the appendix, in contrast, the authors present only three sampling criteria, the first two of which are identical to those in the manuscript. The third, however, is different: "Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were occurring.".

This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections. This, of course, is not a problem, if only the authors acknowledge the limitations of this (which I think they should). At the same time, the sampling criteria listed in the manuscript introduce some circular reasoning. The authors write that they deliberately sampled cases based on their ability to "reveal the participatory nature of this campaign." Later, they then conclude the campaign is participatory (a conclusion already laid clear in the sampling criteria).
I think the best solution is to simply acknowledge that these cases were selected due to their high visibility as well as the authors' detailed empirical engagement with the cases, while they took place (a valuable contribution in itself). Doing so, the authors should also acknowledge in the discussion section that the study cannot conclude how all parts of the #StopTheSteal disinformation campaign operated.

(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better

understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:
• I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"
• On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing." To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.

A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the supplementary materials basically works. And I am pretty much convinced by the authors' responses to my previous comments.

I have a couple of remaining comments.

The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how "participatory disinformation" occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the "participatory disinformation" phenomenon. Such as, "in participatory disinformation, some patterns we see include …" with different columns for behaviors from low-follower accounts, meso-influencers, mega-influencers. Examples could be, from low-follower accounts and meso-influencers, you see accounts calling for attention from those higher up. And so on. There are good insights in the Discussion, but naming these patterns and presenting them in one place could be useful, especially for the paragraph on how to deal with participatory disinformation, which at the moment I don't feel adds a great deal. Can we name the patterns clearly enough that they could be readily identified, ideally at scale?

Second, at several points, it would be helpful for the authors to remember, and remind readers, that these are three cases that are perhaps illustrative of the sorts of disinformation that occurred in 2020, but as they note in their letter, they are not representative. I was reminded of this when looking at a passage on p. 21 containing the idea that "elites moved quickly to amplify" disinformation coming from below: this suggests that elites consistently and quickly amplified claims being made by less influential accounts. Is that what you mean to say? I would have thought rather that they more idiosyncratically got wind of a helpful narrative and amplified it. As some of your cases show, in some cases it took a while for really big accounts to jump in. And it is important to remember that these are some of the most 'successful' of the disinformation narratives. And surely the top accounts did not do this for every possible conspiracy theory… so would it be helpful developing a line of thinking about what conditions lead top influencers (macro/mega) to pick up on a given thread? p. 12: "escalatory vector".

Finally, p. 12 uses the term "escalatory vector," which sounds interesting but I don't know what it means!

REVIEWER 3

I have carefully read the revised manuscript, the appendices outlining methodological choices, and the review letter outlining the various changes made by the authors. The authors added more relevant theory to their paper (I also like the Chadwick framing another reviewer suggested – I think it's a great fit for this paper), and they improved the conclusion by adding context to the "so what" of their findings. I do not have any further comments for the authors at this time and think this piece will be of interest to readers of social media + society.

To: Craig Newmark[craig.newmark@gmail.com]
Cc: Donovan, Joan M[joan_donovan@hks.harvard.edu]; Ryan Merkley (Consultant)[Ryan.Merkley@aspeninstitute.org]; Renee DiResta[renee.diresta@gmail.com]
From: Kate Starbird
Sent: Sun 11/20/2022 7:24:14 PM
Subject: Re: Craig: From Scott Hechinger on Zealous
Received: Sun 11/20/2022 7:24:15 PM

Thanks for sending this along. Lots of potential synergies!

Kate

On Nov 20, 2022, at 9:10 AM, Craig Newmark <craig.newmark@gmail.com> wrote:

FYI, and, hi!

Craig Newmark, craigslist founder
craignewmarkphilanthropies.org

---------- Forwarded message ---------
From: **Scott Hechinger** <scott@zealo.us>
Date: Sun, Nov 20, 2022, 11:34 AM
Subject: Re: Craig: From Scott Hechinger on Zealous
To: Craig Newmark <craig.newmark@gmail.com>

Yes (and sorry for so much).
Note: Our work focuses on criminal and intersecting social justice issues (housing, education, poverty, substance use, mental health, community investment). But note: the models we're developing can be applied more generally. But these issues happen to be the most significant area of use of propaganda to perpetuate and grow our most harmful and costly domestic policies.
+Rapid response models to false media and statements about status quo policing, prosecutions, prisons
+Courtwatch (amassing volunteer armies trained in language of court round country)-- To counter disinformation outside of court about what's happening inside of court -- spread by judges, prosecutors, jailers, parole officers
+Building new tools, pathways, and technologies to get an immense number facts/data/stories into hands of reporters from ground and inside jails/prisons from those committed to truth.
+Organizing and optimizing defender offices (mass volume of millions of data points nationally) to deploy data and real stories to media/journalists/outlets to counter data used and lied about by power.

The goal for all: Organizing, spreading, and democratizing information is disrupting the strongest tool status quo has: Monopoly on messaging to consumers of popular culture and news media.

Scott Hechinger
Founder & Executive Director
Zealous

202-441-3999
scott@zealo.us
zealo.us

On Sun, Nov 20, 2022 at 8:20 AM Craig Newmark <craig.newmark@gmail.com> wrote:

Scott, thanks!
There's an overwhelming amount here.

Anything specific about countering disinformation in general?

I do appreciate it, thanks!

Craig Newmark, craigslist founder
craignewmarkphilanthropies.org

On Sun, Nov 20, 2022, 10:55 AM Scott Hechinger <scott@zealo.us> wrote:

Hi Craig:
Real honor to be in touch. Would love to set up a time to talk more about our work at Zealous across the country fighting to topple the imbalance of power and control over criminal and social justice media and advocacy.

Brief and High Level: Disrupting Sensationalism and Propaganda on Justice Policy is our Work: For decades, people's basic intuitions about crime and punishment and what it actually will take to achieve public health and safety have been shaped by misleading and inaccurate news coverage and popular culture. Lawmakers and the media have overlooked or refused to listen to the perspective, voice, and expertise of those closest to mass criminalization. The result: Our work: Supporting local coalitions of defenders, organizers, artists, and people inside and out of jails and prisons work better and more strategically together and together, tell more compelling, engaging stories. Otherwise, people will continue to lack imagination for different, be too susceptible to sensationalism and fearmongering, and make decisions based on fear not reason.

I've included some more specific information below about some of our interventions, but would just be great to share more via a call or zoom. I've left more written words below my signature. And of course this is all just scratching the surface.

Appreciate you and all the work you've done.

Many thanks,

Scott

Some of our ongoing strategies, systems, and interventions:

-Fighting for court, jail, and prison transparency: Injustice happens in empty courtrooms. Horrors happen behind jail bars and prison walls. And few people know or understand what's happening. This is intentional. In partnership with key local advocacy groups and public defenders who have the relationships and experience, we're disrupting the status quo by sharing first hand accounts from people inside, risking retaliation for speaking out and connecting them directly with journalists and power. We're also supporting the expansion and protection of strategic Court Watch programs around the country. Samples: Silenced (Michigan) | Shedding Light (Texas) | Gasping for Justice (Maryland) | Decriminalize Poverty (Tennessee - in progress).

-Data Transparency: A recent, ongoing project in partnership with reporter Sarah Stillman and her Yale Investigative Reporting Lab, is a major transparency project on the issue of Felony Murder, but more so on the extraordinary lengths to which courts and corrections departments around the country have gone to keep information about who has been victimized by these laws secret. There are estimated to be 10,000s of people behind bars (appx 70% of all women in CA prisons

by one estimation) who are serving life and other long sentences for murder *everyone agrees* they did not commit or intend to commit. Out of her reporting we are aiming to launch an effort to fill in the gaps. The more information people have, the closer we'll get to stop being the only country in the world that allows his practice.

-New Sources & Journalist Relationships: Connecting journalists and media outlets with newly trained expert sources, surrogates, and key information about the way our system really works. This looks like trainings for public defenders, advocates, people with direct experience to harness the power of media, technology, storytelling, and the arts. Relationship building efforts between ground-level sources and beat reporters on criminal justice. Identifying, training, and placing newly media ready advocates to get onto the most watched new programs. Supporting local organizers, people with direct experience, defenders, and other ground experts write compelling commentaries, placing them, and then amplifying them. And designing what we hope will ultimately become core curriculum for up and coming social justice practitioners in law schools throughout the country on expanding their advocacy and media toolkit.

Rapid Response to Lies & Misinformation: In New York, Zealous launched Justice Not Fear to track stories and statements about the impact of pretrial reform and review them to correct false and misleading information, provide additional context, identify and call out damaging patterns, and promote accurate coverage. The project has drawn on extensive legal experience, public databases, court resources, public defender offices, and the law itself to ensure that legal policies and their impact are being correctly portrayed. We want to expand this model.

Optimizing Defender Offices for Information Deployment: We are working with defender offices around the country--right now we are deeply embedded in Chicago--to develop and implement process for efficient issue identification, story collection, and data organization to give to journalists, media outlets, and lawmakers to influence decisionmaking.

Center for Just Journalism: Zealous founded the Center for Just Journalism along with FWD.us and Civil Rights Corps, a new independent initiative and non-profit dedicated to transforming the way that journalists cover issues of health, safety, crime, and punishment. The Center recently launched its first two important contributions to the field: a toolkit for journalists who would report on the new release of FBI crime statistics for 2021 and a toolkit for journalists reporting on retail theft. More resources are forthcoming, as well as the full website.

Scott Hechinger
Founder & Executive Director
Zealous

202-441-3999
scott@zealo.us
zealo.us

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 11/9/2022 3:08:32 PM
Subject: Re: EIP Media Briefing
Received: Wed 11/9/2022 3:08:36 PM

I hope everything is okay! Do you have other team members that we should invite?

Kate

On Nov 8, 2022, at 10:23 PM, Renee DiResta <rdiresta@stanford.edu> wrote:

As a heads up, my husband is having a minor medical procedure tomorrow and I have to show up to the facility to ride in the Uber home with him b/c he is not allowed to leave on his own. I don't know what time he will be done. I will be able to join but might have to drop early.

-----Original Appointment-----
From: Michael Grass <megrass@uw.edu>
Sent: Tuesday, November 8, 2022 7:41 PM
To: Kate Starbird; Mike Caulfield; Renee DiResta
Cc: [redacted]; Rachel Moran; Sukrit Venkatagiri; [redacted] Christopher Giles; Elena Cryst; Daniel Bateyko; [redacted]
Subject: EIP Media Briefing
When: Wednesday, November 9, 2022 10:45 AM-12:15 PM (UTC-08:00) Pacific Time (US & Canada).
Where: https://washington.zoom.us/j/92879058530 [washington.zoom.us]

I'll open the Zoom room around 10:45 a.m. (Pacific) and then we can try to get started at 11 a.m. (Pacific)

Michael Grass is inviting you to a scheduled Zoom meeting.

Join Zoom Meeting
https://washington.zoom.us/j/92879058530 [washington.zoom.us]

Meeting ID: 928 7905 8530
One tap mobile
+12063379723,,92879058530# US (Seattle)
+12532158782,,92879058530# US (Tacoma)

Dial by your location
+1 206 337 9723 US (Seattle)
+1 253 215 8782 US (Tacoma)
+1 346 248 7799 US (Houston)
+1 602 753 0140 US (Phoenix)
+1 669 219 2599 US (San Jose)
+1 669 900 6833 US (San Jose)
+1 720 928 9299 US (Denver)
+1 971 247 1195 US (Portland)
+1 213 338 8477 US (Los Angeles)
+1 651 372 8299 US (Minnesota)
+1 786 635 1003 US (Miami)
+1 267 831 0333 US (Philadelphia)
+1 301 715 8592 US (Washington DC)
+1 312 626 6799 US (Chicago)
+1 470 250 9358 US (Atlanta)
+1 470 381 2552 US (Atlanta)
+1 646 518 9805 US (New York)
+1 646 876 9923 US (New York)
Meeting ID: 928 7905 8530

Find your local number: https://washington.zoom.us/u/acaS6NSdti [washington.zoom.us]

Join by SIP
92879058530@zoomcrc.com

Join by H.323
162.255.37.11 (US West)
162.255.36.11 (US East)
221.122.88.195 (China)
115.114.131.7 (India Mumbai)
115.114.115.7 (India Hyderabad)
213.19.144.110 (Amsterdam Netherlands)
213.244.140.110 (Germany)
103.122.166.55 (Australia Sydney)
103.122.167.55 (Australia Melbourne)
209.9.211.110 (Hong Kong SAR)
64.211.144.160 (Brazil)
69.174.57.160 (Canada Toronto)
65.39.152.160 (Canada Vancouver)
207.226.132.110 (Japan Tokyo)
149.137.24.110 (Japan Osaka)
Meeting ID: 928 7905 8530

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 11/9/2022 6:23:25 AM
Subject: Delayed Response | Media Contact RE: EIP Media Briefing
Received: Wed 11/9/2022 6:23:25 AM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: mmasterson@microsoft.com[mmasterson@microsoft.com]
From: Kate Starbird
Sent: Tue 10/11/2022 6:51:58 PM
Subject: Delayed Response | Media Contact RE: UW CIP: media attention and public records requests
Received: Tue 10/11/2022 6:51:58 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 9/26/2022 3:54:39 PM
Subject: Delayed Response | Media Contact Re: Your plans while at Stanford on Wed?
Received: Mon 9/26/2022 3:54:39 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Daniel Bateyko[dbateyko@stanford.edu]
Cc: Sunny Xun Liu[sunnyxliu@stanford.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Emma Spiro[espiro@uw.edu]; Jevin West[jevinw@uw.edu]
From: Kate Starbird
Sent: Tue 9/20/2022 6:27:56 PM
Subject: Re: SaTC Report - final?
Received: Tue 9/20/2022 6:27:57 PM

I just submitted from our side. Great work everyone!
And we're going to have to be less verbose next time, because we were almost out of room on some prompts… and we're JUST GETTING STARTED. ;)

Kate

On Sep 20, 2022, at 9:50 AM, Daniel Bateyko <dbateyko@stanford.edu> wrote:



--
Dan Bateyko (he/him)
Special Projects Manager, Stanford Internet Observatory
dbateyko@stanford.edu

From: Sunny Xun Liu <sunnyxliu@stanford.edu>
Date: Tuesday, September 20, 2022 at 9:47 AM
To: Kate Starbird <kstarbi@uw.edu>, Jeffrey T. Hancock <hancockj@stanford.edu>, Renee DiResta <rdiresta@stanford.edu>, Daniel Bateyko <dbateyko@stanford.edu>, Emma Spiro <espiro@uw.edu>, Jevin West <jevinw@uw.edu>
Subject: Re: SaTC Report - final?

Hi everyone,

We have submitted the annual report at the Stanford side.

Thanks for this great effort and a wonderful first year!

Sunny

--
Sunny Xun Liu, Ph.D.
Associate Director
Social Media Lab
Department of Communication
Stanford
liuxun@stanford.edu
650-723-4439

From: Kate Starbird <kstarbi@uw.edu>
Date: Friday, September 16, 2022 at 3:55 PM
To: Jeffrey T. Hancock <hancockj@stanford.edu>, Renee DiResta <rdiresta@stanford.edu>, Daniel Bateyko <dbateyko@stanford.edu>, Sunny Xun Liu <sunnyxliu@stanford.edu>, Emma Spiro <espiro@uw.edu>, Jevin West <jevinw@uw.edu>
Subject: SaTC Report - final?

Hi folks,

Thank you to everyone who added their content. I went through and accepted additions and smoothed out things in places. It's plenty long and we have plenty of details. **And I think it's done**!

I think a challenge may be in figuring out how to communicate what pieces of the collaboration are SaTC pieces and what pieces are external… e.g. we're mentoring students who aren't necessarily paid on this grant. I tried to smooth some of the language out there.

If you want to take one last look, please do. I plan to submit our UW version over the weekend. Stanford (Jeff) will have to submit a copy as well — including a form for each person who worked > 0.5 month on the grant.

Here's the Google document:
https://docs.google.com/document/d/1LvWi4rsQeIJyRKXwO2bgDWGuOoDgZjHorAynhFBNhk8/edit# [docs.google.com]

Kate

To: Jeff Hancock[hancockj@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Daniel Bateyko[dbateyko@stanford.edu]; Sunny Xun Liu[sunnyxliu@stanford.edu]; Emma Spiro[espiro@uw.edu]; Jevin West[jevinw@uw.edu]
From: Kate Starbird
Sent: Fri 9/16/2022 10:55:06 PM
Subject: SaTC Report - final?
Received: Fri 9/16/2022 10:55:07 PM

Hi folks,
Thank you to everyone who added their content. I went through and accepted additions and smoothed out things in places. It's plenty long and we have plenty of details. **And I think it's done!**

I think a challenge may be in figuring out how to communicate what pieces of the collaboration are SaTC pieces and what pieces are external… e.g. we're mentoring students who aren't necessarily paid on this grant. I tried to smooth some of the language out there.

If you want to take one last look, please do. I plan to submit our UW version over the weekend. Stanford (Jeff) will have to submit a copy as well — including a form for each person who worked > 0.5 month on the grant.

Here's the Google document:
https://docs.google.com/document/d/1LvWi4rsQeIJyRKXwO2bgDWGuOoDgZjHorAynhFBNhk8/edit#

Kate

To: Daniel Bateyko[dbateyko@stanford.edu]
Cc: Cameron Hickey[cameron@ncoc.org]; Mike Caulfield[mica42@uw.edu]; Sukrit Venkatagiri[sukritv@uw.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 9/26/2022 9:45:14 PM
Subject: Re: [Request] Headcount for EIP Dinner?
Received: Mon 9/26/2022 9:45:16 PM

UW side. ;)

Kate

On Sep 26, 2022, at 2:31 PM, Kate Starbird <kstarbi@uw.edu> wrote:

We have five from the Stanford side, but I could limit it to two if we want to just have the "manager" level folks.

Kate

On Sep 26, 2022, at 1:23 PM, Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all,

I have sent a hold for this Wednesday for an EIP dinner at Tai Pan. I currently have a reservation for 10, but it would be great for me to get a proper headcount if we need more seats. Could you please send over the names of people who can join us for dinner by end-of-day Tuesday?

Best,
Dan

To: Daniel Bateyko[dbateyko@stanford.edu]
Cc: Cameron Hickey[cameron@ncoc.org]; Mike Caulfield[mica42@uw.edu]; Sukrit Venkatagiri[sukritv@uw.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 9/26/2022 9:31:21 PM
Subject: Re: [Request] Headcount for EIP Dinner?
Received: Mon 9/26/2022 9:31:23 PM

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Kate

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Best,
Dan

To: Joel Day[joel.day@princeton.edu]
Cc: Daniel Bateyko[dbateyko@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Emma Spiro[espiro@uw.edu]; Mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Thur 11/3/2022 2:38:09 PM
Subject: Re: Ballot Drop Boxes
Received: Thur 11/3/2022 2:38:10 PM

Adding Mike Caulfield here, who on the UW side probably has the best view of this.
I have been getting your regular SitReps!

Kate

On Nov 2, 2022, at 4:05 PM, Joel Day <joel.day@princeton.edu> wrote:

EIP team,

We are working with partners to track all planned and actualized incidents at drop boxes throughout the country. While very potent as a narrative with True the Vote and others, there seems to be little offline activity from our tracking. To better understand this delta, can you all share what trends you are seeing regarding drop boxes?

Thanks for any help. Are you all receiving our regular SitReps?

Joel

—
Joel Day, PhD
Research Director
Bridging Divides Initiative
Princeton School of Public & International Affairs

To: Daniel Bateyko[dbateyko@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 9/9/2022 8:00:37 PM
Subject: Fwd: [Registration Required] TrustCon 2022 Reception RegistrationEmail
Received: Fri 9/9/2022 8:00:40 PM

Renee, I know we're planning on doing something extra on Wed night (before the conference), but I'm thinking it might also be nice to get into the event. Any chance you all can help with this… I just got a message to say it's over capacity. :(

Kate

Begin forwarded message:

From: ileah@tspa.org
Subject: Re: [Registration Required] TrustCon 2022 Reception Registration Email
Date: September 9, 2022 at 11:44:21 AM PDT
To: kstarbi@uw.edu

Hello,

This email is an update to my previous email about the TrustCon 2022 Reception Registration on September 28th. We are **currently at capacity** for this event, please join the waitlist on eventbrite and we will reach out via email from Eventbrite if a space opens up and you will have 72 hours to register or the system will contact the next person on the list.

If you are an in-person registrant for TrustCon 2022, then you will use your TrustCon badge for entry and do not need to register. If you are only registered for the Trust and Safety research Conference, then you will need to be registered in Eventbrite to attend this event and names will be checked upon entry.

If you registered with Eventbrite and cannot attend the event, please reach out to trustcon@tspa.org so that we can open your spot to someone on the waiting list.

Kindest regards,

Ileah Vazquez (she/her)
Membership Manager
TSPA [tspa.info] | TSF [tsf.foundation]

Please note: I will have limited access to email from September 24 to October 2 while working at our two conferences.

To: Martin Riedl[martin.riedl@utexas.edu]
Cc: SMS Political Influencers[smspoliticalinfluencers@gmail.com]; Renee DiResta[rdiresta@stanford.edu]; Josephine Lukito[jlukito@utexas.edu]; Samuel Christopher Woolley[swoolley@utexas.edu]
From: Kate Starbird
Sent: Thur 9/8/2022 3:07:09 AM
Subject: Re: Social Media + Society Political Influencer Special Issue – Decision on Manuscript ID [28]
Received: Thur 9/8/2022 3:07:18 AM
Participatory-Disinfo-Revision-Document.docx
Participatory-Disinformation-Appendices.docx
Participatory-Disinformation-Draft-2.docx

Hi Martin and editors,
I'm attaching our edited paper, revision document, and (new) supplementary materials document. Please let me know if you need anything else from us. And thank you for serving as editors for this issue.

Kate

On Sep 5, 2022, at 9:58 AM, Martin Riedl <martin.riedl@utexas.edu> wrote:

Dear Kate and Renée:

Good to hear from you. To quickly answer your questions - yes, please submit the revised manuscript and response letter to us through email (this thread is fine). If you could send the supplementary material as a separate file, that would be best. Thank you - and we look forward to receiving y'alls manuscript!
Sending my best,
Martin

On Sat, Sep 3, 2022 at 1:20 PM Kate Starbird <kstarbi@uw.edu> wrote:

Hi folks,
We're putting the final touches on our revision. And after a herculean editing effort, it's under 9000 words (according to MS Word). A couple of quick questions. Should we submit the final paper and revision document via this email thread or through a web portal somewhere? And should we submit the supplementary materials as a separate file or within the same document as the main paper?

Best,
Kate

On Jul 28, 2022, at 3:27 AM, SMS Political Influencers <smspoliticalinfluencers@gmail.com> wrote:

28-July-2022

Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

Your manuscript has now been reviewed, and the comments of the reviewers are included at the bottom of this letter.

We invite you to respond to the reviewers' comments and revise your manuscript.

As you surely noticed, our publication timeline has been delayed. We are grateful that we successfully recruited excellent expert reviewers, but this process took longer than originally anticipated.

We thank you for your patience and understanding and assure you that we are doing everything

within our power to facilitate timely publication of the special issue.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by **September 8.** If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS [journals.sagepub.com].

As discussed in previous correspondence, and as a matter of exception, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract. As Reviewer 2 pointed out, perhaps some information on the cases could be moved into supplemental material.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

Reviewers' Comments to Author(s):

REVIEWER 1
This paper provides a timely and important analysis of voter fraud conspiracy theories on social media during the 2020 US Presidential elections. The detailed analysis of the interplay between small-scale and large-scale influencers in spreading disinformation has potential to provide a valuable contribution to the field. I do, however, think the manuscript have some weaknesses that need to be addressed:

(1) Clarifying the methodology

• I encourage the authors to clarify the methodological approach further. In terms of sampling, the authors write the selected cases are "representative of the kinds of narratives that spread." It is unclear to me what representability means in this regard. I encourage the authors to clarify this,

• The authors write that "We center our analysis on Twitter, but follow traces in that data over to other platforms." In practice, however, only one of the case studies (#MaidenGate) includes other platforms than Twitter (and not in a comprehensive way). I think the authors should reflect on the limitations of their study in terms of empirical breadth, especially considering how Twitter is only a marginal platform in the US (as compared to e.g Facebook or Instagram).

• The authors write that they draw on several methodological approaches, including grounded theory, trace ethnography, statistical analysis, network analysis, and content analysis. I think the relationship between these approaches and how they were used in practice needs to be made clearer. I also encourage the authors to clarify what they mean by content analysis, as I associate this with quantitative research, but the authors seem to associate it with qualitative research.

(2) Analytical contribution

The authors write their paper 'up against' Benkler et al. (2020).

Unfortunately, however, I think the authors end up making similar simplifications as Benkler et al. (2020) and could, instead, make a stronger contribution by emphasizing the hybrid nature of

contemporary disinformation campaigns.

Benkler et al. (2020) write that disinformation fall under the models of 'Social Media dominates,' 'mass media leads,' and 'social media leads.' They then argue that the 2020 voter fraud conspiracy theory falls under 'mass media leads.' The authors of the article under review criticize Benkler et al.'s conclusion and argue that their work shows the importance of 'bottom-up' spreading as well as top-down spreading (a conclusion I agree with). However, the authors go one step further and also states that the aim of their work is to find out whether "the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites)," concluding that "contrary to a prevailing view of such campaigns as coordinated, "top-down" efforts, we highlight "bottom- up" dynamics that are more akin to cultivation and improvisation."

Here, I think the authors run into the same problem as Benkler et al. (2020), namely that they turn their research aim into a question or 'either/or' rather than 'both/and.' As a reader, I think the strength of the article under review is that it shows how contemporary disinformation fundamentally revolves around the interplay between bottom-up and top-down spreading as well as between social media and traditional media. As such, I encourage the authors to revise the manuscript to underline this contribution, rather than the current either/or arguments. In the end, I think this paper does not 'disprove' the conclusion that disinformation around voter fraud in 2020 was primarily spread by political elites through traditional media (as Benkler et al. argue). Rather, the paper shows that it is too simplistic for Benkler et al. (2020) to conclude that disinformation can be divided into 'mass media leads' versus 'social media leads.'

One suggestion would be to use Andrew Chadwick's book on The Hybrid Media System, in which he argues that political communication today always revolves around the interplay of digital and traditional media as well as bottom-up and top-down processes.

Minor comments:

• The authors write that "regular users" encompass users with 1000-5000 followers. I think this is misleading, since the average number of followers for users on Twitter – to my knowledge – is less than 1000. Accordingly, I think the authors should change this.

• The authors write: "In contrast with research on disinformation during the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election."

While I agree with the authors that most research has focused on the Russian Internet Research Agency, I think the authors need to mention that, for example, Benkler et al. (2018) concluded in their book: "Whatever efforts anyone else made on Facebook, Twitter, or the open web were largely secondary to the efforts of the most important source of news for nearly half of Trump's voters [Fox News]" (p. 187).

• The authors write: "Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-retweeted tweets, were posted by now-suspended accounts. "

Does the author know have any indication of why this is the case?

• The authors write: "political influencer, whose liminal identity — neither elite nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds — frustrates researchers' attempts to place them within traditional models of information flow and the role of media."

To this my question would be: does this really frustrate researchers? In my view – which also seems to be the view of the authors – the notion of 'influencers' maps quite neatly onto the category of "opinion leader" from the two-step flow of communication model? Accordingly, I encourage the authors to consider rephrasing/clarifying this.

REVIEWER 2

This study offers a fairly deep analysis of three manifestations of "stop the steal" disinformation before and during the 2020 US Presidential Election. It is presented as a perspective alongside other recent studies of that disinformation campaigns, especially Benkler and colleagues' report,

which emphasized the top-down nature of the campaign.

I think this study's emphasis on the participatory nature of this disinformation—and ESPECIALLY its nuanced articulation of the interactions between the elites and the crowd-sourcers (which in fact are articulated into several gradations of influencer-ness)—is quite valuable.

As an academic article, I am unsure whether the journal will allow the authors to maintain the length required to present the cases in this much detail; if necessary, I do think they can be trimmed, and in any case that it would be useful to have a bit more information in supplemental materials. But in any case, I would recommend the authors spend a little more time developing their ideas about elite-mass interactions in disinformation—those I think are helpful conceptual developments to an emerging research area (the authors mention Starbird's piece on this; Zuckerman's recent work on QAnon also fits. Below I also mention The Ambivalent Internet, which could provide further conceptual grounding).

I do have a few comments on the method. There are some spots where a bit more detail would be warranted. The authors have a generally easy-going, descriptive style, which is welcome, but academic readers will want to know about a few more details. In particular, on p. 5, it would be appropriate to have a somewhat more comprehensive description of the sampling scheme. In particular, the keywords used to construct the sample should be presented—in supplementary materials if necessary. This would be helpful for readers to assess the work and for replicability, and for understanding when we get to the analyses. For example, Figure 5 is labeled as representing tweets of the Sonoma Ballots story. But exactly what set of tweets is that? The reader doesn't know without the keywords. That will allow them to assess what might be left out, and what is represented in the graph.

Also, the streaming API used by the authors is supposed to return 100% of tweets that match the keywords? Though somewhat subject to rate limits as described in the next paragraph?

And a small detail also from p. 5: "all engagement and followers metrics for Twitter are reported as they were at the time of their posting": I know this is challenging with this kind of data, but the engagement counts can't be from the moment of posting (of the original post), because they would all be 0 at that point… so can the authors say more precisely what the timespan of the engagement measure is? Are these measures of engagement with the original post that are accessed from retweets of it?

And some wider notes about the method:

The authors might (briefly) reflect a bit more on these particular cases, why they were chosen, and what they tell us about the "general" phenomenon of disinformation. For one thing, of course we have sampled here on instances of "successful" spread of misinformation. We don't have records of the many that got 10 retweets and were forgotten.

On p. 4, the authors claim these cases are "representative"… representative in what sense? This implies that the authors have access to a wide view (or a catalog) of the sorts of disinformation narratives that were circulating… if they do, it would be great to have a little more detail about why these cases were selected, and which of their features stood out for representativeness. And a study like this probably also deserves a brief caveat that they are only 3 cases in a busy election full of disinformation… concluding that with research questions that point to new directions would also be welcome.

Theory/conceptual contributions

As I mentioned above, the authors' observations and discussion about the exchange between elites and other actors in creating the context for disinformation is very welcome and, I think, a real data-driven conceptual contribution. With that, we see how Trump and allies set the stage for looking for voter fraud; "crowdsources" find it in myriad variations, it builds back up (in some cases) to the elites, who sometimes further amplify it. There are a couple of spots where I would like to push the authors' thinking:

On p. 23: "tried to help move content up the chain": this is an interesting way to put it, and raises the important question of what motivated the various actors in these scenarios. The question is not answerable with the authors' data (or really any data—it would be really hard to get honest answers to this). But I do think it is worth asking. The analysis of @L certainly suggests that many of these

users are primarily motivated by the possibility of attracting attention to THEMSELVES (at least as much as promoting a specific piece of information per se). Works like The Ambivalent Internet should caution us against assuming there is a rational or even strategic motivation behind these actions: much of it may be play, or 'let's see what happens if we do this' or simply an effort to annoy liberals and/or the press.

Similarly, at one point the authors assert that they saw different patterns of behavior at the different levels of influencer, but that is not greatly developed. Could they expand on that? (I do think there is a risk of over-determining our understanding of what accounts at different levels of following do—I am not sure I would use Figure 1 without good reason and grounding.) And do the authors think that accounts at these different levels have different motivations? Or is that not something that varies systematically with following numbers?

On the use of the analogy of improvisation: I think the authors do a nice job of describing how the participants in this disinformation campaign learn a 'tune' (the meta-narrative of election fraud) and then successfully develop variations on the tune (specific disinformation examples). But I am wondering if improvisation is the best term here. Jazz improvisation is bound by rules, yes, but the performer is also creating something new—something only made of what has already been played, the chord progression, etc. In the examples the authors have presented, there are REAL artifacts that the disinformation narratives are drawn from—they are not made up—as the authors do a wonderful job of showing. I wonder if the theme of interpretation might be more applicable here. From this perspective, Trump and other elites have clearly provided the framework within which to understand a variety of phenomena (a photo of ballots in dumpsters, someone's observations about pens bleeding through ballots). This is a form of instruction in how to read election events—parallel perhaps to how Jamieson & Cappella describe talk radio hosts' effect of training listeners how to interpret the news (in Echo Chamber). (Talia Stroud has picked up on the related idea of "inoculation" more recently.) In this way, the performance is less an improvisation of something brand new than the process of (and maybe pleasure of!) applying a known frame to a new phenomenon—which is classic of conspiracy theorizing, of course.

Finally, it is getting somewhat old, but the emerging understanding of disinformation and conspiracy theories as crowd-sourced as such mirror-image echoes (to mix metaphors) of the left-leaning celebration of internet technologies 10-15 years ago. I think of Surowiecki's Wisdom of Crowds, Shirky's Here Comes Everybody, and even Benkler's Wealth of Networks, as well as proponents of digital citizen journalism—and Bellingcat today, for that matter. I do think it is worth mentioning, if only for historical continuity, that many of the processes described in the emerging paradigm on disinformation (including this study) look a lot like what those authors thought the Internet would provide—the CONTENT they imagined citizens focusing on was just a bit different!

Two final smaller comments:

A somewhat aesthetic comment about Figure 5, though one with possible interpretive implications: One element of the figure that could be clearer: as I understand it, the black color is not depicting an AREA (as pink and red are) but a LINE, which represents the total tweets about this topic per minute. So are we to conclude that when there is white space between the red and the black, there are people tweeting about the topic WITHOUT referencing either Elijah Schaffer or the Gateway Pundit, and when there is no white space all the tweets about the topic are related to one of those two sources? Maybe the white space should just have a diff color so we can clearly see where there are any other tweets and when there aren't—rather than have those just be the absence of a labeled color.

p. 17: could the authors add a little more context about the Peoples_Pundit tweet? What are they saying is "not believable nor possible"?

REVIEWER 3

Thank you for the opportunity to review the manuscript, influence and improvisation: participatory disinformation during the 2020 US Election. Through a mixed-method, case study approach, the author(s) describe the participatory nature of disinformation campaigns that took place during the 2020 US Presidential Election. The Twitter (and cross platform) data collected by the author(s) is very rich, and overall I found the paper very enjoyable to read. I also think it does a great job at building on the disinformation literature by focusing on the bottom-up, rather than top-down dynamics that are often discussed in theory. I also appreciated the authors connection to improvisation and thought that this framing was very novel but useful for thinking about the

dynamics of 2020 disinformation. I have made a couple of suggestions for the authors, but overall, I think this manuscript is in great shape – congratulations!

Theory – The authors could add a few more citations in their literature review on disinformation, for example, nodding to more of the work on top-down disinformation from foreign agents (Lukito's work on IRA campaigns), identity and its impact on certain users (Deen Freelon's work on Black Trolls Matter and Samantha Bradshaw's work on Gender and Foreign Influence), as well as their impact on elections and democratic legitimacy (Bennet and Livingston on the disinformation order, for example). I believe Gregory Asmolov also wrote a piece on participatory propaganda that might be useful/helpful to include:

https://jods.mitpress.mit.edu/pub/jyzg7j6x/release/2 [jods.mitpress.mit.edu]

Conclusion – The author(s) provide a good, short summary of their work. However, I think they could expand on the "so what" a bit more in the conclusion. Now that we understand the dynamics of disinfo as being a mix of top-down and bottom-up/participatory, what does this mean for policy and enforcement? What can/should platforms and the media do?

Small questions/points –

Page 7 – "Our data revel that, likely mobilized by the "Army for Trump" messaging and the repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters went to the polls (and went online) actively searching for evidence to support the election fraud narrative." Without qualitative insights, or looking at geodata and polling data, can the data really show us that this increased the number of Trump supporters that went out to vote?

Page 11 – "After an official correction by Sonomy County and enforcement action by Twitter, engagement with the rumor faded dramatically." Do you think this translates into an important policy recommendation around the timing of debunks/corrections as well as enforcement action by the platforms? This could be expanded upon in the discussion or conclusion. Or maybe it doesn't matter if Mega influencers pick up the narrative like with what happened in SharpieGate?

Page 16 – "These corrective tweets were not highly retweeted (relative to the earlier tweets pushing the misleading claims), but instead accompanied a steady decrease in engagement around the narrative". Do you think this was because the fact checks caused people to stop sharing? Or was it because at this point, Twitter started to demote content discussing sharpiegate?

Page 22 – "Researchers have studied improvision in a wide range of contexts, for example, among jazz performers (cite)" Citation missing

This message is from an external sender. Learn more about why this matters. [ut.service-now.com]

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Martin Johannes Riedl, Ph.D.
Postdoctoral Fellow | Center for Media Engagement
Research Associate | Technology and Information Policy Institute
The University of Texas at Austin
Pronouns: he, him, his

Recent research:
Audio misinformation on WhatsApp [misinforeview.hks.harvard.edu]
Chat apps and cascade logic [doi.org]
Platformed antisemitism on Twitter [doi.org]

To: Matthew Masterson[mmasterson@microsoft.com]
Cc: mica42[mica42@uw.edu]; Julia Carter Scanlan[jccarter@uw.edu]; Sue Glueck (CELA)[Sue.Glueck@microsoft.com]; Maeve Whelan-Wuest (Harvey Nash)[v-maevew@microsoft.com]; Michael Grass[megrass@uw.edu]
From: Kate Starbird
Sent: Wed 10/12/2022 5:10:31 PM
Subject: Re: Briefing on EIP and UW Election Work
Received: Wed 10/12/2022 5:10:36 PM

We're on for tomorrow! I don't have substantial capacity to build a new slide deck around that framework, but I'm happy to present the EIP and then present the framework (and open up conversation for discussion).
Kate

On Oct 12, 2022, at 9:45 AM, Matthew Masterson <mmasterson@microsoft.com> wrote:

UW Team,

Just checking in to make sure you are good to go for the community meeting tomorrow? Happy to answer any questions.

Matt

Get Outlook for iOS [aka.ms]

From: Matthew Masterson
Sent: Monday, October 10, 2022 11:29:30 AM
To: Julia Scanlan <jccarter@uw.edu>; Kate Starbird <kstarbi@uw.edu>; mica42 <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>; Michael Grass <megrass@uw.edu>
Subject: RE: Briefing on EIP and UW Election Work

All,

Thank you again for agreeing to participate in the Microsoft Information Integrity Meeting this week. Here is some background information for you regarding the meeting as well as what we are hoping you all can discuss:

- The community is comprised of employees from across Microsoft who work either directly or indirectly on issues of information integrity. There will be approx. 50-100 participants.
- Previous meetings have featured speakers from Miburo, NewsGuard, and other trusted third parties.
- It would be great if Kate and team come prepared to discuss the work of UW/EIP and partnership with Microsoft. Specifically, it would be awesome if the team can discuss the recently released threat framework for virality. Our teams would greatly benefit from a discussion of that analysis.
- You all will have approx. 30 min to talk and then field questions. I will introduce the team at the beginning of that call.

Thank you again for agreeing to participate. It is truly appreciated.

Matt

Matt Masterson
Director of Information Integrity
Democracy Forward Team (CELA)
mmasterson@microsoft.com

From: Julia Scanlan <jccarter@uw.edu>
Sent: Tuesday, October 4, 2022 7:19 PM

To: Matthew Masterson <mmasterson@microsoft.com>; Kate Starbird <kstarbi@uw.edu>; mica42 <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>; Michael Grass <megrass@uw.edu>
Subject: [EXTERNAL] RE: Briefing on EIP and UW Election Work

Hi Matt! Thanks for your patience as we coordinated on our end. As Kate said, it's been a crazy week!

Kate is free at 9:00am on the morning of October 13 (next week). Would that work for your team? If not, we can potentially look at dates later in October, which are filling up fast.

Would this be virtual or in-person?

Thank you so much for reaching out. We're excited to get this on the books!

Julia

From: Matthew Masterson <mmasterson@microsoft.com>
Sent: Friday, September 30, 2022 10:51 AM
To: Kate Starbird <kstarbi@uw.edu>; Julia Scanlan <jccarter@uw.edu>; Mike Caulfield <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>
Subject: Re: Briefing on EIP and UW Election Work

Re-upping this email. Totally understand if you all don't have the bandwidth to support but wanted to try. Thanks!

Matt

Get Outlook for iOS [aka.ms] [nam06.safelinks.protection.outlook.com]

From: Matthew Masterson
Sent: Tuesday, September 27, 2022 12:00:11 PM
To: kstarbi <kstarbi@uw.edu>; Julia Carter <jccarter@uw.edu>; Mike Caulfield: <mica42@uw.edu> <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>
Subject: Briefing on EIP and UW Election Work

Kate,

Reaching out to see if you and the team are willing and able to do a briefing to our Microsoft Information Integrity community regarding the work of EIP, the recently released threat framework and possible narratives heading into the 2022 mid-terms. For background the community is made up of Microsoft employees that work on issues of information integrity. This includes members of product teams, lawyers supporting teams, Clint Watts and team, etc. We try to bring in our trusted external partners to discuss the work they are doing in order to deepen the community's understanding of the current trends and challenges in the space.

As far as timing we can work around your schedule. Our preference is to hold these meetings around 9:00am PT and we would like to have the meeting prior to the election. If you are able and interested to support just send over some possible dates and times and we'll get it scheduled. Also, if you want to add Stanford SIO to the briefers that is wonderful as well. Up to you.

Thank you in advance for your time.

Matt

Matt Masterson
Director of Information Integrity
Democracy Forward Team (CELA)
mmasterson@microsoft.com

Appendix A. Data and Methods

A.1 Research Context: Election Integrity Partnership

The case studies selected for this analysis, and the data used to analyze them, were curated as part of "rapid response" research that took place during the 2020 U.S. election (including the months leading up to and immediately following). Throughout Autumn 2020, the authors of this paper participated in the Election Integrity Partnership (EIP), a collaborative effort to identify, document, and respond to misleading claims about election processes and procedures (CIP, 2021). That effort surfaced hundreds of claims, which were later grouped into 456 distinct "stories" or information cascades where a specific claim or set of closely related claims spread. Of those, 307 stories were later classified by researchers as containing misleading claims and "sowing doubt" in election processes and procedures. During our real-time work, researchers documented and archived content from diverse social media platforms related to each story. Retrospectively, we curated datasets of social media posts related to each story. The EIP collaboration and its initial findings are described in CIP et al., 2021. The methods we used to identify and deduplicate claims, group claims into cohesive stories, and curate comprehensive, low noise datasets of tweets (from our larger tweet collection) related to each of the 456 stories are documented in detail in Kennedy et al., 2022.

A.2 Selection of Case Studies

The case studies presented here are drawn from the ElectionMisinfo2020 dataset (Kennedy et al., 2022). Through our real-time work with the EIP, the authors of this paper became familiar with the numerous false claims, misleading narratives, and harmful conspiracy theories that spread during and around the 2020 election. We selected the three case studies here based on several factors. First, we selected case studies from three distinct periods of the election cycle: (1) the pre-election period, when the primary focus was on mail-in ballots; (2) on and immediately after election day as people attempted to make sense of (and exploit) a highly uncertain information environment; and (3) after the election, when conspiracy theorists and political opportunists attempted to contest election results. Second, we selected cases that were both relatively large (indicative of at least some participation by large-following accounts) and of substantially different magnitudes. Case 1: Sonoma Ballots has ~45K tweets, Case 2: SharpieGate has ~620K tweets, and Case 3: MaidenGate has ~140K tweets. Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were occurring. Though every "story" in our dataset is distinct, the three studies here cover three distinct periods of the 2020 election cycle and accompanying disinformation campaign and include many of the dynamics that we find in other misleading stories without our larger dataset.

A.3 Curating Tweet Datasets for Each Case Study

For each case study, we curated a comprehensive, low-noise subset of related tweets from our larger voting- and election-related Twitter dataset. Our curation process, documented at length in Kennedy et al. (2022), involved developing, through an iterative and time-intensive process, a keyword-based (with boolean operators) and time-delimited search string that attempted to minimize noise (unrelated tweets) and maximize coverage (of related tweets). We include the Postgres search string for each case below.

Case 1: Sonoma Ballots: (created_at > '09-25-20 07:30:00' AND created_at < '09-27-20 00:00:00') AND (tweet iLIKE '%ballots%' OR tweet iLIKE '%mail-in%' OR tweet iLIKE '%vote-by-mail%') AND (tweet iLIKE '%dumpster%' OR tweet iLIKE '%sonoma%' OR tweet iLIKE '%petaluma%' OR tweet iLIKE '%trash%' OR tweet iLIKE '%recycle%') AND (tweet NOT iLIKE '%penn%' AND tweet NOT iLIKE '%military%' AND tweet NOT iLIKE '%florida%' AND tweet NOT iLIKE '%river%' AND tweet NOT iLIKE '%wisconsin%' AND tweet NOT iLIKE '%touchscreens%' AND tweet NOT iLIKE '%nine%' AND tweet NOT iLIKE '%doj%' AND tweet NOT iLIKE '%justice%' AND tweet NOT iLIKE '%todd%' AND tweet NOT iLIKE '%office%' AND tweet NOT iLIKE '%chumley%')

Case 2: SharpieGate: (created_at > '11-03-20 08:00:00' AND created_at < '11-10-20 00:00:00') AND (tweet iLIKE '%ballot%' OR tweet iLIKE '%vote%' OR tweet iLIKE '%sharpiegate%' OR tweet iLIKE '%maricopa%' OR tweet iLIKE '%arizona%') AND (tweet iLIKE '%sharpie%') AND (tweet NOT iLIKE '%here in pa%')

Case 3: MaidenGate: (created_at > '11-08-20 00:00:00' AND created_at < '11-13-20 00:00:00') AND ((tweet iLIKE '%maiden%') OR (tweet iLIKE '% old name%') OR (tweet iLIKE '%name change%') OR (tweet iLIKE '%legal name%') OR (tweet iLIKE '%somebitchiknow%' AND created_at > '11-10-20 03:30:00')) AND ((tweet NOT iLIKE '%marsden%') AND (tweet NOT iLIKE '%handmaiden%'))

In each case, we include several NOT statements to eliminate specific noise, often terms that brought in similar content from other misleading claims. Please note that it is possible (and indeed likely) that we missed some related tweets for each story. However, due to our deep familiarity with each case and iterative curation process, we are confident that we captured most of the significant elements of each story.

A.4 Twitter Data Limitations

The Twitter data for our case studies was curated from a larger collection that captured data in real-time, using Twitter's Streaming API. To collect voting and voter fraud-related data during the 2020 election, our research team (at the University of Washington's Center for an Informed Public) employed several collectors, one for each team member. For each collector, using a search string that can contain up to 400 keyword terms, the Streaming API returns all (or the vast majority of) public tweets up until a specific threshold of 50 tweets per second (TPS). The search strings we used on each collector ranged from one high-frequency term (e.g. "vote") to more than fifty less-common terms. We attempted to balance search terms across collectors, often moving terms from one to another, to reduce the impact of rate limits. However, during high volume events (such as election day), collections even for a single term (like "vote" or "ballot") can exceed 50 TPS, and we did experience data loss, especially on November 3 and 4.

Using comparisons of retweet counts (comparing the number of retweets we captured to the retweet counts embedded in meta-data) we estimate that for Sonoma Ballots and MaidenGate we likely have 90% or more of all tweets with our selected keywords; for SharpieGate, which spread on Election Day and the three subsequent days, we estimate that we captured ~70% of related tweets. Importantly, for highly retweeted tweets (which we primarily focus on here) we can recreate the original tweet from metadata in retweets, so we can still understand how much and how fast the most visible content spread. However, for SharpieGate, though we capture most of the amplification, we do lose some insight into exactly who retweeted each tweet as it

spread — and the overall counts that we provide for retweets and quotes are likely undercounts.

A.5 Data Collections on Facebook and Parler

The data descriptions in this paper focus on Twitter data, both due to the central role of that platform in the featured case studies and the availability of systematic data from that platform. In some cases, for example the prominent Facebook video that appeared on Twitter in the SharpieGate case and the Google document in the MaidenGate case, we follow content that appeared on Twitter over to other platforms, to demonstrate the cross-platform nature of the activities. However, in addition to tracing content from Twitter over to other platforms, our research team also had access to public data from both Facebook and Parler, which we analyzed in concert with the Twitter data during our research. We excluded much of this analysis from our main paper, because we did not have room to follow three case studies across three platforms. However, the data from these other platforms did inform how we presented each case — including how we highlighted specific content and activities on those platforms when it was important for understanding how that story or information incident took shape. Here, we describe the data we collected from Facebook and Parler, our analyses of those data, and how those analyses featured into the results presented in the main paper.

A.5.1 Real-time Data Collection

During the active deployment of the EIP (August to December, 2020), researchers routinely identified, screen-shotted, and archived content related to misleading stories as they emerged. This real-time curation research was cross-platform and included investigations of Facebook, Instagram, TikTok, Reddit, 4chan, and other relevant platforms. For example, the prominent video — originally posted on Facebook — described in the SharpieGate case was identified and archived by our team on November 4, 2020. For the research in this paper, we revisited these contemporaneously curated data, which provided insight into the most salient content, across a range of social media platforms, at the time of these unfolding events.

A.5.1 Retrospective Facebook Data Collection and Analysis

In addition to our contemporaneous data collection of salient Facebook posts, we retrospectively collected and analyzed public Facebook data via the CrowdTangle web application. CrowdTangle allows researchers to view posts and interactions on public pages and public groups through back-in-time searches, which can be downloaded as csv files. Our Facebook data were therefore limited to the content in public areas of Facebook which had not been removed prior to April 2021 (when we ran our searches).

For each case study, we created and executed a search query for Crowdtangle adapted from the query we used for Twitter. Due to slight variations in noise across the two platforms, some terms were added or edited for consistency — for example, to avoid posts about an unrelated incident with found ballots in Pennsylvania, and due to the lack of regex search functionality on CrowdTangle, a search was revised from omitting words with the substring ‘penn’ to omitting variations of ‘Pennsylvania’ and ‘PA’ on CrowdTangle.

We downloaded a total of 2186 Facebook posts from CrowdTangle for Sharpiegate, and a total of 165 Facebook posts for the Sonoma case study. We did not find significant content on

Facebook related to the MaidenGate case. For Sonoma Ballots and SharpieGate, we reviewed the top 100 posts by time and the top 100 posts by engagement to understand whether the post was indeed relevant to the case study, and then annotated relevant posts by the stance of the post (i.e. whether it corrected, spread, or was neutral to claims that sowed doubt in the election). We also differentiated between posts that sowed doubt and posts that explicitly claimed fraud. Finally, we identified and reviewed prominent pieces of content to understand the context of the claims on Facebook and compare those with what was salient on Twitter around the same time.

A.5.2 Retrospective Parler Data and Analysis

For each case study, we also collected data after-the-fact from Parler, an alternative social media platform that was popular among pro-Trump audiences in 2020. Parler has had a number of different access methods over time, of varying reliability. We used the Social Media Analysis Toolkit (SMAT) API. The SMAT API did not allow for boolean queries to mirror the exact queries we used for Twitter. Instead, for each case study, we made individual calls to the SMAT API to gather all content related to the main keywords (in the Twitter query) during the given time window (e.g: 'ballot', 'mail-in', and 'dumpster' were each collected individually), and then used Python to intersect the individual datasets according to the logic from the original boolean query.

The SMAT repository of Parler content includes several collections of content from disparate crawling methods as access to the platform changed over time, which resulted in a far less comprehensive view of the activity there (e.g. than our data from Twitter). However, it did allow us to get a relative sense of how prominent claims from the three different case studies were on Parler. It also allowed us to track down and follow specific pieces of Parler content that we saw on other platforms. In some cases, the team was then able to find the original posts in the Parler SMAT dataset, and thus could investigate how the context (including amount of interaction, commentary from users, etc.) around that content differed across the platforms.

Overall, the amount of content about each case study to be found on Parler through the SMAT API was far smaller than on CrowdTangle or Twitter. Parler was most relevant in the spread of the MaidenGate conspiracy theory, where the main catalyst of that theory (L) was an active contributor. We were able to find 6908 Parler posts about MaidenGate, 1374 posts about SharpieGate, and 75 posts related to Sonoma Ballots. We used these data to augment our understanding of how each of these cases took shape on social media. This included comparing timelines to get a sense of where content appeared first and tracking the actions of specific actors who appeared on both platforms (like L).

A.6 Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified and have less than 100K followers. We make exceptions, however, for public figures, including journalists and elected officials. Given that this work is situated on the intersection between social media influencers and politically-driven disinformation campaigns, we feel it is important to highlight the roles played by specific high-visibility accounts and pages in media and politics.

Appendix B. Tweet Statistics for Case Studies

Here we provide some basic Twitter statistics — i.e. number of accounts who tweeted, the percentage of those accounts that verified, the percentage of those accounts that have since been suspended, the total number of tweets they shared related to the story, the number of original (non-retweets) they posted, they number of retweets those original tweets received, and the ratio of retweets per originals — for each of the case studies across influencer level.

B.1 Sonoma Ballots: Tweet Stats by Influencer Level

Account Size	**Accounts**	**% Verified**	**% Suspended**	**Total Tweets**	**Originals** (Non-RTs)	**RTs of accounts**	**RTs per Original**
Total	36152	0.4%	28.9%	45819	7069	38750	5.48
Low Follower (0-1000 followers)	20416	0.03%	21.4%	24008	4048	1690	0.417
Established (1K-5K followers)	10672	0.2%	35.6%	14078	1911	2562	1.341
Nano (5K-25K followers)	4207	1.2%	43.0%	6180	916	5211	5.689
Micro (25K-100K followers)	793	4.9%	56.9%	1429	168	7007	41.71
Meso (100K-500K followers)	74	28.4%	40.5%	128	24	19692	820.5
Macro (500K-1M followers)	2	100%	0%	2	1	2256	2256
Mega (1M+ followers)	4	100%	0%	4	1	333	333

Table B1. Distribution of participating accounts in the Sonoma Ballots story across audience size, with # of tweets, # of originals, # of RTs received per original, % of verified accounts, and % of suspended accounts for each group.

B.2 SharpieGate: Tweet Stats by Influencer Level

Account Size	**Accounts**	**% Verified**	**% Suspended**	**Total Tweets**	**Originals** (Non-RTs)	**RTs of accounts**	**RTs per Original**
Total	270742	0.73%	20.2%	622419	126376	496043	3.93

Low Follower (0-1000 followers)	190822	0.03%	16.4%	372574	83580	85649	1.02
Established (1K-5K followers)	59076	0.74%	28.4%	175931	30539	54390	1.78
Nano (5K-25K followers)	17555	3.8%	32.9%	62519	9817	88545	9.02
Micro (25K-100K followers)	2817	14.9%	34.6%	9883	1868	78317	41.9
Meso (100K-500K followers)	544	54%	15.8%	1384	453	88370	195.08
Macro (500K-1M followers)	62	90%	0%	133	66	53364	808.545
Mega (1M+ followers)	64	97%	0%	110	70	47420	677.43

Table B2. Distribution of participating accounts in the #SharpieGate story across audience size, with # of tweets, # of originals, # of RTs received per original, % of verified accounts, and % of suspended accounts for each group.

B.3 MaidenGate: Tweet Stats by Influencer Level

Account Size	**Accounts**	**% Verified**	**% Suspended**	**Total Tweets**	**Originals** (Non-RTs)	**RTs of accounts**	**RTs per Original**
Total	59258	0.26%	31.4%	141425	29445	111980	3.8
Low Follower (0-1000 followers)	37197	0.08%	25.5%	81214	19935	16832	0.84
Established (1K-5K followers)	15746	0.15%	39.2%	41317	6890	15349	2.23
Nano (5K-25K followers)	5433	0.81%	46.9%	16449	2209	15600	7.06
Micro (25K-100K followers)	796	6.0%	53.5%	2143	305	24558	80.5
Meso	96	27%	35.4%	290	98	29210	298

(100K-500K followers)							
Macro (500K-1M followers)	6	50%	16.7%	16	4	478	120
Mega (1M+ followers)	6	83%	0%	12	10	9963	996

Table B3. Distribution of participating accounts in the #MaidenGate story across audience size, with # of tweets, # of originals, # of RTs received per original, % of verified accounts, and % of suspended accounts for each group.

Appendix C. A Note on Suspensions

One of the most striking patterns in our Twitter data involved the number and distribution (across influencer level) of suspended accounts. When we conducted our final analysis (in Winter 2022), 29% of accounts that participated in Sonoma Ballots, 20% of accounts in SharpieGate, and 31% of accounts in MaidenGate had been suspended (see Figures B1-3). Some of these accounts were suspended during — and likely due to — their activity related to the case studies we featured, including the author of Tweet 2a in SharpieGate and @L who initiated MaidenGate. However, the majority seem to have been suspended in early January (2021) as part of Twitter's response to the violence on January 6. Quite interestingly, though suspensions affected users of all sizes (except mega influencers), the highest suspension rates were among nano- and micro-influencers.

Revision Document
We thank reviewers for their generous and insightful comments and recommendations!

The most significant changes in this revision involve our efforts to reduce length. This required removing some content (details that we determined were not vital for our main arguments) and moving other content into the supplementary materials/appendices. The revised paper is now under 9000 words. We explored the recommendation to move significant content from the case studies to be supplementary materials, but found that this limited our ability to communicate some of the most interesting elements of this work. So, while we did cut those down significantly, the qualitative analysis and presentation of findings still remain, primarily, in the main content of the paper.

Responding to reviewer requests, we made several adjustments that we feel greatly improved — as well as streamlined — the paper. Thank you! However and unfortunately, even after making significant reductions (~1500 words), we did not have space to make all of the changes recommended by reviewers, especially when those asked for substantial additional content.

Below, we detail our changes and provide responses to some of the recommendations that we were unable to address with additional content. Substantive additions are highlighted as blue text in the draft.

Review Summary / Comments	**Response**
Length: As discussed in previous correspondence, and as a matter of exception, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract. As Reviewer 2 pointed out, perhaps some information on the cases could be moved into supplemental material.	We made significant reductions to length. These include small edits to language throughout as well as some more significant edits. We slightly reduced the introduction by removing some redundant content. We edited down the Background and Related Work section, particularly the section on influencers. We shifted some details from our methods (including details about data limitations and anonymization) to Supplementary Materials (Appendix A). And we significantly edited down the case studies, removing details that (though interesting) were not central to the main arguments in the

	paper.
Methods: I encourage the authors to clarify the methodological approach further. In terms of sampling, the authors write the selected cases are "representative of the kinds of narratives that spread." It is unclear to me what representability means in this regard. I encourage the authors to clarify this. (R1) On p. 4, the authors claim these cases are "representative"… representative in what sense? This implies that the authors have access to a wide view (or a catalog) of the sorts of disinformation narratives that were circulating… if they do, it would be great to have a little more detail about why these cases were selected, and which of their features stood out for representativeness. And a study like this probably also deserves a brief caveat that they are only 3 cases in a busy election full of disinformation… concluding that with research questions that point to new directions would also be welcome. (R2) **Methods:** The authors might (briefly) reflect a bit more on these particular cases, why they were chosen, and what they tell us about the "general" phenomenon of disinformation. For one thing, of course we have sampled here on instances of "successful" spread of misinformation. We don't have records of the many that got 10 retweets and were forgotten. (R2)	We have added content to the main paper and to the appendix to provide these requested deails. Summarizing: During the 2020 election, the authors of this paper participated in a real-time project curating (and responding to) election misinformation. That project documented hundreds of incidents (Kennedy et al., 2022) – including very large and very small incidents as well as many in between. We chose these three events from that curated dataset (Kennedy et al. 2022) due to their relatively large size (in terms of participation and attention), the fact that they occurred during distinct stages (before, during, after) of the election, because they demonstrated different dynamics (that we saw in other cases), and due to our own familiarity with these cases (the authors of this paper had been "on call" and had tracked them in real-time). We now adjust the language to describe this more accurately (adding detail and removing the misleading "representative" term) and explain the criteria for selection in more detail in Appendix A.
Methods: The authors write that "We center our analysis on Twitter, but follow traces in that data over to other platforms." In practice, however, only one of the case studies (#MaidenGate) includes other platforms than Twitter (and not in a comprehensive way). I think the authors should reflect on the limitations of their study in terms of empirical breadth, especially considering how Twitter is only a marginal platform in the US (as compared to e.g Facebook or Instagram). (R1)	We agree that this is a limitation of this work. In addition to following links out from Twitter to other platforms, did analyze traces related to these case studies from other platforms (Parler and Facebook) in a comprehensive

	way — though not as systemically as Twitter data due to data limitations. Due to length issues with the paper, we reduced (prior to our original submission) the documentation of those analyses — though Facebook still shows up in the SharpieGate case and a bit in the Sonoma, Parler in MaidenGate. We now add some of these details (about how we collected and analyzed data from these other platforms) to the Methods section of the Appendix (A).
Methods: The authors write that they draw on several methodological approaches, including grounded theory, trace ethnography, statistical analysis, network analysis, and content analysis. I think the relationship between these approaches and how they were used in practice needs to be made clearer. I also encourage the authors to clarify what they mean by content analysis, as I associate this with quantitative research, but the authors seem to associate it with qualitative research. (R1)	We add context and citations for the methodological approach used here, citing its origins in crisis informatics (Palen and Anderson 2016) and highlighting a more detailed description in Starbird et al., (2019). We also have edited the language to clarify that we mean qualitative content analysis not quantitative content analysis. For brevity's sake, we changed both references from "content analysis" to "qualitative analysis".
Methods: There are some spots where a bit more detail would be warranted. The authors have a generally easy-going, descriptive style, which is welcome, but academic readers will want to know about a few more details. In particular, on p. 5, it would be appropriate to have a somewhat more comprehensive description of the sampling scheme. In particular, the keywords used to construct the sample should be presented—in supplementary materials if necessary. This would be helpful for readers to assess the work and for replicability, and for understanding when we get to the analyses. For example, Figure 5 is labeled as representing tweets of the Sonoma Ballots story. But exactly what set of	We have added the specific search strings and explanation of how we developed them (through an iterative process to maximize coverage and minimize noise) to Appendix A.

tweets is that? The reader doesn't know without the keywords. That will allow them to assess what might be left out, and what is represented in the graph. (R2)	
Methods: Also, the streaming API used by the authors is supposed to return 100% of tweets that match the keywords? Though somewhat subject to rate limits as described in the next paragraph?	We add details to explain our collections (multiple collectors with multiple search terms) and our understanding of their coverage (i.e. all or the vast majority of tweets with those terms up to 50 tweets per second).
Methods: And a small detail also from p. 5: "all engagement and followers metrics for Twitter are reported as they were at the time of their posting": I know this is challenging with this kind of data, but the engagement counts can't be from the moment of posting (of the original post), because they would all be 0 at that point… so can the authors say more precisely what the timespan of the engagement measure is? Are these measures of engagement with the original post that are accessed from retweets of it?	Sorry for the confusion here. We've updated the language to explain that the follower counts are from the time of posting the featured tweet. The engagements are measured by the number of retweets we captured in our collection. We opted not to use the retweet counts embedded in meta-data because they would have been impacted by suspensions along the way and would have fluctuated. We do explain how comparing our counts to the retweet metadata counts helped us to estimate our data loss (in Appendix A).
Analysis/Framing Contribution: R1's comments re: Benkler. The authors write their paper 'up against' Benkler et al. (2020). Unfortunately, however, I think the authors end up making similar simplifications as Benkler et al. (2020) and could, instead, make a stronger contribution by emphasizing the hybrid nature of contemporary disinformation campaigns. Benkler et al. (2020) write that disinformation fall under the models of 'Social Media dominates,' 'mass media leads,' and 'social media leads.' They then argue that the 2020 voter fraud conspiracy theory falls under 'mass media leads.' The authors of the article under review criticize Benkler et al.'s conclusion and argue that their work shows the importance of 'bottom-up' spreading as well as top-down spreading (a conclusion I agree with). However, the authors go one step further and also states that the aim of their work is to find out whether "the 2020 U.S. Election was primarily top-down (moving from elites to their	We agree with these comments. We aimed to (superficially) expand Benkler et al's view of the disinformation campaign beyond the mail-in portion and (more profoundly) to challenge the (in our view) overly simplistic "elite-driven" framing that Benkler puts forth. Our work indeed shows that BOTH top-down and bottom-up dynamics (and integrations of the two) are at work. Following these recommendations from the authors, in the revision, we adjust language in the abstract

audiences) or bottom-up (moving from audiences to elites)," concluding that "contrary to a prevailing view of such campaigns as coordinated, "top-down" efforts, we highlight "bottom- up" dynamics that are more akin to cultivation and improvisation." Here, I think the authors run into the same problem as Benkler et al. (2020), namely that they turn their research aim into a question or 'either/or' rather than 'both/and.' As a reader, I think the strength of the article under review is that it shows how contemporary disinformation fundamentally revolves around the interplay between bottom-up and top-down spreading as well as between social media and traditional media. As such, I encourage the authors to revise the manuscript to underline this contribution, rather than the current either/or arguments. In the end, I think this paper does not 'disprove' the conclusion that disinformation around voter fraud in 2020 was primarily spread by political elites through traditional media (as Benkler et al. argue). Rather, the paper shows that it is too simplistic for Benkler et al. (2020) to conclude that disinformation can be divided into 'mass media leads' versus 'social media leads.' One suggestion would be to use Andrew Chadwick's book on The Hybrid Media System, in which he argues that political communication today always revolves around the interplay of digital and traditional media as well as bottom-up and top-down processes. (R1)	and add language to the introduction and discussion to stress that our view shows both dynamics at play. We added a reference to Chadwick's work in the Discussion and attempted to drive home this point that disinformation isn't either/or (top-down vs bottom-up, mass media driven vs. social media driven) but integrated and hybrid.
Theory Building/Conceptualization: On p. 23: "tried to help move content up the chain": this is an interesting way to put it, and raises the important question of what motivated the various actors in these scenarios. The question is not answerable with the authors' data (or really any data—it would be really hard to get honest answers to this). But I do think it is worth asking. The analysis of @L certainly suggests that many of these users are primarily motivated by the possibility of attracting attention to THEMSELVES (at least as much as promoting a specific piece of information per se). Works like The Ambivalent Internet should caution us against assuming there is a rational or even strategic motivation behind these actions: much of it may be play, or 'let's see what happens if we do this' or simply an effort to annoy liberals and/or the press. (R2)	We agree with all the comments here. We borrow the "trading up the chain" language from previous research (Krafft and Donovan). We agree that motivations are an important but under-considered dimension to the behaviors we're examining — due to our methodological approach. Though we cannot make strong statements about the motivations that different individuals have for their participation, we do note both reputational gains and a sense of belonging (in the final sentence of the Discussion) as potential factors in motivating participation.

Theory Building/Conceptualization: Similarly, at one point the authors assert that they saw different patterns of behavior at the different levels of influencer, but that is not greatly developed. Could they expand on that? (I do think there is a risk of over-determining our understanding of what accounts at different levels of following do—I am not sure I would use Figure 1 without good reason and grounding.) And do the authors think that accounts at these different levels have different motivations? Or is that not something that varies systematically with following numbers? (R2)	This is one of the places that we would have loved to further develop — and indeed removed content from the initial draft along these lines, due to length restrictions. We do have a paragraph in the discussion with some general characterizations of the role differences across influencer level. We've now added tables in our Appendices that show some high level, statistical differences across influencer level (including around suspensions, which is fascinating) as well. Unfortunately, we are not able to expand much further on this, due to length restrictions.
Theory Building/Conceptualization: On the use of the analogy of improvisation: I think the authors do a nice job of describing how the participants in this disinformation campaign learn a 'tune' (the meta-narrative of election fraud) and then successfully develop variations on the tune (specific disinformation examples). But I am wondering if improvisation is the best term here. Jazz improvisation is bound by rules, yes, but the performer is also creating something new—something only made of what has already been played, the chord progression, etc. In the examples the authors have presented, there are REAL artifacts that the disinformation narratives are drawn from—they are not made up—as the authors do a wonderful job of showing. I wonder if the theme of interpretation might be more applicable here. From this perspective, Trump and other elites have clearly provided the framework within which to understand a variety of phenomena (a photo of ballots in dumpsters, someone's observations about pens bleeding through ballots). This is a form of instruction in how to read election events—parallel perhaps to how Jamieson & Cappella describe talk radio hosts' effect of training listeners how to interpret the news (in Echo Chamber). (Talia Stroud has picked up on the related idea of "inoculation" more recently.) In this way, the performance is less an improvisation of something brand new than the process of (and maybe pleasure of!) applying a known frame to a new phenomenon—which is classic of conspiracy theorizing, of course. (R2)	Thank you for these comments and your engagement with the ideas we're presenting here. Others have explored the lens of "networked framing" in other work (which is valuable) and we do it here to some extent — i.e. the elites set the frames, the audiences go out and interpret the world (and assemble content) to fit those frames. We brought in the improvisation lens (from previous research in the disaster response realm) with the hope that it will help us and other understand how these collaborations come together — attempting to get at how people come to participate in these efforts, how they coordinate their work, and how they adapt to slightly new informational conditions (real-world events) to create new (though familiar) performances each time. We didn't have space to do all of that work here, but are hoping this can

	be a starting place for future discussion!
Theory Building/Conceptualization: Finally, it is getting somewhat old, but the emerging understanding of disinformation and conspiracy theories as crowd-sourced as such mirror-image echoes (to mix metaphors) of the left-leaning celebration of internet technologies 10-15 years ago. I think of Surowiecki's Wisdom of Crowds, Shirky's Here Comes Everybody, and even Benkler's Wealth of Networks, as well as proponents of digital citizen journalism—and Bellingcat today, for that matter. I do think it is worth mentioning, if only for historical continuity, that many of the processes described in the emerging paradigm on disinformation (including this study) look a lot like what those authors thought the Internet would provide—the CONTENT they imagined citizens focusing on was just a bit different! (R2)	Indeed! The conspiracy theorizing and participatory disinformation we describe here looks a whole lot like "collective intelligence," "peer production," "crowdsourcing," and "digital activism" from the literature in the early 2000s. If we had room, we would add a paragraph to highlight the similarities in structure and misalignment in the values those scholars once thought these technologies would support. Sadly, we will have to leave that for other work. (We do make that argument in other work.)
Theory Building/Conceptualization: The authors could add a few more citations in their literature review on disinformation, for example, nodding to more of the work on top-down disinformation from foreign agents (Lukito's work on IRA campaigns), identity and its impact on certain users (Deen Freelon's work on Black Trolls Matter and Samantha Bradshaw's work on Gender and Foreign Influence), as well as their impact on elections and democratic legitimacy (Bennet and Livingston on the disinformation order, for example). I believe Gregory Asmolov also wrote a piece on participatory propaganda that might be useful/helpful to include: https://jods.mitpress.mit.edu/pub/jyzg7j6x/release/2 (R3)	We added a reference to Lukito's work to further support characterization of the research around the 2016 election, and a reference to Asmolov's work in our introduction to the "participatory" nature of propaganda.
Conclusion: The author(s) provide a good, short summary of their work. However, I think they could expand on the "so what" a bit more in the conclusion. Now that we understand the dynamics of disinfo as being a mix of top-down and bottom-up/participatory, what does this mean for policy and enforcement? What can/should platforms and the media do?	We added brief comments to the end of the Discussion section that address some of the policy implications of this work, pointing out that while the participatory nature of disinformation underscores the challenge (to platforms) of mitigation, our work also draws attention to the role of influencers and points to a potential pathway forward of addressing the problem at that level. Due to length restrictions, these comments

	are fairly short. We hope that this can be expanded upon in future work.
Terminology: The authors write that "regular users" encompass users with 1000-5000 followers. I think this is misleading, since the average number of followers for users on Twitter – to my knowledge – is less than 1000. Accordingly, I think the authors should change this. (R1)	We acknowledge that there is no established and agreed-upon schema that assigns terminologies by follower counts, particularly given variability across communities and platforms. In this paper we chose to adapt an existing framework **(Mediakix, 2021)** to current influencer dynamics on Twitter. In response to this feedback, we adjusted the name of the 1000-5000 follower accounts to "established users" — users who have gained some followers through any number of strategies but remain under the 5000-follower threshold.
Misc: The authors write: "Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most- retweeted tweets, were posted by now-suspended accounts. " Does the author know have any indication of why this is the case? (R1)	Unfortunately, due to length issues, we had to remove significant sections (from our original paper) of analysis examining how suspensions show up in our data and theorizing about why. Our sense is that most were removed immediately after the January 6 riots/insurrection attempt when Twitter suspended a large number of accounts. Twitter has not explained their criteria for those suspensions, but analysis by other researchers on our larger team reveal those accounts to be highly concentrated in a "follow-back" section of the pro-Trump Twitter network. We now include some statistics on suspensions and limited commentary about this in the Appendix.

MIsc: The authors write: "political influencer, whose liminal identity — neither elite nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds — frustrates researchers' attempts to place them within traditional models of information flow and the role of media." To this my question would be: does this really frustrate researchers? In my view – which also seems to be the view of the authors – the notion of 'influencers' maps quite neatly onto the category of "opinion leader" from the two-step flow of communication model? Accordingly, I encourage the authors to consider rephrasing/clarifying this. (R1)	We adjusted the language to remove the "frustrates" claim.
Misc: p. 17: could the authors add a little more context about the Peoples_Pundit tweet? What are they saying is "not believable nor possible"?	We removed this tweet and surrounding explanations as part of our effort to shorten the paper.
Misc: Page 7 – "Our data revel that, likely mobilized by the "Army for Trump" messaging and the repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters went to the polls (and went online) actively searching for evidence to support the election fraud narrative." Without qualitative insights, or looking at geodata and polling data, can the data really show us that this increased the number of Trump supporters that went out to vote?	I don't think we mean to argue that this changed the number of supporters that went out to vote. Our point is that many of those who went to the polls went there looking to help gather evidence of voter fraud. We've adjusted the language to clarify: Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.
Misc: Page 11 – "After an official correction by Sonomy County and enforcement action by Twitter, engagement with the rumor faded dramatically." Do you think this translates into an important policy recommendation around the timing of debunks/corrections as well as enforcement action by the platforms? This could be expanded upon in the discussion or conclusion. Or maybe it doesn't matter if Mega influencers pick up the narrative like with what happened in SharpieGate?	We agree that there are some interesting recommendations for debunking that could extend from these insights. Unfortunately, we do not have the space to do those justice. We have decided to leave that discussion for future work.
Misc: Page 16 – "These corrective tweets were not highly	Very likely the first. We know

retweeted (relative to the earlier tweets pushing the misleading claims), but instead accompanied a steady decrease in engagement around the narrative". Do you think this was because the fact checks caused people to stop sharing? Or was it because at this point, Twitter started to demote content discussing sharpiegate?	that to be a common pattern (Maddock et al., 2015), that corrections accompany the reduction of spread but aren't always amplified. We've added a note about that to the text. The second (that Twitter started to demote content) is possible as well. But we don't have great data on that.
Misc: Page 22 – "Researchers have studied improvision in a wide range of contexts, for example, among jazz performers (cite)" Citation missing	Added. Crossan, Mary M., Roderick E. White, Henry W. Lane, and Leo Klus. "The improvising organization: Where planning meets opportunity." *Organizational dynamics* 24, no. 4 (1996): 20-36.
Figure 5: A somewhat aesthetic comment about Figure 5, though one with possible interpretive implications: One element of the figure that could be clearer: as I understand it, the black color is not depicting an AREA (as pink and red are) but a LINE, which represents the total tweets about this topic per minute. So are we to conclude that when there is white space between the red and the black, there are people tweeting about the topic WITHOUT referencing either Elijah Schaffer or the Gateway Pundit, and when there is no white space all the tweets about the topic are related to one of those two sources? Maybe the white space should just have a diff color so we can clearly see where there are any other tweets and when there aren't—rather than have those just be the absence of a labeled color. (R2)	We updated the graph per your suggestion.

To: Matthew Masterson[mmasterson@microsoft.com]
Cc: mica42[mica42@uw.edu]; Julia Carter Scanlan[jccarter@uw.edu]; Sue Glueck (CELA)[Sue.Glueck@microsoft.com]; Maeve Whelan-Wuest (Harvey Nash)[v-maevew@microsoft.com]; Michael Grass[megrass@uw.edu]
From: Kate Starbird
Sent: Wed 10/12/2022 5:28:19 PM
Subject: Re: [EXTERNAL] Briefing on EIP and UW Election Work
Received: Wed 10/12/2022 5:28:22 PM

Thanks Matt! We're all hands on deck with our active monitoring… no time for slides!

Kate

On Oct 12, 2022, at 10:13 AM, Matthew Masterson <mmasterson@microsoft.com> wrote:

That sounds great. No need for a new deck. Just talking through is wonderful! Just appreciate your time.

Get Outlook for iOS [aka.ms]

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, October 12, 2022 1:10 PM
To: Matthew Masterson <mmasterson@microsoft.com>
Cc: mica42 <mica42@uw.edu>; Julia Carter <jccarter@uw.edu>; Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>; Michael Grass <megrass@uw.edu>
Subject: [EXTERNAL] Re: Briefing on EIP and UW Election Work

We're on for tomorrow! I don't have substantial capacity to build a new slide deck around that framework, but I'm happy to present the EIP and then present the framework (and open up conversation for discussion).
Kate

On Oct 12, 2022, at 9:45 AM, Matthew Masterson <mmasterson@microsoft.com> wrote:

UW Team,

Just checking in to make sure you are good to go for the community meeting tomorrow? Happy to answer any questions.

Matt

Get Outlook for iOS [aka.ms] [nam06.safelinks.protection.outlook.com]

From: Matthew Masterson
Sent: Monday, October 10, 2022 11:29:30 AM
To: Julia Scanlan <jccarter@uw.edu>; Kate Starbird <kstarbi@uw.edu>; mica42 <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>; Michael Grass <megrass@uw.edu>
Subject: RE: Briefing on EIP and UW Election Work

All,

Thank you again for agreeing to participate in the Microsoft Information Integrity Meeting this week.

Here is some background information for you regarding the meeting as well as what we are hoping you all can discuss:

- The community is comprised of employees from across Microsoft who work either directly or indirectly on issues of information integrity. There will be approx. 50-100 participants.
- Previous meetings have featured speakers from Miburo, NewsGuard, and other trusted third parties.
- It would be great if Kate and team come prepared to discuss the work of UW/EIP and partnership with Microsoft. Specifically, it would be awesome if the team can discuss the recently released threat framework for virality. Our teams would greatly benefit from a discussion of that analysis.
- You all will have approx. 30 min to talk and then field questions. I will introduce the team at the beginning of that call.

Thank you again for agreeing to participate. It is truly appreciated.

Matt

Matt Masterson
Director of Information Integrity
Democracy Forward Team (CELA)
mmasterson@microsoft.com

From: Julia Scanlan <jccarter@uw.edu>
Sent: Tuesday, October 4, 2022 7:19 PM
To: Matthew Masterson <mmasterson@microsoft.com>; Kate Starbird <kstarbi@uw.edu>; mica42 <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>; Michael Grass <megrass@uw.edu>
Subject: [EXTERNAL] RE: Briefing on EIP and UW Election Work

Hi Matt! Thanks for your patience as we coordinated on our end. As Kate said, it's been a crazy week!

Kate is free at 9:00am on the morning of October 13 (next week). Would that work for your team? If not, we can potentially look at dates later in October, which are filling up fast.

Would this be virtual or in-person?

Thank you so much for reaching out. We're excited to get this on the books!

Julia

From: Matthew Masterson <mmasterson@microsoft.com>
Sent: Friday, September 30, 2022 10:51 AM
To: Kate Starbird <kstarbi@uw.edu>; Julia Scanlan <jccarter@uw.edu>; Mike Caulfield <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>
Subject: Re: Briefing on EIP and UW Election Work

Re-upping this email. Totally understand if you all don't have the bandwidth to support but wanted to try. Thanks!

Matt

Get Outlook for iOS [aka.ms] [nam06.safelinks.protection.outlook.com] [nam06.safelinks.protection.outlook.com]

From: Matthew Masterson
Sent: Tuesday, September 27, 2022 12:00:11 PM
To: kstarbi <kstarbi@uw.edu>; Julia Carter <jccarter@uw.edu>; Mike Caulfield: <mica42@uw.edu> <mica42@uw.edu>
Cc: Sue Glueck (CELA) <Sue.Glueck@microsoft.com>; Maeve Whelan-Wuest (Harvey Nash) <v-maevew@microsoft.com>
Subject: Briefing on EIP and UW Election Work

Kate,

Reaching out to see if you and the team are willing and able to do a briefing to our Microsoft Information Integrity community regarding the work of EIP, the recently released threat framework and possible narratives heading into the 2022 mid-terms. For background the community is made up of Microsoft employees that work on issues of information integrity. This includes members of product teams, lawyers supporting teams, Clint Watts and team, etc. We try to bring in our trusted external partners to discuss the work they are doing in order to deepen the community's understanding of the current trends and challenges in the space.

As far as timing we can work around your schedule. Our preference is to hold these meetings around 9:00am PT and we would like to have the meeting prior to the election. If you are able and interested to support just send over some possible dates and times and we'll get it scheduled. Also, if you want to add Stanford SIO to the briefers that is wonderful as well. Up to you.

Thank you in advance for your time.

Matt

Matt Masterson
Director of Information Integrity
Democracy Forward Team (CELA)
mmasterson@microsoft.com

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Tue 9/27/2022 2:19:57 PM
Subject: Re: Your plans while at Stanford on Wed?
Received: Tue 9/27/2022 2:19:59 PM

Do we have a location for a midday Wed meeting?

Kate

On Sep 26, 2022, at 5:08 PM, Renee DiResta <rdiresta@stanford.edu> wrote:

Ok, cool - I will meet w/Kate & team at Stanford, and then we'll all convene for dinner. Dan sent a calendar hold for the latter...how many people from your teams are going to be around?

From: Graham Brookie <gbrookie@ATLANTICCOUNCIL.ORG>
Sent: Monday, September 26, 2022 2:50 PM
To: Cameron Hickey <cameron@ncoc.org>; Kate Starbird <kstarbi@uw.edu>
Cc: Renee DiResta <rdiresta@stanford.edu>; Daniel Bateyko <dbateyko@stanford.edu>
Subject: Re: Your plans while at Stanford on Wed?

I am in the same Omidyar thing on Wednesday as Cameron, and I am not sure if I will be able to excuse myself.

Wednesday evening is more ideal on my end!

From: Cameron Hickey <cameron@ncoc.org>
Date: Monday, September 26, 2022 at 10:32 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Renee DiResta <rdiresta@stanford.edu>, Graham Brookie <gbrookie@ATLANTICCOUNCIL.ORG>, Daniel Bateyko <dbateyko@stanford.edu>
Subject: Re: Your plans while at Stanford on Wed?

I'm in a funder round table event all day Wednesday, but it is at SIO, so perhaps I can leave for an hour to join the meeting. I will be available for a happy hour too!

Cameron Hickey
+1 312-208-7084
ATI.io

Sent from my iPhone

On Sep 26, 2022, at 11:58 AM, Kate Starbird <kstarbi@uw.edu> wrote:

I could do a 1pm meeting at Stanford and a 5:30 dinner. I also was unable to get a spot at the happy hour.

Kate

On Sep 26, 2022, at 8:54 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Hey all -

We are finalizing plans for dinner on Wednesday, and an afternoon check-in meeting (since our Thursday check-in is canceled due to the conference).

Would meeting at Stanford from 1-2:30pm PT on Wednesday work?

Would 5:30 pm-7pm or so work for dinner in downtown Palo Alto?

I was not able to register for the TPSA happy hour - perhaps you all had better luck! - but I believe most of us are staying at the Sheraton (where it's being held) anyway. :) We can always go there post-dinner and I imagine there will be informal networking at the bar area after happy hour ends...

looking forward to seeing everyone!
Renee

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Cameron Hickey[cameron@ncoc.org]; Graham Brookie[gbrookie@ATLANTICCOUNCIL.ORG]; Daniel Bateyko[dbateyko@stanford.edu]
From: Kate Starbird
Sent: Mon 9/26/2022 3:58:13 PM
Subject: Re: Your plans while at Stanford on Wed?
Received: Mon 9/26/2022 3:58:16 PM

I could do a 1pm meeting at Stanford and a 5:30 dinner. I also was unable to get a spot at the happy hour.

Kate

On Sep 26, 2022, at 8:54 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Hey all -

We are finalizing plans for dinner on Wednesday, and an afternoon check-in meeting (since our Thursday check-in is canceled due to the conference).

Would meeting at Stanford from 1-2:30pm PT on Wednesday work?

Would 5:30 pm-7pm or so work for dinner in downtown Palo Alto?

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looking forward to seeing everyone!
Renee

To: Ryan Merkley (GEO)[Ryan.Merkley@aspeninstitute.org]
From: Kate Starbird
Sent: Thur 10/6/2022 9:04:39 PM
Subject: Re: checking in
Received: Thur 10/6/2022 9:04:40 PM

Thanks Ryan. I appreciate it!

Kate

On Oct 6, 2022, at 1:42 PM, Ryan Merkley (GEO) <Ryan.Merkley@aspeninstitute.org> wrote:

Hey Kate - I saw your twitter thread. Glad you and your team are okay, and i'm sorry this is happening. If there's anything we can do to support you and get the word out on your good work, we're happy to do it.

Of course they're targeting you because your work is so good, though I know that's cold comfort when your feed is full of hate and vitriol. Sending good thoughts and strength.

r.

Ryan Merkley
Managing Director, Aspen Digital [aspeninstitute.org]
Aspen Institute
+1-416-802-0662
@ryanmerkley

<Outlook-vjzamfni.png> [aspeninstitute.org]

Stay up to date with Aspen Digital - sign up today. [aspeninstitute.org]

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 8/22/2022 1:11:57 PM
Subject: Delayed Response | Media Contact RE: Trope conversation continued
Received: Mon 8/22/2022 1:11:57 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 8/31/2022 5:17:10 PM
Subject: Delayed Response | Media Contact Re: Discoverability chat
Received: Wed 8/31/2022 5:17:10 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Jeff Hancock[hancockj@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Thur 8/25/2022 6:17:41 PM
Subject: Re: Trope conversation continued
Received: Thur 8/25/2022 6:17:42 PM

Yes, pink columns. Plus some limited notes in the far right column.

Kate

On Aug 25, 2022, at 10:55 AM, Jeff Hancock <hancockj@stanford.edu> wrote:

Good luck with the surgery tomorrow Kate!
For the coding, your codes are the ones in pink, right (columns D-G in the sheet you just shared)?

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Thu, Aug 25, 2022 at 10:45 AM Kate Starbird <kstarbi@uw.edu> wrote:

I'm going to be in surgery tomorrow so I won't be able to make the meeting, but I encourage you all to meet without me. I created a spreadsheet and did some lightweight coding. I think Mike has been in there as well. It does seem like we'll need some conversation to begin to home in on the right coding scheme.
https://docs.google.com/spreadsheets/d/1FamayJZJytEbV9bhLtkg3cH_3_kXCj2lXZneVGM6RUE/edit#gid=476470865

Kate

Sorry for brevity/typos. I am currently nursing a broken finger.

On Aug 25, 2022, at 10:41 AM, Jeff Hancock <hancockj@stanford.edu> wrote:

Hi all,
Sorry to not meet last week - for some reason it wasn't on my calendar. I can meet tomorrow Fri 26th though, anytime before 3pm.

I'm going to work on coding those incidents - I think that's a great idea. I'm leaning towards the multi-dimensional approach for several reasons, including doing statistical analysis afterwards, but the two approaches may not be mutually exclusive.

I'll report back more once I've tried coding them.
--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Mon, Aug 22, 2022 at 7:58 AM Kate Starbird <kstarbi@uw.edu> wrote:

I'm trying to use Mike's scheme (at the narrative trope level), but have also added an into code (what student-researchers might see initially with these incidents) and a more specific trope code.

Kate

On Aug 22, 2022, at 6:11 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Thanks, Kate! I can do this coming Friday for a meeting, if others are clear. I'm back on the East Coast and not traveling for a few weeks.

For this coding test, then, to confirm, we are each trying our own approach? I glanced at your/Mike's sheets (and made a sheet copy for myself) and see you're taking different approaches.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Friday, August 19, 2022 4:46 PM
To: mike Caulfield <mica42@uw.edu>; Jeffrey T. Hancock <hancockj@stanford.edu>; Renee DiResta <rdiresta@stanford.edu>
Subject: Trope conversation continued

Hi folks,

It looks like we failed to connect the dots on our follow-up trope meeting today. Renee and I touched base briefly. It seems that we have two proposed approaches for coding tropes. One would be the one-dimensional scheme at the "narrative-trope" level outlined by Mike:
https://docs.google.com/document/d/1RiO-Th8qZM0xeH67ysI7z5xR6ZDxd7ejSyxIMj1znt8/edit

Renee has suggested a potentially multi-dimensional scheme that captures scene, actor, and high-level narrative. I think she's volunteered to try to articulate that in a table or document of some sort. (Though I know she's over-taxed these days.)

I'm honestly not sure which approach will work better and think we'll likely have to test it, perhaps among multiple groups of coders (experts vs our student novices). One thing we think we need to do first is see if WE can use the coding scheme. I'd like to suggest that we start by trying to code some number of incidents from 2020. Here's a spreadsheet of incidents from 2020 that we determined to have some Twitter spread, be "sowing doubt" (or delegitimization), and not mostly correction. We're included some of the ticket descriptions that were wrapped into those incidents and some notes from the Jira. (Sorry that makes the document really messy). We've also included 10 of the most retweeted tweets in that incident.
https://docs.google.com/spreadsheets/d/1FamayJZJytEbV9bhLtkg3cH_3_kXCj2lXZneVGM6RUE/edit#gid=0

We'll have to come up with a way to "code" … maybe using the letter and short label in the "code" column (highlighted)? Or if someone is a better Google spreadsheeter than I, we could embed a dropdown in each of those cells that draws from a table with the code options.

Kate

To: Jeff Hancock[hancockj@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Thur 8/25/2022 5:45:23 PM
Subject: Re: Trope conversation continued
Received: Thur 8/25/2022 5:45:24 PM

I'm going to be in surgery tomorrow so I won't be able to make the meeting, but I encourage you all to meet without me. I created a spreadsheet and did some lightweight coding. I think Mike has been in there as well. It does seem like we'll need some conversation to begin to home in on the right coding scheme.
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Kate

To: Renee DiResta[rdiresta@stanford.edu]
Cc: mike Caulfield[mica42@uw.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]
From: Kate Starbird
Sent: Mon 8/22/2022 2:57:45 PM
Subject: Re: Trope conversation continued
Received: Mon 8/22/2022 2:57:47 PM

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https://docs.google.com/document/d/1RiO-Th8qZM0xeH67ysI7z5xR6ZDxd7ejSyxIMj1znt8/edit

Renee has suggested a potentially multi-dimensional scheme that captures scene, actor, and high-level narrative. I think she's volunteered to try to articulate that in a table or document of some sort. (Though I know she's over-taxed these days.)

I'm honestly not sure which approach will work better and think we'll likely have to test it, perhaps among multiple groups of coders (experts vs our student novices). One thing we think we need to do first is see if WE can use the coding scheme. I'd like to suggest that we start by trying to code some number of incidents from 2020. Here's a spreadsheet of incidents from 2020 that we determined to have some Twitter spread, be "sowing doubt" (or delegitimization), and not mostly correction. We're included some of the ticket descriptions that were wrapped into those incidents and some notes from the Jira. (Sorry that makes the document really messy). We've also included 10 of the most retweeted tweets in that incident.
https://docs.google.com/spreadsheets/d/1FamayJZJytEbV9bhLtkg3cH_3_kXCj2lXZneVGM6RUE/edit#gid=0

We'll have to come up with a way to "code" … maybe using the letter and short label in the "code" column (highlighted)? Or if someone is a better Google spreadsheeter than I, we could embed a dropdown in each of those cells that draws from a table with the code options.

Kate

To: Josephine Lukito[jlukito@utexas.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 9/5/2022 8:15:08 PM
Subject: Re: Invitation to attend UT-Austin's Disinfo Day, virtually [October26, 2022]
Received: Mon 9/5/2022 8:15:11 PM

It IS Rachel Moran. And Sukrit Venkatagiri <sukritv@uw.edu>

Kate

On Sep 5, 2022, at 11:14 AM, Josephine Lukito <jlukito@utexas.edu> wrote:

A post-doc would be great! I'll follow up with y'all on details. If you could pass along the info for Rachel (if it's Moran, just let me know!) or Sukrit, I could communicate with them directly. :)
Love, love the idea of a February get together in Austin. I've been toying around with getting funding for an in-person data co-op meeting (CIP, IDDP, CCCR, CME, CSMaP, possible OSoMe), and will let you know if we go through with a get-together.

Jo

JO[SEPHINE] LUKITO [jlukito.com], PHD (she/her)
Assistant Professor | School of Journalism & Media
Senior Faculty Research Associate | Center for Media Engagement
Moody College of Communication | The University of Texas at Austin
Due to my schedule, I am no longer accepting events or projects between now and December 2022.
Current Email Response Time: 10 days. I do not take meetings on Friday afternoons.
IJPOR Call for Papers: Special Issue on Global Misinformation and Disinformation [t.co]

On Fri, Sep 2, 2022 at 2:05 PM Kate Starbird <kstarbi@uw.edu> wrote:

Hi Jo,
We're doing well, but drowning a little in ALL THE THINGS. Getting the EIP up and running again has been an endeavor.

A half day disinfo conference sounds wonderful, though the timing may be tough for our team (just because we're all hands on deck at that time). But we should be able to find someone from within our group… maybe Rachel and Sukrit (the UW postdocs who are working on different parts of the EIP)? I'd also love to be able to drop in on whatever sessions I can make. (Can we do an in-person in Austin workshop in February? I'd love to connect with you all in-person and it's about to get cold and dark again in Seattle.)

Kate

On Sep 2, 2022, at 9:04 AM, Josephine Lukito <jlukito@utexas.edu> wrote:

Hi Kate and Renée,
I hope this email finds you surviving! I'm emailing to see if either of you, or a member of your center, would be interested in participating in "Disinfo Day," a virtual, half-day conference that I'm helping to organize as part of UT-Austin's Good System [bridgingbarriers.utexas.edu]

program.

Given that the event will take place close to the midterms, I was hoping either of you, or a colleague, could talk about your ongoing work with the Election Integrity Project. However, you're welcome to also talk about another research project if that would work better.

The schedule is still in progress, but the event itself will take place on October 26th from 11am to 3pm, and we are anticipating about 20-30 minute talks for speakers.

Let me know if you have any questions about the event and if you are unable to make it, an alternative recommendation would be very greatly appreciated!

Many thanks,

Jo

JO[SEPHINE] LUKITO [jlukito.com], PHD (she/her)
Assistant Professor | School of Journalism & Media
Senior Faculty Research Associate | Center for Media Engagement
Moody College of Communication | The University of Texas at Austin
Due to my schedule, I am no longer accepting events or projects between now and December 2022.
Current Email Response Time: 10 days. I do not take meetings on Friday afternoons.
IJPOR Call for Papers: Special Issue on Global Misinformation and Disinformation [t.co]

This message is from an external sender. Learn more about why this matters. [ut.service-now.com]

To: Josephine Lukito[jlukito@utexas.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 9/2/2022 7:05:18 PM
Subject: Re: Invitation to attend UT-Austin's Disinfo Day, virtually [October26, 2022]
Received: Fri 9/2/2022 7:05:20 PM

Hi Jo,
We're doing well, but drowning a little in ALL THE THINGS. Getting the EIP up and running again has been an endeavor.

A half day disinfo conference sounds wonderful, though the timing may be tough for our team (just because we're all hands on deck at that time). But we should be able to find someone from within our group… maybe Rachel and Sukrit (the UW postdocs who are working on different parts of the EIP)? I'd also love to be able to drop in on whatever sessions I can make. (Can we do an in-person in Austin workshop in February? I'd love to connect with you all in-person and it's about to get cold and dark again in Seattle.)

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Jo

JO[SEPHINE] LUKITO [jlukito.com], PHD (she/her)
Assistant Professor | School of Journalism & Media
Senior Faculty Research Associate | Center for Media Engagement
Moody College of Communication | The University of Texas at Austin
Due to my schedule, I am no longer accepting events or projects between now and December 2022.
Current Email Response Time: 10 days. I do not take meetings on Friday afternoons.
IJPOR Call for Papers: Special Issue on Global Misinformation and Disinformation [t.co]

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 12/9/2022 4:16:28 AM
Subject: Delayed Response | Media Contact Re: EIP 2022 final report, Chapter 4 organizing
Received: Fri 12/9/2022 4:16:28 AM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Jeffrey T. Hancock[hancockj@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Emma Spiro[espiro@uw.edu]; Jevin West[jevinw@uw.edu]
Cc: Michael Grass[megrass@uw.edu]
From: Kate Starbird
Sent: Sun 4/24/2022 6:38:39 PM
Subject: SATC meeting: Project slide review
Received: Sun 4/24/2022 6:38:41 PM
SaTC_PI_Meeting_Starbird_Slide-2022.pptx
SaTC_PI_Meeting_Highlight_Template_2022.pptx

Hi folks,

For our upcoming SaTC meeting (in June), they've asked that we submit a project slide that will likely be shown in a shared deck featuring all the projects. They provided a template and I tried to create something — adapting our last slide and some new products to their template. Please take a look and see what you think. Definitely adjust anything that seems amiss. And if you have a better idea for how to use that center space graphically, please suggest — or even better, provide an alternative!

Also, I hate Powerpoint (I'm a Keynote user), so anything you can do to help the appearance here would be fantastic. The NSF provided the circular template with the four sections. I'll attach their template slide to give a sense of their request.

The slide is due May 2, but I'm planning on submitting something this coming week.

Thanks!!
Kate

Rapid-Response Frameworks for Mitigating Online Disinformation

CENTER FOR AN INFORMED PUBLIC
UNIVERSITY of WASHINGTON

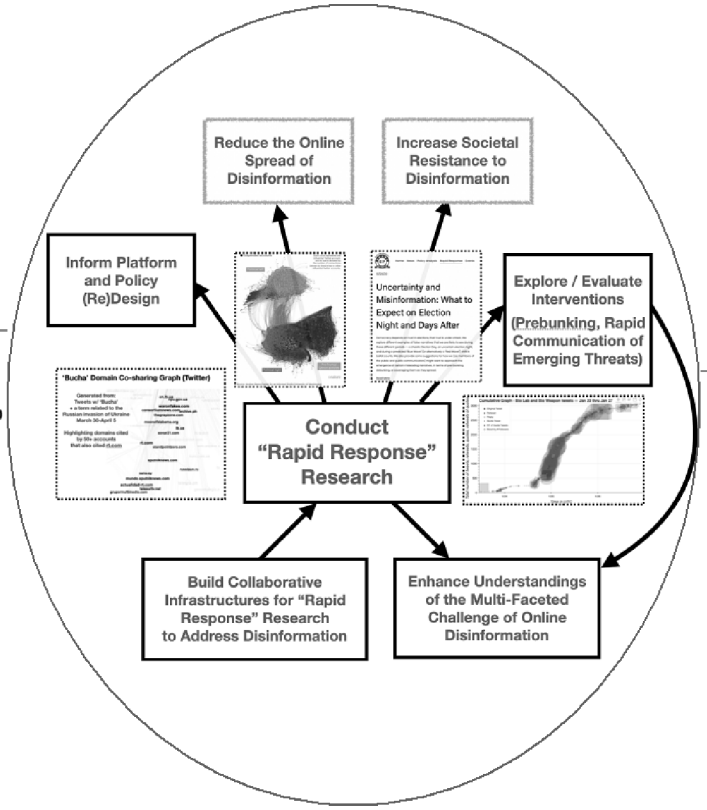
Stanford | Internet Observatory
Cyber Policy Center

Challenge:

Pervasive disinformation (*false or misleading information, intentionally seeded/spread for financial or political gain*) is a critical challenge for society — undermining science, public health, democracy. How can we address disinformation at the speed/scale the problem?

Solution:

Apply mixed-method approaches to understand how disinformation takes shape and spreads online. Develop and evaluate "rapid response" methods for quickly detecting, analyzing, and addressing disinformation. Develop collaborative frameworks for researchers to work with journalists, community partners, and election officials to rapidly address emergent disinformation campaigns.



Scientific Impact:

Enhance empirical and conceptual understandings (*e.g. participatory disinformation*) of how and why disinformation takes root and spreads, as well as pathways for intervention and mitigation.

Broader Impact and Broader Participation:

Mitigate online disinformation.

Inform (re)design of platforms to increase societal resilience to disinformation.

Inform the development of policies to reduce the spread and impact of online disinformation.

Collaborative Research: SaTC: CORE: Large: 2120496
PIs (UW): Kate Starbird, Emma Spiro, Jevin West
PI (Stanford): Jeff Hancock, Renee DiResta (Investigator)

To: SMS Political Influencers[smspoliticalinfluencers@gmail.com]
Cc: Renee DiResta[rdiresta@stanford.edu]; Martin Riedl[martin.riedl@utexas.edu]; Josephine Lukito[jlukito@utexas.edu]; Samuel Christopher Woolley[swoolley@utexas.edu]
From: Kate Starbird
Sent: Sat 9/3/2022 5:20:19 PM
Subject: Re: Social Media + Society Political Influencer Special Issue – Decision on Manuscript ID [28]
Received: Sat 9/3/2022 5:20:25 PM

Hi folks,
We're putting the final touches on our revision. And after a herculean editing effort, it's under 9000 words (according to MS Word). A couple of quick questions. Should we submit the final paper and revision document via this email thread or through a web portal somewhere? And should we submit the supplementary materials as a separate file or within the same document as the main paper?

Best,
Kate

On Jul 28, 2022, at 3:27 AM, SMS Political Influencers <smspoliticalinfluencers@gmail.com> wrote:

28-July-2022

Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

Your manuscript has now been reviewed, and the comments of the reviewers are included at the bottom of this letter.

We invite you to respond to the reviewers' comments and revise your manuscript.

As you surely noticed, our publication timeline has been delayed. We are grateful that we successfully recruited excellent expert reviewers, but this process took longer than originally anticipated.

We thank you for your patience and understanding and assure you that we are doing everything within our power to facilitate timely publication of the special issue.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by **September 8.** If it is not possible for you to submit your revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in previous correspondence, and as a matter of exception, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract. As Reviewer 2 pointed out, perhaps some information on the cases could be moved into supplemental material.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

Reviewers' Comments to Author(s):

REVIEWER 1
This paper provides a timely and important analysis of voter fraud conspiracy theories on social media during the 2020 US Presidential elections. The detailed analysis of the interplay between small-scale and large-scale influencers in spreading disinformation has potential to provide a valuable contribution to the field. I do, however, think the manuscript have some weaknesses that need to be addressed:

(1) Clarifying the methodology

• I encourage the authors to clarify the methodological approach further. In terms of sampling, the authors write the selected cases are "representative of the kinds of narratives that spread." It is unclear to me what representability means in this regard. I encourage the authors to clarify this,

• The authors write that "We center our analysis on Twitter, but follow traces in that data over to other platforms." In practice, however, only one of the case studies (#MaidenGate) includes other platforms than Twitter (and not in a comprehensive way). I think the authors should reflect on the limitations of their study in terms of empirical breadth, especially considering how Twitter is only a marginal platform in the US (as compared to e.g Facebook or Instagram).

• The authors write that they draw on several methodological approaches, including grounded theory, trace ethnography, statistical analysis, network analysis, and content analysis. I think the relationship between these approaches and how they were used in practice needs to be made clearer. I also encourage the authors to clarify what they mean by content analysis, as I associate this with quantitative research, but the authors seem to associate it with qualitative research.

(2) Analytical contribution

The authors write their paper 'up against' Benkler et al. (2020).

Unfortunately, however, I think the authors end up making similar simplifications as Benkler et al. (2020) and could, instead, make a stronger contribution by emphasizing the hybrid nature of contemporary disinformation campaigns.

Benkler et al. (2020) write that disinformation fall under the models of 'Social Media dominates,' 'mass media leads,' and 'social media leads.' They then argue that the 2020 voter fraud conspiracy theory falls under 'mass media leads.' The authors of the article under review criticize Benkler et al.'s conclusion and argue that their work shows the importance of 'bottom-up' spreading as well as top-down spreading (a conclusion I agree with). However, the authors go one step further and also states that the aim of their work is to find out whether "the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites)," concluding that "contrary to a prevailing view of such campaigns as coordinated, "top-down" efforts, we highlight "bottom- up" dynamics that are more akin to cultivation and improvisation."

Here, I think the authors run into the same problem as Benkler et al. (2020), namely that they turn their research aim into a question or 'either/or' rather than 'both/and.' As a reader, I think the strength of the article under review is that it shows how contemporary disinformation fundamentally revolves around the interplay between bottom-up and top-down spreading as well as between social media and traditional media. As such, I encourage the authors to revise the manuscript to underline this contribution, rather than the current either/or arguments. In the end, I think this paper does not 'disprove' the conclusion that disinformation around voter fraud in 2020 was primarily spread by political elites through traditional media (as Benkler et al. argue). Rather, the paper shows that it is too simplistic for Benkler et al. (2020) to conclude that disinformation can be divided into 'mass media leads' versus 'social media leads.'

One suggestion would be to use Andrew Chadwick's book on The Hybrid Media System, in which he argues that political communication today always revolves around the interplay of digital and traditional media as well as bottom-up and top-down processes.

Minor comments:

• The authors write that "regular users" encompass users with 1000-5000 followers. I think this is misleading, since the average number of followers for users on Twitter – to my knowledge – is less than 1000. Accordingly, I think the authors should change this.

• The authors write: "In contrast with research on disinformation during the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election."

While I agree with the authors that most research has focused on the Russian Internet Research Agency, I think the authors need to mention that, for example, Benkler et al. (2018) concluded in their book: "Whatever efforts anyone else made on Facebook, Twitter, or the open web were largely secondary to the efforts of the most important source of news for nearly half of Trump's voters [Fox News]" (p. 187).

• The authors write: "Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-retweeted tweets, were posted by now-suspended accounts. "

Does the author know have any indication of why this is the case?

• The authors write: "political influencer, whose liminal identity — neither elite nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds — frustrates researchers' attempts to place them within traditional models of information flow and the role of media."

To this my question would be: does this really frustrate researchers? In my view – which also seems to be the view of the authors – the notion of 'influencers' maps quite neatly onto the category of "opinion leader" from the two-step flow of communication model? Accordingly, I encourage the authors to consider rephrasing/clarifying this.

REVIEWER 2

This study offers a fairly deep analysis of three manifestations of "stop the steal" disinformation before and during the 2020 US Presidential Election. It is presented as a perspective alongside other recent studies of that disinformation campaigns, especially Benkler and colleagues' report, which emphasized the top-down nature of the campaign.

I think this study's emphasis on the participatory nature of this disinformation—and ESPECIALLY its nuanced articulation of the interactions between the elites and the crowd-sourcers (which in fact are articulated into several gradations of influencer-ness)—is quite valuable.

As an academic article, I am unsure whether the journal will allow the authors to maintain the length required to present the cases in this much detail; if necessary, I do think they can be trimmed, and in any case that it would be useful to have a bit more information in supplemental materials. But in any case, I would recommend the authors spend a little more time developing their ideas about elite-mass interactions in disinformation—those I think are helpful conceptual developments to an emerging research area (the authors mention Starbird's piece on this; Zuckerman's recent work on QAnon also fits. Below I also mention The Ambivalent Internet, which could provide further conceptual grounding).

I do have a few comments on the method. There are some spots where a bit more detail would be warranted. The authors have a generally easy-going, descriptive style, which is welcome, but academic readers will want to know about a few more details. In particular, on p. 5, it would be appropriate to have a somewhat more comprehensive description of the sampling scheme. In particular, the keywords used to construct the sample should be presented—in supplementary materials if necessary. This would be helpful for readers to assess the work and for replicability, and for understanding when we get to the analyses. For example, Figure 5 is labeled as representing tweets of the Sonoma Ballots story. But exactly what set of tweets is that? The reader doesn't know without the keywords. That will allow them to assess what might be left out, and what is represented in the graph.

Also, the streaming API used by the authors is supposed to return 100% of tweets that match the keywords? Though somewhat subject to rate limits as described in the next paragraph?

And a small detail also from p. 5: "all engagement and followers metrics for Twitter are reported as they were at the time of their posting": I know this is challenging with this kind of data, but the engagement counts can't be from the moment of posting (of the original post), because they would all be 0 at that point… so can the authors say more precisely what the timespan of the engagement measure is? Are these measures of engagement with the original post that are accessed from retweets of it?

And some wider notes about the method:

The authors might (briefly) reflect a bit more on these particular cases, why they were chosen, and what they tell us about the "general" phenomenon of disinformation. For one thing, of course we have sampled here on instances of "successful" spread of misinformation. We don't have records of the many that got 10 retweets and were forgotten.

On p. 4, the authors claim these cases are "representative"… representative in what sense? This implies that the authors have access to a wide view (or a catalog) of the sorts of disinformation narratives that were circulating… if they do, it would be great to have a little more detail about why these cases were selected, and which of their features stood out for representativeness. And a study like this probably also deserves a brief caveat that they are only 3 cases in a busy election full of disinformation… concluding that with research questions that point to new directions would also be welcome.

Theory/conceptual contributions

As I mentioned above, the authors' observations and discussion about the exchange between elites and other actors in creating the context for disinformation is very welcome and, I think, a real data-driven conceptual contribution. With that, we see how Trump and allies set the stage for looking for voter fraud; "crowdsources" find it in myriad variations, it builds back up (in some cases) to the elites, who sometimes further amplify it. There are a couple of spots where I would like to push the authors' thinking:

On p. 23: "tried to help move content up the chain": this is an interesting way to put it, and raises the important question of what motivated the various actors in these scenarios. The question is not answerable with the authors' data (or really any data—it would be really hard to get honest answers to this). But I do think it is worth asking. The analysis of @L certainly suggests that many of these users are primarily motivated by the possibility of attracting attention to THEMSELVES (at least as much as promoting a specific piece of information per se). Works like The Ambivalent Internet should caution us against assuming there is a rational or even strategic motivation behind these actions: much of it may be play, or 'let's see what

happens if we do this' or simply an effort to annoy liberals and/or the press.

Similarly, at one point the authors assert that they saw different patterns of behavior at the different levels of influencer, but that is not greatly developed. Could they expand on that? (I do think there is a risk of over-determining our understanding of what accounts at different levels of following do—I am not sure I would use Figure 1 without good reason and grounding.) And do the authors think that accounts at these different levels have different motivations? Or is that not something that varies systematically with following numbers?

On the use of the analogy of improvisation: I think the authors do a nice job of describing how the participants in this disinformation campaign learn a 'tune' (the meta-narrative of election fraud) and then successfully develop variations on the tune (specific disinformation examples). But I am wondering if improvisation is the best term here. Jazz improvisation is bound by rules, yes, but the performer is also creating something new—something only made of what has already been played, the chord progression, etc. In the examples the authors have presented, there are REAL artifacts that the disinformation narratives are drawn from—they are not made up—as the authors do a wonderful job of showing. I wonder if the theme of interpretation might be more applicable here. From this perspective, Trump and other elites have clearly provided the framework within which to understand a variety of phenomena (a photo of ballots in dumpsters, someone's observations about pens bleeding through ballots). This is a form of instruction in how to read election events—parallel perhaps to how Jamieson & Cappella describe talk radio hosts' effect of training listeners how to interpret the news (in Echo Chamber). (Talia Stroud has picked up on the related idea of "inoculation" more recently.) In this way, the performance is less an improvisation of something brand new than the process of (and maybe pleasure of!) applying a known frame to a new phenomenon—which is classic of conspiracy theorizing, of course.

Finally, it is getting somewhat old, but the emerging understanding of disinformation and conspiracy theories as crowd-sourced as such mirror-image echoes (to mix metaphors) of the left-leaning celebration of internet technologies 10-15 years ago. I think of Surowiecki's Wisdom of Crowds, Shirky's Here Comes Everybody, and even Benkler's Wealth of Networks, as well as proponents of digital citizen journalism—and Bellingcat today, for that matter. I do think it is worth mentioning, if only for historical continuity, that many of the processes described in the emerging paradigm on disinformation (including this study) look a lot like what those authors thought the Internet would provide—the CONTENT they imagined citizens focusing on was just a bit different!

Two final smaller comments:

A somewhat aesthetic comment about Figure 5, though one with possible interpretive implications: One element of the figure that could be clearer: as I understand it, the black color is not depicting an AREA (as pink and red are) but a LINE, which represents the total tweets about this topic per minute. So are we to conclude that when there is white space between the red and the black, there are people tweeting about the topic WITHOUT referencing either Elijah Schaffer or the Gateway Pundit, and when there is no white space all the tweets about the topic are related to one of those two sources? Maybe the white space should just have a diff color so we can clearly see where there are any other tweets and when there aren't—rather than have those just be the absence of a labeled color.

p. 17: could the authors add a little more context about the Peoples_Pundit tweet? What are they saying is "not believable nor possible"?

REVIEWER 3

Thank you for the opportunity to review the manuscript, influence and improvisation: participatory disinformation during the 2020 US Election. Through a mixed-method, case study approach, the author(s) describe the participatory nature of disinformation campaigns that took place during the 2020 US Presidential Election. The Twitter (and cross platform) data collected by the author(s) is very rich, and overall I found the paper very enjoyable to read. I also think it does a great job at building on the disinformation literature by focusing on the bottom-up, rather than top-down dynamics that are often discussed in theory. I also

appreciated the authors connection to improvisation and thought that this framing was very novel but useful for thinking about the dynamics of 2020 disinformation. I have made a couple of suggestions for the authors, but overall, I think this manuscript is in great shape – congratulations!

Theory – The authors could add a few more citations in their literature review on disinformation, for example, nodding to more of the work on top-down disinformation from foreign agents (Lukito's work on IRA campaigns), identity and its impact on certain users (Deen Freelon's work on Black Trolls Matter and Samantha Bradshaw's work on Gender and Foreign Influence), as well as their impact on elections and democratic legitimacy (Bennet and Livingston on the disinformation order, for example). I believe Gregory Asmolov also wrote a piece on participatory propaganda that might be useful/helpful to include:

https://jods.mitpress.mit.edu/pub/jyzg7j6x/release/2

Conclusion – The author(s) provide a good, short summary of their work. However, I think they could expand on the "so what" a bit more in the conclusion. Now that we understand the dynamics of disinfo as being a mix of top-down and bottom-up/participatory, what does this mean for policy and enforcement? What can/should platforms and the media do?

Small questions/points –

Page 7 – "Our data revel that, likely mobilized by the "Army for Trump" messaging and the repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters went to the polls (and went online) actively searching for evidence to support the election fraud narrative." Without qualitative insights, or looking at geodata and polling data, can the data really show us that this increased the number of Trump supporters that went out to vote?

Page 11 – "After an official correction by Sonomy County and enforcement action by Twitter, engagement with the rumor faded dramatically." Do you think this translates into an important policy recommendation around the timing of debunks/corrections as well as enforcement action by the platforms? This could be expanded upon in the discussion or conclusion. Or maybe it doesn't matter if Mega influencers pick up the narrative like with what happened in SharpieGate?

Page 16 – "These corrective tweets were not highly retweeted (relative to the earlier tweets pushing the misleading claims), but instead accompanied a steady decrease in engagement around the narrative". Do you think this was because the fact checks caused people to stop sharing? Or was it because at this point, Twitter started to demote content discussing sharpiegate?

Page 22 – "Researchers have studied improvision in a wide range of contexts, for example, among jazz performers (cite)" Citation missing

To: Beth Goldberg[bethgoldberg@google.com]
Cc: Jeff Hancock[hancockj@stanford.edu]; Maddy Jalbert[mjalbert@uw.edu]; Daniel Bateyko[dbateyko@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Mon 4/10/2023 8:08:39 PM
Subject: Re: Research Draft Link
Received: Mon 4/10/2023 8:08:51 PM

My two cents is: these look reasonable to me and seem to meet our criteria. I think the first will be pretty likely to manifest in rumors during the primaries. The second, probably? Mike might have a better sense of that.
I'm not sure what we mean by specific content. We might want to look for early primaries where we except close results and places where mail-in ballots will be counted at different times than in-person ballots (which can exacerbate both narratives).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Apr 10, 2023, at 6:41 AM, Beth Goldberg <bethgoldberg@google.com> wrote:

Welcoming Maddy officially to the thread, we're glad to have you!
Those two techniques (tropes?) work well from my perspective, Jeff, but I defer to Kate and Mike on whether those are high frequency enough in primaries, and if we can find innocuous pop culture illustrations of them.

On Sun, Apr 9, 2023 at 7:26 PM Jeff Hancock <hancockj@stanford.edu> wrote:

Great, thanks all and welcome Maddy!
I agree with Beth - finalizing a couple of key techniques and tropes makes sense as an important first step.

I still think that the two tropes that might be best to start with are Improbable results/timing from Mike's latest taxonomy (now in the shared doc that Dan set up):

- [R] Improbable results. No specific claim is made about an action or process. Rather it is claimed that some result or statistical pattern is evidence of fraud.
- [T] Suspicious timing. The speed of the process, or the way results are announced is suspicious.

Kate and Mike, do you have suggestions for what content we should consider first?
--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Sat, Apr 8, 2023 at 12:00 PM Kate Starbird <kstarbi@uw.edu> wrote:

Can we add Maddy Jalbert (mjalbert@uw.edu) to our communications on this? Maddy is a postdoctoral research at the CIP with a background in psychology, expertise in experimental methods, and an interest in teasing out differences in "inoculation" approaches (pre-bunking vs. tactics).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

On Apr 7, 2023, at 10:35 AM, Beth Goldberg <bethgoldberg@google.com> wrote:

Thanks, Dan! Before we meet again in 2 weeks, it'd help to each align in the doc on the top 2-3 techniques and/or tropes we'd like to inoculate against. Then next week we can discuss research study design (representative US sample vs specific geos/demos? qualtrics? etc) and outcome measures beyond discernment of falsity.
For inspiration/reference, here are inoculative/prebunking videos Jigsaw has produced: https://www.youtube.com/channel/UCiov-3rtgg9Nl_ezyWyOHpQ

On Fri, Apr 7, 2023 at 1:30 PM Daniel Bateyko <dbateyko@stanford.edu> wrote:

Hi all,

Please see the research drafting doc linked below:

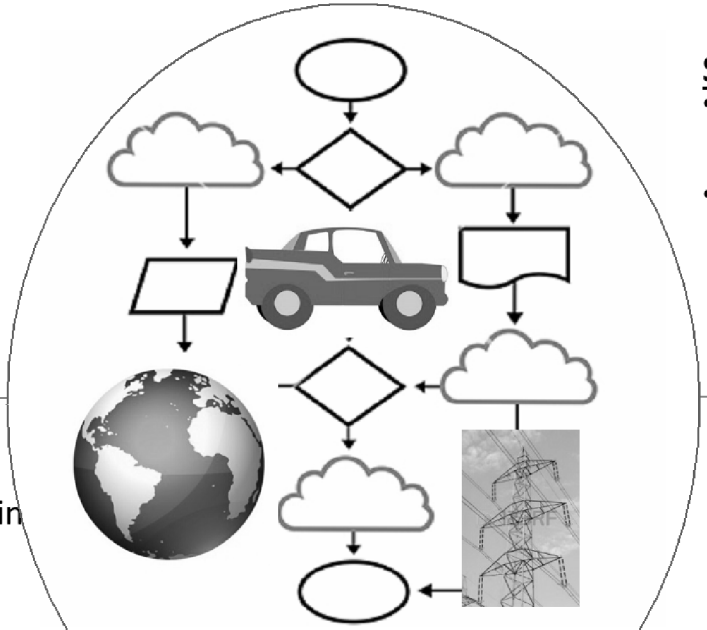
https://docs.google.com/document/d/14Yq7-LLo6HxQdGZhX34MwAFvMmf-IHRFXahgL3xHM4Q/edit?usp=sharing

Project Name

Optionally, one university or project logo may go in this space. Delete this box!

Challenge:

- Key problem(s) to be addressed and their significance.



Graphical representation of your approach and its place within the broader application domain.

Scientific Impact:

- How might the project contribute to solutions to security/privacy problems?
- How might the project improve the research community's understanding of security or privacy

Solution:

- Technical approach, in brief
- Highlight *key innovations* (new contributions)

Broader Impact and Broader Participation:

- What is the impact on society? Who will care?
- Possible transition to practice?
- Education and Outreach
- Quantify impacts if possible

Project info (number, institution, contacts,...)

To: Beth Goldberg[bethgoldberg@google.com]
Cc: Daniel Bateyko[dbateyko@stanford.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Elena Cryst[ecryst@stanford.edu]; Mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Sat 4/8/2023 7:00:28 PM
Subject: Re: Research Draft Link
Received: Sat 4/8/2023 7:00:39 PM

Can we add Maddy Jalbert (mjalbert@uw.edu) to our communications on this? Maddy is a postdoctoral research at the CIP with a background in psychology, expertise in experimental methods, and an interest in teasing out differences in "inoculation" approaches (pre-bunking vs. tactics).

Kate Starbird
Associate Professor, UW HCDE
Co-Founder and Faculty Director of the UW Center for an Informed Public
kstarbi@uw.edu

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> Hi all,
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> Please see the research drafting doc linked below:
>
> https://docs.google.com/document/d/14Yq7-LLo6HxQdGZhX34MwAFvMmf-IHRFXahgL3xHM4Q/edit?usp=sharing

To: rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 8/26/2022 7:32:19 PM
Subject: Delayed Response | Media Contact Re: Meeting Renee/Kate/Jeff/Mike
Received: Fri 8/26/2022 7:32:19 PM

Thank you for your message.

I am currently receiving a large volume of email messages and requests each day. Though I would like to respond to every message, I apologize that I may not be able to get back to you in a timely manner.

If this is an urgent request about the Center for an Informed Public, please contact our Director of Strategy and Operations, Julia Scanlan (jccarter@uw.edu). If this is a media request, please contact Michael Grass (megrass@uw.edu), the Communications Manager at the Center for an Informed Public, who may be able to coordinate a time for us to chat or find another researcher at the Center who can speak with you.

Warm regards,
Kate

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Stahl, Eric[ericstahl@dwt.com]
From: Kate Starbird
Sent: Mon 12/20/2021 11:02:21 PM
Subject: Re: Virality Project - final report review
Received: Mon 12/20/2021 11:02:22 PM

I didn't catch that this was a cited claim rather than our own analysis. If we add a citation there, explicitly citing her next to that claim, I think that would reduce our risk there.

> Smith notes that *many [updated]* of these influencers are not ordinary citizens but individuals or groups who benefit (often, financially) from the spread of health misinformation [explicit citation].

I'm ccing Eric to see if he agrees?

Kate

> On Dec 20, 2021, at 2:50 PM, Renee DiResta <rdiresta@stanford.edu> wrote:
>
> In the table in her paper https://academic-oup-com.stanford.idm.oclc.org/ofid/article/4/3/ofx146/3978712 I think 100% of the people named do benefit financially.
>
> In our paper it is a very significantly high percentage, upon just skimming it again there are only 1-2 mentioned in that chapter that perhaps don't (Naiomi Wolf?) . Also, we are saying "who benefit (*often*, financially)" we could additionally note other types of benefits might include general audience growth/clout or capturing public attention. That might then require going down a bunny trail on why those things are a benefit, so my pref is to keep it simple.
>
> ---
>
> **From:** Renee DiResta <rdiresta@stanford.edu>
> **Sent:** Monday, December 20, 2021 2:41 PM
> **To:** Kate Starbird <kstarbi@uw.edu>
> **Subject:** Re: Virality Project - final report review
>
> Here is the relevant passage from Smith's paper:
>
> "Although many of the individuals who spread vaccine misinformation are ordinary citizens, the sources of most antivaccine tropes are individuals or groups who benefit from the spread of such inaccuracies. Many of the primary antivaccine "thought leaders" have written books or produced movies that characterize vaccines as dangerous and unsafe (see Supplemental Information for examples of antivaccine books and sites). Others run groups dependent on donations from individuals who support their ideas. Still others rely on clicks, advertising revenue, and product sales from online sites where they share articles on the "dangers" of vaccines. "
>
> And then ours:
> "These mechanisms rely on a group of social media influencers that Smith divides into five distinct groups: The Doctors, The Celebrity, The Organizers, The "Mommy Bloggers," and The Opportunists. Smith notes that most of these influencers are not ordinary citizens but individuals or groups who benefit (often, financially) from the spread of health misinformation." -- we are attributing the claim to the paper in the sentence in question, so I have amended to "many" since that is the specific word the cited paper uses, but could reduce it down further if you think it sounds like we are saying it?

From: Kate Starbird <kstarbi@uw.edu>
Sent: Monday, December 20, 2021 2:34 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: Virality Project - final report review

Could we use “some” and then footnote specific cases (i.e. highlighting where the actor makes money from the sale of books)? I think the issue is that “many” casts suspicion over all of them, which can be problematic.

Kate

> On Dec 20, 2021, at 2:31 PM, Renee DiResta <rdiresta@stanford.edu> wrote:
>
> I can chat about that financial question whenever; I reread the passage and it definitely says "most" but not all; we can change to "many" or something like that.

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Sun 12/19/2021 5:13:12 PM
Subject: Fwd: Virality Project - final report review
Received: Sun 12/19/2021 5:13:12 PM

Hi Renee,
Here's the feedback from our lawyers. Are you able to make the suggested changes? And perhaps we should talk about that final point there?

Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: RE: Virality Project - final report review
Date: December 18, 2021 at 9:58:48 PM PST
To: Kate Starbird <kstarbi@uw.edu>
Cc: Julia Carter Scanlan <jccarter@uw.edu>

Kate –

Thanks for sending. I have reviewed all three chapters—they look solid from a legal standpoint. Chapter 1 does a good job of defining the terms and disclosing the underlying facts for the conclusions that follow (which, as we've discussed, helps a lot from the standpoint of defending potential defamation claims). I have just a few minor notes. I'm happy to discuss after I return 12/28. Please also send the additional material when it's ready.

Chapter 1
--In all of the definitional footnotes, I would recommend adding some context along the lines of: "See Appendix X: Definitions for definitions of "misinformation" and "disinformation," as used in this Report."

--P. 2: "*Plandemic* was a slickly produced video that spun the testimony of a discredited government whistleblower together with health misinformation about COVID-19 to feed a broader conspiratorial tale of profiteering and cover-ups." I strongly suggest adding a citation supporting the highlighted parts.

Chapter 4 Narratives

--FN14: "CHD tends not to be reliable." I would suggest deleting this. It seems like gratuitous poking here, in a way that could play out unhelpfully if there's ever a claim. Alternatively, please add a cross-reference to the later, more expansive discussion of CHD.

--p. 10: The term "Repeat Spreaders" is capitalized. Is it a defined in an earlier chapter I don't have?

Chapter 5
--P. 24: We say Berenson's posts are "posed as 'digging up' …." Could we use a less loaded term than "posed"? I think "couched as" would have the same meaning.
-
-We say in Chapter 1, p. 6: "Smith notes that most of these influencers are not ordinary citizens but individuals or groups who benefit (often, financially) from the spread of health misinformation. That leaves open the suggestion that the influences/actors highlighted in Chapter 5 benefit financially or in some other tangible way from spreading misinformation. If we know that isn't true for any one in particular – that is, if we have information indicating any of them are truly amatuers/volunteers – let's discuss. I would want to at least talk through addressing that point in some fashion.

Thanks.

Eric M. Stahl | Davis Wright Tremaine LLP
920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
Tel: (206) 757-8148 | Cel: (206) 369-7476
Email: ericstahl@dwt.com | Website: www.dwt.com
Bio: www.dwt.com/lawdir/attorneys/StahlEric.cfm
Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, December 15, 2021 9:56 AM
To: Stahl, Eric <ericstahl@dwt.com>
Cc: Julia Carter Scanlan <jccarter@uw.edu>
Subject: Virality Project - final report review

[EXTERNAL]

Hi Eric,

I hope your trial went well yesterday.

I'm sending over three chapters for our final report for the Virality Project. Chapters 4 and 5 are the two that mention people and organizations by name. Chapter 1 is an intro. My understanding is that Chapter 1 is still in flux a bit as we've asked that the definitions get updated in the text. I think we're currently using an appendix for the definitions. It will be included at the end of Chapter 1 (rather than at the end of the report). I can send you an updated version of Chapter 1 later this week, but wanted to make sure you have the context there before reading Chapters 4 and 5 (which are at or very close to their final state here).

Please let me know if you have any questions. I'll be around and fairly responsive through the end of next week. (And then slightly less responsive Dec 26-Jan2).

Thank you,
Kate

To: Scherer, William[William.Scherer@mail.house.gov]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 1/21/2022 6:20:00 PM
Subject: Re: January 6th Meeting today
Received: Fri 1/21/2022 6:20:03 PM
Election Repeat Spreaders-Preprint.pdf

Hi Bill,
Here's a first paper I can share. It outlines our method for identifying repeat spreaders of election misinformation. I'm a bit reluctant to share the 150 top spreaders w/o a conversation, because the last 50 or so pull in people who were correcting the false rumors. I think I'd prefer to share that through a conversation, because if the list circulates on its own, it could be misleading (and wrongly implicate folks who were doing the right thing).

I'm happy to have additional conversations. Additionally, we're hoping to make the data outlined in this paper publicly available, but we're waiting on peer review and some ethical guidance (around protecting the privacy of accounts that aren't public figures).

I'm also willing to create interactive graphs related to specific misleading narratives or false claims within our data. We can also build networks graphs. But all of this is limited to Twitter and it's only part of the larger picture.

Kate

On Jan 20, 2022, at 12:58 PM, Scherer, William <William.Scherer@mail.house.gov> wrote:

Kate and Renee: Many thanks, and very impressive research. We appreciate any sharing and as I mentioned no publishing out of the committee except the report (I specifically can't do papers on my committee work!). Looking forward to any papers/reports that you can share, twitter charts, and the top 150 influencers. I know Amanda already reached out to you re finance and we truly appreciate you working with us.
Thanks again – Bill

William (Bill) T. Scherer
Chief Data Scientist
House Select Committee to Investigate the
January 6th Attack on the U.S. Capitol
Professor, Systems Engineering
University of Virginia
Cell: 202-697-2893

From: Kate Starbird <kstarbi@uw.edu>
Sent: Thursday, January 20, 2022 12:16 PM
To: Scherer, William <William.Scherer@mail.house.gov>
Cc: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: January 6th Meeting today

Hi Bill,

I can go until 12:30 (PT) / 3:30 (ET)

Kate

On Jan 20, 2022, at 8:07 AM, Scherer, William <William.Scherer@mail.house.gov> wrote:

Hello Katie and Renee – are you willing to go 60 minutes today if needed? Lots of interest from committee in the discussion.
I realize schedules likely already set but thought I'd check.
Thanks- Bill

William (Bill) T. Scherer
Chief Data Scientist
House Select Committee to Investigate the
January 6th Attack on the U.S. Capitol
Professor, Systems Engineering
University of Virginia
Cell: 202-697-2893

> On Jan 14, 2022, at 12:53 PM, Scherer, William <William.Scherer@mail.house.gov> wrote:
>
> Hello Kate – great – let's do Thursday @ 11:30am Pacific (2:30 East). Is teams or zoom better?
> I look forward to talking - Bill
>
> ---
>
> **From:** Kate Starbird <kstarbi@uw.edu>
> **Sent:** Friday, January 14, 2022 2:12 PM
> **To:** Scherer, William <William.Scherer@mail.house.gov>
> **Cc:** Alex Stamos <stamos@stanford.edu>; Renee DiResta <rdiresta@stanford.edu>
> **Subject:** Re: January 6th
>
> Hi Bill,
>
> I'm happy to chat. I have some flexibility next Wed at 11am (Pacific) and Thurs 10-noon (Pacific).
>
> Kate
>
> > On Jan 13, 2022, at 3:44 PM, Scherer, William <William.Scherer@mail.house.gov> wrote:
> >
> > Hello Alex, Kate, and Renee- I'd love to set-up a call and talk about what we are doing. Based on your thoughts, I could invite some other fellow senior members of the committee. Many thanks for the quick response - Bill
> >
> > Sent from my iPhone

On Jan 13, 2022, at 4:22 PM, Alex Stamos <stamos@stanford.edu> wrote:

Hi, William-

You probably want to chat with some combination of Dr. Kate Starbird from UW or Renee and I from Stanford.

-Alex

From: Scherer, William <William.Scherer@mail.house.gov>
Date: Thursday, January 13, 2022 at 1:20 PM
To: info@eipartnership.net <info@eipartnership.net>
Cc: Scherer, William <William.Scherer@mail.house.gov>, Scherer, William T (wts) <wts@virginia.edu>
Subject: January 6th

Hello: I'd like to know if there is a contact I can speak with regarding your Long Fuse report, and in particular the data used.
I'm working, as a faculty at the University of Virginia with the House Select Committee, on investigations into the Jan 6 attack on the Capitol.
Thanks- Bill

William T. Scherer
Professor, Systems Engineering
wts@virginia.edu
William.Scherer@mail.house.gov
https://engineering.virginia.edu/faculty/william-t-scherer

--
To unsubscribe from this group and stop receiving emails from it, send an email toinfo+unsubscribe@eipartnership.net.

Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 U.S. Election



Isabella Carmago
Krebs Stamos Group
Emma Spiro
Information School, University of Washington
Kate Starbird
Human Centered Design & Engineering, University of Washington

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This study introduces and presents a first analysis of a uniquely curated dataset of misinformation, disinformation, and rumors spreading on Twitter around the 2020 U.S. Election. Previous research on misinformation has largely focused either on broad categories, using a finite set of keywords to cover a complex topic, or on a few, focused case studies, with increased precision but limited scope. Our approach, by comparison, leverages real-time reports collected from September through November 2020 to develop a comprehensive dataset of tweets connected to 456 distinct misinformation stories from the 2020 US Presidential election, 397 of which were false, misleading, or exaggerated claims about voter fraud. By relying on real-time incidents and streaming data, we generate a curated dataset that not only provides more granularity than a large collection based on a finite number of search terms, but also an improved opportunity for generalization compared to a small set of case studies. Along with a detailed description of the data, this paper provides an analysis of this election misinformation in terms of size, content, temporal diffusion, and partisanship. We label key ideological clusters of accounts within interaction networks, describe common misinformation narratives, and identify those accounts which repeatedly spread misinformation. We document the asymmetry of misinformation spread: accounts linked to President Biden shared the stories in *ElectionMisinfo2020* far less than accounts supporting his opponent. That asymmetry remained among the accounts who repeatedly spread misinformation: all but one of the top 50 such accounts were supporters of then-President Trump. These findings support

the implementation and enforcement of ‘strike rules’ on social media platforms, directly addressing the outsized role of repeat offenders.

Introduction

Misinformation — and its intentional cousin, disinformation — have emerged as critical societal challenges, undermining democratic institutions and processes and making it difficult to address pressing issues such as climate change and global pandemics. In 2020, as the world grappled with the Covid-19 pandemic and accompanying “infodemic” (Zarocostas 2020), the United States held a general election that became the target of numerous false and misleading claims, including repeated assertions by then-President Trump that the election would be — and then that it was — “rigged” (Baker and Haberman 2020; Goidel et al 2019). Prior to the election, Benkler and colleagues (2020) described an elite-driven effort to intentionally sow distrust in the mail-in voting process, terming it a ‘disinformation campaign’ (Benkler 2020). The spread of mis- and disinformation continued after election day and grew to include, among other things, a wide range of false, misleading, and exaggerated claims that supported a false narrative of extensive and systematic voter fraud — ranging from claims that Sharpie pens were part of a plot to disenfranchise certain voters to allegations that voting machines and voting software were switching votes, en masse, from one candidate after another.

During the two months following the election, as then-President Trump refused to acknowledge the results, these falsehoods were used to mobilize a “Stop the Steal” effort that included pressuring government officials to overturn results (Gardner 2021; Shear and Saul 2021; McFall and Mears, 2021) and eventually led to a violent insurrection attempt within the U.S. Capitol Building on January 6 (Blake 2021; Cramer 2021), as protesters attempted to stop the certification of the results. Nearly a year after the election, 31% of the US population still believe the ‘big lie’ that the election was stolen from then-President Trump (PRRI 2021).

Much of the mis- and disinformation about the election spread online on social media websites like Twitter and Facebook. While platforms introduced new “civic integrity” policies (Chowdhury et al. 2021; Niker and Yarrow 2021; EIP 2020a), and enacted enforcement strategies including the application of credibility labels and other mitigation techniques, these actions were not enough to stop false and misleading claims from spreading. In the lead up to the election, and again after January 6, platforms suspended and otherwise sanctioned large numbers of accounts — eventually taking action against then-President Trump’s accounts. These sanctions effectively removed these accounts from the public sphere, making it difficult for future data collections to capture that particular moment in time.

This paper introduces and provides the first descriptive analyses of a unique dataset, captured and curated during this critical window in the history of online misinformation — during the lead-up to and immediate aftermath of the 2020 U.S. Election. This dataset, termed *ElectionMisinfo2020,* is made up of over 49 million tweets connected to 456 distinct

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misinformation stories spread about the 2020 U.S. election between September 1, 2020 and December 15, 2020. In particular, this dataset focuses on false, misleading, or unsubstantiated claims or narratives related to voting, vote counting, and other election procedures.

This dataset derives from contemporaneous monitoring and analysis work conducted through the Election Integrity Partnership (EIP), a collaborative team that was identifying and responding to Election 2020 misinformation in real-time during that period (CIP et al. 2021). Each tweet is linked to at least one misinformation story that was reported to the EIP. As a result, the dataset includes both the most widely-spread misinformation stories from the election, like those about Dominion Voting Systems, and many smaller stories about lost mail-in ballots, allegations of planned violence that could have suppressed votes, and false statistical claims (Eggers et al. 2021).

This paper describes the techniques we used to generate *ElectionMisinfo2020*, discusses how the dataset combines existing methods for compiling misinformation-related tweets, and demonstrates its usefulness in generating empirical insights. The first of these insights utilizes network analyses to reveal two distinct groups of accounts reflecting U.S. political alignments. We show that while Biden-supporting Twitter accounts did spread false and misleading claims about election procedures, the vast majority of election-related misinformation on Twitter was spread by Trump supporting accounts. Second, we identify, compare, and examine over time the largest misinformation content groups, collections of stories that had similar narrative or thematic components. Finally, we identify high profile accounts who had highly-retweeted tweets in several distinct misinformation stories, whom we label 'repeat spreaders,' and show the disproportionate impact these accounts had on total misinformation spread on Twitter during the U.S. Election. Taken together, these results spotlight the utility of this new dataset and lay the foundations for its use in further analyses focused on understanding the drivers of misinformation and the patterns of its proliferation before, during, and after the 2020 US election.

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Background

Event Background: The 2020 U.S. Presidential Election

When Donald Trump announced his intention to run for president in 2015, most experts doubted his chances; recent history suggested that the success of Republican nominees was tied directly to years of party service and the irreproachability of one's personal and political record. In contrast, Donald Trump was a former Democrat with limited political experience and a checkered personal history. Despite these concerns he managed to unify the Republican base by fomenting anti-government sentiment and presenting himself as a Washington outsider. A key feature of the subsequent 2016 election campaign, which saw him face off with former Secretary of State Hillary Clinton, was the presence of organized disinformation. That disinformation was amplified on social media platforms, including by bot accounts, through

coordinated campaigns linked with foreign governments, and in targeted advertisements utilizing user social media profiles. After losing the popular vote but winning the 2016 election through the electoral college, Trump publicly alleged, without evidence, that his deficit in the popular vote was the result of voter fraud (Cottrell et al. 2017).

As President, Trump made ample use of social media, primarily Twitter, to promote content that was often demonstrably false. While Twitter and other social media platforms responded to the 2016 election by trying to reduce bot activity, they did little to question, label, or remove these false statements made by then-President Trump during his first three years in the White House. Furthermore, hyper-partisan accounts supporting then-President Trump, such as the Gateway Pundit, One America News, and Breitbart, used these same digital channels to extend and amplify extant misinformation (Lazar et al 2021). Though the 2020 presidential election was not marked by substantial bot activity or foreign interference, Trump supporting accounts and media outlets appear to have engaged in the promotion of a "disinformation campaign" (Benkler 2020) full of false, misleading, or unverifiable claims about voting fraud. Then-President Trump lost the 2020 election to Joe Biden (both overall and in the electoral college), but false stories attributing that loss to fraud spread online in early November and remained central to online discussions of the election in the following months. This collection of online rumors and conspiracies came to serve as a key rallying point for in-person 'Stop the Steal' protests and rallies, the largest of which was the January 6, 2021 riot, attempted insurrection, and storming of the U.S. Capitol Building.

During the election, the authors participated in the Election Integrity Partnership (EIP), a coalition of research entities focused on supporting the real-time information exchange between disinformation researchers, election officials, civil society organizations, and social media platforms. The EIP collected reports of emerging misinformation stories, conducted real-time analysis, and wrote rapid-response reports. In the *ElectionMisinfo2020* dataset, we document and record comprehensive, low-noise sets of tweets connected to each of the misinformation stories reported to the EIP during the 2020 election, making those tweets available for analysis.

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Defining Terms: Stories, Rumors, Misinformation, and Disinformation

We use the term *misinformation* for this dataset as an umbrella term, inclusive of rumors, misinformation, and disinformation. However, it is important to note that this use — and in fact, much of the terminology around mis- and disinformation — is contested and in flux. In this section, we present and define our terminology, which is critical for understanding the contours of the *ElectionMisinfo2020* dataset.

One term we invoke here, as the core organizing element of the *ElectionMisinfo2020* dataset, is "story". *Stories* refer to distinct accounts of an event or events, following long standing use in research on rumors (Knapp 1944; Rosnow 1980) and contemporary work on online mis- and disinformation (Polletta et al. 2019; Ananny 2018; Huang and Carley 2020). Often, several stories will share similar content, such as claims that voting machines and voting software were

systematically altering votes to advantage a certain candidate — but they may differ as to the specific claim around which technology, which location, and which candidate was implicated. In practice, it is often difficult to differentiate between distinct stories, especially when they map to the same narratives within a disinformation campaign. We discuss that challenge below, in the section titled “Mapping Tweets to Misinformation Stories.”

Rumors are stories of uncertain or unverified veracity (Bordia and Difonzo, 2004; Kapferer, 1987; Starbird et al. 2016). We often think of rumors, particularly in colloquial contexts, as inherently false, but some rumors turn out to be true. Due to the real-time curation of *ElectionMisinfo2020,* the set contains many rumors that were unsubstantiated at the time, including a few that turned out to be true (or partly true), like allegations that a Trump-supporting poll watcher was unlawfully removed from a Philadelphia polling place — and some whose veracity is still uncertain. As such, several prominent *ElectionMisinfo2020* narratives, such as claims that a ballot arrived “pre-filled” for select candidates or that individuals voted multiple times, are unfalsifiable — i.e. the claim is made in such a way that it would be extremely difficult or impossible to disprove.

The term *misinformation* translates, literally, to false information. Misinformation applies to content that is false (like false rumors), but not necessarily intentionally false (Jack, 2017). *Disinformation*, on the other hand, is used to characterize content that is false or misleading, and that was intentionally created or strategically amplified for an objective — e.g. political, financial, or reputational gain (Jack, 2017; Wardle & D, 2017). An important distinction of disinformation is that it is not necessarily outright false, but can instead be *misleading*. It is often built around a true or plausible core, but layered with falsehoods and/or exaggerations to create a distorted perception of the truth (Starbird et al., 2019; Bittman, 1985). Additionally, disinformation rarely functions as a single piece of content, but more often as part of a broader campaign (Starbird et al., 2019; Calo et al, 2021). The *ElectionMisinfo2020* dataset contains many unsubstantiated and exaggerated claims (for example, about ballots being mistreated by the U.S. Postal Service) that, together, contributed to a false perception of massive and systematic election fraud. In the lead up to the election, Benkler (2020) and colleagues described the intentional effort to sow distrust in the mail-in voting process — enacted through the strategic production and amplification of false, misleading, and exaggerated claims — as a “disinformation campaign” (Benkler 2020: 1). We accept that characterization here. A large number of the stories that constitute the *ElectionMisinfo2020* dataset were part of the disinformation campaign to sow distrust in election procedures and, eventually, the results of the election.

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Previous Research on Online Mis- and Disinformation

Research on rumoring has a long history and draws from diverse fields — including sociology and social psychology. Early work focused on the spread of rumors and misinformation during conflict and crisis (Knapp, 1944; Allport and Postman, 1947; Caplow, 1947; Kapferer, 1987;

Starbird, Spiro, and Koltai, 2020). Researchers have posited that uncertainty (such as a lack of official information) and anxiety can motivate rumoring (Andrews et al. 2016), as has been suggested in work detailing how the U.S.'s decentralized election system has created "knowledge gaps and uncertainty that disinformation-peddlers can leverage" (Adler & Thakur 2021: 6). Shibutani described rumoring as a collective, improvisational problem-solving activity whereby people work together to make sense of an unfolding situation (Shibutani, 1966).

Early research took two approaches: focusing on rumors that were organically circulating and experimentally studying planted rumors (Starbird, Spiro, and Koltai, 2020). This work follows the tradition of the former and adopts Shibutani's lens to conceptualize rumoring — and the spread of mis- and even disinformation (Starbird et al., 2019) — as a kind of collective sensemaking process.

With the widespread adoption of digital technologies, research on rumoring and misinformation has begun to attend to — and increasingly focus on — the online dimensions of their spread (e.g. Oh et al., 2013; Starbird et al., 2014; Mitra and Gilbert, 2015; Maddock et al., 2015; Arif et al., 2016; Vosoughi et al. 2018). Political events in 2016, including documented attempts by state-sponsored organizations to interfere in democratic elections in the U.K. and U.S. (S. Rep. No. 116-290, 2020; Mueller 2019), sparked interest in the online spread of disinformation (e.g. Freelon and Wells 2020; Arif et al., 2018; Starbird et al., 2019; Marwick and Lewis, 2017). In recent years, with increased media attention to what has been perceived as a growing problem, a large number of researchers, journalists, and non-profit organizations have converged onto these topics as a new, interdisciplinary field emerges to study these phenomena — often through the analysis of digital trace data.

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Challenge of Identifying/Collecting Data on Multiple Misinformation Stories

ElectionMisinfo2020 builds on previous efforts to collect data about online rumors, misinformation, and disinformation. We adapt useful aspects of both small- and large-scale data collection methods to create an extensive collection of misinformation stories that spread around a specific event — the 2020 U.S. Election.

Focused data collection has investigated the dynamics of misinformation either within a particular story or comparatively across a small number of stories. Like much of online rumoring research, we focus on Twitter, a platform where most content is publically shared and data can be accessed at large scale for academic research through Twitter's APIs (Tufekci, 2014). One line of work on rumoring on Twitter — extending the perspective of rumoring as a social process — used mixed-method approaches to study a small number of individual rumors or stories to identify patterns and anomalies within and across rumors (e.g. Oh et al. 2010; Oh et al. 2013; Starbird et al., 2014; Maddock et al., 2015). More recent work on online disinformation (e.g. Arif et al., 2018; Starbird et al., 2019; Hunt et. al., 2020) follows this tradition, relying upon highly-curated, comprehensive, low-noise samples of the stories under investigation. We attempt to reproduce this approach for *ElectionMisinfo2020*.

An alternative approach to research on rumoring and misinformation has been to gather much larger sets of social media data using a time frame or single set of keywords. Some of those efforts collected total shares within a certain time frame, like Subbian et al. (2017) who used a single day of content, or Dow et al. (2013), who collected an entire week. Those approaches are useful for studies of viral dynamics, which they have helped elucidate. However, it is difficult to use these approaches when investigating misinformation or rumoring without additional validation that the content is indeed misleading. To get at this gap, others use similarly broad collections but filter or validate these collections with other resources. For example, misinformation researchers have used links to fact checking websites (Friggeri et al. 2014; Vosoughi et al. 2018), in an attempt to ensure that cascades are about misinformation. Yet many cascades may never include a reply with a link to a fact checking website, even if the story in question was fact checked, and limits data collection to stories high-profile enough to be fact checked. Finally, some recent studies (Gallagher et al. 2021; Abilov et al. 2021) collect large datasets on a single set of keywords. One standout prior example is Credbank, collected by Mitra and Gilbert (2015), which used computational text analysis and human validation to label millions of tweets for their connection to over one thousand real-world events. Credbank was not focused on political misinformation; it included any real-world event as a potential topic for misinformation.

Our approach with the *ElectionMisinfo2020* dataset was to attempt to apply the best aspects of the techniques above to the collection of a dataset focused on misinformation in the 2020 election. Our process, detailed below, uses hundreds of independent, real-time reports of mis- and disinformation during the 2020 election cycle, and careful validation by researchers to ensure the quality of the data.

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Dataset Construction

The *ElectionMisinfo2020* dataset consists of 49.3 million tweets posted between September 1, 2020 and December 15, 2020. Drawn from a broader collection of election-related Twitter data, each tweet was selected for its connection to one of 456 misinformation stories — distinct stories that included false, exaggerated, or otherwise misleading claims or narratives — promulgated during the 2020 election. In this section, we describe how these stories were (1) first identified through a collaborative reporting process as part of the Election Integrity Partnership; (2) labeled for content type and deduplicated into distinct stories; (3) each mapped to a comprehensive, low-noise sample of tweets; and (4) validated.

Figure 1

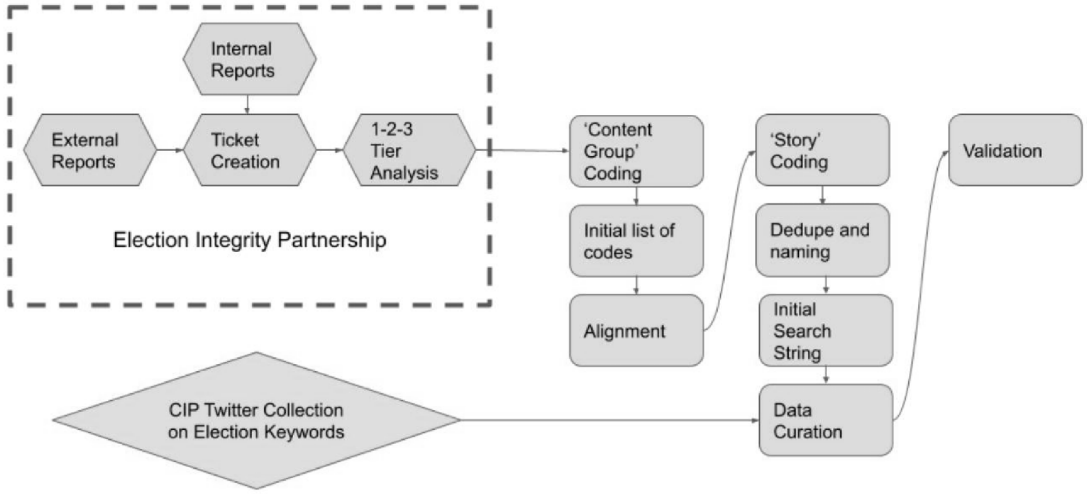

Figure 1 Caption: A process map of the dataset creation process. It shows how reports generated for the EIP were filtered and coded into stories. Then those stories were linked to comprehensive, low-noise samples of related tweets from the broad election-related Twitter dataset collected by the Center for an Informed Public (CIP).

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The Election Integrity Partnership: Identifying Misinformation in Real-Time

The 456 misinformation stories were based on 814 initial reports of misinformation generated by the Election Integrity Partnership (EIP), a coalition of research entities working to identify, analyze, and address misinformation in real-time. The partnership, which was active from July 27 2020 to November 19 2020, supported rapid information exchange between disinformation researchers, election officials, civil society organizations, and social media platforms. The 112 researchers who made up the EIP team came from four major disinformation research organizations: Graphika, the Atlantic Council's Digital Forensic Research Lab, the Stanford Internet Observatory, and the University of Washington Center for an Informed Public. Researchers entered with a diversity of backgrounds and skill sets, and received training in monitoring, triaging, and open source investigation principles. The team worked in shift schedules to (1) monitor online platforms and communities for potential election mis- and disinformation, (2) analyze that content, and (3) send findings to the EIP's network of civil society and government affiliated partners.

Since this process occurred concurrently with the emergence of misinformation stories, *ElectionMisinfo2020* includes both extremely large misinformation stories with million of tweets, like those concerning Dominion Voting Systems or misleading allegations that Ilhan Omar's campaign paid for votes, and other stories which never gained traction and have fewer than one hundred connected tweets.

Reports to the EIP came from both within and beyond the partnership: external collaborators made 21% of the reports, and internal researchers contributed 79%. A group of 30 dedicated social media monitors, recruited from a single university and representing a range of academic majors, made most of the internal reports. These researchers, termed "Tier 1 analysts", identified new potential misinformation stories, conducted an initial analysis, and archived related content. To ensure coverage across online ecosystems, each analyst focused on a specific state or interest group, which they developed expertise in and followed throughout the project.

Tier 1 analysts were responsible for evaluating new content against the EIP's scope and prioritization standards (EIP 2020a), defined by the partnership prior to its launch and updated three times between its initial publication in August 2020 and Election Day, on November 3, 2020. Broadly speaking, the EIP focused on misinformation about election processes and procedures — excluding adjacent topics related to the candidates in the election, such as policy stances, personal histories, and political scandals. The EIP initially focused on four types of election-related stories: (1) procedural interference, (2) participation interference, (3) fraud, and (4) election delegitimization. Later, the collaboration added (5) incitement to violence when it became a salient issue in the overall election-related conversation. *Procedural interference* included stories with false information about when or how to vote. *Participation interference* included anything that could dissuade voters, including intimidation, suppression, false information about long wait times or mail ballot failures. We considered stories within the *Fraud* topic if they encouraged people to commit fraud, for example, by submitting two ballots or destroying ballots. *Delegitimization* stories are those that challenge or question trust in the election or the election process. With these shared definitions in mind, Tier 1 analysts scanned content across a number of online platforms for in-scope, election-related content — eventually logging 643 distinct reports (79% of all EIP reports).

External collaborators could also submit reports to the EIP. Among these, the Center for Internet Security (CIS) contributed the largest number (101 reports or 16% of all EIP tickets). The CIS is a non-profit which runs the Election Infrastructure Information Sharing and Analysis Center (EI-ISAC), the central coordinating body for state and local government officials running U.S. Elections. The CIS serves as a central reporting structure for election officials to raise election misinformation concerns. As a result, reports originating from the CIS were dependent on well-resourced, motivated election officials to establish contact with the CIS and take time to report their concerns. Reports from the CIS most often highlighted potential misinformation about Washington, Conneticut, and Ohio voting infrastructure. Additionally, the CIS raised more reports about issues which election officials faced most saliently: this included several reports of

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online accounts impersonating election officials, phishing emails impersonating the Election Assistance Commission (EAC), and spoofed voter registration websites asking voters to share personal information including addresses and Social Security Numbers. Other collaborators who reported tickets included the State Department's Global Engagement Center, MITRE, Common Cause, the DNC, the Defending Digital Democracy Project, and the NAACP.[1]

The report-level dataset likely reflects biases of the individual analysts and of the monitoring process more generally. Monitoring topics were diverse, but not comprehensive due to staff limitations: for example, researchers were directed towards spending more monitoring hours on swing states rather than non-swing states on election night. Though the organizers did not record the political orientations of the Tier 1 analysts, our experience working with them suggests that diverse political orientations were present and that the overall group skewed towards the center left. Additionally, language constraints prevented the partnership from monitoring non-English languages as comprehensively as English-language disinformation, and *ElectionMisinfo2020* explicitly excluded stories shared only in languages other than English. Despite these caveats, given the broad diversity of team members and the ongoing calibration conducted with the Tier 1 analysis team, we believe the reports generated by the EIP provide an interesting and unique set of stories which ground *ElectionMisinfo2020's* collection.

Converting Misinformation Reports into Distinct Misinformation Stories

Each misinformation story in *ElectionMisinfo2020* reflects a distinct time-bounded informational "event" encompassing the propagation of a single false, misleading, exaggerated, or unsubstantiated claim or narrative. However, many stories were reported to the EIP repeatedly, resulting in multiple reports for the same story. Additionally, some reports contained claims that never appeared on Twitter. Using a qualitative coding process, we grouped the initial 814 reports by their narratives and themes into 29 content groups, collapsed duplicate reports into single stories, and excluded stories for which we could find no related tweets.

The EIP reports covered an array of topics, ranging from widely discussed conspiracies about voting machines to localized reports of deceased citizens casting votes. To aid in the organization of the data, we first categorized these stories into content groups, comprised of reports that had similar narrative or thematic components. Researchers created content groups through an inductive process, relying on contextual expertise gained through participation in the EIP. Next, each story was assigned to a content group independently by two coders, with disagreements arbitrated by a third coder. Following this initial categorization, content groups with fewer than five unique stories were redistributed into larger content groupings. The resulting dataset contains 29 unique content groups (see Appendix I for a full list). The two largest groupings, "physical mail-in ballot fraud" and "misleading voting information", ultimately contained 57 stories and 56 stories, respectively.

[1] The EIP also contacted the RNC and invited them to join the partnership, but that organization did not respond.

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Once reports were organized into content groups, researchers worked to deduplicate them — grouping together overlapping reports into the same story. Finally, we removed reports that had not spread on Twitter (i.e. reports for which we could not find any related tweets). This filtering and synthesis process resulted in 456 distinct, election-related misinformation stories that spread on Twitter.

Mapping Tweets to Misinformation Stories

Next, we sought to identify — from a more general collection of election-related tweets — a comprehensive, low noise sample of tweets for each misinformation story. To do so, we developed and validated a complex, keyword-based search string for each of the 456 misinformation stories.

Election Discourse: Collecting Election-Related Data through the Twitter Streaming API

The curated *ElectionMisinfo2020* dataset is derived from a larger, more general dataset of election-related tweets which we refer to as the broad election-related Twitter dataset. For several months leading up to — and now more than a year following — the 2020 U.S. Election, the Center for an Informed Public at the University of Washington (CIP) collected election-related tweets using the Twitter Streaming API. This dataset included generic terms such as *vote*, *election*, *poll, ballot,* and *mail-in* as well as terms related to fraud and voter suppression. During the active election monitoring period (August through December, 2020), researchers added emergent terms including specific hashtags that became focal points for conversations about the election. The CIP tracked more than 160 keywords, spread across numerous collectors (collection instances) to limit the impact of rate limits (around 50 tweets per second for each collector). For the period of interest here, between September 1, 2020 and December 15, 2020, this dataset contains 1.04 Billion tweets. For a full list of the keywords used for the collection of the data in the broad election-related Twitter dataset see Appendix II.

This collection has limitations. For certain high volume terms (e.g. “vote”) we dedicated an entire collector to that term, but still regularly hit rate limits. For others, we maintained a relatively balanced set of terms that tended to remain under 50 tweets per second, though occasionally hit limits during specific bursts in activity. Though it’s difficult to measure the impact of rate limits, we can estimate them based on retweet comparisons — i.e. for a highly retweeted tweet, comparing the number of retweets we collected during a period of time against the rise in “retweet count” for that tweet (which is recorded in each retweet’s metadata) during that same period of time. We find that even when there is significant rate-limiting, we capture almost all tweets (99.98%) that have at least 10 retweets. This paper, along with a large amount of work on misinformation, focuses on the spread of salient misinformation stories, e.g. those that receive large numbers of retweets, and therefore we find this coverage acceptable. More detail about rate limiting can be found Appendix III.

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Curating Election Twitter Data to Identify Tweets Related to Misinformation Stories

From this larger dataset, researchers worked — using an iterative approach — to identify tweets related to each misinformation story. This work was conducted by a small group of coders who had been core members of the EIP and who therefore had a deep understanding of these stories and how they spread. Drawing on information contained in the initial EIP ticket(s) associated with each story, coders generated a date range to isolate the story's spread. Next, coders constructed keyword-based boolean search strings to capture a comprehensive set of tweets related to the story, while limiting noise (tweets unrelated to the story). Each search string contained keywords linked by boolean operators OR, NOT, and AND and could contain tens of terms to ensure that the tweet sample for each story was comprehensive and low-noise.

For example, as the tallying of ballots first commenced on the evening of election day a chart was posted on Twitter and Facebook supposedly showing discrepancies between registered voters and votes tallied in Florida precincts. The registration numbers included in the graph were misleading, leading to the impression that fraud had occurred where it had not. To capture the spread of the story we limited our validation to the period ranging from the morning of November 3rd through November 8th based on plots detailing the spread of a collection of related Tweets. In order to ensure the data we collected on the story matched the discussion we developed the following search string:

> *(more turnout than voters OR more than 100% turnout OR (just sayin. AND every swing state) OR (how does this add up AND fightfortrump) OR disappointed but not surprised OR totally not sus at all) AND (turnout OR registration OR turn out) AND NOT (vandalize OR (florida AND crash))*

Search string curation was an iterative process which enabled coders to test and retest numerous keyword combinations for each story. To assess the precision with which each set of keywords captured tweets relevant to the incident in question, coders were presented with a random selection of ten tweets from the reduced subset. In most cases we examined multiple such samples. When this subset contained unassociated tweets, the keywords were adjusted to either expand the search string to collect a larger sample or add terms with a 'NOT' operator to exclude tweets discussing alternative stories.

To ensure that our samples were as comprehensive as possible for each story, we started the process with broad search strings with many 'OR' operators. We also used temporal graphical representations of the story to ensure that we did not exclude dates from our search when the story was active. Finally, as we read tweets to make sure they were properly categorized, we also looked for more keywords to include to collect larger and more comprehensive samples.

The final step in the development of the dataset was independent validation to ensure that each story contained no more than 10% noise, or that at least 90% of the tweets linked to each story

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were indeed about the story in question, while collecting as many tweets as possible. We regarded this 90% threshold as a way of ensuring that we achieved a low-noise sample for each story. Each story was validated by someone who had not participated in producing the initial keywords. That validator examined both a random sample of tweets linked to the story and the top ten tweets in terms of retweets for each story. If 90% of that mixed sample was properly linked to the story, then we marked the story as validated. If the generated tweets did not reach this threshold for relevance, the coder iteratively improved the search string until the 90% threshold was met. Once all stories within a particular content group achieved this threshold, it was considered validated and these stories were incorporated into the final dataset. This process, which included numerous checkpoints and multiple coder interactions, enabled the development of our uniquely-curated dataset of 456 distinct misinformation stories which spread on Twitter around the 2020 U.S. Election, *ElectionMisinfo2020.* A table of story names, search strings, and start and end dates can be found in Appendix V.

Results

The content and structure of *ElectionMisinfo2020* allow for otherwise difficult descriptive analyses. To demonstrate this capacity, we describe the dataset's network structure, partisanship, and common areas of content. We also report on "repeat spreader" accounts within this data — accounts that A) spread large amounts of misinformation in the most distinct stories; and B) were operated by public figures who were either verified or had sufficiently large follower counts. Finally, we present short case studies of four widely spread and discussed stories: (1) a narrative claiming Dominion voting systems were changing votes; (2) a story spread on Election day concerning allegations of undelivered mail-in ballots; (3) 'Sharpiegate': allegations that a large number of votes were invalidated due to the use of felt-tipped pens for filling out ballots; and (4) allegations made by a 'whistleblower' who worked for USPS in Pennsylvania.

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Political-Ideological Structure

We used an inductive, network approach to estimate partisanship for the accounts that shared tweets within the stories we identified and curated. We began with a dataset of ~500M retweets, a subset of the broad election-related Twitter dataset containing terms related to the presidential election, limited to tweets matching the terms 'vote', 'voting', 'mail', 'ballot', 'poll', and 'election.' From this dataset, we create an *coengagement projection* graph (Beers et al. 2021), a network graph where two nodes are connected if at least 10,000 accounts have retweeted both nodes (see Figure 2, below).

We leveraged the clusters produced by our network graph to estimate partisanship for the Twitter accounts in our dataset using a two step process. For the first step, we assigned a partisan label — whether the account seemed to support President Biden or then-President Trump — for each account who appeared directly in our coengagement projection network. We marked accounts that appeared in the coengagement projection network based on their location

within either the Biden-supporting or Trump-supporting clusters, shown in Figure 2. Some accounts had strong connections to both the Biden- and Trump-supporting clusters. We only marked accounts as partisan based on their network position if more than 90% of their weighted ties were within one cluster. We excluded twelve accounts based on that cutoff. Many were mainstream news accounts, like those from C-SPAN (@cspan), the Associated Press (@AP_Politics), NBC news (@NBCNews), Newsweek (@Newswek), and The Hill (@thehill). This assigned partisan values for 4,474 accounts. Then, we estimated partisanship for other accounts based on how often they retweeted other accounts who were marked in the first step. We marked an account as a Trump supporter if that account had retweeted tweets from any users from our coengagement projection network, and if 80% of those retweets were of Trump supporting accounts. Similarly, we marked an account as a Biden supporter if 80% of its retweets of tweets from users in our network were from Biden-supporting accounts. If an account met neither threshold, we did not mark them for either Trump or Biden. This second step allowed us to mark 1,580,365 accounts, or 57% of all accounts. Though many accounts remained unmarked, those accounted for a small portion of all tweets: we were able to mark the partisanship of the accounts for 94% of the tweets in *ElectionMisinfo2020*.

Figure 2

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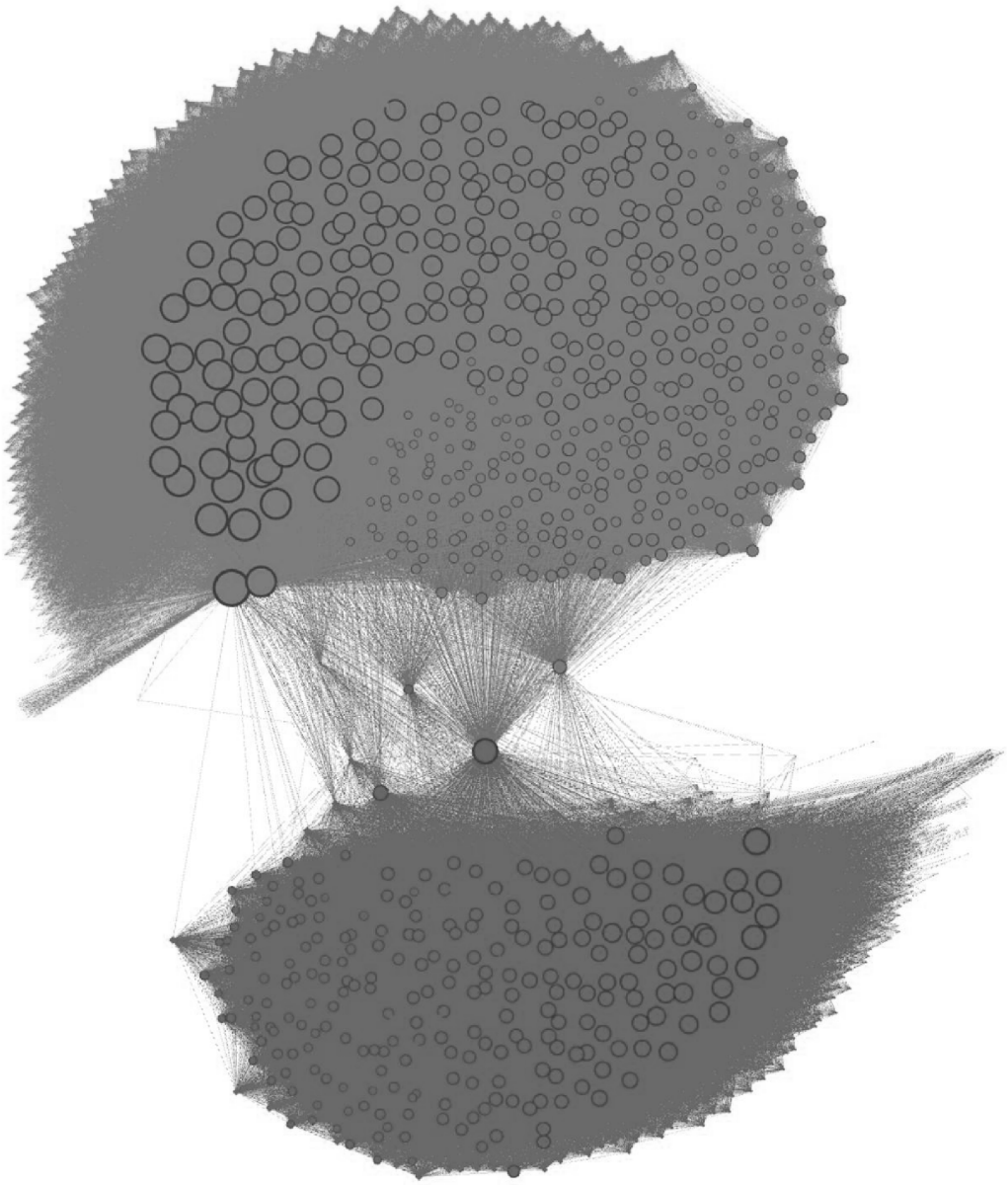

Figure 2 Caption: A visualization of an coengagement projection graph (Beers et al. 2021) where two accounts share a tie of at least 10,000 accounts retweeting both accounts at least once. Nodes are sized by their degree, with weighted edges. We used Gephi to visualize this data, with the ForceAtlas2 layout algorithm. Using this retweet projection, major political accounts cluster into two, large, partisan groups using a modularity clustering algorithm with resolution 1.0. The cluster on the top, colored red, includes former President Trump and many

of his high-profile supporters, while the bottom, blue cluster includes President Biden and many of his high-profile supporters.

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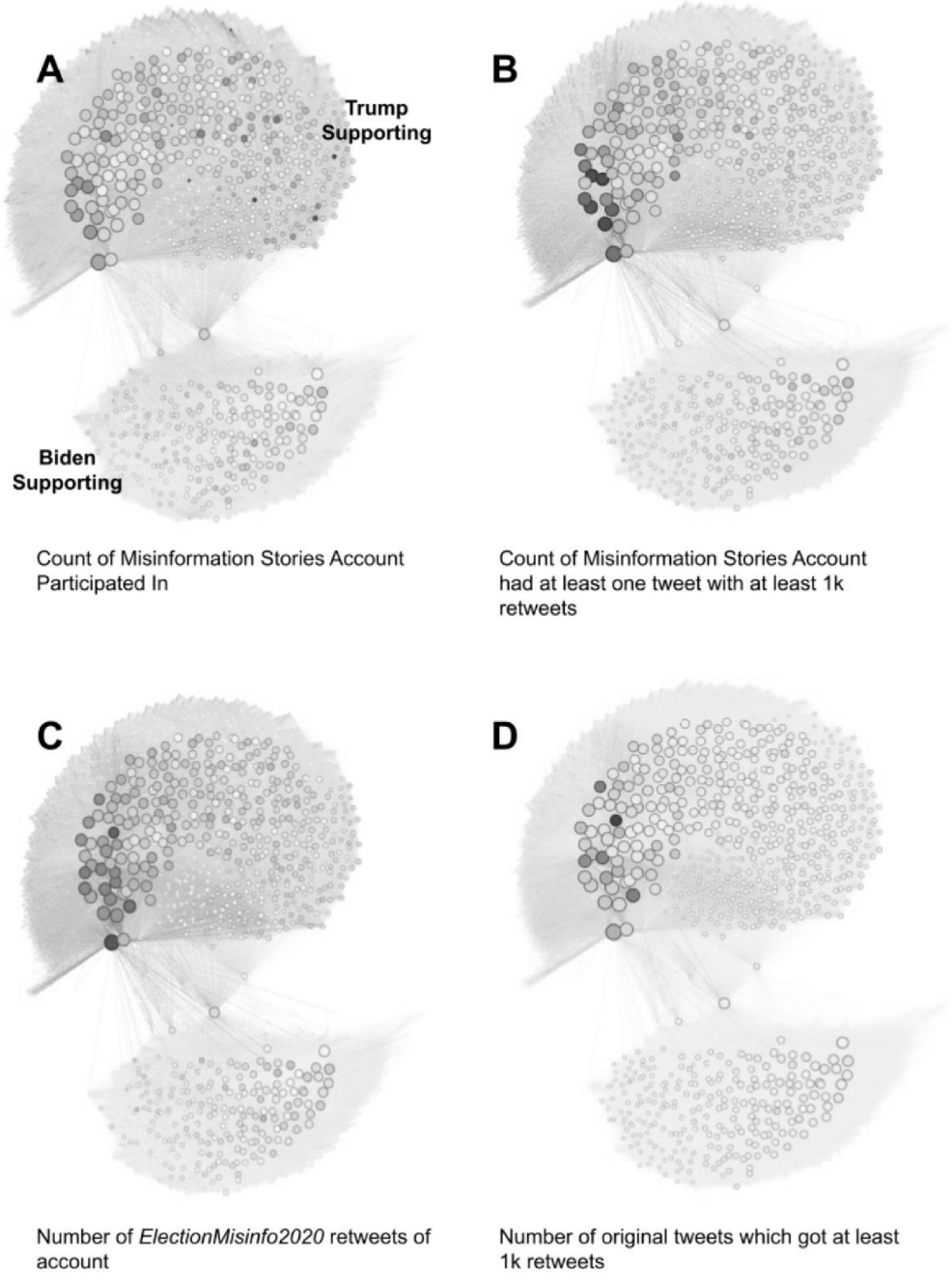
Figure 3



Count of Misinformation Stories Account Participated In

Count of Misinformation Stories Account had at least one tweet with at least 1k retweets

Number of *ElectionMisinfo2020* retweets of account

Number of original tweets which got at least 1k retweets

Figure 3 Caption: The same coengagement projection graph shown in Figure 2, but colored by accounts' participation in the misinformation stories contained in *ElectionMisinfo2020.* 3a is shaded based on the number of misinformation stories in which the account had any tweet, retweet, quote tweet, or reply. 3b is shaded by the count of misinformation stories an account has an original tweet, quote tweet, or reply which received at least 1k retweets. 3c is shaded by the total number of retweets all of an account's tweets, quote tweets, and replies received in *ElectionMisinfo2020*. Finally, 3c is shaded by the number of an accounts tweets, quote tweets, and replies which received at least 1k retweets.

To understand how different stories within *ElectionMisinfo2020* spread through pro-Trump and pro-Biden Twitter communities, we can map those stories onto the coengagement projection graph. Figure 3 shows the same network as in Figure 2, but shades nodes by their participation in misinformation stories using four different metrics. All four methods show some involvement from accounts in both clusters, but also a disproportionately large amount of misinformation activity in the Trump-supporting cluster.

In Figure 3A, accounts are colored based on how many stories they participated in — through original tweets or retweeting others. We can see that the darkest nodes, those that participated in the largest number of misinformation stories, are smaller nodes in the Trump supporting cluster. However, many notes in the Biden-supporting cluster are also colored; there were active participants in both clusters who participated in sharing multiple election-related stories that were determined to be false or misleading.

In Figure 3B, we only count stories where an account posted an original tweet with at least 1k retweets — in other words, where an account contributed original content that was highly retweeted as part of a misinformation story. This is also the metric we use for our repeat spreaders analysis below. By this measure, the darkest nodes are also some of the largest nodes in the Trump-supporting cluster, including then-President Trump's account itself. And indeed, our repeat spreader analysis below reveals that former President Trump's account was repeatedly influential in the spread of different misinformation stories.

Figure 3C focuses on the number of total retweets an account garnered which were part of *ElectionMisinfo2020*, a measure of its overall "influence" in the spread of election-related misinformation, though not necessarily its role in spreading different stories. Finally, Figure 3D indicates the relative number of original tweets each account posted which were part of *ElectionMisinfo2020* and got more than one thousand retweets, a combined signal of activity and influence.

Taken together, these graphs show that, across multiple metrics of how much election misinformation spread on Twitter, it is clear that misinformation spread more within pro-Trump communities than pro-Biden communities. There are some accounts in the pro-Biden cluster who did spread misinformation effectively, though when compared with the pro-Trump cluster, those accounts were much fewer in number and far less central in their community's structure.

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Election Misinformation by Time and Partisanship

We used the partisanship labels to estimate the spread of misinformation about the election by pro-Biden and pro-Trump communities over time from September to December and for each of our content groups and misinformation stories. We only used partisanship from accounts we were able to classify either directly through their membership in a network cluster from the network shown in Figure 2, or who retweeted accounts from one of those clusters more than 80% of the time, as discussed in the 'Political-Ideological Structure' section above.

Using those classified accounts, we made plots of partisan share of misinformation spread about the US election over time, and for each of our content groups and misinformation stories.

Figure 4 shows our measure of partisan spread, during our study period, of tweets by Trump supporting and Biden supporting accounts related to any of the 456 misinformation stories we identified.

Figure 4

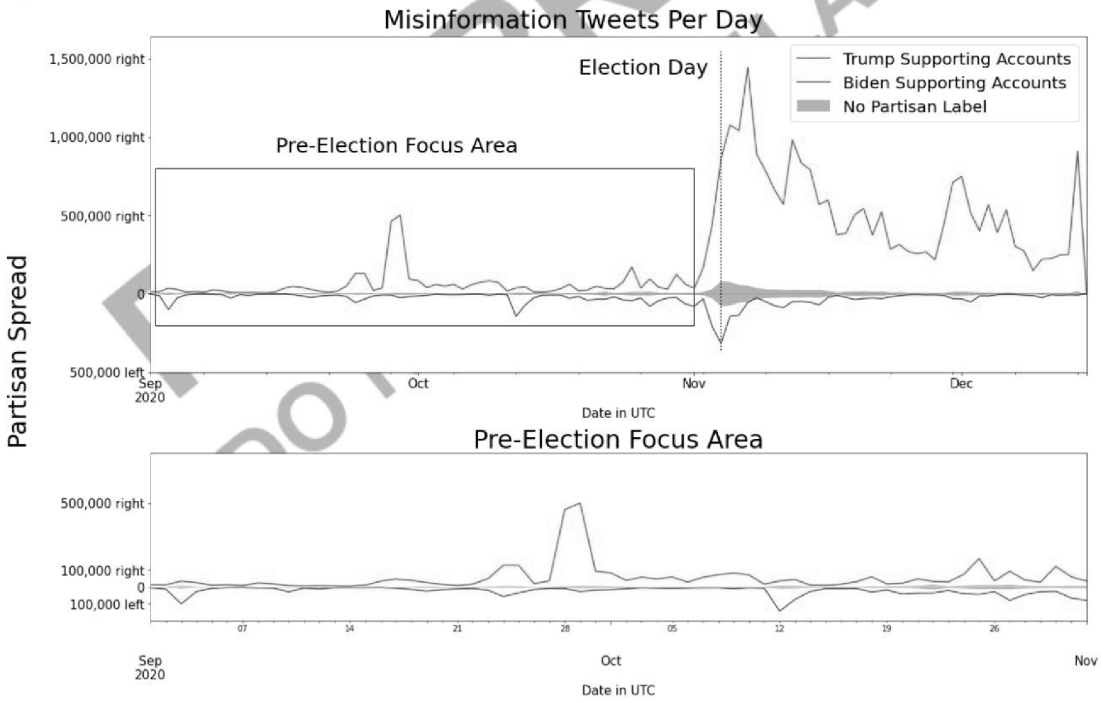

Figure 4 Caption: Temporal plot of the number of tweets in *ElectionMisinfo2020* for each day from September 1, 2020 to December 15, 2020, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue

and downwards. We show tweets from accounts whose partisanship that we were unable to classify as a gray ribbon.

Examining misinformation spread overtime shows that before the election there were already a large number of misinformation tweets each day from both Trump and Biden supporters, and that the amount on both sides increased in late October and early November — going into and immediately following the election. The median number of pre-election tweets each day was 35k from Trump supporters and 15k from Biden supporters. These early tweets, especially among Trump supporters, contained many of the themes that were popular after the election on November 3.

On and immediately after election day, the volume of misinformation increased for both Trump and Biden supporters. However, the proportion was highly skewed toward pro-Trump accounts: even on election day, when the outcome of the race was uncertain, there were over 1 million misinformation-related tweets from Trump supporters and less than 500k from Biden supporters. Once the results clearly showed that Biden would win, the partisan difference in misinformation volume increased: Biden supporters generally stopped engaging with misinformation on Twitter other than to challenge key narratives. Trump supporters, on the other hand, frequently tweeted during this period — which held some of our largest volume misinformation stories like Dominion, Sharpiegate, and others, including accusations of partisan counting methods, and suggestions that large numbers of ballots were cast in the name of dead people.

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Largest Content Groups

We intentionally organized *ElectionMisinfo2020* to capture both the spread and the content of misinformation. Content groups, collections of stories that have similar narrative or thematic components, are the broadest categories of misinformation in the dataset. The temporal dynamics of the five largest content groups are shown in Figure 5.

The largest content group, ‘Technology’, includes misinformation stories alleging that votes were changed digitally, about hacking allegations, and about the false claims concerning Dominion voting systems. The second largest group focused on allegations of political actors illegally collecting individual ballots, or ‘Ballot Harvesting’, including the allegations made by Project Veritas (Astor 2020), and allegations that operatives targeted and misled elderly voters. The third largest group of stories we called ‘USPS Accusations’. It focused on false accusations that the U.S. Postal Service (including its leadership and/or employees) was improperly interfering with the election and was mostly spread by Biden-supporting accounts. The fourth largest group collected stories surrounding how votes were counted, labeled ‘Partisan Vote Counting/Recording.’ Many of those stories were allegations about improper handling of ballots, or delays in counting timed to benefit one candidate. The fifth largest content group was made up of stories which alleged that votes had been cast in the name of dead people. This group included many allegations of votes recorded for specific deceased individuals, as well as claims that large numbers of people with birthdays in 1900 had ballots cast for them.

Figure 5

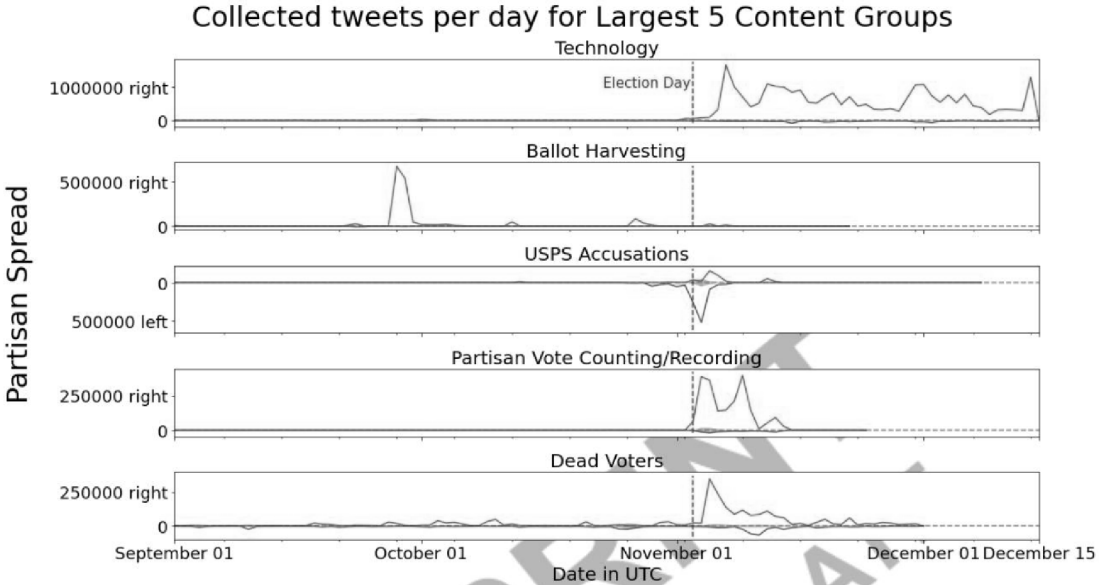

Figure 5 Caption: Temporal plot of the number of tweets in the five largest content groups for each day from September 1, 2020 to December 15, 2020, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue and downwards. We show tweets from accounts whose partisanship that we were unable to classify as a gray ribbon.

Four out of the top five content groups were primarily spread by Trump-supporting accounts. Only allegations about USPS involvement in election fraud skewed towards Biden supporters. More information about the content groups, including over-time plots for each one can be found in Appendix I, while the keywords and content groups for each misinformation story are in Appendix V.

Repeat Spreaders

We used our dataset to identify accounts that repeatedly spread false and misleading information about the election through multiple, distinct stories. Efforts to discredit the election took shape over time and across many different false/misleading narratives, and misinformation stories prior to the election seemed to fertilize the ground for the prolific spread we saw after the election. To measure the impact accounts had on that misinformation ecosystem, we chose to measure the impact of specific accounts in their influence in the spread of multiple, distinct misinformation stories. Compared to counting overall tweets (or retweets of that account) which could come from a single very large tweet from a single misinformation story, looking at large tweets across multiple stories allows us to reveal the accounts that repeatedly spread election-related mis- and disinformation. We identified accounts who had at least one original

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tweet, quote tweet, or reply in the *ElectionMisinfo2020* dataset which received more than 1,000 retweets, a threshold we considered a reasonable measure of an account's influence. Since we are interested in repeated spread of false and misleading narratives — in part because the disinformation often takes place through a campaign and incorporates multiple different narratives — we looked at how many distinct stories each account was influential in spreading, i.e in which they posted a tweet that met the 1,000 retweet threshold. We refer to this as a measure of 'repeat spreaders.'

This method has a different focus than other measures of influence commonly used in the study of rumors and misinformation, differentiating it from those using the total number of retweets or shares associated with each account or by using the h-index (Gallagher et al. 2021). The total number of retweets or shares is a reasonable measure of an account's influence in a particular discursive space, and it is commonly used in journalistic studies of misinformation (see, for example, CCDH 2021). However, the power-law distribution of social media spread and sharing means that using the raw count of retweets or a similar sharing metric can easily be biased towards accounts with a small number of tweets with very large spread. Moreover, in our data those very large tweets also tend to be associated with the most widely spread misinformation stories. Since we are interested in accounts who are influential across multiple misinformation stories, this measure is insufficient. However, we investigate both of these alternatives in Appendix IV.

Table 1 shows the top 36 'repeat spreader' accounts, ordered by the number of stories they shared with an influential (>1000 retweets) tweet. The top 36 accounts alone were responsible for 10,132,847 out of 36,793,064--or 27.5%--of all misinformation connected retweets and quote tweets we collected. All of the top 36 are Trump supporters, Table 1 also lists the two highest-ranked Biden-supporting accounts — with the first Biden-supporting account, @jennycohn1, ranked 47th. The partisanship is underscored by the fact that the list includes former President Trump and his two adult sons, as well as his lawyer Rudy Giuliani. This list also shows the connection between the 2020 election and the Qanon movement: both @prayingmedic and @cjtruth are in this top 36 list and regularly spread Q-related material. Finally, this list also shows the role of right-leaning media outlets like the Gateway Pundit and Breitbart News, or their presenters, such as Candace Owens, Sean Hannity and Mark Levin. Similarly, Trump-supporting political and online activists like Steven Crowder and Charlie Kirk appear on the list.

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Table 1

	User Screen Name[2]	Verified User	Stories With Large Tweet (>1000 RTs)	Number of Retweets	Stories With Any Tweet or Retweet	Number of Followers
1	**RealJamesWoods**	Yes	26	425,451	31	2,743,289
2	**gatewaypundit**	Yes	24	438,484	43	440,023
3	**TomFitton**	Yes	22	181,413	29	1,349,282
4	**JackPosobiec**	Yes	22	176,531	41	1,247,209
5	**realDonaldTrump**	Yes	21	2,699,401	27	88,965,706
6	**DonaldJTrumpJr**	Yes	21	475,283	52	6,495,397
7	**EricTrump**	Yes	19	586,691	29	4,580,170
8	**ChuckCallesto**	Yes	16	306,077	26	319,609
9	**prayingmedic**	No	15	123,724	32	466,324
10	**robbystarbuck**	Yes	14	88,417	50	208,433
11	**JamesOKeefeIII**	No	13	452,749	15	1,021,498
12	**MichaelCoudrey**	Yes	13	184,850	34	302,031
13	**RealCandaceO**	Yes	12	282,525	12	2,822,802
14	**cjtruth**	No	12	72,532	18	273,741
15	**stillgray**	Yes	11	75,688	43	328,525
16	**RichardGrenell**	Yes	10	289,835	17	697,825
17	**RyanAFournier**	Yes	10	117,774	35	1,134,420
18	**marklevinshow**	Yes	10	100,305	10	2,853,449
19	**TrumpWarRoom**	Yes	10	93,186	29	1,237,123
20	**Timcast**	Yes	10	91,862	13	801,512
21	**michellemalkin**	Yes	10	87,237	21	2,222,503
22	**TheRightMelissa**	No	10	68,235	29	519,051
23	**scrowder**	Yes	10	67,322	12	1,335,428
24	---------[3]	No	10	53,383	19	23,288
25	**pnjaban**	Yes	10	46,164	32	230,152
26	**charliekirk11**	Yes	9	410,124	12	1,925,942
27	**RudyGiuliani**	Yes	9	274,532	9	1,312,916
28	**ScottAdamsSays**	Yes	9	116,409	16	652,399
29	**jsolomonReports**	No	9	98,793	12	847,680
30	**seanhannity**	Yes	9	97,430	9	5,548,650
31	**mikeroman**[4]	No	9	77,108	16	29,596
32	**DC_Draino**	No	9	75,265	14	431,732
33	**seanmdav**	Yes	9	69,715	48	382,653
34	**BreitbartNews**	Yes	9	52,567	16	1,667,102
35	**joshdcaplan**	Yes	9	30,696	19	93,617
36	**johncardillo**	Yes	9	24,726	39	280,938
48	**jennycohn1**	No	7	78,104	37	173,789
55	**donwinslow**	No	7	24,725	24	539,481

[2] This list includes the screen names of many twitter accounts identified as repeat spreaders. We aim to only share account names if the person or people who run the account do not have a reasonable expectation of privacy. Specifically, we share the screen names of accounts that are any of these three things: 1) Verified twitter users; 2) Public figures, ie politicians and celebrities; 3) have more than 50k twitter followers.

[3] This was an unverified account with 23k followers at the time of the election. They claimed to represent the Republican party of Philadelphia.

[4] While Mike Roman is not verified and has fewer than 50k followers, we consider him a public figure because of his roles in both of then-President Trump's campaigns, and his job as Director of Special Projects and Research in then-President Trump's White House.

Case Studies

Building on the repeat spreaders analysis, we briefly investigate four of our 456 misinformation stories, showing their partisan spread over time, as red and blue lines in Figures 6-9, and the proportion of that spread that can be tied (via retweets) to our top 150 repeat spreaders which we represent with pink and light blue fill. We used 150 accounts because they were also responsible for almost exactly half of the retweets and quote tweets in the data. Larger amounts of pink or blue shading suggest that the story, at that point of time, was more 'influencer driven', since a large portion of the tweets were connected to the top 150 repeat spreaders. On the other hand, relatively small amounts of shading suggest a more 'organic' story, with more of the retweets being connected to less prominent accounts.[5] We also provide a brief content overview of each story and highlight particularly influential tweets. Being able to combine the context of repeat spreaders to an investigation of a particular story is one strength of the *ElectionMisinfo2020* dataset.

Dominion Voting Systems

By far the largest story in our dataset, and indeed the largest misinformation story of the 2020 Election, was the allegation that election software developed by Dominion Voting Systems had systematically changed votes from candidate Trump to candidate Biden. Past allegations of fraud in voting systems have been raised on the left (Rodhe 2004), but in 2020 this story spread almost exclusively among pro-Trump accounts and echoed previous long-standing rumors pertaining to voting machine vulnerabilities. The sotry began with an error by an official in Antrim County, MI which resulted in temporarily inaccurate vote tallies. The error was not related to Dominion's software, but resulted from a mistake in the process of updating the software on vote tabulation computers (Michigan Department of State 2020).

Figure 6

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[5] The Top 150 repeat spreaders are a good measure of the top 150 influential users in the spread of original misinformation content. However, note that we identified only 16 of those users as Biden supporters. As such, that group is a less-good measure of the influencer-driven or organic nature of misinformation spread among Biden-supporters than among Trump-supporters.

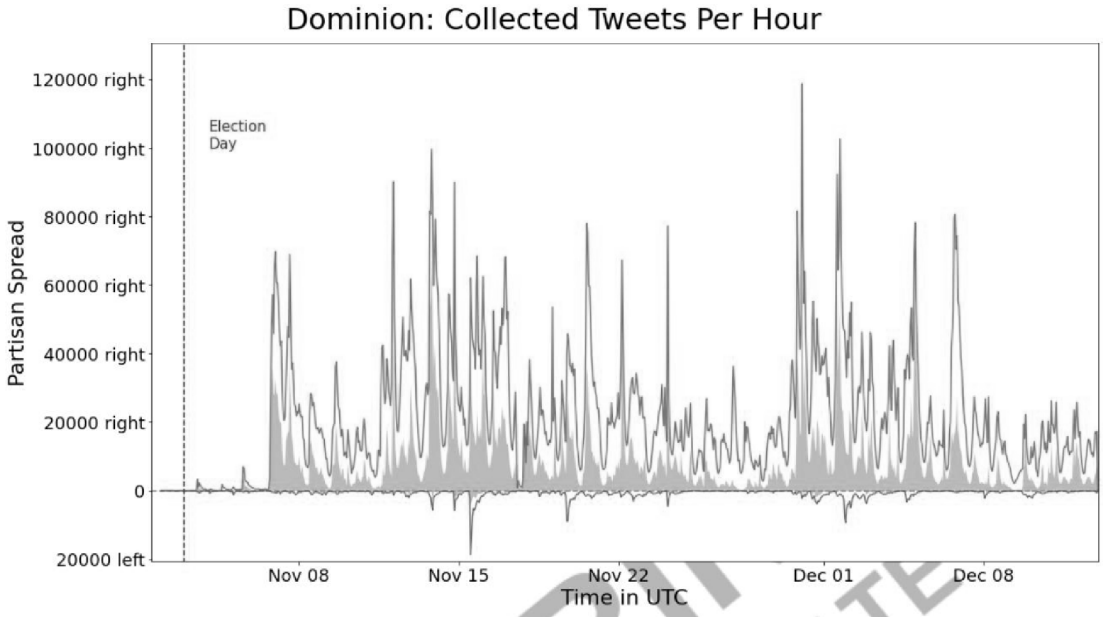

Figure 6 Caption: Temporal plot of the number of tweets per hour in the 'Dominion' story, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue and downwards.The red and blue fill reflects the portion of total spread that can be connected to an original tweet by one of the top 150 repeat spreaders.

The earliest small spikes in Figure 6 were related to that story about Antrim County and an incident in Georgia, which was characterized by similar claims. The story grew with a tweet by repeat spreader @robbystarbuck reading:

> One Michigan county clerk caught a glitch in tabulation software so they hand counted votes and found the glitch caused 6,000 votes to go to Biden + Democrats that were meant for Trump and Republicans. 47 MI counties used this software. All must check now! (November 6 6:00 UTC)

That tweet was retweeted over 44k times. It highlighted the earlier Antrim County issue, calling it a 'glitch', but erroneously connected it to other counties in Michigan. These allegations combined transformed the story about an essentially insignificant and isolated mistake into what seemed to be evidence of systemic fraud. A similar tweet by fellow repeat spreader @stillgray followed which read:

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> This is big. The software used to tabulate the votes in one county sent at least 6,000 Trump votes to Biden. 47 counties used the software. Other states may have, too. Was it a glitch or a 'feature'?

This tweet, which was retweeted 37k times, also takes the Antrim event as a signal of a larger issue spreading throughout and beyond the state of Michigan. A quote tweet (of this tweet) by Donald Trump Jr. was retweeted another 28k times. After this point, the narrative was picked up by then-President Trump, who used the term 'dominion' in 24 tweets which garnered a total of 849k retweets between November 6 and December 15, 2020.

Dominion, then, was a prime example of an isolated incident which was reframed to suit the narrative that election fraud was systematic and widespread. It was spread early on by repeat spreaders, and then repeatedly emphasized by then-President Trump. The influencer-driven nature of the Dominion story is clear in Figure 6: a relatively high proportion of spread, even early on, can be attributed to activity from repeat spreaders, as shown by the pink fill. This narrative was the most tweeted (and retweeted) misinformation story in our data, possibly because, to those who believed or wanted to believe it, such a software glitch alone seemed plausibly severe enough to overturn the election.

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Undelivered Ballots

Though none of the top 36 repeat spreaders we identified were Biden supporters, a few Election 2020 misinformation stories did spread widely among Biden-supporting accounts. The largest of these concerned allegations that hundreds of thousands of mail-in ballots would be delayed and left uncounted. These claims were often connected to suggestions that such delays were purposeful, often directly accusing Postmaster General Louis DeJoy, a Trump-appointee, of intentionally sabotaging the mail-in vote.

Figure 7

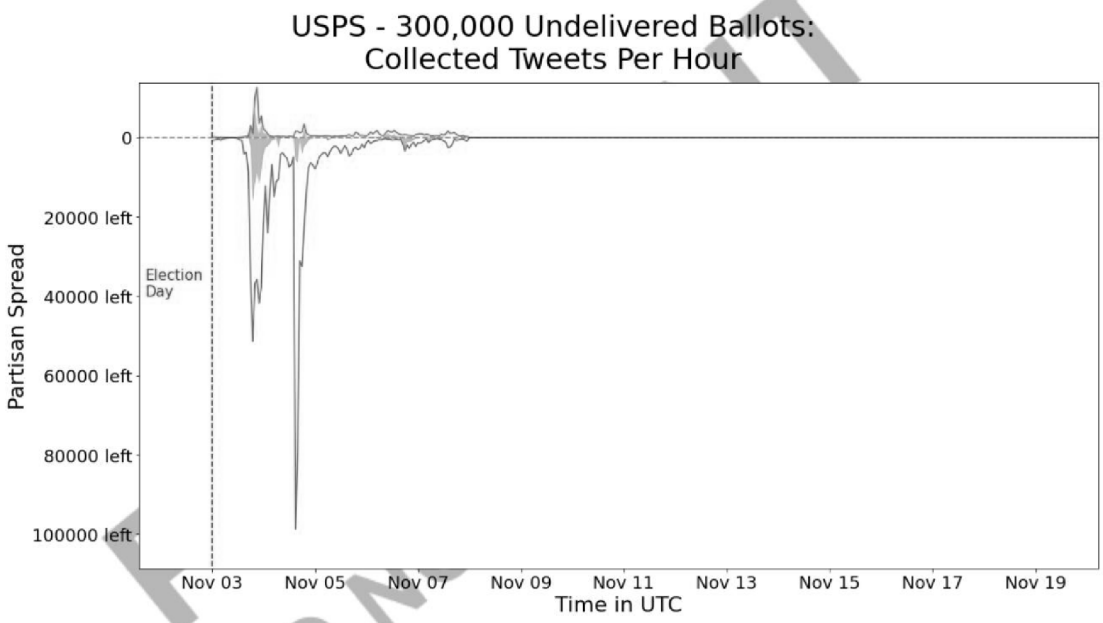

Figure 7 Caption: Temporal plot of the number of tweets per hour in the 'USPS undelivered ballots' story, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue and downwards.The red and blue fill reflects the portion of total spread that can be connected to an original tweet by one of the top 150 repeat spreaders.

This misinformation story, shown in Figure 7, seems to have begun with an apparently accurate accounting of delays published by John Kruzel, a reporter for *The Hill*. Kruzel's tweet showed a list of ballots which had not yet received a delivery scan and referenced that a hearing would soon take place to address the problem. Though Kruzel's tweet was technically accurate, it was misleading since the number of ballots listed as undelivered tended to be much smaller than the vote margins in those areas (so they would not have impacted the final tally). Additionally, the USPS claimed that many of the ballots on the list were delivered but may not have had a

delivery scan. Additionally, while the original tweet was technically accurate but somewhat misleading (around impact), many quote tweets of Kruzel's original took the allegations much further (i.e. suggesting intentional fraud). For example, Ari Berman's quote tweet read:

> Louis DeJoy should be held in contempt of court & face criminal charges for obstructing an election if these ballots are not delivered on time

implying that the delay could be attributed to Dejoy's role as the Postmaster General. This was a common narrative from Biden-supporting accounts, which, though less common, were still represented in 16 of the top 150 repeat offender accounts.

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Sharpiegate

Another prominent story in our data (see Figure 8), termed "SharpieGate" by some of its proponents, reveals a slightly different dynamic — beginning somewhat organically and later receiving amplification by influential accounts. SharpieGate began early on Election day, when voters in several polling locations noted that the Sharpie pens they had been given to vote were bleeding through the ballots — and some began to share concern (and later suspicion) that their votes had not been counted. Officials in Arizona (the state the narrative focused on most heavily) noted that bleed through would not affect their votes as the ballots were designed to be used with Sharpie pens as they allow marks to dry faster than with ink pens (Leingang and Fifield 2020).

Figure 8

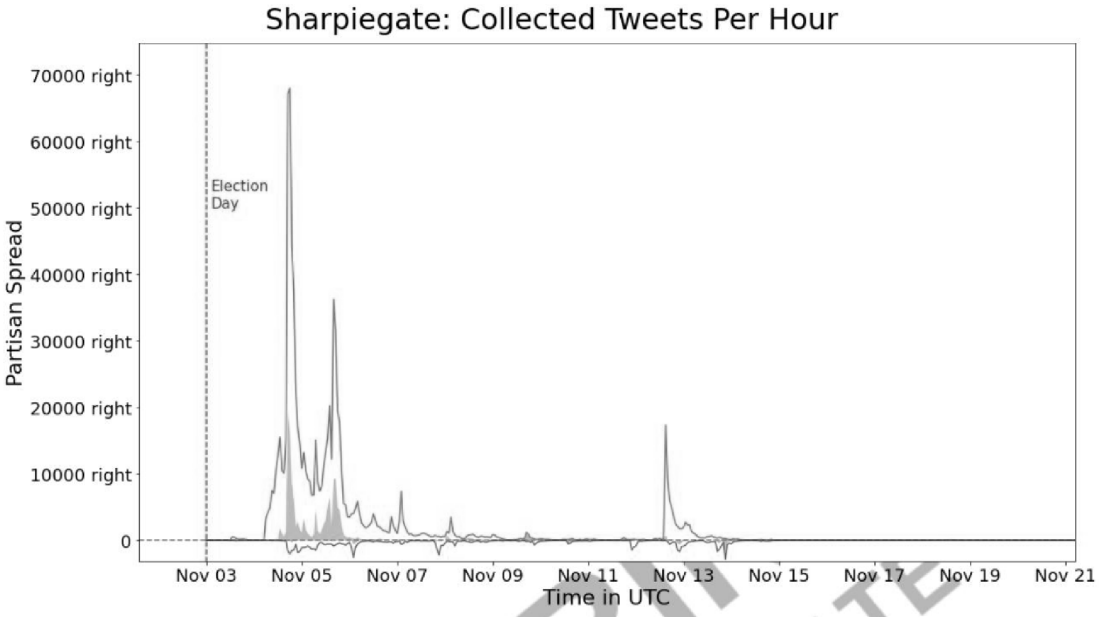

Figure 8 Caption: Temporal plot of the number of tweets per hour in the 'Sharpiegate' story, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue and downwards.The red and blue fill reflects the portion of total spread that can be connected to an original tweet by one of the top 150 repeat spreaders.

Early on, the spread of SharpieGate was largely "bottom up" — moving through tweets and retweets of low-follower accounts and often accompanied by a tone of concern or, in some cases, suspicion. Note that there is little pink shading (retweets of repeat spreader accounts) in the early spread of this rumor (Figure 8), underscoring its initially "organic" nature. This changed as the narrative went into its first (and highest) peak on November 4.

In the early hours of the day after the election, shortly after Arizona was called for President Biden, the tone of the Sharpie conversation began to shift from concern and suspicion towards outright accusation that Trump voters in particular were being purposefully disenfranchised by being forced to use Sharpie pens. For example, @m1dn7ghtrider posted:

> `They gave Trump voters sharpies and now their votes are being invalidated! WTF!`

which explicitly alleges intentional fraud. As that day progressed, more influencers began to participate in the propagation of that false narrative.

However, even at its peak, a relatively small proportion of the tweets, quote tweets and retweets in the Sharpiegate story came from our top 150 repeat spreaders, who account for 50% of all retweets and quote tweets in *ElectionMisinfo2020.* Instead, the Sharpiegate story seems to

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have been unusual among large narratives in that it had larger numbers of tweets spread by less influential accounts. This may be connected to the experiential nature of the story.

Sharpiegate also had a notable late spike, around November 13, when influencers revived the story as part of a general effort at that time to weave together different misinformation stories into conspiracy theories. For example, @CodeMonkeyZ claimed that the ballots marked with Sharpies would have been saved in a separate folder, allowing investigators to uncover the plot. Of course, that was not the case.

USPS PA Whistleblower

Our fourth and final case study reveals a very different dynamic. Many of the misinformation stories tracked in the *ElectionMisinfo2020* dataset began with real incidents. This was the case with the examples presented so far: a mistake by a county official, real counts of ballots without delivery scans, or Sharpie pens bleeding through ballots. Other incidents were completely manufactured. This seemed to be true of several of the 'whistleblower' stories that we tracked, some of which were initially spread by the group Project Veritas or its leader, James O'Keefe III. The USPS PA Whistleblower story, shown in Figure 9, featured unfounded allegations by a man claiming to be a USPS worker in Pennsylvania.

Figure 9

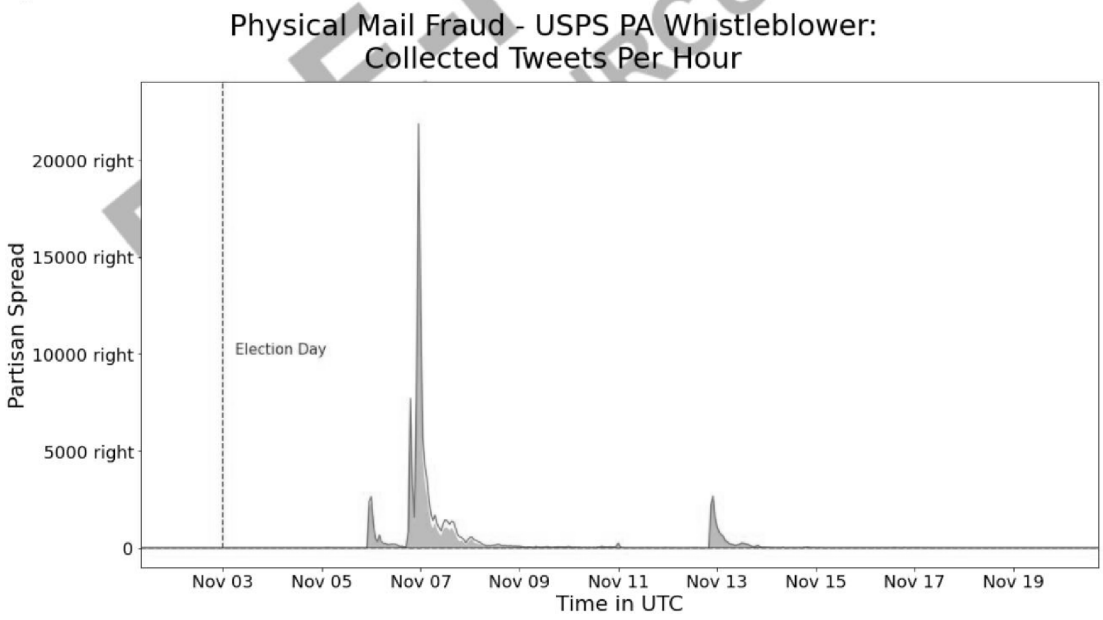

Figure 9 Caption: Temporal plot of the number of tweets per hour in the USPS PA Whistleblower story, using our partisan labels to estimate how many of those tweets were from Trump supporters, in red and upwards, or Biden supporters, in blue and downwards.The red and blue

fill reflects the portion of total spread that can be connected to an original tweet by one of the top 150 repeat spreaders.

This story was almost entirely driven by tweets from James O'Keefe III, first teasing and then releasing a video of Richard Hopkins, a USPS employee in Pennsylvania. The video and the tweets both contained allegations that the Pennsylvania Postmaster had ordered the backdating of mail-in ballot envelopes so that more of them could be counted. Hopkins walked back his allegations on November 9, admitting that he had no evidence that backdating had occurred or been ordered. However, O'Keefe's tweet and the Project Veritas video featuring his claims were still being retweeted on November 13, as part of a general attempt at spreading content questioning the outcome of the election on that day.

Discussion and Conclusion

This work presents a first-look at a novel dataset, curated in real-time by trained researchers, covering hundreds of distinct misinformation stories that spread about the 2020 U.S. Election. As we hope to have demonstrated, the scope of the *ElectionMisinfo2020* dataset gives it the potential to be used to analyze the origins, pathways to amplification, and real-world overlap of the online misinformation that surrounded the 2020 US Election and its political outcomes — including the related events on January 6, 2021. As such, we hope that the initial findings developed here will serve to inspire further research into the social media dynamics that drive and sustain misinformation — and specifically election-related misinformation. The combination of front-end identification, verification, and processing ensures that the database, while not entirely comprehensive, contains data related to misinformation stories across a variety of narratives built around many different real world (and in some cases imaginary) events. Moreover, this process enabled us to include smaller incidents, as defined by their reach and interactions on Twitter, which have often been overlooked and therefore missing from previous datasets. In addition to the scope of the stories included in the dataset, the keyword selection and validation processes give us confidence that the majority of the stories contained in *ElectionMisinfo2020* consist of tweet sets that are largely reflective of the breadth of each story as they spread on the platform in real-time.

Initial analyses, presented here, provide additional evidence for various trends identified using smaller datasets. Specifically, the main takeaways from the dataset reiterate observed asymmetric spreading by the political "right" as well as the outsized influence of "repeat offender" accounts. With regards to partisanship, we have shown that by identifying specific accounts by the candidates they most frequently interact with, we can conclude that prior evidence noting the pervasiveness of misinformation on the right was representative of a larger asymmetry, both by highly followed and less followed accounts. Though there is evidence in these data to suggest that left-affiliated accounts would have been more active in the misinformation space had Biden failed to win the election, the differences in partisan amplification were evident long before the election, as evidenced by claims that the election would be rigged in the build-up to November 3rd, as well as prior to final vote counts. This was

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particularly evident amongst highly-followed accounts, which this dataset helps tie to the spread of misinformation.

On issues of enforcement, evidence from the repeat spreaders identified in the data is aligned with previous work (Gallagher et al. 2021; CCDH 2021; EIP 2020b; CIP et al. 2021) in noting that many high impact accounts rely on interactions with misinformation stories to grow followers and sustain engagement with their account. Where incentives remain tied to follower interactions, lesser interventions, such as content labeling, are not likely to have a significant impact on the willingness of these accounts to interact with questionable content. Rather, enforcing rules more stringently on accounts which repeatedly violate rules, as well as increasing enforcement on influential, large-follower accounts could be a fruitful avenue for platforms to explore. Our own previous work, published as a “rapid response” blog (EIP 2020b) and a white paper (CIP et al. 2021), helped spotlight this role played by large influencer accounts in repeatedly spreading misinformation. Since then, others (Gallagher et al. 2021; CCDH 2021) have also brought attention to the prevalence of top-down or “elite” spread of misinformation. Some platforms have realized that repeated violations need to be treated differently with so called ‘strike systems,’ where platforms have policies to more heavily sanction accounts which repeatedly violate speech policies. These are quite common, from mainstream social platforms like Twitter and YouTube, and even on “free speech” platforms like Parler (Buckley and Schafer 2021). While these policies are not always implemented for misinformation content, the existence of these systems for other contexts would make adding them for misinformation (and specifically for disinformation) more feasible. Moreover, combining strike systems with existing policies may be more effective than isolated approaches (Bak-Coleman et al. 2021). Rather than exempting high-profile accounts from enforcement, as some platforms have done (Horwitz 2021), the large influence and potential for harm that large accounts possess suggest that these accounts ought to be held to at least as strict, if not stricter, standards than less-influential accounts.

Moreover, as evidence from the *ElectionMisinfo2020* dataset shows, top-down interactions are not the only way for misinformation to gain traction, as coordinated efforts by partisan accounts were shown to have sustained high profile misinformation on Twitter - prior to the wave of suspensions following January 6th (Tollefson 2021). This dataset offers the first real chance to examine the dynamics of other extant account groups like this, along with repeat offenders, whose dynamics we hope to interrogate further in future work. A focus on other types of misinformation, already split among content groups within our dataset, could yield information on the specific dynamics driving the amplification of various forms of misinformation online. For example, we also collected several stories related to either real, threatened, or fictional instances of political violence. These stories, which at the time largely appeared to be isolated incidents, have taken on more weight in the aftermath of the January 6th insurrection. In our final count we tallied 118 unique stories related to violence or threats of violence, split between the content groups intimidation (38), suppression (21), riots (18), discussions of a potential coup (16), protests (16), and discussions of civil war (9). Given the wider literature on the influence of violence in the destabilization of elections these stories represent an incisive threat to electoral integrity that should be the focus of further research in the buildup to future elections.

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In all, we view this new dataset as an inclusive resource for researchers interested in examining the broad scope of misinformation circulated during the months before and after the 2020 US Election. Rather than focusing on specific incidents, the live identification and post hoc validation processes should enable research that utilizes both misinformation stories with outsized impact as well as those which failed to inspire extended discussion. As a result, this data should first allow researchers to carefully examine the factors that enable certain stories to "take off" while others fade into online obscurity. Second, by exposing the pathways that specific misinformation stories take to national notoriety, we hope this database will also serve to provide insight into the characteristics of the accounts who amplify these stories along this chain. Though this database enables further examination of the most active and influential of these accounts, less is known about the accounts with less prominent profiles who often serve as a crucial link to repeat spreaders — a compelling question for future research. In addition, from a policy perspective, each misinformation story and associated tweet set can serve in studies that aim to examine the impact of specific policies or outcomes on the acceleration of misinformation.

Despite efforts to limit gaps in the development and creation of this dataset, there remain limitations. As noted in the methodology section, though the EIP's team of content analysts was trained to identify and tag potential misinformation in as neutral a manner as possible, there is no way to ensure that analysts treated information from both political sides equally. Additionally, though misinformation stories were cataloged from websites and social media platforms as far ranging as NextDoor, Parler, and Reddit, this dataset is limited to misinformation that, at least briefly, appeared on Twitter. Though Twitter does appear to have been used to disseminate the majority of these stories, there were several stories which originated on separate platforms which we were never able to track to the platform. However, we can get an idea of how prevalent cross-platform spread is by looking at the links in our data to other social media websites: 189 (46%) of the misinformation stories included at least one tweet with a link to YouTube, 77 (19%) included a link to Facebook, and 60 (15%) linked to Instagram. More than 20 (5%) stories were linked each to Tiktok, Parler, and Reddit as well. Another limitation is that our curation process does not enable us to differentiate between misinformation tweets furthering the spread of a particular story and corrective tweets attempting to limit its spread. Though preliminary evidence from this process suggests that these corrections represent only a small fraction of the total discussion, the tweets associated with each story should be considered as representing the totality of the discussion surrounding each story, rather than solely a collection of tweets containing misinformation.

Collectively, the *ElectionMisinfo2020* dataset presents an uncommonly comprehensive collection of 456 misinformation stories and 49.3 million related tweets related to the 2020 US Election. Here, we demonstrated the potential of this dataset through the identification and analysis of the 2020 Election's "repeat spreaders", which had an undue influence over the stories we identified and tracked. By drawing data directly from the stories reported and cataloged in real time by the EIP, this dataset serves as both a snapshot of circulating misinformation and a resource for researchers and policymakers alike interested in examining the online ecosystem in which these rumors and conspiracy theories flourished.

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References

Abilov, A., Hua, Y., Matatov, H., Amir, O., & Naaman, M. (2021). VoterFraud2020: a Multi-modal Dataset of Election Fraud Claims on Twitter. *Proceedings of the International AAAI Conference on Web and Social Media*, *15*(1), 901-912.

Adamic, L. A., Lento, T. M., Adar, E., & Ng, P. C. (2016, February). Information evolution in social networks. In Proceedings of the ninth ACM international conference on web search and data mining (pp. 473-482).

Adler, W. T., & Thakur, D. (2021). A Lie Can Travel: Election Disinformation in the United States, Brazil, and France. Center for Democracy & Technology. (pp.1-60). Available at: https://cdt.org/insights/cdt-and-kas-report-a-lie-can-travel-election-disinformation-in-the-united-states-brazil-and-france/

Allport, G. W., & Postman, L. (1947). The psychology of rumor. New York: Holt, Rinehart & Winston.

Ananny, M. (2018). The partnership press: Lessons for platform-publisher collaborations as Facebook and news outlets team to fight misinformation. Tow Center for Digital Journalism.

Andrews C., E. Fichet, S. Ding, E. S. Spiro, and K. Starbird. (2016). Keeping Up with the Tweet-Dashians: The Impact of 'Official' Accounts on Online Rumoring. In Proceedings of the ACM 2016 Computer Supported Cooperative Work (CSCW 2016)

Arif, A., Shanahan, K., Chou, F. J., Dosouto, Y., Starbird, K., & Spiro, E. S. (2016, February). How information snowballs: Exploring the role of exposure in online rumor propagation. In Proceedings of the 19th ACM Conference on Computer-Supported Cooperative Work & Social Computing (pp. 466-477).

PRE-PRINT
DO NOT CIRCULATE

Astor, M. (2020 September 29). Project Veritas Video Was a ‘Coordinated Disinformation Campaign,’ Researchers Say. The New York Times. https://www.nytimes.com/2020/09/29/us/politics/project-veritas-ilhan-omar.html.

Baker, P. and M. Haberman (2020, November 7). In Torrent of Falsehoods, Trump Claims Election Is Being Stolen. The New York TImes. https://www.nytimes.com/2020/11/05/us/politics/trump-presidency.html?smid=url-share

Beers, A., J. S. Schafer, I. Kennedy, M. Wack, E. S. Spiro, and K. Starbird. (2021) Ccoengagement Projections for the 2020 Election. Preprint.

Benkler, Y., Tilton, C., Etling, B., Roberts, H., Clark, J., Faris, R., Kaiser, J, & Schmitt, C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Available at: https://cyber.harvard.edu/publication/2020/Mail-in-Voter-Fraud-Disinformation-2020

Bak-Coleman, J. B., Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Spiro, E., … West, J. (2021, May 23). Combining interventions to reduce the spread of viral misinformation. Preprint. https://doi.org/10.31235/osf.io/4jtvm

Bittman, L. (1985). The KGB and Soviet disinformation: an insider's view. Washington: Pergamon-Brassey's.

Blake, A. (2021 January 7). 'Let's have trial by combat': How Trump and allies egged on the violent scenes Wednesday. *The Washington Post*. https://www.washingtonpost.com/politics/2021/01/06/lets-have-trial-by-combat-how-trump-allies-egged-violent-scenes-wednesday/

Bordia, P., & DiFonzo, N. (2004). Problem solving in social interactions on the Internet: Rumor as social cognition. Social Psychology Quarterly, 67(1), 33-49.

Buckley, N., & Schafer, J. S. (2021, August 7). “Censorship-free” platforms: Evaluating content moderation policies and practices of alternative social media. https://doi.org/10.31235/osf.io/yf9qz

Calo, R. C. Coward, E. S. Spiro, K. Starbird, J. West. (2021). How do you solve a problem like misinformation? Science Advances. https://www.science.org/doi/10.1126/sciadv.abn0481

Caplow, T. (1947). Rumors in war. Social Forces, 298-302.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. Stanford Digital Repository: Election Integrity Partnership. v1.3.0 Available at: https://purl.stanford.edu/tr171zs0069

PRE-PRINT
DO NOT CIRCULATE

Center for Countering Digital Hate. (2021). The Disinformation Dozen: Why Platforms Must Act on Twelve Leading Online Antivaxxers. Center for Countering Digital Hate. https://www.counterhate.com/disinformationdozen.

Chowdhury, F. A., Saha, D., Hasan, M. R., Saha, K., & Mueen, A. (2021). Examining factors associated with twitter account suspension following the 2020 US presidential election. arXiv preprint arXiv:2101.09575.

Cramer, M. (2021 January 9). "Confederate Battle Flag in the Capitol: A 'Jarring' First in U.S. History". *The New York Times.* https://www.nytimes.com/2021/01/09/us/politics/confederate-flag-capitol.html

Cottrell, D., Herron, M. C., & Westwood, S. J. (2018). An exploration of Donald Trump's allegations of massive voter fraud in the 2016 General Election. Electoral Studies, 51, 123-142.

Dow, P. A., Adamic, L., & Friggeri, A. (2013, June). The anatomy of large facebook cascades. In Proceedings of the International AAAI Conference on Web and Social Media (Vol. 7, No. 1).

Giglietto, F., Righetti, N., & Marino, G. (2020). Detecting Coordinated Link Sharing Behavior on Facebook during the Italian Coronavirus Outbreak. AoIR Selected Papers of Internet Research.

Eggers, A. C., Garro, H., & Grimmer, J. (2021). No evidence for systematic voter fraud: A guide to statistical claims about the 2020 election. Proceedings of the National Academy of Sciences, 118(45).

Election Integrity Partnership (2020a). Evaluating Platform Election-Related Speech Policies. Available at: https://www.eipartnership.net/policy-analysis/platform-policies

Election Integrity Partnership (2020b). Repeat Offenders: Voting Misinformation on Twitter in the 2020 United States Election. Available at: https://www.eipartnership.net/rapid-response/repeat-offenders

Freelon, D., & Wells, C. (2020). Disinformation as political communication.

Friggeri, Adrien, Lada Adamic, Dean Eckles, and Justin Cheng. "Rumor cascades." In Proceedings of the International AAAI Conference on Web and Social Media, vol. 8, no. 1. 2014.

Gallagher, R. J., Doroshenko, L., Shugars, S., Lazer, D., & Welles, B. F. (2020). Sustained online amplification of COVID-19 elites in the United States. arXiv preprint arXiv:2009.07255.

Gardner, A. (2021, January 3). 'I just want to find 11,780 votes': In extraordinary hour-long call, Trump pressures Georgia secretary of state to recalculate the vote in his favor. *The Washington*

PRE-PRINT
DO NOT CIRCULATE

Post.
https://www.washingtonpost.com/politics/trump-raffensperger-call-georgia-vote/2021/01/03/d45acb92-4dc4-11eb-bda4-615aaefd0555_story.html

Goidel, K., Gaddie, K., & Goidel, S. (2019). Rigged-Election Rhetoric: Coverage and Consequences. PS: Political Science & Politics, 52(2), 229-238. doi:10.1017/S1049096518001646

Horwitz, J. (2021, September 13). Facebook says its rules apply to all. company documents reveal a secret elite that's exempt. The Wall Street Journal. Retrieved December 8, 2021, from https://www.wsj.com/articles/facebook-files-xcheck-zuckerberg-elite-rules-11631541353.

Huang, B., & Carley, K. M. (2020). Disinformation and misinformation on twitter during the novel coronavirus outbreak. arXiv preprint arXiv:2006.04278.

Hunt, K., Wang, B., & Zhuang, J. (2020). Misinformation debunking and cross-platform information sharing through Twitter during Hurricanes Harvey and Irma: a case study on shelters and ID checks. Natural Hazards, 103, 861-883.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. Data & Society, 3(22), 1094-1096.

Kapferer, J. N. (1987). Rumeurs: le plus vieux média du monde. Editions du seuil.

Knapp, R. H. (1944). A psychology of rumor. Public opinion quarterly, 8(1), 22-37.

Lazer, D., Ruck, D. J., Quintana, A., Shugars, S., Joseph, K., Grinberg, N., … Green, J. (2021, February 10). The COVID States Project #18: Fake news on Twitter. https://doi.org/10.31219/osf.io/vzb9t

Leingang, R., & J. Fifield. (2020, November 4). Sharpies and felt-tip pens on Arizona ballots won't disqualify votes, elections officials say. USA Today. https://www.usatoday.com/story/news/politics/elections/2020/11/04/arizona-ballots-counted-if-marked-sharpies-felt-tip-pens/6162463002/

Marwick, A., & Lewis, R. (2017). Media manipulation and disinformation online. New York: Data & Society Research Institute, 7-19.

McFall, C. and B. Mears. (2021, July 30). Trump told DOJ officials in December 2020 to call election 'corrupt,' notes show. Fox News.com. https://www.foxnews.com/politics/trump-doj-officials-election-corrupt-donoghue-notes

PRE-PRINT
DO NOT CIRCULATE

Michigan Department of State. (2020, November 7) Isolated User Error in Antrim County Does Not Affect Election Results, Has no Impact on Other Counties or States. [Press release]. https://www.michigan.gov/documents/sos/Antrim_Fact_Check_707197_7.pdf

Mitra, T., & Gilbert, E. (2015, April). Credbank: A large-scale social media corpus with associated credibility annotations. In *Ninth international AAAI conference on web and social media*.

Mueller, R. S. (2019). Report On The Investigation Into Russian Interference In The 2016 Presidential Election: Volume I of II. U.S. Department of Justice.

Niker, F., & Yarrow, D. (2021). Introduction: Regulating the Public Sphere in a Post-Truth World.

Oh, O., Agrawal, M., & Rao, H. R. (2013). Community intelligence and social media services: A rumor theoretic analysis of tweets during social crises. MIS quarterly, 407-426.

Polletta, F., & Callahan, J. (2019). Deep stories, nostalgia narratives, and fake news: Storytelling in the Trump era. In Politics of meaning/meaning of politics (pp. 55-73). Palgrave Macmillan, Cham.

PRRI Staff. (2021 November 1) Competing Visions of America: An Evolving Identity or a Culture Under Attack? Findings from the 2021 American Values Survey. https://www.prri.org/research/competing-visions-of-america-an-evolving-identity-or-a-culture-under-attack/

Rohde, D. (2004). On new voting machine, the same old fraud. The New York Times. April, 27.

Rosnow, R. L. (1980). Psychology of rumor reconsidered. Psychological Bulletin, 87(3), 578–591. https://doi.org/10.1037/0033-2909.87.3.578

S. Rep. No. 116-290, (2020).

Shear, M. and S. Saul (2021, January 3) Trump, in Taped Call, Pressured Georgia Official to 'Find' Votes to Overturn Election. *The New York Times*. https://www.nytimes.com/2021/01/03/us/politics/trump-raffensperger-call-georgia.html

Starbird, K., Spiro, E., Edwards, I., Zhou, K., Maddock, J., & Narasimhan, S. (2016, May). Could this be true? I think so! Expressed uncertainty in online rumoring. In Proceedings of the 2016 CHI Conference on Human Factors in Computing Systems (pp. 360-371).

Starbird, K., Spiro, E. S., & Koltai, K. (2020). Misinformation, Crisis, and Public Health—Reviewing the Literature V1. 0. Social Science Research Council, MediaWell. June, 25, 2020.

PRE-PRINT
DO NOT CIRCULATE

Subbian, K., Prakash, B. A., & Adamic, L. (2017, April). Detecting large reshare cascades in social networks. In Proceedings of the 26th International Conference on World Wide Web (pp. 597-605).

Tollefson, J. (2021). Tracking QAnon: how Trump turned conspiracy-theory research upside down. Nature.

Tufekci, Z. (2014, May). Big questions for social media big data: Representativeness, validity and other methodological pitfalls. In Eighth international AAAI conference on weblogs and social media.

Vosoughi, S., Roy, D., & Aral, S. (2018). The spread of true and false news online. Science, 359(6380), 1146-1151.

Wardle, C., & Derakhshan, H. (2017). Information disorder: Toward an interdisciplinary framework for research and policy making. Council of Europe, 27.

Zarocostas, J. (2020). How to fight an infodemic. *The Lancet.* 395 (10225) https://doi.org/10.1016/S0140-6736(20)30461-X.

Zeng, L., Starbird, K., & Spiro, E. S. (2016, January). Rumors at the speed of light? Modeling the rate of rumor transmission during crisis. In 2016 49th Hawaii International Conference on System Sciences (HICSS) (pp. 1969-1978). IEEE.

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To: Isabella Gc[isabellagc2010@gmail.com]; Matt Marshall DeButts[mdebutts@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Fri 11/5/2021 6:46:53 PM
Subject: spreadsheets with Sharpie tweets
Received: Fri 11/5/2021 6:46:56 PM
SharpieGate_ElectionDay_wRTs.csv
SharpieGate_Nov4_Surge_noRTs.csv

Hi Matt and Bella,

Here are some csv files with Sharpie tweets.

The first one is the first day's tweets (before the spike). That includes retweets.

The second is Nov 4 00:00:00 UTC to Nov 4 12:00:00 UTC (showing the spike). I only included original tweets there. There are some interesting things there I don't think I saw before — around people trying to "trade up" during the early period.

You can see the large-follower retweets on the Bokeh plot.

The columns are: tweet_id, user_name, created_at, followers_count, profile_description, tweet_text, URL.

Please let me know if you'd like to see another cut of the data.

Kate

To: Renee DiResta[rdiresta@stanford.edu]; Jeff Hancock[hancockj@stanford.edu]; Elliott Stevens[res22@uw.edu]
From: Kate Starbird
Sent: Sat 10/16/2021 5:26:52 PM
Subject: IRB determination for the social media component
Received: Sat 10/16/2021 5:26:54 PM
APPLICATION_IRB_RapidResponse_SocialMedia.docx

Hi folks,
We just received our "not human subjects" determination for the social media component of the research. Because the IRB doesn't look at these, we can't use a "single IRB" for both institutions on this and you'll likely have to get your own.

I'm attaching our forms in case you want to use anything for your own process.

Also, we're looking forward to our "launch" meeting this coming Friday. We've been waiting for Mike Caulfield to join us — yesterday was his first day, and we're REALLY excited to get started.

Kate

The Human Subjects Division (HSD) strives to ensure that people with disabilities have access to all services and content. **If you experience any accessibility-related issues with this form or any aspect of the application process, email hsdinfo@uw.edu for assistance.**

INSTRUCTIONS

- **This form is only for studies that will be reviewed by the UW IRB**. Before completing this form, check HSD's website to confirm that this should not be reviewed by an external (non-UW) IRB.
- **If you are requesting a determination** about whether the planned activity is human subjects research or qualifies for exempt status, you may skip all questions except those marked with a ◯. For example **1.1** must be answered.
- **Answer all questions**. If a question is not applicable to the research or if you believe you have already answered a question elsewhere in the application, state "NA" (and if applicable, refer to the question where you provided the information). If you do not answer a question, the IRB does not know whether the question was overlooked or whether it is not applicable. This may result in unnecessary "back and forth" for clarification. Use non-technical language as much as possible.
- To check a box, place an "X" in the box. To fill in a text box, make sure your cursor is within the gray text box bar before typing or pasting text.
- For collaborative or multi-site research, describe only the UW activities unless you are requesting that the UW IRB provide the review and oversight for non-UW collaborators or co-investigators as well.
- You may reference other documents (such as a grant application) if they provide the requested information in non-technical language. Be sure to provide the document name, page(s), and specific sections, and upload it to ***Zipline***. Also, describe any changes that may have occurred since the document was written (for example, changes that you've made during or after the grant review process). In some cases, you may need to provide additional details in the answer space as well as referencing a document.
- **NOTE: Do not convert this Word document to PDF.** The ability to use "tracked changes" is required in order to modify your study and respond to screening requests.

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1 OVERVIEW

Study Title: Rapid Response to Disinformation: Social Media Analysis

1.1 Home institution. Identify the institution through which the lead researcher listed on the IRB application will conduct the research. Provide any helpful explanatory information.

In general, the home institution is the institution (1) that provides the researcher's paycheck and that considers him/her to be a paid employee, or (2) at which the researcher is a matriculated student. Scholars, faculty, fellows, and students who are visiting the UW and who are the lead researcher: identify your home institution and describe the purpose and duration of your UW visit, as well as the UW department/center with which you are affiliated while at the UW.

Note that many UW clinical faculty members are paid employees of non-UW institutions.

*The UW IRB provides IRB review and oversight for only those researchers who meet the criteria described in the **SOP Use of the UW IRB**.*

University of Washington

1.2 Consultation history. Has there been any consultation with someone at HSD about this study?

It is not necessary to obtain advance consultation. However, if advance consultation was obtained, answering this question will help ensure that the IRB is aware of and considers the advice and guidance provided in that consultation.

☐ **No**
☒ **Yes** → If yes, briefly describe the consultation: approximate date, with whom, and method (e.g., by email, phone call, in-person meeting).

Jenny Maki, email. Sept 13-17; Adrienne Meyer, Zoom, Sept 22, 2021

1.3 Similar and/or related studies. Are there any related IRB applications that provide context for the proposed activities?

Examples of studies for which there is likely to be a related IRB application: Using samples or data collected by another study; recruiting subjects from a registry established by a colleague's research activity; conducting Phase 2 of a multi-part project, or conducting a continuation of another study; serving as the data coordinating center for a multi-site study that includes a UW site.

Providing this information (if relevant) may significantly improve the efficiency and consistency of the IRB's review.

☐ **No**
☒ **Yes** → If yes, briefly describe the other studies or applications and how they relate to the proposed activities. If the other applications were reviewed by the UW IRB, please also provide: the UW IRB number, the study title, and the lead researcher's name.

The proposed work connects to the following IRBs:

STUDY00003903: Unraveling Online Disinformation Trajectories — Social Media Analysis (PI: Starbird). This IRB covers related research analyzing publicly available social media data to better understand how disinformation spreads online.

STUDY00009923: How Scientific Data, Knowledge, and Expertise Mobilize in Online Media during the COVID-19 Crisis (PI: Spiro). This IRB covers research analyzing online activities to better understand the flow of information related to Covid-19.

1.4 Externally-imposed urgency or time deadlines. Are there any externally-imposed deadlines or urgency that affect the proposed activity?

HSD recognizes that everyone would like their IRB applications to be reviewed as quickly as possible. To ensure fairness, it is HSD policy to review applications in the order in which they are received. However, HSD will assign a higher priority to research with externally-imposed urgency that is beyond the control of the researcher. Researchers are encouraged to communicate as soon as possible with their HSD staff contact person when there is an urgent situation (in other words, before submitting the IRB application). Examples: a researcher plans to test an experimental vaccine that has just been developed for a newly emerging epidemic; a researcher has an unexpected opportunity to collect data from students when the end of the school year is only four weeks away.

HSD may ask for documentation of the externally-imposed urgency. A higher priority should not be requested to compensate for a researcher's failure to prepare an IRB application in a timely manner. Note that IRB review requires a certain minimum amount of time; without sufficient time, the IRB may not be able to review and approve an application by a deadline.

[ ] **No**
[X] **Yes** → If yes, briefly describe the urgency or deadline as well as the reason for it.

There's currently a hold on our budget for this research, and it would be great to remove that so we can hire researchers. Some urgency, but no specific deadline.

1.5 Objectives Using lay language, describe the purpose, specific aims, or objectives that will be met by this specific project. If hypotheses are being tested, describe them. You will be asked to describe the specific procedures in a later section.

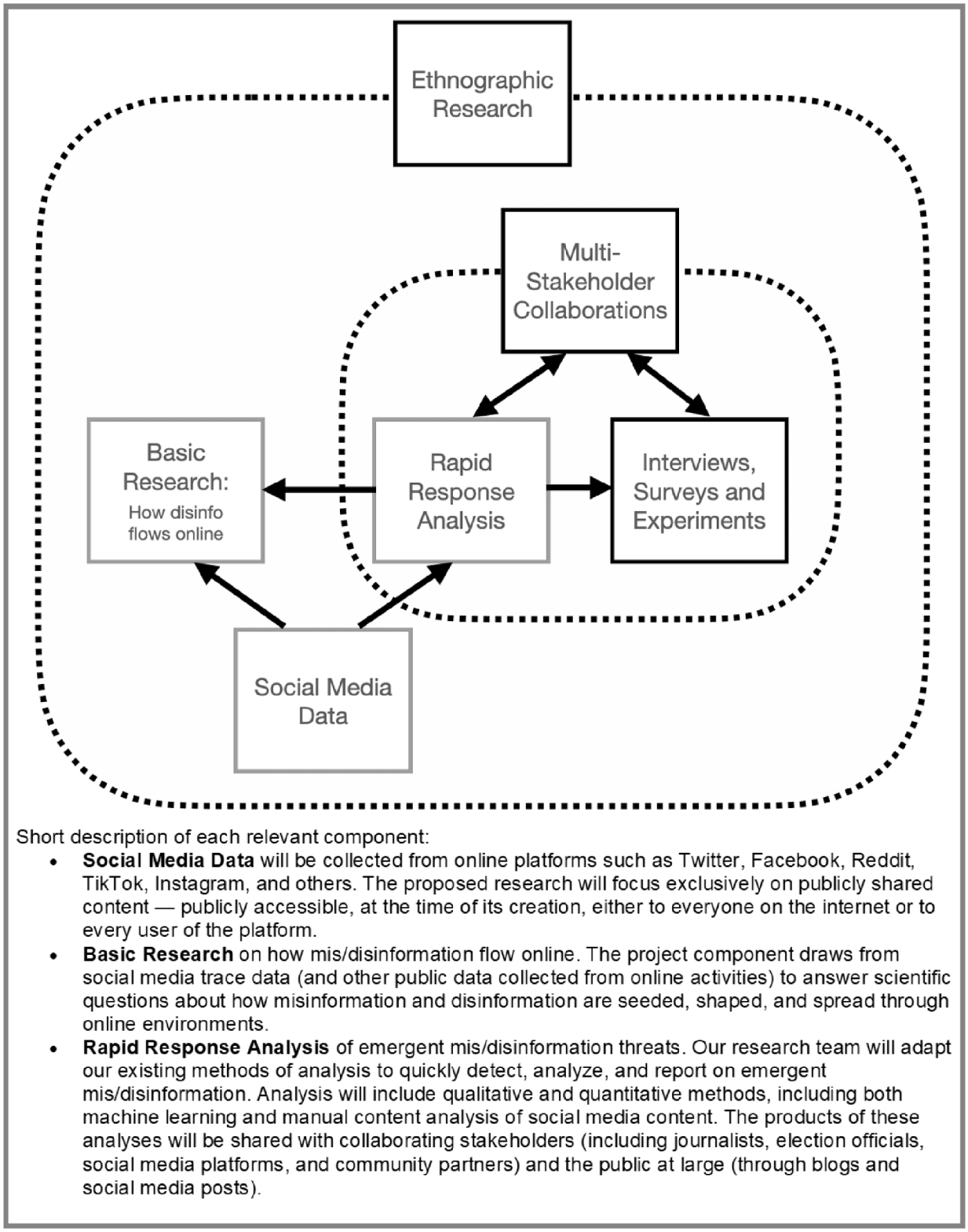
If this application involves the use of a HUD "humanitarian" device: describe whether the use is for "on-label" clinical patient care, "off-label" clinical patient care, and/or research (collecting safety and/or effectiveness data).

This research is part of a larger research project where we will conduct basic research as well as "rapid response" research on public social media data (and study the rapid response activities). **This IRB proposal is focused on the social media data collection and analysis.**

The larger project has integrated three objectives. This IRB directly relates to the first two.

1. **To enhance understandings of how mis- and disinformation spread online — especially in relation to elections and crisis events.**
2. **To develop, deploy, and evaluate methods for analyzing online misinformation for "rapid analysis" of emerging mis- and disinformation.**
3. To develop, deploy, and evaluate collaborative frameworks for working with diverse stakeholders (journalists, social media companies, government officials, community organizations) to quickly identify, analyze, and communicate about online mis- and disinformation.

The project has several distinct but interacting components, illustrated and defined below. The social media data feed into both the basic research and the rapid response analysis. These components in the blue boxes are covered in this proposal.



Short description of each relevant component:

- **Social Media Data** will be collected from online platforms such as Twitter, Facebook, Reddit, TikTok, Instagram, and others. The proposed research will focus exclusively on publicly shared content — publicly accessible, at the time of its creation, either to everyone on the internet or to every user of the platform.
- **Basic Research** on how mis/disinformation flow online. The project component draws from social media trace data (and other public data collected from online activities) to answer scientific questions about how misinformation and disinformation are seeded, shaped, and spread through online environments.
- **Rapid Response Analysis** of emergent mis/disinformation threats. Our research team will adapt our existing methods of analysis to quickly detect, analyze, and report on emergent mis/disinformation. Analysis will include qualitative and quantitative methods, including both machine learning and manual content analysis of social media content. The products of these analyses will be shared with collaborating stakeholders (including journalists, election officials, social media platforms, and community partners) and the public at large (through blogs and social media posts).

1.6 Study design. Provide a one-sentence description of the general study design and/or type of methodology.

Your answer will help HSD in assigning applications to reviewers and in managing workload. Examples: a longitudinal observational study; a double-blind, placebo-controlled randomized study; ethnographic interviews; web scraping from a convenience sample of blogs; medical record review; coordinating center for a multi-site study.

This IRB proposal focuses on mixed (qualitative, quantitative and visual) analysis of social media data and other data that is publicly available online.

1.7 Intent. Check all the descriptors that apply to your activity. You must place an "X" in at least one box.

This question is essential for ensuring that your application is correctly reviewed. Please read each option carefully.

	Descriptor
☐	1. Class project or other activity whose purpose is to provide an educational experience for the researcher (for example, to learn about the process or methods of doing research).
☐	2. Part of an institution, organization, or program's own internal operational monitoring.
☐	3. Improve the quality of service provided by a specific institution, organization, or program.
☒	4. Designed to expand the knowledge base of a scientific discipline or other scholarly field of study, and produce results that: • Are expected to be applicable to a larger population beyond the site of data collection or the specific subjects studied, or • Are intended to be used to develop, test, or support theories, principles, and statements of relationships, or to inform policy beyond the study.
☐	5. Focus directly on the specific individuals about whom the information or biospecimens are collected through oral history, journalism, biography, or historical scholarship activities, to provide an accurate and evidence-based portrayal of the individuals.
☐	6. A quality improvement or program improvement activity conducted to improve the implementation (delivery or quality) of an accepted practice, or to collect data about the implementation of the practice for clinical, practical, or administrative purposes. This does not include the evaluation of the efficacy of different accepted practices, or a comparison of their efficacy.
☐	7. Public health surveillance activities conducted, requested, or authorized by a public health authority for the sole purpose of identifying or investigating potential public health signals or timely awareness and priority setting during a situation that threatens public health.
☐	8. Preliminary, exploratory, or research development activities (such as pilot and feasibility studies, or reliability/validation testing of a questionnaire)
☐	9. Expanded access use of a drug or device not yet approved for this purpose
☐	10. Use of a Humanitarian Use Device
☐	11. Other. Explain:

1.8 Background, experience, and preliminary work. Answer this question **only** if the proposed activity has one or more of the following characteristics. The purpose of this question is to provide the IRB with information that is relevant to its risk/benefit analysis.

- Involves more than minimal risk (physical or non-physical)
- Is a clinical trial, or
- Involves having the subjects use a drug, biological, botanical, nutritional supplement, or medical device.

"Minimal risk" means that the probability and magnitude of harm or discomfort anticipated in the research are not greater than those ordinarily encountered in daily life or during the performance of routine physical or psychological examinations or tests.

a. Background. Provide the rationale and the scientific or scholarly background for the proposed activity, based on existing literature (or clinical knowledge). Describe the gaps in current knowledge that the project is intended to address.

This should be a plain language description. Do not provide scholarly citations. Limit your answer to less than one page, or refer to an attached document with background information that is no more than three pages long.

Addressing pervasive misinformation — especially intentional *disinformation* — is one of society's most pressing challenges. Disinformation affects human health (Zarocostas, 2020; Roozenbeek et al., 2020), planetary health (Oreskes & Conway, 2011; van der Linden et al., 2017), diplomacy (Rid, 2020; Goldman, 2016), elections (Faris et al., 2017; Bak-Coleman et al., 2020; Benkler et al., 2020) and collective decision-making more broadly (Starbird et al., 2019). Disinformation reduces our ability to respond to emerging threats and disasters. The COVID-19 pandemic and the recent 2020 U.S. elections provide evidence of the direct impact of disinformation; resistance to public health policies (Carrieri et al., 2019; Roozenbeek et al., 2020) and the U.S. Capitol riots on Jan. 6, 2021 (Reader, 2021) are notable examples. In other cases, effects are indirect and difficult to measure. Both indicate we need to better understand how disinformation is seeded, cultivated, and spread.

Disinformation's most consequential effects are the degradation of trust in the democratic process, degradation of trust in institutions, and degradation of trust in each other (Bradshaw & Howard, 2018). Disinformation is an attack on our collective ability to make sense of information and to build shared realities — the kind of common ground that a democratic society needs to stand upon to govern itself (Farrell & Shneier, 2018). Even the institution of science, which has maintained high levels of trust for decades, has begun to see declines among some parts of the population in the United States (West & Bergstrom, 2021; Iyengar & Massey, 2018; Gauchat, 2012).

Despite increased attention on the issue of disinformation, knowledge gaps exist. Researchers typically define disinformation as information intended to mislead, but in practice, both veracity and intention can be difficult to determine. The participatory and diffuse nature of disinformation (Starbird et al., 2019) makes it especially challenging to detect and address. We need a better understanding of what disinformation is and how it functions — and the proposed research seeks to enhance this understanding.

But even if we could consistently and accurately characterize and detect disinformation, can we do this fast enough in practice and in ways that mitigate the negative effects of disinformation rather than amplify them? How do we integrate real-time responses across diverse stakeholders, e.g., social media platforms, journalists, and governments? And how do we communicate about emergent disinformation campaigns in ways that are useful to these and other stakeholders, including the public at large? It is these questions that we hope to address with this research.

b. Experience and preliminary work. Briefly describe experience or preliminary work or data (if any) that you, your team, or your collaborators/co-investigators have that supports the feasibility and/or safety of this study.

It is not necessary to summarize all discussion that has led to the development of the study protocol. The IRB is interested only in short summaries about experiences or preliminary work that suggest the study is feasible and that risks are reasonable relative to the benefits. Examples: Your team has already conducted a Phase 1 study of an experimental drug which supports the Phase 2 study being proposed in this application; your team has already done a small pilot study showing that the reading skills intervention described in this application is feasible in an after-school program with classroom aides; your team has experience with the type of surgery that is required to implant the study device; the study coordinator is experienced in working with subjects who have significant cognitive impairment.

Researchers on our team have extensive experience applying mixed-methods to the analysis of social media data to better understand how mis- and disinformation take root and spread across the internet (e.g. 51 et al., 2016; 51 et al., 2018, 51 et al., 2018, Starbird et al., 2018; Starbird et al., 2019). We have established the infrastructure to collect, store, analyze, and (in cases where it aligns with terms of service) share online data — e.g. public data from social media platforms — for research.

We have previously organized and participated in "rapid response" efforts to address emergent disinformation. In Fall 2020, our two research teams (at UW and Stanford) collaborated with two external analysis teams and a variety of stakeholders — including journalists, social media platforms, government officials, and community organizations — as part of the "Election Integrity Partnership" to conduct rapid analysis of online misinformation related to the election. Findings from these research efforts were quickly communicated with partners and the public at large — through articles, blogs, and social media posts (e.g. Browning, 2020; Starbird et al., 2020; Tollefson, 2021). A final report (Center for an Informed Public et al., 2020) documents the extent of these activities.

51 and Kate Starbird. (2018). Acting the Part: Examining Information Operations within #BlackLivesMatter Discourse. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 20.

Kellen Browning. (November 3, 2020). After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows. *New York Times*. Available at: https://www.nytimes.com/2020/11/03/technology/after-twitter-labels-trumps-tweet-about-pennsylvania-its-spread-slows.html

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election*. Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

Kate Starbird, Michael Caulfield, Renee DiResta, Jevin West, Emma Spiro, 51, Rachel Moran, and 51 October 26, 2020. "Uncertainty and misinformation: What to expect on election night and days after." Blog posted by *Election Integrity Partnership*. https://www.eipartnership.net/news/what-to-expect

Kate Starbird, 51 (2019). Disinformation as Collaborative Work: Surfacing the Participatory Nature of Strategic Information Operations. *PACMHCI. 3, Computer-Supported Cooperative Work (CSCW 2019)*. Article 127.

51, and Kate Starbird. (2018). Assembling Strategic Narratives: Information Operations as Collaborative Work within an Online Community. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 183.

Kate Starbird, [redacted], and Daniel Scarnecchia. (2018). Ecosystem or Echo-System? Exploring Content Sharing across Alternative Media Domains. Presented at *12th International AAAI Conference on Web and Social Media (ICWSM 2018)*, Stanford, CA, (pp. 365-374).

[redacted] Kate Starbird and Emma Spiro. (2016). Rumors at the Speed of Light? Modeling the Rate of Rumor Transmission during Crisis. *Hawaii International Conference on System Sciences (HICSS 2016)*. (pp. 1969-1978).

Jeff Tollefson. "Tracking QAnon: how Trump turned conspiracy-theory research upside down." *Nature Communications*. February 4, 2021. https://www.nature.com/articles/d41586-021-00257-y

1.9 Supplements. Check all boxes that apply, to identify relevant Supplements that should be completed and uploaded to ***Zipline***.

This section is here instead of at the end of the form to reduce the risk of duplicating information in this IRB Protocol form that you will need to provide in these Supplements.

Check all That Apply	Type of Research	Supplement Name
☐	**Department of Defense** The research involves Department of Defense funding, facilities, data, or personnel.	SUPPLEMENT Department of Defense
☐	**Department of Energy** The research involves Department of Energy funding, facilities, data, or personnel.	SUPPLEMENT Department of Energy
☐	**Drug, biologic, botanical, supplement** Procedures involve the use of any drug, biologic, botanical or supplement, even if the item is not the focus of the proposed research	SUPPLEMENT Drugs
☐	**Emergency exception to informed consent** Research that requires this special consent waiver for research involving more than minimal risk	SUPPLEMENT Exception from Informed Consent for Emergency Research (EFIC)
☐	**Genomic data sharing** Genomic data are being collected and will be deposited in an external database (such as the NIH dbGaP database) for sharing with other researchers, and the UW is being asked to provide the required certification or to ensure that the consent forms can be certified	SUPPLEMENT Genomic Data Sharing
☐	**Medical device** Procedures involve the use of any medical device, even if the device is not the focus of the proposed research, except when the device is FDA-approved and is being used through a clinical facility in the manner for which it is approved	SUPPLEMENT Devices
☐	**Multi-site or collaborative study** The UW IRB is being asked to review on behalf of one or more non-UW institutions in a multi-site or collaborative study.	SUPPLEMENT Multi-site or Collaborative Research

☐	**Non-UW Individual Investigators** The UW IRB is being asked to review on behalf of one or more non-UW individuals who are not affiliated with another organization for the purpose of the research.	SUPPLEMENT Non-UW Individual Investigators
☐	**Other REDCap Installation Attestation for Electronic Consent** The research will use a non-UW installation of REDCap for conducting and/or documenting informed consent.	SUPPLEMENT Other REDCap Installation
☒	None of the above	

1.10 **Confirm by checking the box below** that you will comply with the COVID requirements described on HSD's COVID webpage, which are based on the location of the in-person study procedures and the vaccination status of study team members and study participants.

Review the HSD website for current guidelines about which in-person research activities are allowable.

☒ **Confirmed**

2 PARTICIPANTS

2.1 **Participants**. Describe the general characteristics of the subject populations or groups, including age range, gender, health status, and any other relevant characteristics.

This proposal has several different components that have different kinds of participants.

For **Basic Research and "Rapid Response" Research** on how mis- and disinformation flow online, we will conduct mixed (quantitative and qualitative) analysis on social media data collected from multiple platforms, including Twitter, Facebook, Instagram, YouTube, Reddit, TikTok, and others.

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories.

We will limit our analysis to social media data that was shared through public accounts — data that was publicly visible (to any/all users of those platforms) at the time of collection. "Participants" will be social media users who shared or engaged with social media content captured by our collections — e.g. accounts that shared tweets with specific keywords related to elections, crises and breaking news events or specific disinformation campaigns. These can include people from all over the world and people of any age. Due to the nature of our collections, we do not foresee children comprising a large portion of participants captured in our collections. However, there will likely be some posts and/or engagements from children (13-17) included in these collections.

Platforms of study include, but are not limited to: Twitter, Facebook (public posts, pages and groups), Instagram (public pages), YouTube, Reddit, TikTok, Parler, Amazon.

2.2 Inclusion and exclusion criteria.

a. Inclusion criteria. Describe the specific criteria that will be used to decide who will be included in the research from among interested or potential subjects. Define any technical terms in lay language.

"Participants" in the social media data analysis will be people who operate accounts that shared content related to one of the events, misinformation incidents, or disinformation campaigns we are studying.

b. Exclusion criteria. Describe the specific criteria that will be used to decide who will be excluded from the research from subjects who meet the inclusion criteria listed above. Define any technical terms in lay language.

There are no exclusion criteria.

2.3 Prisoners. IRB approval is required in order to include prisoners in research, even when prisoners are not an intended target population.

Is the research likely to have subjects who become prisoners while participating in the study?

For example, a longitudinal study of youth with drug problems is likely to have subjects who will be prisoners at some point during the study.

[X] **No**
[ ] **Yes** → If yes, if a subject becomes a prisoner while participating in the study, will any study procedures and/or data collection related to the subject be continued while the subject is a prisoner?

[ ] **No**
[ ] **Yes** → If yes, describe the procedures and/or data collection that will continue with prisoner subjects

2.4 Will the proposed research recruit or obtain data from individuals that are known to be prisoners?

*For records reviews: if the records do not indicate prisoner status and prisoners are not a target population, select "No". See the **GUIDANCE Prisoners** for the definition of "prisoner", which is not necessarily tied to the type of facility in which a person is residing.*

[X] **No**
[ ] **Yes** → If yes, answer the following questions (i – iv).

i. Describe the type of prisoners, and their location(s):

ii. One concern about prisoner research is whether the effect of participation on prisoners' general living conditions, medical care, quality of food, amenities, and/or opportunity for earnings in prison will be so great that it will make it difficult for prisoners to adequately consider the research risks. How will the chances of this be reduced?

iii. Describe what will be done to make sure that (a) recruitment and subject selection procedures will be fair to all eligible prisoners and (b) prison authorities or other prisoners will not be able to arbitrarily prevent or require particular prisoners from participating.

iv. If the research is funded by one of these federal departments and agencies (Health & Human Services; Energy; Defense; Homeland Security; CIA; Social Security Administration), and/or will involve prisoners in federal facilities or in state/local facilities outside of Washington State: check the box below to provide assurance that study team members will (a) not encourage or facilitate the use of a prisoner's participation in the research to influence parole or pardon decisions, and (b) clearly inform each prisoner in advance (for example, in a consent form) that participation in the research will have no effect on his or her parole or pardon.

☐ **Confirmed**

2.5 **Protected populations**. IRB approval is required for the use of the subject populations listed here. Check the boxes for any of these populations that will be purposefully included. (In other words, being a part of the population is an inclusion criterion for the study.)

The WORKSHEETS describe the criteria for approval but do not need to be completed and should not be submitted.

Population	Worksheet
☐ Fetuses in utero	WORKSHEET Pregnant Women
☐ Neonates of uncertain viability	WORKSHEET Neonates
☐ Non-viable neonates	WORKSHEET Neonates
☐ Pregnant women	WORKSHEET Pregnant Women

a. If you check any of the boxes above, use this space to provide any information that may be relevant for the IRB to consider.

2.6 **Native Americans or non-U.S. indigenous populations.** Will Native American or non-U.S. indigenous populations be actively recruited through a tribe, tribe-focused organization, or similar community-based organization?

Indigenous people are defined in international or national legislation as having a set of specific rights based on their historical ties to a particular territory and their cultural or historical distinctiveness from other populations that are often politically dominant.

Examples: a reservation school or health clinic; recruiting during a tribal community gathering

☒ **No**

☐ **Yes** → If yes, name the tribe, tribal-focused organization, or similar community-based organization. The UW IRB expects that tribal/indigenous approval will be obtained before beginning the research. This may or may not involve approval from a tribal IRB. The study team and any collaborators/investigators are also responsible for identifying any tribal laws that may affect the research.

2.7 Third party subjects. Will the research collect private identifiable information about *other individuals* from the study subjects? Common examples include: collecting medical history information or contact information about family members, friends, co-workers.

"Identifiable" means any direct or indirect identifier that, alone or in combination, would allow you or another member of the research team to readily identify the person. For example, suppose that the research is about immigration history. If subjects are asked questions about their grandparents but are not asked for names or other information that would allow easy identification of the grandparents, then private identifiable information is not being collected about the grandparents and the grandparents are not subjects.

[X] **No**
[ ] **Yes** → If yes, these individuals are considered human subjects in the study. Describe them and what data will be collected about them.

2.8 Number of subjects. Is it possible to predict or describe the maximum number of subjects (or subject units) needed to complete the study, for each subject group?

Subject units mean units within a group. For most research studies, a group will consist of individuals. However, the unit of interest in some research is not the individual. Examples:

- *Dyads such as caregiver-and-Alzheimer's patient, or parent and child*
- *Families*
- *Other units, such as student-parent-teacher*

Subject group means categories of subjects that are meaningful for the specific study. Some research has only one subject group – for example, all UW students taking Introductory Psychology. Some common ways in which subjects are grouped include:

- *By intervention – for example, an intervention group and a control group.*
- *By subject population or setting – for example, urban versus rural families*
- *By age – for example, children who are 6, 10, or 14 years old.*

The IRB reviews the number of subjects in the context of risks and benefits. Unless otherwise specified, if the IRB determines that the research involves no more than minimal risk: there are no restrictions on the total number of subjects that may be enrolled. If the research involves more than minimal risk: The number of enrolled subjects must be limited to the number described in this application. If it is necessary later to increase the number of subjects, submit a Modification. Exceeding the IRB-approved number (over-enrollment) will be considered non-compliance.

[X] **No** → If no, provide the rationale in the box below. Also, provide any other available information about the scope/size of the research. You do not need to complete the table.

Example: It may not be possible to predict the number of subjects who will complete an online survey advertised through Craigslist, but you can state that the survey will be posted for two weeks and the number who respond is the number who will be in the study.

We will collect social media data during many different, high-visibility events (such as crisis events and elections) and data related to specific misinformation incidents and disinformation campaigns between 2021 and 2025. These data potentially include billions of posts, from millions of different users.

[ ] **Yes** → If yes, for each subject group, use the table below to provide the estimate of the maximum desired number of individuals (or other subject unit, such as families) who will complete the research.

Group name/description	Maximum desired number of individuals (or other subject unit, such as families) who will complete the research

	Provide numbers for the site(s) reviewed by the UW IRB and for the study-wide total number; example: 20/100

3 NON-UW RESEARCH SETTING

Complete this section only if UW investigators and people named in the SUPPLEMENT: Non-UW Individual Investigators will conduct research procedures outside of UW and Harborview

3.1 Reason for locations. Describe the reason(s) for choosing the locations.

This is especially important when the research will occur in locations or with populations that may be vulnerable to exploitation. One of the three ethical principles the IRB must consider is justice: ensuring that reasonable, non-exploitative, and well-considered procedures are administered fairly, with a fair distribution of costs and potential benefits.

We will collect our data using infrastructure housed on UW campus (primarily at the Center for an Informed Public). We will conduct our analyses using that same infrastructure housed on the UW campus. With remote work, some researchers will be using machines in their own homes to access our UW infrastructure as well as directly access content on the social media platforms and through tools provided by those platforms (e.g. Crowdtangle). Our collections will be focused on elections, crises and other breaking news events, and public health concerns (e.g. vaccine hesitancy). The data we collect and analyze may be shared by people anywhere in the world.

3.2 Local context. Culturally appropriate procedures and an understanding of local context are an important part of protecting subjects. Describe any site-specific cultural issues, customs, beliefs, or values that may affect the research, how it is conducted, or how consent is obtained or documented.

Examples: It would be culturally inappropriate in some international settings for a woman to be directly contacted by a male researcher; instead, the researcher may need to ask a male family member for permission before the woman can be approached. It may be appropriate to obtain permission from community leaders prior to obtaining consent from individual members of a group. In some distinct cultural groups, signing forms may not be the norm.

This federal site maintains an international list of human research standards and requirements:
http://www.hhs.gov/ohrp/international/index.html

N/A

3.3 Location-specific laws. Describe any local laws that may affect the research (especially the research design and consent procedures). The most common examples are laws about:

- **Specimens** – for example, some countries will not allow biospecimens to be taken out of the country.
- **Age of consent** – laws about when an individual is considered old enough to be able to provide consent vary across states, and across countries.
- **Legally authorized representative** – laws about who can serve as a legally authorized representative (and who has priority when more than one person is available) vary across states and countries.
- **Use of healthcare records** – many states (including Washington State) have laws that are similar to the federal HIPAA law but that have additional requirements.

N/A

3.4 Location-specific administrative or ethical requirements. Describe local administrative or ethical requirements that affect the research.

Example: A school district may require researchers to obtain permission from the head district office as well as school principals before approaching teachers or students; a factory in China may allow researchers to interview factory workers but not allow the workers to be paid for their participation.

N/A

3.5 If the PI is a student: Does the research involve traveling outside of the US?

[X] **No**

[ ] **Yes** → If yes, confirm by checking the box that (1) you will register with the UW Office of Global Affairs before traveling; (2) you will notify your advisor when the registration is complete; and (3) you will request a UW Travel Waiver if the research involves travel to the list of countries requiring a UW Travel Waiver.

[ ] **Confirmed**

4 RECRUITING and SCREENING PARTICIPANTS

4.1 Recruiting and Screening. Describe how subjects will be identified, recruited, and screened. Include information about: how, when, where, and in what setting. Identify who (by position or role, not name) will approach and recruit subjects, and who will screen them for eligibility.

Note: Per UW Medicine policy, the UW Medicine eCare/MyChart system may not be used for research recruitment purposes.

We will collect data about elections, crises and other breaking news events, as well as specific misinformation incidents (when a piece of misinformation goes viral) and disinformation campaigns. Our collections will be based on 1) specific search terms; 2) influential accounts; 3) specific channels, groups or threads.

1) Specific search terms. For example, during the 2022 U.S. midterm elections, we will collect data using terms like election, vote, voter, voting, midterm, fraud and on specific candidate and location names.
2) Influential accounts. We may collect data containing content from and engagements with influential accounts — including high visibility accounts with many followers; verified accounts; accounts of public officials or organizations (like candidates and campaigns).
3) Groups. We may identify specific channels, groups, or #hashtags to collect relevant conversations about

4) the events and phenomena we are interested in — for example, YouTube channels that repeatedly post disinformation, a public Facebook group for a local election, or a "community" on Reddit where conspiracy theories are often discussed.

4.2 Recruitment materials.

a. What materials (if any) will be used to recruit and screen subjects?

Examples: talking points for phone or in-person conversations; video or audio presentations; websites; social media messages; written materials such as letters, flyers for posting, brochures, or printed advertisements; questionnaires filled out by potential subjects.

None. There are no recruiting or screening processes.

b. Upload descriptions of each type of material (or the materials themselves) to ***Zipline***. If letters or emails will be sent to any subjects, these should include a statement about how the subject's name and contact information were obtained. No sensitive information about the person (such as a diagnosis of a medical condition) should be included in the letter. The text of these letters and emails must be uploaded to ***Zipline*** (i.e., a description will not suffice).

HSD encourages researchers to consider uploading descriptions of most recruitment and screening materials instead of the materials themselves. The goal is to provide the researchers with the flexibility to change some information on the materials without submitting a Modification for IRB approval of the changes. Examples:

- *Provide a list of talking points that will be used for phone or in-person conversations instead of a script.*
- *For the description of a flyer, include the information that it will provide the study phone number and the name of a study contact person (without providing the actual phone number or name). This means that a Modification would not be necessary if/when the study phone number or contact person changes. Also, instead of listing the inclusion/exclusion criteria, the description below might state that the flyer will list one or a few of the major inclusion/exclusion criteria.*
- *For the description of a video or a website, include a description of the possible visual elements and a list of the content (e.g., study phone number; study contact person; top three inclusion/exclusion criteria; payment of $50; study name; UW researcher).*

4.3 Relationship with participant population. Do any members of the study team have an existing relationship with the study population(s)?

Examples: a study team member may have a dual role with the study population (for example, being their clinical care provider, teacher, laboratory directory or tribal leader in addition to recruiting them for his/her research).

[X] **No**
[ ] **Yes** → If yes, describe the nature of the relationship.

4.4 Payment to participants. The IRB must evaluate subject payment for the possibility that it will unduly influence subjects to participate. Refer to GUIDANCE Subject Payment when designing subject payment plans. Provide the following information about your plans for paying research subjects in the text box below or note that the information can be found in the consent form.

- The total amount/value of the payment
- Schedule/timing of the payment [i.e., when will subjects receive the payment(s)]
- Purpose of the payment [e.g., reimbursement, compensation, incentive]
- Whether payment will be "pro-rated" so that participants who are unable to complete the research may still receive some part of the payment

The IRB expects the consent process or study information provided to the subjects to include all of the above-listed information about payment, including the number and amount of payments, and especially when subjects can expect to receive payment.

One of the most frequent complaints received by HSD is from subjects who expected to receive cash or a check on the day that they completed a study and who were angry or disappointed when payment took 6-8 weeks to reach them.

Researchers should review current UW Financial Management requirements about when Social Security Numbers must be collected, and when research payment must be reported to the UW Tax Office and the IRS: https://finance.uw.edu/ps/how-pay/research-subjects.

4.5 Non-monetary compensation. Describe any non-monetary compensation that will be provided. Example: extra credit for students; a toy for a child. If class credit will be offered to students, there must be an alternate way for the students to earn the extra credit without participating in the research.

N/A

4.6 Will data or specimens be accessed or obtained for recruiting and screening procedures prior to enrollment?

Examples: names and contact information; the information gathered from records that were screened; results of screening questionnaires or screening blood tests; Protected Health Information (PHI) from screening medical records to identify possible subjects.

[X] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the data and/or specimens (including PHI) and whether it will be retained as part of the study data.

4.7 Consent for recruiting and screening. Will consent be obtained for any of the recruiting and screening procedures? (Section 8: Consent of Adults asks about consent for the main study procedures).

"Consent" includes: consent from individuals for their own participation; parental permission; assent from children; consent from a legally authorized representative for adult individuals who are unable to provide consent.

Examples:

- *For a study in which names and contact information will be obtained from a registry: the registry should have consent from the registry participants to release their names and contact information to researchers.*
- *For a study in which possible subjects are identified by screening records: there will be no consent process.*
- *For a study in which individuals respond to an announcement and call into a study phone line: the study team person talking to the individual may obtain non-written consent to ask eligibility questions over the phone.*

[ ] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the consent process.

a. Documentation of consent. Will a written or verifiable electronic signature from the subject on a consent form be used to document consent for the **recruiting and screening procedures**?

☐ **No** → If no, describe the information that will be provided during the consent process and for which procedures.

☐ **Yes, written** → If yes, and a **written** signature will be used to document consent:
- Upload the consent form to ***Zipline***.

☐ **Yes, electronic** → If yes, and an **electronic** signature will be used to document consent:
- Upload the consent form to ***Zipline***.
- **If the eSignature process or method for recruiting and screening is different than for the main study procedures**, use the questions about electronic consent in Section 8.3 and 8.4 to differentiate between recruiting/screening and main study electronic consent. **If electronic consent will be used for recruiting/screening but not main study consent**, use 8.3 and 8.4 to describe eConsent and note that it is only for recruiting/screening.

5 PROCEDURES

5.1 **Study procedures**. Using lay language, provide a complete description of the study procedures, including the sequence, intervention or manipulation (if any), drug dosing information (if any), blood volumes and frequency of draws (if any), use of records, time required, and setting/location. If it is available: Upload a study flow sheet or table to ***Zipline***.

For studies comparing standards of care: It is important to accurately identify the research procedures. See UW IRB ***POLICY Risks of Harm from Standard Care*** *and the draft guidance from the federal Office of Human Research Protections,* ***"Guidance on Disclosing Reasonably Foreseeable Risks in Research Evaluating Standards of Care";*** *October 20, 2014. Information about pediatric blood volume and frequency of draws that would qualify for expedited review can be found in this* **reference table** *on the Seattle Children's IRB website.*

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team, using individual UW researchers' machines and shared infrastructure at the UW Center for an Informed Public, through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API). This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by the mediating entity (e.g. Crowdtangle).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories. This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by collaborating partner.

We will analyze these data as individual researchers and within collaborative teams using a mixture of methods — including qualitative, quantitative, and visual methods.

5.2 Recordings. Does the research involve creating audio or video recordings?

- [X] **No** → If no, go to question **5.3.**
- [ ] **Yes** → If yes, verify that you have described what will be recorded in 5.1 and answer question **a**.

a. Before recording, will consent for being recorded be obtained from subjects and any other individuals who may be recorded?

- [ ] **No** → If no, email hsdinfo@uw.edu before submitting this application in Zipline. In the email, include a brief description of the research and a note that individuals will be recorded without their advance consent.
- [ ] **Yes**

5.3 MRI scans. Will any subjects have a Magnetic Resonance Imaging (MRI) scan as part of the study procedures?

This means scans that are performed solely for research purposes or clinical scans that are modified for research purposes (for example, using a gadolinium-based contrast agent when it is not required for clinical reasons).

- [X] **No** → If no, go to question **5.4**.
- [ ] **Yes** → If yes, answer questions **a** through **c**.

a. Describe the MRI scan(s). Specifically:

- What is the purpose of the scan(s)? *Examples: obtain research data; safety assessment associated with a research procedure.*
- Which subjects will receive an MRI scan?
- Describe the minimum and maximum number of scans per subject, and over what time period the scans will occur. *For example: all subjects will undergo two MRI scans, six months apart.*

b. MRI facility. At which facility(ies) will the MRI scans occur? Check all that apply.

- [ ] UWMC Radiology/Imaging Services (the UWMC clinical facility)
- [ ] DISC Diagnostic Imaging Sciences Center (UWMC research facility)
- [ ] CHN Center for Human Neuroscience MRI Center (Arts & Sciences research facility)
- [ ] BMIC Biomolecular Imaging Center (South Lake Union research facility)
- [ ] Harborview Radiology/Imaging Services (the Harborview clinical facility)
- [ ] SCCA Imaging Services
- [ ] Northwest Diagnostic Imaging
- [ ] Other: identify in the text box below:

c. Personnel. For MRI scans that will be conducted at the DISC, CHN or BMIC research facilities: Indicate who will be responsible for operating the MRI scanner by checking all that apply.

- [ ] MRI technician who is formally qualified
- [ ] Researcher who has completed scanner operator training provided by a qualified MRI operator

5.4 Data variables. Describe the specific data that will be obtained (including a description of the most sensitive items). Alternatively, a list of the data variables may be uploaded to ***Zipline***.

Only public data, including public social media posts and publicly available information on user profiles will be obtained. Metadata associated with this content will also be archived. This includes for example the number of social relationships (e.g. "followers" or "friends") that an account has, the self-reported location of the account, and links to external media that were included in the post.

5.5 Data sources. For all types of data that will be accessed or collected for this research: Identify whether the data are being obtained from the subjects (or subjects' specimens) or whether they are being obtained from some other source (and identify the source).

If you have already provided this information in Question 5.1, you do not need to repeat the information here.

See 5.1

5.6 Identifiability of data and specimens. Answer these questions carefully and completely. This will allow HSD to accurately determine the type of review that is required and the relevant compliance requirements. Review the following definitions before answering the questions:

Access *means to view or perceive data, but not to possess or record it. See, in contrast, the definition of "obtain".*
Identifiable *means that the identity of an individual is or may be readily (1) ascertained by the researcher or any other member of the study team from specific data variables or from a combination of data variables, or (2) associated with the information.*
Direct identifiers *are direct links between a subject and data/specimens. Examples include (but are not limited to): name, date of birth, medical record number, email or IP address, pathology or surgery accession number, student number, or a collection of data that is (when taken together) identifiable.*
Indirect identifiers *are information that links between direct identifiers and data/specimens. Examples: a subject code or pseudonym.*
Key *refers to a single place where direct identifiers and indirect identifiers are linked together so that, for example, coded data can be identified as relating to a specific person. Example: a master list that contains the data code and the identifiers linked to the codes.*
Obtain *means to possess or record in any fashion (writing, electronic document, video, email, voice recording, etc.) for research purposes and to retain for any length of time. This is different from* ***accessing****, which means to view or perceive data.*

a. Will you or any members of your team have access to any direct or indirect identifiers?

[X] **Yes** → If yes, describe which identifiers and for which data/specimens.

We will collect social media posts and account information for each participant. Some social media accounts are anonymous and other contain pieces of identifying information such as when people include their real names. Following the Terms of Service for these platforms, we will collect, store and analyze the data and metadata a user provides for their account.

[ ] **No** → If no, select the reason(s) why you (and all members of your team) will not have access to direct or indirect identifiers.

- [ ] There will be no identifiers.
- [ ] Identifiers or the key have been (or will have been) destroyed before access.
- [ ] There is an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) to study team members under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

b. Will you or any study team members obtain any direct or indirect identifiers?

☒ **Yes** → If yes, describe which identifiers and for which data/specimens.

We have and will continue to collect social media posts and account information for each participant. We will obtain only information which the user provides for their account.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not obtain direct or indirect identifiers.

☐ There will be no identifiers.

☐ Identifiers or the key have been (or will have been) destroyed before access.

☐ There will be an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

c. If any identifiers will be obtained, indicate how the identifiers will be stored (and for which data). NOTE: Do not describe the data security plan here – that information is requested in section 9.6.

☒ Identifiers will be stored with the data. Describe the data to which this applies:

Following Terms of Service for the platforms that are sources of data for the project, we will collect and store information together with the content of social media posts.

☐ Identifiers and study data will be stored separately but a link will be maintained between the identifiers and the study data (for example, through the use of a code). Describe the data to which this applies:

☐ Identifiers and study data will be stored separately, with no link between the identifiers and the study data. Describe the data to which this applies:

d. Research collaboration. Will individuals who provide coded information or specimens for the research also collaborate on other activities for this research? If yes, identify the activities and provide the name of the collaborator's institution/organization.

Examples include but are not limited to: (1) study, interpretation, or analysis of the data that results from the coded information or specimens; and (2) authorship on presentations or manuscripts related to this work.

No.

5.7 Protected Health Information (PHI). Will participants' identifiable PHI be accessed, obtained, used, or disclosed for any reason (for example, to identify or screen potential subjects, to obtain study data or specimens, for study follow-up) that does not involve the creation or obtaining of a Limited Data Set?

PHI is individually identifiable healthcare record information or clinical specimens from an organization considered a "covered entity" by federal HIPAA regulations, in any form or media, whether electronic, paper, or oral. ***You must answer yes to this question if the research involves identifiable health care records (e.g., medical, dental, pharmacy, nursing, billing, etc.), identifiable healthcare information from a clinical department repository, or observations or recordings of clinical interactions.***

For information about what constitutes the UW Covered Entity, see UW Medicine Compliance Patient Information Privacy Policy 101 and diagram of the healthcare components.

[X] **No** → If no, skip the rest of this question; go to question **5.8**.

[ ] **Yes** → If yes, answer all of the questions below.

a. Describe the PHI and the reason for using it. *Be specific. For example, will any "free text" fields (such as physician notes) be accessed, obtained, or used?*

b. Is any of the PHI located in Washington State?

[ ] **No**
[ ] **Yes**

c. Describe the pathway of how the PHI will be accessed or obtained, starting with the source/location and then describing the system/path/mechanism by which it will be identified, accessed, and copied for the research. *Be specific. For example: directly view records; search through a department's clinical database; submit a request to Leaf.*

d. For which PHI will subjects provide HIPAA authorization before the PHI is accessed, obtained and/or used?

Confirm by checking the box that the UW Medicine HIPAA Authorization form maintained on the HSD website will be used to access, obtain, use, or disclose any UW Medicine PHI.

[ ] **Confirmed**

e. Will you obtain any HIPAA authorizations electronically (i.e., e-signature)?

[ ] **No**
[ ] **Yes**

If 'Yes', confirm by checking the box that you have read and understand the 'Special Considerations' section of the **GUIDANCE Electronic Informed Consent** for

information regarding the use of electronic signatures and HIPAA authorizations.

☐ **Confirmed**

f. For which PHI will HIPAA authorization NOT be obtained from the subjects?

Provide the following assurances by checking the boxes.

☐ The minimum necessary amount of PHI to accomplish the purposes described in this application will be accessed, obtained and/or used.

☐ The PHI will not be reused or disclosed to any other person or entity, except as required by law, for authorized oversight of the research study, or for other research for which the use or disclosure of PHI would be permitted.

☐ The HIPAA "accounting for disclosures" requirement will be fulfilled, if applicable. See UW Medicine Compliance Policy #104.

☐ There will be reasonable safeguards to protect against identifying, directly or indirectly, any patient in any report of the research.

5.8 Genomic data sharing. Will the research obtain or generate genomic data?

☒ **No**
☐ **Yes** → If yes, answer the question below.

a. Will genomic data from this research be sent to a national database (for example, NIH's dbGaP database)?

☐ **No**
☐ **Yes** → If yes, complete the **SUPPLEMENT Genomic Data Sharing** and upload it to ***Zipline***.

5.9 Whole genome sequencing. For research involving biospecimens: Will the research include whole genome sequencing?

Whole genome sequencing is sequencing of a human germline or somatic specimen with the intent to generate the genome or exome sequence of that specimen.

☐ **No**
☐ **Yes**

5.10 Possible secondary use or sharing of information, specimens, or subject contact information. Is it likely that the obtained or collected information, specimens, or subject contact information will be used for any of the following:

- Future research not described in this application (in other words, secondary research)
- Submission to a repository, registry, or database managed by the study team, colleagues, or others for research purposes
- Sharing with others for their own research

Please consider the broadest possible future plans and whether consent will be obtained now from the subjects for future sharing or research uses (which it may not be possible to describe in detail at this time). Answer **YES** even if future sharing or uses will use de-identified information or specimens. Answer **NO** if sharing is unlikely or if the only sharing will be through the NIH Genomic Data Sharing described in question 5.8.

Many federal grants and contracts now require data or specimen sharing as a condition of funding, and many journals require data sharing as a condition of publication. "Sharing" may include (for example): informal arrangements to share banked data/specimens with other investigators; establishing a repository that will formally share with other researchers through written agreements; or sending data/specimens to a third party repository/archive/entity such as the Social Science Open Access Repository (SSOAR), or the UCLA Ethnomusicology Archive.

☐ **No**
☐ **Yes** → If yes, answer all of the questions below.

a. Describe what will be stored for future use, including whether any direct or indirect (e.g., subject codes) identifiers will be stored.

b. Describe what will be shared with other researchers or with a repository/database/registry, including whether direct identifiers will be shared and (for specimens) what data will be released with the specimens.

c. Who will oversee and/or manage the sharing?

d. Describe the possible future uses, including limitations or restrictions (if any) on future uses or users. As stated above, consider the broadest possible uses.
Examples: data will be used only for cardiovascular research; data will not be used for research on population origins.

e. Consent. Will consent be obtained now from subjects for the secondary use, banking and/or future sharing?

☐ **No**
☐ **Yes** → If yes, be sure to include the information about this consent process in the consent form (if there is one) and in the answers to the consent questions in Section 8.

f. Withdrawal. Will subjects be able to withdraw their data/specimens from secondary use, banking or sharing?

☐ **No**
☐ **Yes** → If yes, describe how, and whether there are any limitations on withdrawal.

Example: data can be withdrawn from the repository but cannot be retrieved after they are released.

g. Agreements for sharing or release. Confirm by checking the box that the sharing or release will comply with UW (and, if applicable, UW Medicine) policies that require a formal agreement with the recipient for release of data or specimens to individuals or entities other than federal databases.

Data Use Agreements or Gatekeeping forms are used for data; Material Transfer Agreements are used for specimens (or specimens plus data). Do not attach any template agreement forms; the IRB neither reviews nor approves them

☐ **Confirmed**

5.11 Communication with subjects during the study. Describe the types of communication (if any) the research team will have with already-enrolled subjects during the study. Provide a description instead of the actual materials themselves.

Examples: email, texts, phone, or letter reminders about appointments or about returning study materials such as a questionnaire; requests to confirm contact information.

5.12 Future contact with subjects. Is there a plan to retain any contact information for subjects so that they can be contacted in the future?

☐ **No**
☐ **Yes** → If yes, describe the purpose of the future contact, and whether use of the contact information will be limited to the study team; if not, describe who else could be provided with the contact information. Describe the criteria for approving requests for the information.

Examples: inform subjects about other studies; ask subjects for additional information or medical record access that is not currently part of the study proposed in this application; obtain another sample.

5.13 Alternatives to participation. Are there any alternative procedures or treatments that might be advantageous to the subjects?

If there are no alternative procedures or treatments, select "No". Examples of advantageous alternatives: earning extra class credit in some time-equivalent way other than research participation; obtaining supportive care or a standard clinical treatment from a health care provider instead of participating in research with an experimental drug.

☐ **No**
☐ **Yes** → If yes, describe the alternatives.

5.14 Upload to *Zipline* all data collection forms (if any) that will be directly used by or with the subjects, and any scripts/talking points that will be used to collect the data. Do not include data collection forms that will be used to abstract data from other sources (such as medical or academic records), or video recordings.

- ***Examples**: survey, questionnaires, subject logs or diaries, focus group questions.*
- ***NOTE:** Sometimes the IRB can approve the general content of surveys and other data collection instruments rather than the specific form itself. This prevents the need to submit a modification request for future minor changes that do not add new topics or increase the sensitivity of the questions. To request this general approval, use the text box below to identify the questionnaires/surveys/ etc. for which you are seeking this more general approval. Then briefly describe the scope of the topics that will be covered and the most personal and sensitive questions. The HSD staff person who screens this application will let you know whether this is sufficient or whether you will need to provide more information.*
- ***For materials that cannot be uploaded**: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. You may also provide URLs (website addresses) or written descriptions below. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*
- ***For data that will be gathered in an evolving way**: This refers to data collection/questions that are not pre-determined but rather are shaped during interactions with participants in response to observations and responses made during those interactions. If this applies to the proposed research, provide a description of the process by which the data collection/questions will be established during the interactions with subjects, how the data collection/questions will be documented, the topics likely to be addressed, the most sensitive type of information likely to be gathered, and the limitations (if any) on topics that will be raised or pursued.*

Use this text box (if desired) to provide:

- Short written descriptions of materials that cannot be uploaded, such as URLs
- A description of the process that will be used for data that will be gathered in an evolving way.
- The general content of questionnaires, surveys and similar instruments for which general approval is being sought. (See the **NOTE** bullet point in the instructions above.)

5.15 SARS-CoV-2 testing. Will the subjects be tested for the SARS-CoV-2 coronavirus?

If the only testing is to screen the subjects (question 2.8), you do not need to answer this question

☒ **No**
☐ **Yes** → If yes:

- Name the testing lab
- Confirm that the lab and its use of this test is CLIA-certified or certified by the Washington State Department of Health
- Describe whether you will return the results to the participants and, if yes, who will do it and how (including any information you would provide to subjects with positive test results).

6 CHILDREN (MINORS) and PARENTAL PERMISSION

6.1 Involvement of minors. Does the research include minors (children)?

Minor or child means someone who has not yet attained the legal age for consent for the research procedures, as described in the applicable laws of the jurisdiction in which the research will be conducted. This may or may not be the same as the definition used by funding agencies such as the National Institutes of Health.

- In Washington State the generic age of consent is 18, meaning that anyone under the age of 18 is considered a child.
- There are some procedures for which the age of consent is much lower in Washington State.
- The generic age of consent may be different in other states, and in other countries.

☐ **No** → If no, go to Section 8.

☐ **Yes** → If yes, provide the age range of the minor subjects for this study and the legal age for consent in the study population(s). If there is more than one answer, explain.

☒ **Don't know** → This means is it not possible to know the age of the subjects. For example, this may be true for some research involving social media, the Internet, or a dataset that is obtained from another researcher or from a government agency. Go to Section 8.

6.2 Parental permission. Parental permission means actively obtaining the permission of the parents. This is not the same as "passive" or "opt out" permission where it is assumed that parents are allowing their children to participate because they have been provided with information about the research and have not objected or returned a form indicating they don't want their children to participate.

a. Will parental permission be obtained for:

☐ All of the research procedures → Go to question **6.2b.**

☐ None of the research procedures → Use the table below to provide justification, and skip question 6.2b.

☐ Some of the research procedures → Use the table below to identify the procedures for which parental permission will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO parental permission[2]	Reason why parental permission will not be obtained	Will parents be informed about the research?[3] YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐

	☐	☐
	☐	☐

Table footnotes

1. *If the answer is the same for all children groups or all procedures: collapse the answer across the groups and/or procedures.*
2. *If identifiable information or biospecimens will be obtained without parent permission, any waiver granted by the IRB does not override parents' refusal to provide broad consent (for example, through the Northwest Biotrust).*
3. *Will parents be informed about the research beforehand even though active permission is not being obtained?*

b. Indicate the plan for obtaining parental permission. One or both boxes must be checked.

☐ Both parents, unless one parent is deceased, unknown, incompetent, or not reasonably available; or when only one parent has legal responsibility for the care and custody of the child

☐ One parent, even if the other parent is alive, known, competent, reasonably available, and shares legal responsibility for the care and custody of the child.

This is all that is required for minimal risk research.

If both boxes are checked, explain:

6.3 Children who are wards. Will any of the children be wards of the State or any other agency, institution, or entity?

☐ **No**
☐ **Yes** → If yes, an advocate may need to be appointed for each child who is a ward. The advocate must be in addition to any other individual acting on behalf of the child as guardian or in loco parentis. The same individual can serve as advocate for all children who are wards.

Describe who will be the advocate(s). The description must address the following points:

- Background and experience
- Willingness to act in the best interests of the child for the duration of the research
- Independence of the research, research team, and any guardian organization

6.4 UW Office for Youth Programs Development and Support. If the project involves interaction (in-person or remotely) with individuals under the age of 18, researchers must comply with **UW Administrative Policy Statement 10.13** and the requirements listed at this website. This includes activities that are deemed to be Not Research or Exempt. It does not apply to third-party led research (i.e., research conducted by a non-UW PI). Information and FAQs for researchers are available.

This point is advisory only; there is no need to provide a response.

7 ASSENT OF CHILDREN (MINORS)

Go to Section 8 if your research does not involve children (minors).

7.1 Assent of children (minors). Though children do not have the legal capacity to "consent" to participate in research, they should be involved in the process if they are able to "assent" by having a study explained to them and/or by reading a simple form about the study, and then giving their verbal choice about whether they want to participate. They may also provide a written assent if they are older. See **WORKSHEET Children** for circumstances in which a child's assent may be unnecessary or inappropriate.

a. Will assent be obtained for:

☐ All research procedures and child groups	→ Go to question **7.2.**
☐ None of the research procedures and child groups	→ Use the table below to provide justification, then skip to question **7.6**
☐ Some of your research procedures and child groups	→ Use the table below to identify the procedures for which assent will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be obtained	Reason why assent will not be obtained

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse your answer across the groups and/or procedures.*

7.2 Assent process. Describe how assent will be obtained, for each child group. If the research involves children of different ages, answer separately for each group. If the children are non-English speakers, include a description of how their comprehension of the information will be evaluated.

7.3 Dissent or resistance. Describe how a child's objection or resistance to participation (including non-verbal indications) will be identified during the research, and what the response will be.

7.4 E-consent. Will any electronic processes (email, websites, electronic signatures, etc.) be used to present assent information to subjects/and or to obtain documentation (signatures) of assent? If yes, describe how this will be done.

7.5 Documentation of assent. Which of the following statements describes whether documentation of assent will be obtained?

☐ None of the research procedures and child groups	→ Use the table below to provide justification, then go to question **7.5.b**
☐ All of the research procedures and child groups	→ Go to question **7.5.a**, do not complete the table
☐ Some of the research procedures and/or child groups	→ Complete the table below and then to go question **7.5.a**

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be documented

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse the answer across the groups and/or procedures.*

a. Describe how assent will be documented. If the children are functionally illiterate or are not fluent in English, include a description of the documentation process for them.

b. Upload all assent materials (talking points, videos, forms, etc.) to ***Zipline***. Assent materials are not required to provide all of the standard elements of adult consent; the information should be appropriate to the age, population, and research procedures. The documents should be in Word, if possible.

7.6 Children who reach the legal age of consent during participation in longitudinal research.

Children who were enrolled at a young age and continue for many years: It is best practice to re-obtain assent (or to obtain it for the first time, if it was not obtained at the beginning of their participation).
Children who reach the legal age of consent: Informed consent must be obtained from the now-adult subject for (1) any ongoing interactions or interventions with the subjects, or (2) the continued analysis of specimens or data for which the subject's identify is readily identifiable to the researcher, unless the IRB waives this requirement.

a. Describe the plans (if any) to re-obtain assent from children.

b. Describe the plans (if any) to obtain consent for children who reach the legal age of consent.

- If adult consent will be obtained from them, describe what will happen regarding now-adult subjects who cannot be contacted.
- If consent will not obtained or will not be possible: explain why.

7.7 Other regulatory requirements. (This is for information only; no answer or response is required.) Researchers are responsible for determining whether their research conducted in schools, with student records, or over the Internet comply with permission, consent, and inspection requirements of the following federal regulations:

- PPRA – Protection of Pupil Rights Amendment
- FERPA – Family Education Rights and Privacy Act
- COPPA – Children's Online Privacy Protection Act

8 CONSENT OF ADULTS

Review the following definitions before answering the questions in this section.

CONSENT	is the process of informing potential subjects about the research and asking them whether they want to participate. It does not necessarily include the signing of a consent form.
CONSENT DOCUMENTATION	refers to how a subject's decision to participate in the research is documented. This is typically obtained by having the subject sign a consent form.
CONSENT FORM	is a document signed by subjects, by which they agree to participate in the research as described in the consent form and in the consent process.
ELEMENTS OF CONSENT	are specific information that is required to be provided to subjects.

CHARACTERISTICS OF CONSENT	are the qualities of the consent process as a whole. These are:
	• Consent must be legally effective.
	• The process minimizes the possibility of coercion or undue influence.
	• Subjects or their representatives must be given sufficient opportunity to discuss and consider participation.
	• The information provided must:
	  ○ Begin with presentation of key information (for consent materials over 2,000 words)
	  ○ Be what a reasonable person would want to have
	  ○ Be organized and presented so as to facilitate understanding
	  ○ Be provided in sufficient detail
	  ○ Not ask or appear to ask subjects to waive their rights

PARENTAL PERMISSION	is the parent's active permission for the child to participate in the research. Parental permission is subject to the same requirements as consent, including written documentation of permission and required elements.
SHORT FORM CONSENT	is an alternative way of obtaining written documentation of consent that is most commonly used with individuals who are illiterate or whose language is one for which translated consent forms are not available.
WAIVER OF CONSENT	means there is IRB approval for not obtaining consent or for not including some of the elements of consent in the consent process. **NOTE**: If you plan to obtain identifiable information or identifiable biospecimens without consent, any waiver granted by the IRB does not override a subject's refusal to provide broad consent (for example, the Northwest Biotrust).

WAIVER OF DOCUMENTATION OF CONSENT	means that there is IRB approval for not obtaining written documentation of consent.

8.1 Groups Identify the groups to which the answers in this section apply.

☐ Adult subjects

☐ Parents who are providing permission for their children to participate in research

→ *If you selected **PARENTS**, the word "consent" below should also be interpreted as applying to parental permission and "subjects" should also be interpreted as applying to the parents.*

8.2 The consent process and characteristics. This series of questions is about whether consent will be obtained for all procedures except recruiting and screening and, if yes, how.

The issue of consent for recruiting and screening activities is addressed in question 4.7. You do not need to repeat your answer to question 4.6.

a. Are there any procedures for which consent will not be obtained?

☐ **No**

☐ **Yes** → If yes, use the table below to identify the procedures for which consent will not be obtained. "All" is an acceptable answer for some studies.

Be sure to consider all research procedures and plans, including future contact, and sharing/banking of data and specimens for future work.

Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO consent process	Reason why consent will not be obtained	Will subjects be provided with info about the research after they finish? YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all groups, collapse your answer across the groups and/or procedures.*

b. Describe the consent process, if consent will be obtained for any or all procedures, for any or all groups. Address groups and procedures separately if the consent processes are different.

Be sure to include:

- *The location/setting where consent will be obtained*
- *Who will obtain consent (refer to positions, roles, or titles, not names)*
- *How subjects will be provided sufficient opportunity to discuss the study with the research team and consider participation*

c. Comprehension. Describe the methods that will be used to ensure or test the subjects' understanding of the information during the consent process.

d. Influence. Does the research involve any subject groups that might find it difficult to say "no" to participation because of the setting or their relationship with someone on the study team, even if they aren't pressured to participate?

Examples: Student participants being recruited into their teacher's research; patients being recruited into their healthcare provider's research, study team members who are participants; outpatients recruited from an outpatient surgery waiting room just prior to their surgery.

☐ **No**
☐ **Yes** → If yes, describe what will be done to reduce any effect of the setting or relationship on the participation decision.

Examples: a study coordinator will obtain consent instead of the subjects' physician; the researcher will not know which subjects agreed to participate; subjects will have two days to decide after hearing about the study.

e. Information provided is tailored to needs of subject population. Describe the basis for concluding that the information that will be provided to subjects (via written or oral methods) is what a *reasonable member of the subject population(s)* would want to know. If the research consent materials contain a key information section, also describe the basis for concluding that the information presented in that section is that which is *most likely* to assist the selected subject population with making a decision. See **GUIDANCE Key Information for Consent Materials**.

For example: Consultation with publications about research subjects' preferences, disease-focused nonprofit groups, patient interest groups, or other researchers/study staff with experience with the specific population. It may also involve directly consulting selected members of the study population.

f. Ongoing process. For research that involves multiple or continued interaction with subjects over time, describe the opportunities (if any) that will be given to subjects to ask questions or to change their minds about participating.

8.3 Electronic presentation of consent information. Will any part of the consent-related information be provided electronically for some or all of the subjects?

This refers to the use of electronic systems and processes instead of (or in addition to) a paper consent form. For example, an emailed consent form, a passive or an interactive website, graphics, audio, video podcasts. See GUIDANCE Electronic Informed Consent for information about electronic consent requirements at UW.

☐ **No** → If no, skip to question 8.4
☐ **Yes** → If yes, answer questions **a** through **e**

a. Describe the electronic consent methodology and the information that will be provided.

All informational materials must be made available to the IRB. Website content should be provided as a Word document. It is considered best practice to give subjects information about multi-page/multi-screen information that will help them assess how long it will take them to complete the process. For example, telling them that it will take about 15 minutes, or that it involves reading six screens or pages.

b. Describe how the information can be navigated (if relevant). *For example, will the subject be able to proceed forward or backward within the system, or to stop and continue at a later time?*

c. In a standard paper-based consent process, the subjects generally have the opportunity to go through the consent form with study staff and/or to ask study staff about any question they may have after reading the consent form. Describe what will be done, if anything, to facilitate the subject's comprehension and opportunity to ask questions when consent information is presented electronically. Include a description of any provisions to help ensure privacy and confidentiality during this process.

Examples: hyperlinks, help text, telephone calls, text messages or other type of electronic messaging, video conference, live chat with remotely located study team members.

d. What will happen if there are individuals who wish to participate but who do not have access to the consent methodology being used, or who do not wish to use it? Are there alternative ways in which they can obtain the information, or will there be some assistance available? If this is a clinical trial, these individuals cannot be excluded from the research unless there is a compelling rationale.

For example, consider individuals who lack familiarity with electronic systems, have poor eyesight or impaired motor skills, or who do not have easy email or internet access.

e. How will the research team ensure continued accessibility of consent materials and information during the study?

f. How will additional information be provided to subjects during the research, including any significant new findings (such as new risk information) If this is not an issue, explain why.

8.4 Written documentation of consent. Which of the statements below describe whether documentation of consent will be obtained? NOTE: This question does not apply to screening and recruiting procedures which have already been addressed in question 4.7.

Documentation of consent that is obtained electronically is not considered written consent unless it is obtained by a method that allows verification of the individual's signature. In other words, saying "yes" by email is rarely considered to be written documentation of consent

a. Is written documentation of consent being obtained for:

☐ None of the research procedures	→ Use the table below to provide justification then go to question **8.5.**
☐ All of the research procedures	→ Do not complete the table; go to question **8.4.b.**
☐ Some of the research procedures	→ Use the table below to identify the procedures for which written documentation of consent will not be obtained from adult subjects.

Adult subject group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO documentation of consent	Will they be provided with a written statement describing the research (optional)? YES	NO
		☐	☐
		☐	☐
		☐	☐
		☐	☐
		☐	☐

Table footnotes

1. *If the answer is the same for all adult groups or all procedures, collapse the answer across the groups and/or procedures.*

b. Electronic consent signature. For studies in which documentation of consent will be obtained: will subjects use an electronic method to provide their consent signature?

- *See the GUIDANCE Electronic Informed Consent for information about options (including REDCap e-signature and the DocuSign system) and any associated requirements.*
- *FDA-regulated studies must use a system that complies with the FDA's "Part 11" requirements about electronic systems and records. Note that the UW-IT supported DocuSign e-signature system does not meet this requirement.*
- *Having subjects check a box at the beginning of an emailed or web-based questionnaire is not considered legally effective documentation of consent.*

☐ **No**
☐ **Yes** → If yes, indicate which methodology will be used.

☐ **UW ITHS REDCap** (excludes REDCap Mobile application, which is a separate software application for use with a mobile device for consent when internet service is absent or unreliable)

☐ **Other REDCap installation** → Please name the institutional version you will be using (e.g. Vanderbilt, Univ. of Cincinnati) in the field below and provide a completed **SUPPLEMENT Other REDCap Installation** with your submission.

☐ **UW DocuSign**

☐ **Other** → Please describe in the field below and provide a signed TEMPLATE Other E-signature Attestation Letter with your submission.

b.1 Is this method legally valid in the jurisdiction where the research will occur?
NOTE: UW ITHS REDCap (excludes REDCap Mobile application) and UW DocuSign have been vetted for compliance with WA State and federal laws regarding electronic signatures.

☐ **No**
☐ **Yes** → If yes, what is the source of information about legal validity?

b.2 Will verification of the subject's identity be obtained if the signature is not personally witnessed by a member of the study team? Note that this is required for FDA-regulated studies.

See the GUIDANCE Electronic Informed Consent for information and examples

☐ **No** → If no, provide the rationale for why this is not required or necessary to protect subjects or the integrity of the research. Also, what would be the risks to the actual subject if somebody other than the intended signer provides the consent signature?

☐ **Yes** → If yes, describe how subject identity will be verified, providing a non- technical description that the reviewer will understand.

b.3 How will the requirement be met to provide a copy of the consent information (consent form) to individuals who provide an e-signature?

The copy can be paper or electronic and may be provided on an electronic storage device or via email. If the electronic consent information uses hyperlinks or other websites or podcasts to convey information specifically related to the research, the information in these hyperlinks should be included in the copy provided to the subjects and the website must be maintained for the duration of the entire study.

8.5 Non-English-speaking or -reading adult subjects. Will the research enroll adult subjects who do not speak English or who lack fluency or literacy in English?

☐ **No**
☐ **Yes** → If yes, describe the process that will be used to ensure that the oral and written information provided to them during the consent process and throughout the study will be in a language readily understandable to them and (for written materials such as consent forms or questionnaires) at an appropriate reading/comprehension level.

a. Interpretation. Describe how interpretation will be provided, and when. Also, describe the qualifications of the interpreter(s) – for example, background, experience, language proficiency in English and in the other language, certification, other credentials, familiarity with the research-related vocabulary in English and the target language.

b. Translations. Describe how translations will be obtained for all study materials (not just consent forms). Also, describe the method for ensuring that the translations meet the UW IRB's requirement that translated documents will be linguistically accurate, at an appropriate reading level for the participant population, and culturally sensitive for the locale in which they will be used.

8.6 Barriers to written documentation of consent. There are many possible barriers to obtaining written documentation of consent. Consider, for example, individuals who are functionally illiterate; do not read English well; or have sensory or motor impairments that may impede the ability to read and sign a consent form.

a. Describe the plans (if any) for obtaining written documentation of consent from potential subjects who may have difficulty with the standard documentation process (that is, reading and signing a consent form). Skip this question if written documentation of consent is not being obtained for any part of the research.

Examples of solutions: Translated consent forms; use of the Short Form consent process; reading the form to the person before they sign it; excluding individuals who cannot read and understand the consent form.

8.7 Deception. Will information be deliberately withheld, or will false information be provided, to any of the subjects?

Note: "Blinding" subjects to their study group/condition/arm is not considered to be deception, but not telling them ahead of time that they will be subject to an intervention or about the purpose of the procedure(s) is deception.

- [X] **No**
- [ ] **Yes** → If yes, describe what information and why.

Example: It may be necessary to deceive subjects about the purpose of the study (describe why).

a. Will subjects be informed beforehand that they will be unaware of or misled regarding the nature or purposes of the research? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes**

b. Will subjects be debriefed later? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes** → If yes, describe how and when this will occur. Upload any debriefing materials, including talking points or a script, to ***Zipline***.

8.8 Cognitively impaired adults, and other adults unable to consent. Will such individuals be included in the research?

Examples: individuals with Traumatic Brain Injury (TBI) or dementia; individuals who are unconscious, or who are significantly intoxicated.

- [X] **No** → If no, go to question **8.9**.
- [ ] **Yes** → If yes, answer the following questions.

a. Rationale. Provide the rationale for including this population.

b. Capacity for consent / decision making capacity. Describe the process that will be used to determine whether a cognitively impaired individual is capable of consent decision making with respect to the research protocol and setting.

b.1. If there will be repeated interactions with the impaired subjects over a time period when cognitive capacity could increase or diminish, also describe how (if at all) decision-making capacity will be re-assessed and (if appropriate) consent obtained during that time.

c. Permission (surrogate consent). If the research will include adults who cannot consent for themselves, describe the process for obtaining permission ("surrogate consent") from a legally authorized representative (LAR).

*For research conducted in Washington State, see the **GUIDANCE Legally Authorized Representative** to learn which individuals meet the state definition of "legally authorized representative".*

d. Assent. Describe whether assent will be required of all, some, or none of the subjects. If some, indicate which subjects will be required to assent and which will not (and why not). Describe any process that will be used to obtain and document assent from the subjects.

e. Dissent or resistance. Describe how a subject's objection or resistance to participation (including non-verbal) during the research will be identified, and what will occur in response.

8.9 Research use of human fetal tissue obtained from elective abortion. Federal and UW Policy specify some requirements for the consent process. If you are conducting this type of research, check the boxes to confirm these requirements will be followed.

- ☐ Informed consent for the donation of fetal tissue for research use will be obtained by someone other than the person who obtained the informed consent for abortion.
- ☐ Informed consent for the donation of fetal tissue for research use will be obtained after the informed consent for abortion.
- ☐ Participation in the research will not affect the method of abortion.
- ☐ No enticements, benefits, or financial incentives will be used at any level of the process to incentivize abortion or the donation of human fetal tissue.
- ☐ The informed consent form for the donation of fetal tissue for use in research will be signed by both the

woman and the person who obtains the informed consent.

8.10 Consent-related materials. Upload to ***Zipline*** all consent scripts/talking points, consent forms, debriefing statements, Information Statements, Short Form consent forms, parental permission forms, and any other consent-related materials that will be used. Materials that will be used by a specific site should be uploaded to that site's **Local Site Documents** page.

- *Translations must be submitted and approved before they can be used. However, we strongly encourage you to wait to provide them until the IRB has approved the English versions.*
- *Combination forms: It may be appropriate to combine parental permission with consent, if parents are subjects as well as providing permission for the participation of their children. Similarly, a consent form may be appropriately considered an assent form for older children.*
- *For materials that cannot be uploaded: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. URLs (website addresses) may also be provided, or written descriptions of websites. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*

9 PRIVACY AND CONFIDENTIALITY

9.1 Privacy protections. Describe the steps that will be taken, if any, to address possible privacy concerns of subjects and potential subjects.

Privacy refers to the sense of being in control of access that others have to ourselves. This can be an issue with respect to recruiting, consenting, sensitivity of the data being collected, and the method of data collection.
Examples:

- *Many subjects will feel a violation of privacy if they receive a letter asking them to participate in a study because they have ____ medical condition, when their name, contact information, and medical condition were drawn from medical records without their consent. Example: the IRB expects that "cold call" recruitment letters will inform the subject about how their information was obtained.*
- *Recruiting subjects immediately prior to a sensitive or invasive procedure (e.g., in an outpatient surgery waiting room) will feel like an invasion of privacy to some individuals.*
- *Asking subjects about sensitive topics (e.g. details about sexual behavior) may feel like an invasion of privacy to some individuals.*

The data we use are all public — publicly shared and publicly visible, at the time of our data collections. However, even though these data are considered public, we do add layers of privacy protection for individuals who would have a reasonable expectation of privacy — e.g. those who are not public figures and not purposefully trying to manipulate others for political or financial gain. For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. However, **we do publish account names for public accounts** such as celebrities, media personalities, journalists, politicians, companies, etc. when the identity of the account is important for understanding the phenomena of study. We also publish the publicly available account names (which may or may not be traceable to real names) of accounts with high follower counts (>100,000 followers) that are repeatedly and purposefully manipulating the platform (intentionally spreading false information) for political or financial gain.

9.2 Identification of individuals in publications and presentations. Will potentially identifiable information about subjects be used in publications and presentations, or is it possible that individual identities could be inferred from what is planned to be published or presented?

☐ **No**

[X] **Yes** → If yes, will subject consent be obtained for this use?

[ ] **Yes**

[X] **No** → If no, describe the steps that will be taken to protect subjects (or small groups of subjects) from being identifiable.

For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. For presentations and publications, we will hide the account details for accounts that are not public figures or extremely high-visibility accounts (>100,000 followers).

9.3 State mandatory reporting. Each state has reporting laws that require some types of individuals to report some kinds of abuse, and medical conditions that are under public health surveillance. These include:

- Child abuse
- Abuse, abandonment, neglect, or financial exploitation of a vulnerable adult
- Sexual assault
- Serious physical assault
- Medical conditions subject to mandatory reporting (notification) for public health surveillance

Are you or a member of the research team likely to learn of any of the above events or circumstances while conducting the research **AND** feel obligated to report it to state authorities?

[X] **No**

[ ] **Yes** → If yes, the UW IRB expects subjects to be informed of this possibility in the consent form or during the consent process, unless you provide a rationale for not doing so:

9.4 Retention of identifiers and data. Check the box below to indicate assurance that any identifiers (or links between identifiers and data/specimens) and data that are part of the research records will not be destroyed until after the end of the applicable records retention requirements (e.g. Washington State; funding agency or sponsor; Food and Drug Administration). If it is important to say something about destruction of identifiers (or links to identifiers) in the consent form, state something like "the link between your identifier and the research data will be destroyed after the records retention period required by state and/or federal law."

This question can be left blank for conversion applications (existing paper applications that are being "converted" into a Zipline application.)

See the "Research Data" sections of the following website for UW Records management for the Washington State research rectords retention schedules that apply in general to the UW (not involving UW Medicine data):
http://f2.washington.edu/fm/recmgt/gs/research?title=R

See the "Research Records and Data" information in Section 8 of this document for the retention schedules for UW Medicine Records: ***https://www.uwmedicine.org/recordsmanagementuwm-records-retention-schedule.pdf***

[X] **Confirm**

9.5 Certificates of Confidentiality. Will a federal Certificate of Confidentiality be obtained for the research data?
NOTE: Answer "No" if the study is funded by NIH or the CDC, because all NIH-funded and CDC-funded studies automatically have a Certificate.

[X] **No**

[ ] **Yes**

9.6 Data and specimen security protections. Identify the data classifications and the security protections that will be provided for all sites where data will be collected, transmitted, or stored, referring to the **GUIDANCE Data and Security Protections** for the minimum requirements for each data classification level. ***It is not possible to answer this question without reading this document. Data security protections should not conflict with records retention requirements.***

a. Which level of protections will be applied to the data and specimens? If more than one level will be used, describe which level will apply to which data and which specimens and at which sites.

Level 1 (publicly available data)

b. Use this space to provide additional information, details, or to describe protections that do not fit into one of the levels. If there are any protections within the level listed in 9.6.a which will *not* be followed, list those here, including identifying the sites where this exception will apply. For example, if you intend to store subject identifiers with study data (not permitted under requirement U9 for Risk Levels 3-5), then indicate this in the box below (e.g., "We will not adhere to requirement U9 for screening data").

Though these data ARE publicly available at the time of our collection, it is possible that our analyses will reveal illegal (voter suppression efforts) or socially unacceptable (intentional lying) behavior by specific social media users (some of them public figures). It is even possible that our data and/or analyses could be used in prosecutions (for example, we have data from past collections that could be useful in understanding how the January 6 were planned). So, though the data are publicly available, there are risks for people whose content is picked up in our data collections — in part because our analyses are designed to identify "bad actors".

10 RISK / BENEFIT ASSESSMENT

10.1 Anticipated risks. Describe the reasonably foreseeable risks of harm, discomforts, and hazards to the subjects and others of the research procedures. For each harm, discomfort, or hazard:

- Describe the magnitude, probability, duration, and/or reversibility of the harm, discomfort, or hazard, AND
- Describe how the risks will be reduced or managed. Do not describe data security protections here, these are already described in Question 9.6.

- *Consider possible physical, psychological, social, legal, and economic harms, including possible negative effects on financial standing, employability, insurability, educational advancement or reputation. For example, a breach of confidentiality might have these effects.*
- *Examples of "others": embryo, fetus, or nursing child; family members; a specific group.*
- *Ensure applicable risk information from any Investigator Brochures, Drug Package Inserts, and/or Device Manuals is included in your description.*
- *Do not include the risks of non-research procedures that are already being performed.*
- *If the study design specifies that subjects will be assigned to a specific condition or intervention, then the condition or intervention is a research procedure - even if it is a standard of care.*
- *Examples of mitigation strategies: inclusion/exclusion criteria; applying appropriate data security measures to prevent unauthorized access to individually identifiable data; coding data; taking blood samples to monitor something that indicates drug toxicity.*
- *As with all questions on this application, you may refer to uploaded documents.*

There is some reputation all risk for accounts at appear in our analyses—for example by exposing that an account participated in the spread of misinformation, this could have a negative impact on that account's reputation. In some cases, where our data reveal libel (e.g. Rudy Guiliani accusing Dominion Voting machines of switching votes), our analyses could inform lawsuits. Similarly, by showing how a specific account organized protests that led to violence, our analyses could have criminal legal implications. For these reasons, we attempt to obscure in our reporting the accounts of private citizens who were not intentionally participating in illegal action. However, for public individuals (like Guiliani), we will not withhold account information.

10.2 Reproductive risks. Are there any risks of the study procedures to men and women (who are subjects, or partner of subjects) related to pregnancy, fertility, lactation or effects on a fetus or neonate?

Examples: direct teratogenic effects; possible germline effects; effects on fertility; effects on a woman's ability to continue a pregnancy; effects on future pregnancies.

[X] **No** → If no go to question 10.3
[ ] **Yes** → If yes, answer the following questions:

a. Risks. Describe the magnitude, probability, duration and/or reversibility of the risks.

b. Steps to minimize risk. Describe the specific steps that will be taken to minimize the magnitude, probability, or duration of these risks.

Examples: inform the subjects about the risks and how to minimize them; require a pregnancy test before and during the study; require subjects to use contraception; advise subjects about banking of sperm and ova.

If the use of contraception will be required: describe the allowable methods and the time period when contraception must be used.

c. Pregnancy. Describe what will be done if a subject (or a subject's partner) becomes pregnant

For example; will subjects be required to immediately notify study staff, so that the study procedures can be discontinue or modified, or for a discussion of risks, and/or referrals or counseling?

10.3 MRI risk management. A rare but serious adverse reaction called nephrogenic systemic fibrosis (NSF) has been observed in individuals with kidney disease who received gadolinium-based contrast agents (GBCAs) for the scans. Also, a few healthy individuals have a severe allergic reaction to GBCAs.

a. Use of gadolinium. Will any of the MRI scans involve the use of a gadolinium-based contrast agent (GBCA?)

[X] **No**
[ ] **Yes** → If yes, which agents will be used? *Check all that apply.*

	Brand Name	Generic Name	Chemical Structure
[ ]	Dotarem	Gadoterate meglumine	Macrocylic
[ ]	Eovist / Primovist	Gadoxetate disodium	Linear
[ ]	Gadavist	Gadobutro	Macrocyclic
[ ]	Magnevist	Gadpentetate dimeglumine	Linear
[ ]	MultiHance	Gadobenate dimeglumine	Linear
[ ]	Omniscan	Gadodiamide	Linear
[ ]	OptiMARK	Gadoversetamide	Linear
[ ]	ProHance	Gadoteridol	Macrocyclic
[ ]	Other, provide name:		

1.) The FDA has concluded that gadolinium is retained in the body and brain for a significantly longer time than previously recognized, especially for linear GBCAs. The health-related risks of this longer retention are not yet clearly established. However, the UW IRB expects researchers to provide a compelling justification for using a linear GBCA instead of a macrocyclic GBCA, to manage the risks associated with GBCAs.

Describe why it is important to use a GBCA with the MRI scan(s). Describe the dose that will be used and (if it is more than the standard clinical dose recommended by the manufacturer) why it is necessary to use a higher dose. If a linear GBCA will be used, explain why a macrocyclic GBCA cannot be used.

2.) Information for subjects. Confirm by checking this box that subjects will be provided with the FDA-approved Patient Medication Guide for the GBCA being used in the research or that the same information will be inserted into the consent form.

☐ **Confirmed**

b. Who will (1) calculate the dose of GBCA; (2) prepare it for injection; (3) insert and remove the IV catheter; (4) administer the GBCA; and (5) monitor for any adverse effects of the GCBA? Also, what are the qualifications and training of these individual(s)?

c. Describe how the renal function of subjects will be assessed prior to MRI scans and how that information will be used to exclude subjects at risk for NSF.

d. Describe the protocol for handling a severe allergic reaction to the GBCA or any other medical event/emergency during the MRI scan, including who will be responsible for which actions.

10.4 Unforeseeable risks. Are there any research procedures that may have risks that are currently unforeseeable?

Example: using a drug that hasn't been used before in this subject population.

☒ **No**
☐ **Yes** → If yes, identify the procedures.

10.5 Subjects who will be under regional or general anesthesiology. Will any research procedures occur while patients are under general or regional anesthesia, or during the 3 hours preceding general or regional anesthesia (supplied for non-research reasons)?

☐ **No**
☐ **Yes** → If yes, check all the boxes that apply.

☐ Administration of any drug for research purposes

☐ Inserting an intra-venous (central or peripheral) or intra-arterial line for research purposes

☐ Obtaining samples of blood, urine, bone marrow or cerebrospinal fluid for research

☐ Obtaining a research sample from tissue or organs that would not otherwise be removed during surgery

☐ Administration of a radio-isotope for research purposes**

☐ Implantation of an experimental device

☐ Other manipulations or procedures performed solely for research purposes (e.g., experimental liver dialysis, experimental brain stimulation)

If any of the boxes are checked:
Provide the name and institutional affiliation of a physician anesthesiologist who is a member of the research team or who will serve as a safety consultant about the interactions between the research procedures and the general or regional anesthesia of the subject-patients. If the procedures will be performed at a UW Medicine facility or affiliate, the anesthesiologist must be a UW faculty member, and the Vice Chair of Clinical Research in the UW Department of Anesthesiology and Pain Medicine must be consulted in advance for feasibility, safety and billing.

*** If the box about radio-isotopes is checked: the study team is responsible for informing in advance all appropriate clinical personnel (e.g., nurses, technicians, anesthesiologists, surgeons) about the administration and use of the radio-isotope, to ensure that any personal safety issues (e.g., pregnancy) can be appropriately addressed. This is a condition of IRB approval.*

10.6 Data and Safety Monitoring. A Data and Safety Monitoring Plan (DSMP) is required for clinical trials (as defined by NIH). If required for this research, or if there is a DSMP for the research regardless of whether it is required, upload the DSMP to ***Zipline***. If it is embedded in another document being uploading (for example, a Study Protocol) use the text box below to name the document that has the DSMP. Alternatively, provide a description of the DSMP in the text box below. For guidance on developing a DSMP, see the ITHS webpage on Data and Safety Monitoring Plans.

10.7 Un-blinding. If this is a double-blinded or single-blinded study in which the participant and/or relevant study team members do not know the group to which the participant is assigned: describe the circumstances under which un-blinding would be necessary, and to whom the un-blinded information would be provided.

10.8 Withdrawal of participants. If applicable, describe the anticipated circumstances under which participants will be withdrawn from the research without their consent. Also, describe any procedures for orderly withdrawal of a participant, regardless of the reason, including whether it will involve partial withdrawal from procedures and any intervention but continued data collection or long-term follow-up.

10.9 Anticipated direct benefits to participants. If there are any direct research-related benefits that some or all individual participants are likely to experience from taking part in the research, describe them below:

Do not include benefits to society or others, and do not include subject payment (if any). Examples: medical benefits such as laboratory tests (if subjects receive the results); psychological resources made available to participants; training or education that is provided.

N/A

10.10 Return of individual research results.

In this section, provide your plans for the return of individual results. An "individual research result" is any information collected, generated or discovered in the course of a research study that is linked to the identity of a research participant. These may be results from screening procedures, results that are actively sought for purposes of the study, results that are discovered unintentionally, or after analysis of the collected data and/or results has been completed.

*See the **GUIDANCE Return of Individual Results** for information about results that should and should not be returned, validity of results, the Clinical Laboratory Improvement Amendment (CLIA), consent requirements and communicating results.*

a. Is it anticipated that the research will produce any individual research results that are clinically actionable?

"Clinically actionable" means that there are established therapeutic or preventive interventions or other available actions that have the potential to change the clinical course of the disease/condition, or lead to an improved health outcome.

In general, every effort should be made to offer results that are clinically actionable, valid and pose life-threatening or severe health consequences if not treated or addressed quickly. Other clinically actionable results should be offered if this can be accomplished without compromising the research.

- [X] **No**
- [ ] **Yes** → If yes, answer the following questions (a.1-a.3).

a.1. Describe the clinically actionable results that are anticipated and explain which results, if any, could be urgent (i.e. because they pose life-threatening or severe health consequences if not treated or addressed quickly).

Examples of urgent results include very high calcium levels, highly elevated liver function test results, positive results for reportable STDs.

a.2. Explain which of these results will be offered to subjects.

a.3. Explain which results will not be offered to subjects and provide the rationale for not offering these results.

Reasons not to offer the results might include:

- *There are serious questions regarding validity or reliability*
- *Returning the results has the potential to cause bias*
- *There are insufficient resources to communicate the results effectively and appropriately*
- *Knowledge of the result could cause psychosocial harm to subjects*

b. Is there a plan for offering subjects any results that are not clinically actionable?

Examples: non-actionable genetic results, clinical tests in the normal range, experimental and/or uncertain results.

- [ ] **No**
- [ ] **Yes** → If yes, explain which results will be offered to subjects and provide the rationale for

c. Describe the validity and reliability of any results that will be offered to subjects.

The IRB will consider evidence of validity such as studies demonstrating diagnostic, prognostic, or predictive value, use of confirmatory testing, and quality management systems.

d. Describe the process for communicating results to subjects and facilitating understanding of the results. In the description, include who will approach the participant with regard to the offer of results, who will communicate the result (if different), the circumstances, timing, and communication methods that will be used.

e. Describe any plans to share results with family members (e.g. in the event a subject becomes incapacitated or deceased).

f. Check the box to indicate that any plans for return of individual research results have been described in the consent document. If there are no plans to provide results to participants, this should be stated in the consent form.

*See the **GUIDANCE Return of Individual Results** for information about consent requirements.*

☐ **Confirmed**

10.11 Commercial products or patents. Is it possible that a commercial product or patent could result from this study?

☐ **No**
☐ **Yes** → If yes, describe whether subjects might receive any remuneration/compensation and, if yes, how the amount will be determined.

11 ECONOMIC BURDEN TO PARTICIPANTS

11.1 Financial responsibility for research-related injuries. Answer this question only if the lead researcher is not a UW student, staff member, or faculty member whose primary paid appointment is at the UW.

For each institution involved in conducting the research: Describe who will be financially responsible for research-related injuries experienced by subjects, and any limitations. Describe the process (if any) by which participants may obtain treatment/compensation.

11.2 Costs to subjects. Describe any research-related costs for which subjects and/or their health insurance may be responsible (examples might include: CT scan required for research eligibility screening; co-pays; surgical costs when a subject is randomized to a specific procedure; cost of a device; travel and parking expenses that will not be reimbursed).

12 RESOURCES

12.1 Faculty Advisor. (For researchers who are students, residents, fellows, or post-docs.) Provide the following information about the faculty advisor.

- Advisor's name
- Your relationship with your advisor (for example: graduate advisor; course instructor)
- Your plans for communication/consultation with your advisor about progress, problems, and changes.

PI (Kate Starbird) is faculty

12.2 UW Principal Investigator Qualifications. Upload a current or recent Curriculum Vitae (CV), Biosketch (as provided to federal funding agencies), or similar document to the Local Site Documents page in Zipline. The purpose of this is to address the PI's qualifications to conduct the proposed research (education, experience, training, certifications, etc.).

For help with creating a CV, see http://adai.uw.edu/grants/nsf_biosketch_template.pdf and https://education.uwmedicine.org/student-affairs/career-advising/year-4/residency-applications/curriculum-vitae/

☐ **The CV will be uploaded.**

12.3 UW Study team qualifications. Describe the qualifications and/or training for each UW study team member to fulfill their role on the study and perform study procedures. (You may be asked about non-UW study team members during the review; they should not be described here.) You may list these individuals by name, however if you list an individual by name, you will need to modify this application if that individual is replaced. Alternatively, you can describe study roles and the qualifications and training the PI or study leadership will require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.

Describe: The role (or name of person), the study activities they will perform, and the qualifications or training that are relevant to performing those study activities.

Examples:
Research Study Coordinator: Obtain consent, administer surveys, blood draw. Will have previous experience coordinating clinical research and be a certified phlebotomist in WA.
Undergraduate Research Assistant: Obtain consent, perform all study procedures. Will have had coursework in research methods, complete an orientation to human subjects protections given by the department, and will receive training from the PI or the graduate student project lead on obtaining consent and debriefing subjects.
Acupuncturist: Perform acupuncture procedures and administer surveys. Must be licensed with WA State DoH and complete training in administering research surveys given by the project director, an experienced survey researcher.
Co-Investigator: Supervise MRI and CT scan procedures and data interpretation, obtain consent. MD, specialty in interventional radiology and body imaging. 5-years clinical research experience.

12.4 Study team training and communication. Describe how it will be ensured that each study team member is adequately trained and informed about the research procedures and requirements (including any changes) as well as their research-related duties and functions.

☐ **There is no study team.**

13 OTHER APPROVALS, PERMISSIONS, and REGULATORY ISSUES

13.1 Approvals and permissions. Identify any other approvals or permissions that will be obtained. For example: from a school, external site/organization, funding agency, employee union, UW Medicine clinical unit.

Do not attach the approvals and permissions unless requested by the IRB.

N/A

13.2 Financial Conflict of Interest. Does any UW member of the team have ownership or other Significant Financial Interest (SFI) with this research as defined by UW policy GIM 10?

☐ **No**

☐ **Yes** → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

- ☐ **No** → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination
- ☐ **Yes** → If yes, upload the Conflict Management Plan for every UW team member who has a FCOI with respect to the research, to ***Zipline***. If it is not yet available, use the text box to describe whether the Significant Financial Interest has been disclosed already to the UW Office of Research and include the FIDS Disclosure ID if available.

To: Jeff Hancock[hancockj@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Elena Cryst[ecryst@stanford.edu]
Cc: Emma Spiro[espiro@uw.edu]; Jevin West[jevinw@uw.edu]; Crystal Welliver[welliver@uw.edu]
Bcc: caulfield.mike@gmail.com[caulfield.mike@gmail.com]
From: Kate Starbird
Sent: Wed 9/22/2021 8:34:50 PM
Subject: SaTC grant: IRB update
Received: Wed 9/22/2021 8:34:51 PM
APPLICATION_IRB_RapidResponse_SocialMedia.docx

Hi folks,
I talked with our IRB folks this afternoon. I gave them all the details and they confirmed that this would still be considered "Not Human Subjects" because it uses exclusively public data. (It doesn't even make it to "Exempt" on our side).

If we ever want to include data that wasn't public (e.g. from a private group or channel), then we'll have to go through the IRB separately with that data set. But we'll cross that bridge if we get there.

I'm attaching a current version of our application, which I intend to send through UW IRB to get our letter that confirms this isn't human subjects research. The Stanford folks will have to go through their own IRB. You're welcome to use any of the content I include here.

We'll work on the ethnographic research IRB next. That one will likely be "Expedited", but we'll find out. I'm hoping to get that out by the end of October. But we should be able to get started as soon as the social media pieces go through our different IRBs.

Kate

The Human Subjects Division (HSD) strives to ensure that people with disabilities have access to all services and content. **If you experience any accessibility-related issues with this form or any aspect of the application process, email hsdinfo@uw.edu for assistance.**

INSTRUCTIONS

- **This form is only for studies that will be reviewed by the UW IRB**. Before completing this form, check HSD's website to confirm that this should not be reviewed by an external (non-UW) IRB.
- **If you are requesting a determination** about whether the planned activity is human subjects research or qualifies for exempt status, you may skip all questions except those marked with a ◯. For example **1.1** must be answered.
- **Answer all questions**. If a question is not applicable to the research or if you believe you have already answered a question elsewhere in the application, state "NA" (and if applicable, refer to the question where you provided the information). If you do not answer a question, the IRB does not know whether the question was overlooked or whether it is not applicable. This may result in unnecessary "back and forth" for clarification. Use non-technical language as much as possible.
- To check a box, place an "X" in the box. To fill in a text box, make sure your cursor is within the gray text box bar before typing or pasting text.
- For collaborative or multi-site research, describe only the UW activities unless you are requesting that the UW IRB provide the review and oversight for non-UW collaborators or co-investigators as well.
- You may reference other documents (such as a grant application) if they provide the requested information in non-technical language. Be sure to provide the document name, page(s), and specific sections, and upload it to ***Zipline***. Also, describe any changes that may have occurred since the document was written (for example, changes that you've made during or after the grant review process). In some cases, you may need to provide additional details in the answer space as well as referencing a document.
- **NOTE: Do not convert this Word document to PDF.** The ability to use "tracked changes" is required in order to modify your study and respond to screening requests.

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1 OVERVIEW

Study Title: Rapid Response to Disinformation: Social Media Analysis

1.1 Home institution. Identify the institution through which the lead researcher listed on the IRB application will conduct the research. Provide any helpful explanatory information.

In general, the home institution is the institution (1) that provides the researcher's paycheck and that considers him/her to be a paid employee, or (2) at which the researcher is a matriculated student. Scholars, faculty, fellows, and students who are visiting the UW and who are the lead researcher: identify your home institution and describe the purpose and duration of your UW visit, as well as the UW department/center with which you are affiliated while at the UW.

Note that many UW clinical faculty members are paid employees of non-UW institutions.

*The UW IRB provides IRB review and oversight for only those researchers who meet the criteria described in the **SOP Use of the UW IRB**.*

University of Washington

1.2 Consultation history. Has there been any consultation with someone at HSD about this study?

It is not necessary to obtain advance consultation. However, if advance consultation was obtained, answering this question will help ensure that the IRB is aware of and considers the advice and guidance provided in that consultation.

☐ **No**
☒ **Yes** → If yes, briefly describe the consultation: approximate date, with whom, and method (e.g., by email, phone call, in-person meeting).

Jenny Maki, email. Sept 13-17.

1.3 Similar and/or related studies. Are there any related IRB applications that provide context for the proposed activities?

Examples of studies for which there is likely to be a related IRB application: Using samples or data collected by another study; recruiting subjects from a registry established by a colleague's research activity; conducting Phase 2 of a multi-part project, or conducting a continuation of another study; serving as the data coordinating center for a multi-site study that includes a UW site.

Providing this information (if relevant) may significantly improve the efficiency and consistency of the IRB's review.

☐ **No**
☒ **Yes** → If yes, briefly describe the other studies or applications and how they relate to the proposed activities. If the other applications were reviewed by the UW IRB, please also provide: the UW IRB number, the study title, and the lead researcher's name.

The proposed work connects to the following IRBs:

STUDY00003903: Unraveling Online Disinformation Trajectories — Social Media Analysis (PI: Starbird). This IRB covers related research analyzing publicly available social media data to better understand how disinformation spreads online.

STUDY00009923: How Scientific Data, Knowledge, and Expertise Mobilize in Online Media during the COVID-19 Crisis (PI: Spiro). This IRB covers research analyzing online activities to better understand the flow of information related to Covid-19.

1.4 Externally-imposed urgency or time deadlines. Are there any externally-imposed deadlines or urgency that affect the proposed activity?

HSD recognizes that everyone would like their IRB applications to be reviewed as quickly as possible. To ensure fairness, it is HSD policy to review applications in the order in which they are received. However, HSD will assign a higher priority to research with externally-imposed urgency that is beyond the control of the researcher. Researchers are encouraged to communicate as soon as possible with their HSD staff contact person when there is an urgent situation (in other words, before submitting the IRB application). Examples: a researcher plans to test an experimental vaccine that has just been developed for a newly emerging epidemic; a researcher has an unexpected opportunity to collect data from students when the end of the school year is only four weeks away.

HSD may ask for documentation of the externally-imposed urgency. A higher priority should not be requested to compensate for a researcher's failure to prepare an IRB application in a timely manner. Note that IRB review requires a certain minimum amount of time; without sufficient time, the IRB may not be able to review and approve an application by a deadline.

[ ] **No**
[X] **Yes** → If yes, briefly describe the urgency or deadline as well as the reason for it.

There's currently a hold on our budget for this research, and it would be great to remove that so we can hire researchers. Some urgency, but no specific deadline.

1.5 Objectives Using lay language, describe the purpose, specific aims, or objectives that will be met by this specific project. If hypotheses are being tested, describe them. You will be asked to describe the specific procedures in a later section.

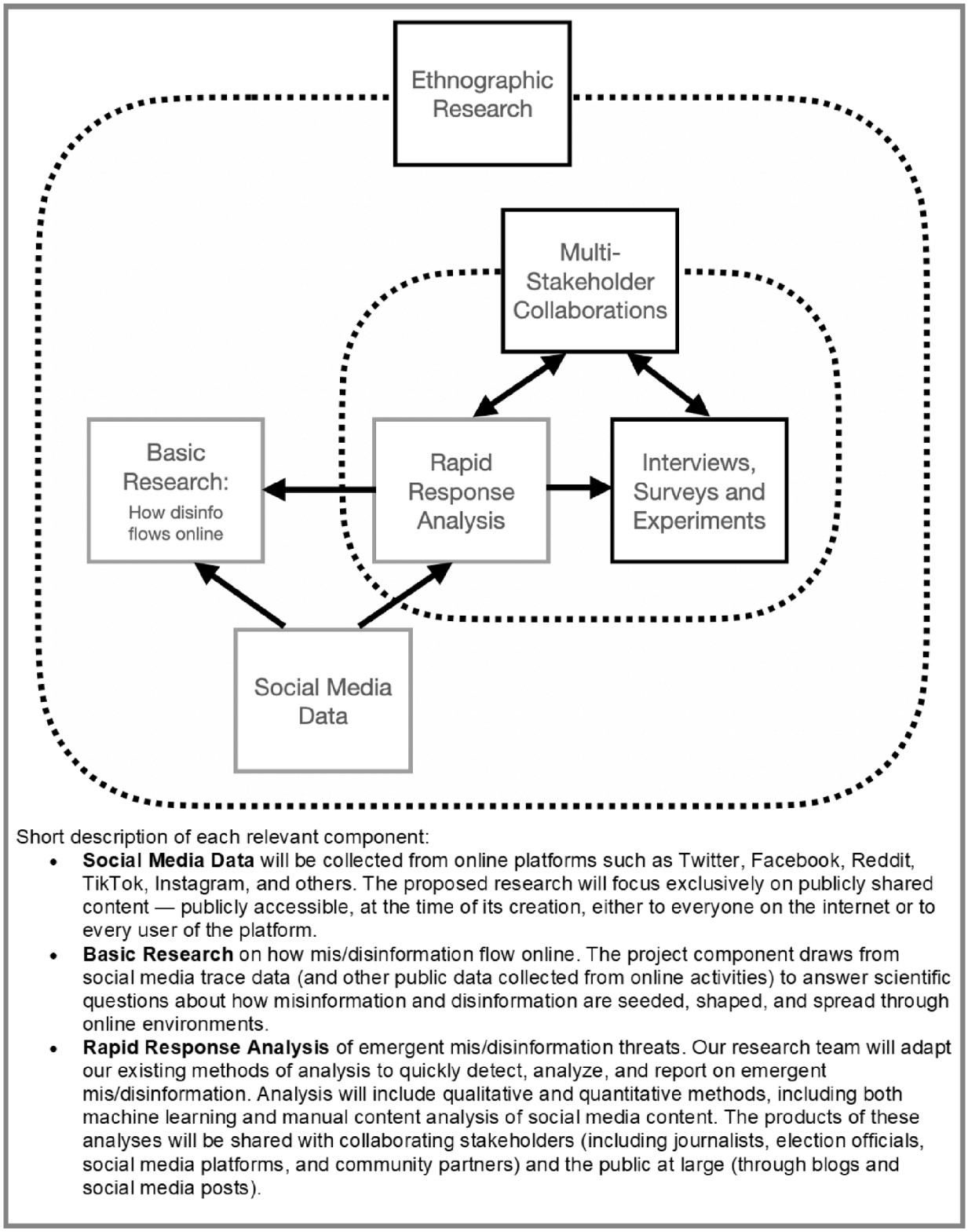
If this application involves the use of a HUD "humanitarian" device: describe whether the use is for "on-label" clinical patient care, "off-label" clinical patient care, and/or research (collecting safety and/or effectiveness data).

This research is part of a larger research project where we will conduct basic research as well as "rapid response" research on public social media data (and study the rapid response activities). **This IRB proposal is focused on the social media data collection and analysis.**

The larger project has integrated three objectives. This IRB directly relates to the first two.

1. **To enhance understandings of how mis- and disinformation spread online — especially in relation to elections and crisis events.**
2. **To develop, deploy, and evaluate methods for analyzing online misinformation for "rapid analysis" of emerging mis- and disinformation.**
3. To develop, deploy, and evaluate collaborative frameworks for working with diverse stakeholders (journalists, social media companies, government officials, community organizations) to quickly identify, analyze, and communicate about online mis- and disinformation.

The project has several distinct but interacting components, illustrated and defined below. The social media data feed into both the basic research and the rapid response analysis. These components in the blue boxes are covered in this proposal.



Short description of each relevant component:

- **Social Media Data** will be collected from online platforms such as Twitter, Facebook, Reddit, TikTok, Instagram, and others. The proposed research will focus exclusively on publicly shared content — publicly accessible, at the time of its creation, either to everyone on the internet or to every user of the platform.
- **Basic Research** on how mis/disinformation flow online. The project component draws from social media trace data (and other public data collected from online activities) to answer scientific questions about how misinformation and disinformation are seeded, shaped, and spread through online environments.
- **Rapid Response Analysis** of emergent mis/disinformation threats. Our research team will adapt our existing methods of analysis to quickly detect, analyze, and report on emergent mis/disinformation. Analysis will include qualitative and quantitative methods, including both machine learning and manual content analysis of social media content. The products of these analyses will be shared with collaborating stakeholders (including journalists, election officials, social media platforms, and community partners) and the public at large (through blogs and social media posts).

1.6 Study design. Provide a one-sentence description of the general study design and/or type of methodology.

Your answer will help HSD in assigning applications to reviewers and in managing workload. Examples: a longitudinal observational study; a double-blind, placebo-controlled randomized study; ethnographic interviews; web scraping from a convenience sample of blogs; medical record review; coordinating center for a multi-site study.

This IRB proposal focuses on mixed (qualitative, quantitative and visual) analysis of social media data and other data that is publicly available online.

1.7 Intent. Check all the descriptors that apply to your activity. You must place an "X" in at least one box.

This question is essential for ensuring that your application is correctly reviewed. Please read each option carefully.

	Descriptor
☐	1. Class project or other activity whose purpose is to provide an educational experience for the researcher (for example, to learn about the process or methods of doing research).
☐	2. Part of an institution, organization, or program's own internal operational monitoring.
☐	3. Improve the quality of service provided by a specific institution, organization, or program.
☒	4. Designed to expand the knowledge base of a scientific discipline or other scholarly field of study, and produce results that: • Are expected to be applicable to a larger population beyond the site of data collection or the specific subjects studied, or • Are intended to be used to develop, test, or support theories, principles, and statements of relationships, or to inform policy beyond the study.
☐	5. Focus directly on the specific individuals about whom the information or biospecimens are collected through oral history, journalism, biography, or historical scholarship activities, to provide an accurate and evidence-based portrayal of the individuals.
☐	6. A quality improvement or program improvement activity conducted to improve the implementation (delivery or quality) of an accepted practice, or to collect data about the implementation of the practice for clinical, practical, or administrative purposes. This does not include the evaluation of the efficacy of different accepted practices, or a comparison of their efficacy.
☐	7. Public health surveillance activities conducted, requested, or authorized by a public health authority for the sole purpose of identifying or investigating potential public health signals or timely awareness and priority setting during a situation that threatens public health.
☐	8. Preliminary, exploratory, or research development activities (such as pilot and feasibility studies, or reliability/validation testing of a questionnaire)
☐	9. Expanded access use of a drug or device not yet approved for this purpose
☐	10. Use of a Humanitarian Use Device
☐	11. Other. Explain:

1.8 Background, experience, and preliminary work. Answer this question **only** if the proposed activity has one or more of the following characteristics. The purpose of this question is to provide the IRB with information that is relevant to its risk/benefit analysis.

- Involves more than minimal risk (physical or non-physical)
- Is a clinical trial, or
- Involves having the subjects use a drug, biological, botanical, nutritional supplement, or medical device.

"Minimal risk" means that the probability and magnitude of harm or discomfort anticipated in the research are not greater than those ordinarily encountered in daily life or during the performance of routine physical or psychological examinations or tests.

a. Background. Provide the rationale and the scientific or scholarly background for the proposed activity, based on existing literature (or clinical knowledge). Describe the gaps in current knowledge that the project is intended to address.

This should be a plain language description. Do not provide scholarly citations. Limit your answer to less than one page, or refer to an attached document with background information that is no more than three pages long.

Addressing pervasive misinformation — especially intentional *disinformation* — is one of society's most pressing challenges. Disinformation affects human health (Zarocostas, 2020; Roozenbeek et al., 2020), planetary health (Oreskes & Conway, 2011; van der Linden et al., 2017), diplomacy (Rid, 2020; Goldman, 2016), elections (Faris et al., 2017; Bak-Coleman et al., 2020; Benkler et al., 2020) and collective decision-making more broadly (Starbird et al., 2019). Disinformation reduces our ability to respond to emerging threats and disasters. The COVID-19 pandemic and the recent 2020 U.S. elections provide evidence of the direct impact of disinformation; resistance to public health policies (Carrieri et al., 2019; Roozenbeek et al., 2020) and the U.S. Capitol riots on Jan. 6, 2021 (Reader, 2021) are notable examples. In other cases, effects are indirect and difficult to measure. Both indicate we need to better understand how disinformation is seeded, cultivated, and spread.

Disinformation's most consequential effects are the degradation of trust in the democratic process, degradation of trust in institutions, and degradation of trust in each other (Bradshaw & Howard, 2018). Disinformation is an attack on our collective ability to make sense of information and to build shared realities — the kind of common ground that a democratic society needs to stand upon to govern itself (Farrell & Shneier, 2018). Even the institution of science, which has maintained high levels of trust for decades, has begun to see declines among some parts of the population in the United States (West & Bergstrom, 2021; Iyengar & Massey, 2018; Gauchat, 2012).

Despite increased attention on the issue of disinformation, knowledge gaps exist. Researchers typically define disinformation as information intended to mislead, but in practice, both veracity and intention can be difficult to determine. The participatory and diffuse nature of disinformation (Starbird et al., 2019) makes it especially challenging to detect and address. We need a better understanding of what disinformation is and how it functions — and the proposed research seeks to enhance this understanding.

But even if we could consistently and accurately characterize and detect disinformation, can we do this fast enough in practice and in ways that mitigate the negative effects of disinformation rather than amplify them? How do we integrate real-time responses across diverse stakeholders, e.g., social media platforms, journalists, and governments? And how do we communicate about emergent disinformation campaigns in ways that are useful to these and other stakeholders, including the public at large? It is these questions that we hope to address with this research.

b. Experience and preliminary work. Briefly describe experience or preliminary work or data (if any) that you, your team, or your collaborators/co-investigators have that supports the feasibility and/or safety of this study.

It is not necessary to summarize all discussion that has led to the development of the study protocol. The IRB is interested only in short summaries about experiences or preliminary work that suggest the study is feasible and that risks are reasonable relative to the benefits. Examples: Your team has already conducted a Phase 1 study of an experimental drug which supports the Phase 2 study being proposed in this application; your team has already done a small pilot study showing that the reading skills intervention described in this application is feasible in an after-school program with classroom aides; your team has experience with the type of surgery that is required to implant the study device; the study coordinator is experienced in working with subjects who have significant cognitive impairment.

Researchers on our team have extensive experience applying mixed-methods to the analysis of social media data to better understand how mis- and disinformation take root and spread across the internet (e.g. 51 et al., 2016; 51 et al., 2018, 51 et al., 2018, Starbird et al., 2018; Starbird et al., 2019). We have established the infrastructure to collect, store, analyze, and (in cases where it aligns with terms of service) share online data — e.g. public data from social media platforms — for research.

We have previously organized and participated in "rapid response" efforts to address emergent disinformation. In Fall 2020, our two research teams (at UW and Stanford) collaborated with two external analysis teams and a variety of stakeholders — including journalists, social media platforms, government officials, and community organizations — as part of the "Election Integrity Partnership" to conduct rapid analysis of online misinformation related to the election. Findings from these research efforts were quickly communicated with partners and the public at large — through articles, blogs, and social media posts (e.g. Browning, 2020; Starbird et al., 2020; Tollefson, 2021). A final report (Center for an Informed Public et al., 2020) documents the extent of these activities.

51, and Kate Starbird. (2018). Acting the Part: Examining Information Operations within #BlackLivesMatter Discourse. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 20.

Kellen Browning. (November 3, 2020). After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows. *New York Times*. Available at: https://www.nytimes.com/2020/11/03/technology/after-twitter-labels-trumps-tweet-about-pennsylvania-its-spread-slows.html

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election*. Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

Kate Starbird, Michael Caulfield, Renee DiResta, Jevin West, Emma Spiro, 51, Rachel Moran, and 51 October 26, 2020. "Uncertainty and misinformation: What to expect on election night and days after." Blog posted by *Election Integrity Partnership*. https://www.eipartnership.net/news/what-to-expect

Kate Starbird, 51 (2019). Disinformation as Collaborative Work: Surfacing the Participatory Nature of Strategic Information Operations. *PACMHCI. 3, Computer-Supported Cooperative Work (CSCW 2019)*. Article 127.

51 and Kate Starbird. (2018). Assembling Strategic Narratives: Information Operations as Collaborative Work within an Online Community. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 183.

Kate Starbird, [51] and Daniel Scarnecchia. (2018). Ecosystem or Echo-System? Exploring Content Sharing across Alternative Media Domains. Presented at *12th International AAAI Conference on Web and Social Media (ICWSM 2018)*, Stanford, CA, (pp. 365-374).

[51] Kate Starbird and Emma Spiro. (2016). Rumors at the Speed of Light? Modeling the Rate of Rumor Transmission during Crisis. *Hawaii International Conference on System Sciences (HICSS 2016)*. (pp. 1969-1978).

Jeff Tollefson. "Tracking QAnon: how Trump turned conspiracy-theory research upside down." *Nature Communications*. February 4, 2021. https://www.nature.com/articles/d41586-021-00257-y

1.9 Supplements. Check all boxes that apply, to identify relevant Supplements that should be completed and uploaded to ***Zipline***.

This section is here instead of at the end of the form to reduce the risk of duplicating information in this IRB Protocol form that you will need to provide in these Supplements.

Check all That Apply	Type of Research	Supplement Name
☐	**Department of Defense** The research involves Department of Defense funding, facilities, data, or personnel.	SUPPLEMENT Department of Defense
☐	**Department of Energy** The research involves Department of Energy funding, facilities, data, or personnel.	SUPPLEMENT Department of Energy
☐	**Drug, biologic, botanical, supplement** Procedures involve the use of any drug, biologic, botanical or supplement, even if the item is not the focus of the proposed research	SUPPLEMENT Drugs
☐	**Emergency exception to informed consent** Research that requires this special consent waiver for research involving more than minimal risk	SUPPLEMENT Exception from Informed Consent for Emergency Research (EFIC)
☐	**Genomic data sharing** Genomic data are being collected and will be deposited in an external database (such as the NIH dbGaP database) for sharing with other researchers, and the UW is being asked to provide the required certification or to ensure that the consent forms can be certified	SUPPLEMENT Genomic Data Sharing
☐	**Medical device** Procedures involve the use of any medical device, even if the device is not the focus of the proposed research, except when the device is FDA-approved and is being used through a clinical facility in the manner for which it is approved	SUPPLEMENT Devices
☐	**Multi-site or collaborative study** The UW IRB is being asked to review on behalf of one or more non-UW institutions in a multi-site or collaborative study.	SUPPLEMENT Multi-site or Collaborative Research

☐	**Non-UW Individual Investigators** The UW IRB is being asked to review on behalf of one or more non-UW individuals who are not affiliated with another organization for the purpose of the research.	SUPPLEMENT Non-UW Individual Investigators
☐	**Other REDCap Installation Attestation for Electronic Consent** The research will use a non-UW installation of REDCap for conducting and/or documenting informed consent.	SUPPLEMENT Other REDCap Installation
☒	None of the above	

1.10 **Confirm by checking the box below** that you will comply with the COVID requirements described on HSD's COVID webpage, which are based on the location of the in-person study procedures and the vaccination status of study team members and study participants.

Review the HSD website for current guidelines about which in-person research activities are allowable.

☒ **Confirmed**

2 PARTICIPANTS

2.1 **Participants**. Describe the general characteristics of the subject populations or groups, including age range, gender, health status, and any other relevant characteristics.

This proposal has several different components that have different kinds of participants.

For **Basic Research and "Rapid Response" Research** on how mis- and disinformation flow online, we will conduct mixed (quantitative and qualitative) analysis on social media data collected from multiple platforms, including Twitter, Facebook, Instagram, YouTube, Reddit, TikTok, and others.

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories.

We will limit our analysis to social media data that was shared through public accounts — data that was publicly visible (to any/all users of those platforms) at the time of collection. "Participants" will be social media users who shared or engaged with social media content captured by our collections — e.g. accounts that shared tweets with specific keywords related to elections, crises and breaking news events or specific disinformation campaigns. These can include people from all over the world and people of any age. Due to the nature of our collections, we do not foresee children comprising a large portion of participants captured in our collections. However, there will likely be some posts and/or engagements from children (13-17) included in these collections.

Platforms of study include, but are not limited to: Twitter, Facebook (public posts, pages and groups), Instagram (public pages), YouTube, Reddit, TikTok, Parler, Amazon.

2.2 Inclusion and exclusion criteria.

a. Inclusion criteria. Describe the specific criteria that will be used to decide who will be included in the research from among interested or potential subjects. Define any technical terms in lay language.

"Participants" in the social media data analysis will be people who operate accounts that shared content related to one of the events, misinformation incidents, or disinformation campaigns we are studying.

b. Exclusion criteria. Describe the specific criteria that will be used to decide who will be excluded from the research from subjects who meet the inclusion criteria listed above. Define any technical terms in lay language.

There are no exclusion criteria.

2.3 Prisoners. IRB approval is required in order to include prisoners in research, even when prisoners are not an intended target population.

Is the research likely to have subjects who become prisoners while participating in the study?

For example, a longitudinal study of youth with drug problems is likely to have subjects who will be prisoners at some point during the study.

[X] **No**
[ ] **Yes** → If yes, if a subject becomes a prisoner while participating in the study, will any study procedures and/or data collection related to the subject be continued while the subject is a prisoner?

[ ] **No**
[ ] **Yes** → If yes, describe the procedures and/or data collection that will continue with prisoner subjects

2.4 Will the proposed research recruit or obtain data from individuals that are known to be prisoners?

*For records reviews: if the records do not indicate prisoner status and prisoners are not a target population, select "No". See the **GUIDANCE Prisoners** for the definition of "prisoner", which is not necessarily tied to the type of facility in which a person is residing.*

[X] **No**
[ ] **Yes** → If yes, answer the following questions (i – iv).

i. Describe the type of prisoners, and their location(s):

ii. One concern about prisoner research is whether the effect of participation on prisoners' general living conditions, medical care, quality of food, amenities, and/or opportunity for earnings in prison will be so great that it will make it difficult for prisoners to adequately consider the research risks. How will the chances of this be reduced?

iii. Describe what will be done to make sure that (a) recruitment and subject selection procedures will be fair to all eligible prisoners and (b) prison authorities or other prisoners will not be able to arbitrarily prevent or require particular prisoners from participating.

iv. If the research is funded by one of these federal departments and agencies (Health & Human Services; Energy; Defense; Homeland Security; CIA; Social Security Administration), and/or will involve prisoners in federal facilities or in state/local facilities outside of Washington State: check the box below to provide assurance that study team members will (a) not encourage or facilitate the use of a prisoner's participation in the research to influence parole or pardon decisions, and (b) clearly inform each prisoner in advance (for example, in a consent form) that participation in the research will have no effect on his or her parole or pardon.

☐ **Confirmed**

2.5 **Protected populations**. IRB approval is required for the use of the subject populations listed here. Check the boxes for any of these populations that will be purposefully included. (In other words, being a part of the population is an inclusion criterion for the study.)

The WORKSHEETS describe the criteria for approval but do not need to be completed and should not be submitted.

Population	Worksheet
☐ Fetuses in utero	WORKSHEET Pregnant Women
☐ Neonates of uncertain viability	WORKSHEET Neonates
☐ Non-viable neonates	WORKSHEET Neonates
☐ Pregnant women	WORKSHEET Pregnant Women

a. If you check any of the boxes above, use this space to provide any information that may be relevant for the IRB to consider.

2.6 **Native Americans or non-U.S. indigenous populations.** Will Native American or non-U.S. indigenous populations be actively recruited through a tribe, tribe-focused organization, or similar community-based organization?

Indigenous people are defined in international or national legislation as having a set of specific rights based on their historical ties to a particular territory and their cultural or historical distinctiveness from other populations that are often politically dominant.

Examples: a reservation school or health clinic; recruiting during a tribal community gathering

☒ **No**

☐ **Yes** → If yes, name the tribe, tribal-focused organization, or similar community-based organization. The UW IRB expects that tribal/indigenous approval will be obtained before beginning the research. This may or may not involve approval from a tribal IRB. The study team and any collaborators/investigators are also responsible for identifying any tribal laws that may affect the research.

2.7 Third party subjects. Will the research collect private identifiable information about *other individuals* from the study subjects? Common examples include: collecting medical history information or contact information about family members, friends, co-workers.

"Identifiable" means any direct or indirect identifier that, alone or in combination, would allow you or another member of the research team to readily identify the person. For example, suppose that the research is about immigration history. If subjects are asked questions about their grandparents but are not asked for names or other information that would allow easy identification of the grandparents, then private identifiable information is not being collected about the grandparents and the grandparents are not subjects.

[X] **No**
[ ] **Yes** → If yes, these individuals are considered human subjects in the study. Describe them and what data will be collected about them.

2.8 Number of subjects. Is it possible to predict or describe the maximum number of subjects (or subject units) needed to complete the study, for each subject group?

Subject units mean units within a group. For most research studies, a group will consist of individuals. However, the unit of interest in some research is not the individual. Examples:

- *Dyads such as caregiver-and-Alzheimer's patient, or parent and child*
- *Families*
- *Other units, such as student-parent-teacher*

Subject group means categories of subjects that are meaningful for the specific study. Some research has only one subject group – for example, all UW students taking Introductory Psychology. Some common ways in which subjects are grouped include:

- *By intervention – for example, an intervention group and a control group.*
- *By subject population or setting – for example, urban versus rural families*
- *By age – for example, children who are 6, 10, or 14 years old.*

The IRB reviews the number of subjects in the context of risks and benefits. Unless otherwise specified, if the IRB determines that the research involves no more than minimal risk: there are no restrictions on the total number of subjects that may be enrolled. If the research involves more than minimal risk: The number of enrolled subjects must be limited to the number described in this application. If it is necessary later to increase the number of subjects, submit a Modification. Exceeding the IRB-approved number (over-enrollment) will be considered non-compliance.

[X] **No** → If no, provide the rationale in the box below. Also, provide any other available information about the scope/size of the research. You do not need to complete the table.

Example: It may not be possible to predict the number of subjects who will complete an online survey advertised through Craigslist, but you can state that the survey will be posted for two weeks and the number who respond is the number who will be in the study.

We will collect social media data during many different, high-visibility events (such as crisis events and elections) and data related to specific misinformation incidents and disinformation campaigns between 2021 and 2025. These data potentially include billions of posts, from millions of different users.

[ ] **Yes** → If yes, for each subject group, use the table below to provide the estimate of the maximum desired number of individuals (or other subject unit, such as families) who will complete the research.

Group name/description	Maximum desired number of individuals (or other subject unit, such as families) who will complete the research

	Provide numbers for the site(s) reviewed by the UW IRB and for the study-wide total number; example: 20/100

3 NON-UW RESEARCH SETTING

Complete this section only if UW investigators and people named in the SUPPLEMENT: Non-UW Individual Investigators will conduct research procedures outside of UW and Harborview

3.1 Reason for locations. Describe the reason(s) for choosing the locations.

This is especially important when the research will occur in locations or with populations that may be vulnerable to exploitation. One of the three ethical principles the IRB must consider is justice: ensuring that reasonable, non-exploitative, and well-considered procedures are administered fairly, with a fair distribution of costs and potential benefits.

We will collect our data using infrastructure housed on UW campus (primarily at the Center for an Informed Public). We will conduct our analyses using that same infrastructure housed on the UW campus. With remote work, some researchers will be using machines in their own homes to access our UW infrastructure as well as directly access content on the social media platforms and through tools provided by those platforms (e.g. Crowdtangle). Our collections will be focused on elections, crises and other breaking news events, and public health concerns (e.g. vaccine hesitancy). The data we collect and analyze may be shared by people anywhere in the world.

3.2 Local context. Culturally appropriate procedures and an understanding of local context are an important part of protecting subjects. Describe any site-specific cultural issues, customs, beliefs, or values that may affect the research, how it is conducted, or how consent is obtained or documented.

Examples: It would be culturally inappropriate in some international settings for a woman to be directly contacted by a male researcher; instead, the researcher may need to ask a male family member for permission before the woman can be approached. It may be appropriate to obtain permission from community leaders prior to obtaining consent from individual members of a group. In some distinct cultural groups, signing forms may not be the norm.

This federal site maintains an international list of human research standards and requirements:
http://www.hhs.gov/ohrp/international/index.html

N/A

3.3 Location-specific laws. Describe any local laws that may affect the research (especially the research design and consent procedures). The most common examples are laws about:

- **Specimens** – for example, some countries will not allow biospecimens to be taken out of the country.
- **Age of consent** – laws about when an individual is considered old enough to be able to provide consent vary across states, and across countries.
- **Legally authorized representative** – laws about who can serve as a legally authorized representative (and who has priority when more than one person is available) vary across states and countries.
- **Use of healthcare records** – many states (including Washington State) have laws that are similar to the federal HIPAA law but that have additional requirements.

N/A

3.4 Location-specific administrative or ethical requirements. Describe local administrative or ethical requirements that affect the research.

Example: A school district may require researchers to obtain permission from the head district office as well as school principals before approaching teachers or students; a factory in China may allow researchers to interview factory workers but not allow the workers to be paid for their participation.

N/A

3.5 If the PI is a student: Does the research involve traveling outside of the US?

[X] **No**

[ ] **Yes** → If yes, confirm by checking the box that (1) you will register with the UW Office of Global Affairs before traveling; (2) you will notify your advisor when the registration is complete; and (3) you will request a UW Travel Waiver if the research involves travel to the list of countries requiring a UW Travel Waiver.

[ ] **Confirmed**

4 RECRUITING and SCREENING PARTICIPANTS

4.1 Recruiting and Screening. Describe how subjects will be identified, recruited, and screened. Include information about: how, when, where, and in what setting. Identify who (by position or role, not name) will approach and recruit subjects, and who will screen them for eligibility.

Note: Per UW Medicine policy, the UW Medicine eCare/MyChart system may not be used for research recruitment purposes.

We will collect data about elections, crises and other breaking news events, as well as specific misinformation incidents (when a piece of misinformation goes viral) and disinformation campaigns. Our collections will be based on 1) specific search terms; 2) influential accounts; 3) specific channels, groups or threads.

1) Specific search terms. For example, during the 2022 U.S. midterm elections, we will collect data using terms like election, vote, voter, voting, midterm, fraud and on specific candidate and location names.
2) Influential accounts. We may collect data containing content from and engagements with influential accounts — including high visibility accounts with many followers; verified accounts; accounts of public officials or organizations (like candidates and campaigns).
3) Groups. We may identify specific channels, groups, or #hashtags to collect relevant conversations about

4) the events and phenomena we are interested in — for example, YouTube channels that repeatedly post disinformation, a public Facebook group for a local election, or a "community" on Reddit where conspiracy theories are often discussed.

4.2 Recruitment materials.

a. What materials (if any) will be used to recruit and screen subjects?

Examples: talking points for phone or in-person conversations; video or audio presentations; websites; social media messages; written materials such as letters, flyers for posting, brochures, or printed advertisements; questionnaires filled out by potential subjects.

None. There are no recruiting or screening processes.

b. Upload descriptions of each type of material (or the materials themselves) to ***Zipline***. If letters or emails will be sent to any subjects, these should include a statement about how the subject's name and contact information were obtained. No sensitive information about the person (such as a diagnosis of a medical condition) should be included in the letter. The text of these letters and emails must be uploaded to ***Zipline*** (i.e., a description will not suffice).

HSD encourages researchers to consider uploading descriptions of most recruitment and screening materials instead of the materials themselves. The goal is to provide the researchers with the flexibility to change some information on the materials without submitting a Modification for IRB approval of the changes. Examples:

- *Provide a list of talking points that will be used for phone or in-person conversations instead of a script.*
- *For the description of a flyer, include the information that it will provide the study phone number and the name of a study contact person (without providing the actual phone number or name). This means that a Modification would not be necessary if/when the study phone number or contact person changes. Also, instead of listing the inclusion/exclusion criteria, the description below might state that the flyer will list one or a few of the major inclusion/exclusion criteria.*
- *For the description of a video or a website, include a description of the possible visual elements and a list of the content (e.g., study phone number; study contact person; top three inclusion/exclusion criteria; payment of $50; study name; UW researcher).*

4.3 Relationship with participant population. Do any members of the study team have an existing relationship with the study population(s)?

Examples: a study team member may have a dual role with the study population (for example, being their clinical care provider, teacher, laboratory directory or tribal leader in addition to recruiting them for his/her research).

[X] **No**
[ ] **Yes** → If yes, describe the nature of the relationship.

4.4 Payment to participants. The IRB must evaluate subject payment for the possibility that it will unduly influence subjects to participate. Refer to GUIDANCE Subject Payment when designing subject payment plans. Provide the following information about your plans for paying research subjects in the text box below or note that the information can be found in the consent form.

- The total amount/value of the payment
- Schedule/timing of the payment [i.e., when will subjects receive the payment(s)]
- Purpose of the payment [e.g., reimbursement, compensation, incentive]
- Whether payment will be "pro-rated" so that participants who are unable to complete the research may still receive some part of the payment

The IRB expects the consent process or study information provided to the subjects to include all of the above-listed information about payment, including the number and amount of payments, and especially when subjects can expect to receive payment.

One of the most frequent complaints received by HSD is from subjects who expected to receive cash or a check on the day that they completed a study and who were angry or disappointed when payment took 6-8 weeks to reach them.

Researchers should review current UW Financial Management requirements about when Social Security Numbers must be collected, and when research payment must be reported to the UW Tax Office and the IRS: https://finance.uw.edu/ps/how-pay/research-subjects.

4.5 Non-monetary compensation. Describe any non-monetary compensation that will be provided. Example: extra credit for students; a toy for a child. If class credit will be offered to students, there must be an alternate way for the students to earn the extra credit without participating in the research.

N/A

4.6 Will data or specimens be accessed or obtained for recruiting and screening procedures prior to enrollment?

Examples: names and contact information; the information gathered from records that were screened; results of screening questionnaires or screening blood tests; Protected Health Information (PHI) from screening medical records to identify possible subjects.

[X] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the data and/or specimens (including PHI) and whether it will be retained as part of the study data.

4.7 Consent for recruiting and screening. Will consent be obtained for any of the recruiting and screening procedures? (Section 8: Consent of Adults asks about consent for the main study procedures).

"Consent" includes: consent from individuals for their own participation; parental permission; assent from children; consent from a legally authorized representative for adult individuals who are unable to provide consent.

Examples:

- *For a study in which names and contact information will be obtained from a registry: the registry should have consent from the registry participants to release their names and contact information to researchers.*
- *For a study in which possible subjects are identified by screening records: there will be no consent process.*
- *For a study in which individuals respond to an announcement and call into a study phone line: the study team person talking to the individual may obtain non-written consent to ask eligibility questions over the phone.*

[ ] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the consent process.

a. Documentation of consent. Will a written or verifiable electronic signature from the subject on a consent form be used to document consent for the **recruiting and screening procedures**?

☐ **No** → If no, describe the information that will be provided during the consent process and for which procedures.

☐ **Yes, written** → If yes, and a **written** signature will be used to document consent:
- Upload the consent form to ***Zipline***.

☐ **Yes, electronic** → If yes, and an **electronic** signature will be used to document consent:
- Upload the consent form to ***Zipline***.
- **If the eSignature process or method for recruiting and screening is different than for the main study procedures**, use the questions about electronic consent in Section 8.3 and 8.4 to differentiate between recruiting/screening and main study electronic consent. **If electronic consent will be used for recruiting/screening but not main study consent**, use 8.3 and 8.4 to describe eConsent and note that it is only for recruiting/screening.

5 PROCEDURES

5.1 Study procedures. Using lay language, provide a complete description of the study procedures, including the sequence, intervention or manipulation (if any), drug dosing information (if any), blood volumes and frequency of draws (if any), use of records, time required, and setting/location. If it is available: Upload a study flow sheet or table to ***Zipline***.

For studies comparing standards of care: It is important to accurately identify the research procedures. See UW IRB ***POLICY Risks of Harm from Standard Care*** *and the draft guidance from the federal Office of Human Research Protections,* ***"Guidance on Disclosing Reasonably Foreseeable Risks in Research Evaluating Standards of Care";*** *October 20, 2014. Information about pediatric blood volume and frequency of draws that would qualify for expedited review can be found in this* **reference table** *on the Seattle Children's IRB website.*

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team, using individual UW researchers' machines and shared infrastructure at the UW Center for an Informed Public, through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API). This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by the mediating entity (e.g. Crowdtangle).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories. This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by collaborating partner.

We will analyze these data as individual researchers and within collaborative teams using a mixture of methods — including qualitative, quantitative, and visual methods.

5.2 Recordings. Does the research involve creating audio or video recordings?

- [X] **No** → If no, go to question **5.3.**
- [ ] **Yes** → If yes, verify that you have described what will be recorded in 5.1 and answer question **a**.

a. Before recording, will consent for being recorded be obtained from subjects and any other individuals who may be recorded?

- [ ] **No** → If no, email hsdinfo@uw.edu before submitting this application in Zipline. In the email, include a brief description of the research and a note that individuals will be recorded without their advance consent.
- [ ] **Yes**

5.3 MRI scans. Will any subjects have a Magnetic Resonance Imaging (MRI) scan as part of the study procedures?

This means scans that are performed solely for research purposes or clinical scans that are modified for research purposes (for example, using a gadolinium-based contrast agent when it is not required for clinical reasons).

- [X] **No** → If no, go to question **5.4**.
- [ ] **Yes** → If yes, answer questions **a** through **c**.

a. Describe the MRI scan(s). Specifically:

- What is the purpose of the scan(s)? *Examples: obtain research data; safety assessment associated with a research procedure.*
- Which subjects will receive an MRI scan?
- Describe the minimum and maximum number of scans per subject, and over what time period the scans will occur. *For example: all subjects will undergo two MRI scans, six months apart.*

b. MRI facility. At which facility(ies) will the MRI scans occur? Check all that apply.

- [ ] UWMC Radiology/Imaging Services (the UWMC clinical facility)
- [ ] DISC Diagnostic Imaging Sciences Center (UWMC research facility)
- [ ] CHN Center for Human Neuroscience MRI Center (Arts & Sciences research facility)
- [ ] BMIC Biomolecular Imaging Center (South Lake Union research facility)
- [ ] Harborview Radiology/Imaging Services (the Harborview clinical facility)
- [ ] SCCA Imaging Services
- [ ] Northwest Diagnostic Imaging
- [ ] Other: identify in the text box below:

c. Personnel. For MRI scans that will be conducted at the DISC, CHN or BMIC research facilities: Indicate who will be responsible for operating the MRI scanner by checking all that apply.

- [ ] MRI technician who is formally qualified
- [ ] Researcher who has completed scanner operator training provided by a qualified MRI operator

5.4 Data variables. Describe the specific data that will be obtained (including a description of the most sensitive items). Alternatively, a list of the data variables may be uploaded to ***Zipline***.

Only public data, including public social media posts and publicly available information on user profiles will be obtained. Metadata associated with this content will also be archived. This includes for example the number of social relationships (e.g. "followers" or "friends") that an account has, the self-reported location of the account, and links to external media that were included in the post.

5.5 Data sources. For all types of data that will be accessed or collected for this research: Identify whether the data are being obtained from the subjects (or subjects' specimens) or whether they are being obtained from some other source (and identify the source).

If you have already provided this information in Question 5.1, you do not need to repeat the information here.

See 5.1

5.6 Identifiability of data and specimens. Answer these questions carefully and completely. This will allow HSD to accurately determine the type of review that is required and the relevant compliance requirements. Review the following definitions before answering the questions:

Access *means to view or perceive data, but not to possess or record it. See, in contrast, the definition of "obtain".*
Identifiable *means that the identity of an individual is or may be readily (1) ascertained by the researcher or any other member of the study team from specific data variables or from a combination of data variables, or (2) associated with the information.*
Direct identifiers *are direct links between a subject and data/specimens. Examples include (but are not limited to): name, date of birth, medical record number, email or IP address, pathology or surgery accession number, student number, or a collection of data that is (when taken together) identifiable.*
Indirect identifiers *are information that links between direct identifiers and data/specimens. Examples: a subject code or pseudonym.*
Key *refers to a single place where direct identifiers and indirect identifiers are linked together so that, for example, coded data can be identified as relating to a specific person. Example: a master list that contains the data code and the identifiers linked to the codes.*
Obtain *means to possess or record in any fashion (writing, electronic document, video, email, voice recording, etc.) for research purposes and to retain for any length of time. This is different from* ***accessing****, which means to view or perceive data.*

a. Will you or any members of your team have access to any direct or indirect identifiers?

[X] **Yes** → If yes, describe which identifiers and for which data/specimens.

We will collect social media posts and account information for each participant. Some social media accounts are anonymous and other contain pieces of identifying information such as when people include their real names. Following the Terms of Service for these platforms, we will collect, store and analyze the data and metadata a user provides for their account.

[ ] **No** → If no, select the reason(s) why you (and all members of your team) will not have access to direct or indirect identifiers.

- [ ] There will be no identifiers.
- [ ] Identifiers or the key have been (or will have been) destroyed before access.
- [ ] There is an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) to study team members under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

b. Will you or any study team members obtain any direct or indirect identifiers?

☒ **Yes** → If yes, describe which identifiers and for which data/specimens.

We have and will continue to collect social media posts and account information for each participant. We will obtain only information which the user provides for their account.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not obtain direct or indirect identifiers.

☐ There will be no identifiers.

☐ Identifiers or the key have been (or will have been) destroyed before access.

☐ There will be an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

c. If any identifiers will be obtained, indicate how the identifiers will be stored (and for which data). NOTE: Do not describe the data security plan here – that information is requested in section 9.6.

☒ Identifiers will be stored with the data. Describe the data to which this applies:

Following Terms of Service for the platforms that are sources of data for the project, we will collect and store information together with the content of social media posts.

☐ Identifiers and study data will be stored separately but a link will be maintained between the identifiers and the study data (for example, through the use of a code). Describe the data to which this applies:

☐ Identifiers and study data will be stored separately, with no link between the identifiers and the study data. Describe the data to which this applies:

d. Research collaboration. Will individuals who provide coded information or specimens for the research also collaborate on other activities for this research? If yes, identify the activities and provide the name of the collaborator's institution/organization.

Examples include but are not limited to: (1) study, interpretation, or analysis of the data that results from the coded information or specimens; and (2) authorship on presentations or manuscripts related to this work.

No.

5.7 Protected Health Information (PHI). Will participants' identifiable PHI be accessed, obtained, used, or disclosed for any reason (for example, to identify or screen potential subjects, to obtain study data or specimens, for study follow-up) that does not involve the creation or obtaining of a Limited Data Set?

PHI is individually identifiable healthcare record information or clinical specimens from an organization considered a "covered entity" by federal HIPAA regulations, in any form or media, whether electronic, paper, or oral. ***You must answer yes to this question if the research involves identifiable health care records (e.g., medical, dental, pharmacy, nursing, billing, etc.), identifiable healthcare information from a clinical department repository, or observations or recordings of clinical interactions.***

For information about what constitutes the UW Covered Entity, see UW Medicine Compliance Patient Information Privacy Policy 101 and diagram of the healthcare components.

[X] **No** → If no, skip the rest of this question; go to question **5.8**.

[ ] **Yes** → If yes, answer all of the questions below.

a. Describe the PHI and the reason for using it. *Be specific. For example, will any "free text" fields (such as physician notes) be accessed, obtained, or used?*

b. Is any of the PHI located in Washington State?

[ ] **No**
[ ] **Yes**

c. Describe the pathway of how the PHI will be accessed or obtained, starting with the source/location and then describing the system/path/mechanism by which it will be identified, accessed, and copied for the research. *Be specific. For example: directly view records; search through a department's clinical database; submit a request to Leaf.*

d. For which PHI will subjects provide HIPAA authorization before the PHI is accessed, obtained and/or used?

Confirm by checking the box that the UW Medicine HIPAA Authorization form maintained on the HSD website will be used to access, obtain, use, or disclose any UW Medicine PHI.

[ ] **Confirmed**

e. Will you obtain any HIPAA authorizations electronically (i.e., e-signature)?

[ ] **No**
[ ] **Yes**

If 'Yes', confirm by checking the box that you have read and understand the 'Special Considerations' section of the **GUIDANCE Electronic Informed Consent** for

information regarding the use of electronic signatures and HIPAA authorizations.

☐ **Confirmed**

f. For which PHI will HIPAA authorization NOT be obtained from the subjects?

Provide the following assurances by checking the boxes.

☐ The minimum necessary amount of PHI to accomplish the purposes described in this application will be accessed, obtained and/or used.

☐ The PHI will not be reused or disclosed to any other person or entity, except as required by law, for authorized oversight of the research study, or for other research for which the use or disclosure of PHI would be permitted.

☐ The HIPAA "accounting for disclosures" requirement will be fulfilled, if applicable. See UW Medicine Compliance Policy #104.

☐ There will be reasonable safeguards to protect against identifying, directly or indirectly, any patient in any report of the research.

5.8 Genomic data sharing. Will the research obtain or generate genomic data?

☒ **No**
☐ **Yes** → If yes, answer the question below.

a. Will genomic data from this research be sent to a national database (for example, NIH's dbGaP database)?

☐ **No**
☐ **Yes** → If yes, complete the **SUPPLEMENT Genomic Data Sharing** and upload it to ***Zipline***.

5.9 Whole genome sequencing. For research involving biospecimens: Will the research include whole genome sequencing?

Whole genome sequencing is sequencing of a human germline or somatic specimen with the intent to generate the genome or exome sequence of that specimen.

☐ **No**
☐ **Yes**

5.10 Possible secondary use or sharing of information, specimens, or subject contact information. Is it likely that the obtained or collected information, specimens, or subject contact information will be used for any of the following:

- Future research not described in this application (in other words, secondary research)
- Submission to a repository, registry, or database managed by the study team, colleagues, or others for research purposes
- Sharing with others for their own research

Please consider the broadest possible future plans and whether consent will be obtained now from the subjects for future sharing or research uses (which it may not be possible to describe in detail at this time). Answer **YES** even if future sharing or uses will use de-identified information or specimens. Answer **NO** if sharing is unlikely or if the only sharing will be through the NIH Genomic Data Sharing described in question 5.8.

Many federal grants and contracts now require data or specimen sharing as a condition of funding, and many journals require data sharing as a condition of publication. "Sharing" may include (for example): informal arrangements to share banked data/specimens with other investigators; establishing a repository that will formally share with other researchers through written agreements; or sending data/specimens to a third party repository/archive/entity such as the Social Science Open Access Repository (SSOAR), or the UCLA Ethnomusicology Archive.

☐ **No**
☐ **Yes** → If yes, answer all of the questions below.

a. Describe what will be stored for future use, including whether any direct or indirect (e.g., subject codes) identifiers will be stored.

b. Describe what will be shared with other researchers or with a repository/database/registry, including whether direct identifiers will be shared and (for specimens) what data will be released with the specimens.

c. Who will oversee and/or manage the sharing?

d. Describe the possible future uses, including limitations or restrictions (if any) on future uses or users. As stated above, consider the broadest possible uses.
Examples: data will be used only for cardiovascular research; data will not be used for research on population origins.

e. Consent. Will consent be obtained now from subjects for the secondary use, banking and/or future sharing?

☐ **No**
☐ **Yes** → If yes, be sure to include the information about this consent process in the consent form (if there is one) and in the answers to the consent questions in Section 8.

f. Withdrawal. Will subjects be able to withdraw their data/specimens from secondary use, banking or sharing?

☐ **No**
☐ **Yes** → If yes, describe how, and whether there are any limitations on withdrawal.

Example: data can be withdrawn from the repository but cannot be retrieved after they are released.

g. Agreements for sharing or release. Confirm by checking the box that the sharing or release will comply with UW (and, if applicable, UW Medicine) policies that require a formal agreement with the recipient for release of data or specimens to individuals or entities other than federal databases.

Data Use Agreements or Gatekeeping forms are used for data; Material Transfer Agreements are used for specimens (or specimens plus data). Do not attach any template agreement forms; the IRB neither reviews nor approves them

☐ **Confirmed**

5.11 Communication with subjects during the study. Describe the types of communication (if any) the research team will have with already-enrolled subjects during the study. Provide a description instead of the actual materials themselves.

Examples: email, texts, phone, or letter reminders about appointments or about returning study materials such as a questionnaire; requests to confirm contact information.

5.12 Future contact with subjects. Is there a plan to retain any contact information for subjects so that they can be contacted in the future?

☐ **No**
☐ **Yes** → If yes, describe the purpose of the future contact, and whether use of the contact information will be limited to the study team; if not, describe who else could be provided with the contact information. Describe the criteria for approving requests for the information.

Examples: inform subjects about other studies; ask subjects for additional information or medical record access that is not currently part of the study proposed in this application; obtain another sample.

5.13 Alternatives to participation. Are there any alternative procedures or treatments that might be advantageous to the subjects?

If there are no alternative procedures or treatments, select "No". Examples of advantageous alternatives: earning extra class credit in some time-equivalent way other than research participation; obtaining supportive care or a standard clinical treatment from a health care provider instead of participating in research with an experimental drug.

☐ **No**
☐ **Yes** → If yes, describe the alternatives.

5.14 Upload to *Zipline* all data collection forms (if any) that will be directly used by or with the subjects, and any scripts/talking points that will be used to collect the data. Do not include data collection forms that will be used to abstract data from other sources (such as medical or academic records), or video recordings.

- ***Examples**: survey, questionnaires, subject logs or diaries, focus group questions.*
- ***NOTE:** Sometimes the IRB can approve the general content of surveys and other data collection instruments rather than the specific form itself. This prevents the need to submit a modification request for future minor changes that do not add new topics or increase the sensitivity of the questions. To request this general approval, use the text box below to identify the questionnaires/surveys/ etc. for which you are seeking this more general approval. Then briefly describe the scope of the topics that will be covered and the most personal and sensitive questions. The HSD staff person who screens this application will let you know whether this is sufficient or whether you will need to provide more information.*
- ***For materials that cannot be uploaded**: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. You may also provide URLs (website addresses) or written descriptions below. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*
- ***For data that will be gathered in an evolving way**: This refers to data collection/questions that are not pre-determined but rather are shaped during interactions with participants in response to observations and responses made during those interactions. If this applies to the proposed research, provide a description of the process by which the data collection/questions will be established during the interactions with subjects, how the data collection/questions will be documented, the topics likely to be addressed, the most sensitive type of information likely to be gathered, and the limitations (if any) on topics that will be raised or pursued.*

Use this text box (if desired) to provide:

- Short written descriptions of materials that cannot be uploaded, such as URLs
- A description of the process that will be used for data that will be gathered in an evolving way.
- The general content of questionnaires, surveys and similar instruments for which general approval is being sought. (See the **NOTE** bullet point in the instructions above.)

5.15 SARS-CoV-2 testing. Will the subjects be tested for the SARS-CoV-2 coronavirus?

If the only testing is to screen the subjects (question 2.8), you do not need to answer this question

☒ **No**
☐ **Yes** → If yes:

- Name the testing lab
- Confirm that the lab and its use of this test is CLIA-certified or certified by the Washington State Department of Health
- Describe whether you will return the results to the participants and, if yes, who will do it and how (including any information you would provide to subjects with positive test results).

6 CHILDREN (MINORS) and PARENTAL PERMISSION

6.1 Involvement of minors. Does the research include minors (children)?

Minor or child means someone who has not yet attained the legal age for consent for the research procedures, as described in the applicable laws of the jurisdiction in which the research will be conducted. This may or may not be the same as the definition used by funding agencies such as the National Institutes of Health.

- In Washington State the generic age of consent is 18, meaning that anyone under the age of 18 is considered a child.
- There are some procedures for which the age of consent is much lower in Washington State.
- The generic age of consent may be different in other states, and in other countries.

☐ **No** → If no, go to Section 8.

☐ **Yes** → If yes, provide the age range of the minor subjects for this study and the legal age for consent in the study population(s). If there is more than one answer, explain.

☒ **Don't know** → This means is it not possible to know the age of the subjects. For example, this may be true for some research involving social media, the Internet, or a dataset that is obtained from another researcher or from a government agency. Go to Section 8.

6.2 Parental permission. Parental permission means actively obtaining the permission of the parents. This is not the same as "passive" or "opt out" permission where it is assumed that parents are allowing their children to participate because they have been provided with information about the research and have not objected or returned a form indicating they don't want their children to participate.

a. Will parental permission be obtained for:

☐ All of the research procedures → Go to question **6.2b.**

☐ None of the research procedures → Use the table below to provide justification, and skip question 6.2b.

☐ Some of the research procedures → Use the table below to identify the procedures for which parental permission will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO parental permission[2]	Reason why parental permission will not be obtained	Will parents be informed about the research?[3] YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐

	☐	☐
	☐	☐

Table footnotes

1. *If the answer is the same for all children groups or all procedures: collapse the answer across the groups and/or procedures.*
2. *If identifiable information or biospecimens will be obtained without parent permission, any waiver granted by the IRB does not override parents' refusal to provide broad consent (for example, through the Northwest Biotrust).*
3. *Will parents be informed about the research beforehand even though active permission is not being obtained?*

b. Indicate the plan for obtaining parental permission. One or both boxes must be checked.

☐ Both parents, unless one parent is deceased, unknown, incompetent, or not reasonably available; or when only one parent has legal responsibility for the care and custody of the child

☐ One parent, even if the other parent is alive, known, competent, reasonably available, and shares legal responsibility for the care and custody of the child.

This is all that is required for minimal risk research.

If both boxes are checked, explain:

6.3 Children who are wards. Will any of the children be wards of the State or any other agency, institution, or entity?

☐ **No**
☐ **Yes** → If yes, an advocate may need to be appointed for each child who is a ward. The advocate must be in addition to any other individual acting on behalf of the child as guardian or in loco parentis. The same individual can serve as advocate for all children who are wards.

Describe who will be the advocate(s). The description must address the following points:

- Background and experience
- Willingness to act in the best interests of the child for the duration of the research
- Independence of the research, research team, and any guardian organization

6.4 UW Office for Youth Programs Development and Support. If the project involves interaction (in-person or remotely) with individuals under the age of 18, researchers must comply with **UW Administrative Policy Statement 10.13** and the requirements listed at this website. This includes activities that are deemed to be Not Research or Exempt. It does not apply to third-party led research (i.e., research conducted by a non-UW PI). Information and FAQs for researchers are available.

This point is advisory only; there is no need to provide a response.

7 ASSENT OF CHILDREN (MINORS)

Go to Section 8 if your research does not involve children (minors).

7.1 Assent of children (minors). Though children do not have the legal capacity to "consent" to participate in research, they should be involved in the process if they are able to "assent" by having a study explained to them and/or by reading a simple form about the study, and then giving their verbal choice about whether they want to participate. They may also provide a written assent if they are older. See **WORKSHEET Children** for circumstances in which a child's assent may be unnecessary or inappropriate.

a. Will assent be obtained for:

☐ All research procedures and child groups	→ Go to question **7.2.**
☐ None of the research procedures and child groups	→ Use the table below to provide justification, then skip to question **7.6**
☐ Some of your research procedures and child groups	→ Use the table below to identify the procedures for which assent will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be obtained	Reason why assent will not be obtained

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse your answer across the groups and/or procedures.*

7.2 Assent process. Describe how assent will be obtained, for each child group. If the research involves children of different ages, answer separately for each group. If the children are non-English speakers, include a description of how their comprehension of the information will be evaluated.

7.3 Dissent or resistance. Describe how a child's objection or resistance to participation (including non-verbal indications) will be identified during the research, and what the response will be.

7.4 E-consent. Will any electronic processes (email, websites, electronic signatures, etc.) be used to present assent information to subjects/and or to obtain documentation (signatures) of assent? If yes, describe how this will be done.

7.5 Documentation of assent. Which of the following statements describes whether documentation of assent will be obtained?

☐ None of the research procedures and child groups	→ Use the table below to provide justification, then go to question **7.5.b**
☐ All of the research procedures and child groups	→ Go to question **7.5.a**, do not complete the table
☐ Some of the research procedures and/or child groups	→ Complete the table below and then to go question **7.5.a**

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be documented

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse the answer across the groups and/or procedures.*

a. Describe how assent will be documented. If the children are functionally illiterate or are not fluent in English, include a description of the documentation process for them.

b. Upload all assent materials (talking points, videos, forms, etc.) to ***Zipline***. Assent materials are not required to provide all of the standard elements of adult consent; the information should be appropriate to the age, population, and research procedures. The documents should be in Word, if possible.

7.6 Children who reach the legal age of consent during participation in longitudinal research.

Children who were enrolled at a young age and continue for many years: It is best practice to re-obtain assent (or to obtain it for the first time, if it was not obtained at the beginning of their participation).
Children who reach the legal age of consent: Informed consent must be obtained from the now-adult subject for (1) any ongoing interactions or interventions with the subjects, or (2) the continued analysis of specimens or data for which the subject's identify is readily identifiable to the researcher, unless the IRB waives this requirement.

a. Describe the plans (if any) to re-obtain assent from children.

b. Describe the plans (if any) to obtain consent for children who reach the legal age of consent.

- If adult consent will be obtained from them, describe what will happen regarding now-adult subjects who cannot be contacted.
- If consent will not obtained or will not be possible: explain why.

7.7 Other regulatory requirements. (This is for information only; no answer or response is required.) Researchers are responsible for determining whether their research conducted in schools, with student records, or over the Internet comply with permission, consent, and inspection requirements of the following federal regulations:

- PPRA – Protection of Pupil Rights Amendment
- FERPA – Family Education Rights and Privacy Act
- COPPA – Children's Online Privacy Protection Act

8 CONSENT OF ADULTS

Review the following definitions before answering the questions in this section.

CONSENT	is the process of informing potential subjects about the research and asking them whether they want to participate. It does not necessarily include the signing of a consent form.
CONSENT DOCUMENTATION	refers to how a subject's decision to participate in the research is documented. This is typically obtained by having the subject sign a consent form.
CONSENT FORM	is a document signed by subjects, by which they agree to participate in the research as described in the consent form and in the consent process.
ELEMENTS OF CONSENT	are specific information that is required to be provided to subjects.

CHARACTERISTICS OF CONSENT	are the qualities of the consent process as a whole. These are:
	• Consent must be legally effective.
	• The process minimizes the possibility of coercion or undue influence.
	• Subjects or their representatives must be given sufficient opportunity to discuss and consider participation.
	• The information provided must:
	  ○ Begin with presentation of key information (for consent materials over 2,000 words)
	  ○ Be what a reasonable person would want to have
	  ○ Be organized and presented so as to facilitate understanding
	  ○ Be provided in sufficient detail
	  ○ Not ask or appear to ask subjects to waive their rights

PARENTAL PERMISSION	is the parent's active permission for the child to participate in the research. Parental permission is subject to the same requirements as consent, including written documentation of permission and required elements.
SHORT FORM CONSENT	is an alternative way of obtaining written documentation of consent that is most commonly used with individuals who are illiterate or whose language is one for which translated consent forms are not available.
WAIVER OF CONSENT	means there is IRB approval for not obtaining consent or for not including some of the elements of consent in the consent process. **NOTE**: If you plan to obtain identifiable information or identifiable biospecimens without consent, any waiver granted by the IRB does not override a subject's refusal to provide broad consent (for example, the Northwest Biotrust).

WAIVER OF DOCUMENTATION OF CONSENT	means that there is IRB approval for not obtaining written documentation of consent.

8.1 Groups Identify the groups to which the answers in this section apply.

☐ Adult subjects

☐ Parents who are providing permission for their children to participate in research

→ *If you selected **PARENTS**, the word "consent" below should also be interpreted as applying to parental permission and "subjects" should also be interpreted as applying to the parents.*

8.2 The consent process and characteristics. This series of questions is about whether consent will be obtained for all procedures except recruiting and screening and, if yes, how.

The issue of consent for recruiting and screening activities is addressed in question 4.7. You do not need to repeat your answer to question 4.6.

a. Are there any procedures for which consent will not be obtained?

☐ **No**

☐ **Yes** → If yes, use the table below to identify the procedures for which consent will not be obtained. "All" is an acceptable answer for some studies.

Be sure to consider all research procedures and plans, including future contact, and sharing/banking of data and specimens for future work.

Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO consent process	Reason why consent will not be obtained	Will subjects be provided with info about the research after they finish? YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all groups, collapse your answer across the groups and/or procedures.*

b. Describe the consent process, if consent will be obtained for any or all procedures, for any or all groups. Address groups and procedures separately if the consent processes are different.

Be sure to include:

- *The location/setting where consent will be obtained*
- *Who will obtain consent (refer to positions, roles, or titles, not names)*
- *How subjects will be provided sufficient opportunity to discuss the study with the research team and consider participation*

c. Comprehension. Describe the methods that will be used to ensure or test the subjects' understanding of the information during the consent process.

d. Influence. Does the research involve any subject groups that might find it difficult to say "no" to participation because of the setting or their relationship with someone on the study team, even if they aren't pressured to participate?

Examples: Student participants being recruited into their teacher's research; patients being recruited into their healthcare provider's research, study team members who are participants; outpatients recruited from an outpatient surgery waiting room just prior to their surgery.

☐ **No**
☐ **Yes** → If yes, describe what will be done to reduce any effect of the setting or relationship on the participation decision.

Examples: a study coordinator will obtain consent instead of the subjects' physician; the researcher will not know which subjects agreed to participate; subjects will have two days to decide after hearing about the study.

e. Information provided is tailored to needs of subject population. Describe the basis for concluding that the information that will be provided to subjects (via written or oral methods) is what a *reasonable member of the subject population(s)* would want to know. If the research consent materials contain a key information section, also describe the basis for concluding that the information presented in that section is that which is *most likely* to assist the selected subject population with making a decision. See **GUIDANCE Key Information for Consent Materials**.

For example: Consultation with publications about research subjects' preferences, disease-focused nonprofit groups, patient interest groups, or other researchers/study staff with experience with the specific population. It may also involve directly consulting selected members of the study population.

f. Ongoing process. For research that involves multiple or continued interaction with subjects over time, describe the opportunities (if any) that will be given to subjects to ask questions or to change their minds about participating.

8.3 Electronic presentation of consent information. Will any part of the consent-related information be provided electronically for some or all of the subjects?

This refers to the use of electronic systems and processes instead of (or in addition to) a paper consent form. For example, an emailed consent form, a passive or an interactive website, graphics, audio, video podcasts. See GUIDANCE Electronic Informed Consent for information about electronic consent requirements at UW.

☐ **No** → If no, skip to question 8.4
☐ **Yes** → If yes, answer questions **a** through **e**

a. Describe the electronic consent methodology and the information that will be provided.

All informational materials must be made available to the IRB. Website content should be provided as a Word document. It is considered best practice to give subjects information about multi-page/multi-screen information that will help them assess how long it will take them to complete the process. For example, telling them that it will take about 15 minutes, or that it involves reading six screens or pages.

b. Describe how the information can be navigated (if relevant). *For example, will the subject be able to proceed forward or backward within the system, or to stop and continue at a later time?*

c. In a standard paper-based consent process, the subjects generally have the opportunity to go through the consent form with study staff and/or to ask study staff about any question they may have after reading the consent form. Describe what will be done, if anything, to facilitate the subject's comprehension and opportunity to ask questions when consent information is presented electronically. Include a description of any provisions to help ensure privacy and confidentiality during this process.

Examples: hyperlinks, help text, telephone calls, text messages or other type of electronic messaging, video conference, live chat with remotely located study team members.

d. What will happen if there are individuals who wish to participate but who do not have access to the consent methodology being used, or who do not wish to use it? Are there alternative ways in which they can obtain the information, or will there be some assistance available? If this is a clinical trial, these individuals cannot be excluded from the research unless there is a compelling rationale.

For example, consider individuals who lack familiarity with electronic systems, have poor eyesight or impaired motor skills, or who do not have easy email or internet access.

e. How will the research team ensure continued accessibility of consent materials and information during the study?

f. How will additional information be provided to subjects during the research, including any significant new findings (such as new risk information) If this is not an issue, explain why.

8.4 Written documentation of consent. Which of the statements below describe whether documentation of consent will be obtained? NOTE: This question does not apply to screening and recruiting procedures which have already been addressed in question 4.7.

Documentation of consent that is obtained electronically is not considered written consent unless it is obtained by a method that allows verification of the individual's signature. In other words, saying "yes" by email is rarely considered to be written documentation of consent

a. Is written documentation of consent being obtained for:

☐ None of the research procedures	→ Use the table below to provide justification then go to question **8.5.**
☐ All of the research procedures	→ Do not complete the table; go to question **8.4.b.**
☐ Some of the research procedures	→ Use the table below to identify the procedures for which written documentation of consent will not be obtained from adult subjects.

Adult subject group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO documentation of consent	Will they be provided with a written statement describing the research (optional)? YES	NO
		☐	☐
		☐	☐
		☐	☐
		☐	☐
		☐	☐

Table footnotes

1. *If the answer is the same for all adult groups or all procedures, collapse the answer across the groups and/or procedures.*

b. Electronic consent signature. For studies in which documentation of consent will be obtained: will subjects use an electronic method to provide their consent signature?

- *See the GUIDANCE Electronic Informed Consent for information about options (including REDCap e-signature and the DocuSign system) and any associated requirements.*
- *FDA-regulated studies must use a system that complies with the FDA's "Part 11" requirements about electronic systems and records. Note that the UW-IT supported DocuSign e-signature system does not meet this requirement.*
- *Having subjects check a box at the beginning of an emailed or web-based questionnaire is not considered legally effective documentation of consent.*

☐ **No**
☐ **Yes** → If yes, indicate which methodology will be used.

☐ **UW ITHS REDCap** (excludes REDCap Mobile application, which is a separate software application for use with a mobile device for consent when internet service is absent or unreliable)

☐ **Other REDCap installation** → Please name the institutional version you will be using (e.g. Vanderbilt, Univ. of Cincinnati) in the field below and provide a completed **SUPPLEMENT Other REDCap Installation** with your submission.

☐ **UW DocuSign**

☐ **Other** → Please describe in the field below and provide a signed TEMPLATE Other E-signature Attestation Letter with your submission.

b.1 Is this method legally valid in the jurisdiction where the research will occur?
NOTE: UW ITHS REDCap (excludes REDCap Mobile application) and UW DocuSign have been vetted for compliance with WA State and federal laws regarding electronic signatures.

☐ **No**
☐ **Yes** → If yes, what is the source of information about legal validity?

b.2 Will verification of the subject's identity be obtained if the signature is not personally witnessed by a member of the study team? Note that this is required for FDA-regulated studies.

See the GUIDANCE Electronic Informed Consent for information and examples

☐ **No** → If no, provide the rationale for why this is not required or necessary to protect subjects or the integrity of the research. Also, what would be the risks to the actual subject if somebody other than the intended signer provides the consent signature?

☐ **Yes** → If yes, describe how subject identity will be verified, providing a non- technical description that the reviewer will understand.

b.3 How will the requirement be met to provide a copy of the consent information (consent form) to individuals who provide an e-signature?

The copy can be paper or electronic and may be provided on an electronic storage device or via email. If the electronic consent information uses hyperlinks or other websites or podcasts to convey information specifically related to the research, the information in these hyperlinks should be included in the copy provided to the subjects and the website must be maintained for the duration of the entire study.

8.5 Non-English-speaking or -reading adult subjects. Will the research enroll adult subjects who do not speak English or who lack fluency or literacy in English?

☐ **No**
☐ **Yes** → If yes, describe the process that will be used to ensure that the oral and written information provided to them during the consent process and throughout the study will be in a language readily understandable to them and (for written materials such as consent forms or questionnaires) at an appropriate reading/comprehension level.

a. Interpretation. Describe how interpretation will be provided, and when. Also, describe the qualifications of the interpreter(s) – for example, background, experience, language proficiency in English and in the other language, certification, other credentials, familiarity with the research-related vocabulary in English and the target language.

b. Translations. Describe how translations will be obtained for all study materials (not just consent forms). Also, describe the method for ensuring that the translations meet the UW IRB's requirement that translated documents will be linguistically accurate, at an appropriate reading level for the participant population, and culturally sensitive for the locale in which they will be used.

8.6 Barriers to written documentation of consent. There are many possible barriers to obtaining written documentation of consent. Consider, for example, individuals who are functionally illiterate; do not read English well; or have sensory or motor impairments that may impede the ability to read and sign a consent form.

a. Describe the plans (if any) for obtaining written documentation of consent from potential subjects who may have difficulty with the standard documentation process (that is, reading and signing a consent form). Skip this question if written documentation of consent is not being obtained for any part of the research.

Examples of solutions: Translated consent forms; use of the Short Form consent process; reading the form to the person before they sign it; excluding individuals who cannot read and understand the consent form.

8.7 Deception. Will information be deliberately withheld, or will false information be provided, to any of the subjects?

Note: "Blinding" subjects to their study group/condition/arm is not considered to be deception, but not telling them ahead of time that they will be subject to an intervention or about the purpose of the procedure(s) is deception.

- [X] **No**
- [ ] **Yes** → If yes, describe what information and why.

Example: It may be necessary to deceive subjects about the purpose of the study (describe why).

a. Will subjects be informed beforehand that they will be unaware of or misled regarding the nature or purposes of the research? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes**

b. Will subjects be debriefed later? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes** → If yes, describe how and when this will occur. Upload any debriefing materials, including talking points or a script, to ***Zipline***.

8.8 Cognitively impaired adults, and other adults unable to consent. Will such individuals be included in the research?

Examples: individuals with Traumatic Brain Injury (TBI) or dementia; individuals who are unconscious, or who are significantly intoxicated.

- [X] **No** → If no, go to question **8.9**.
- [ ] **Yes** → If yes, answer the following questions.

a. Rationale. Provide the rationale for including this population.

b. Capacity for consent / decision making capacity. Describe the process that will be used to determine whether a cognitively impaired individual is capable of consent decision making with respect to the research protocol and setting.

b.1. If there will be repeated interactions with the impaired subjects over a time period when cognitive capacity could increase or diminish, also describe how (if at all) decision-making capacity will be re-assessed and (if appropriate) consent obtained during that time.

c. Permission (surrogate consent). If the research will include adults who cannot consent for themselves, describe the process for obtaining permission ("surrogate consent") from a legally authorized representative (LAR).

*For research conducted in Washington State, see the **GUIDANCE Legally Authorized Representative** to learn which individuals meet the state definition of "legally authorized representative".*

d. Assent. Describe whether assent will be required of all, some, or none of the subjects. If some, indicate which subjects will be required to assent and which will not (and why not). Describe any process that will be used to obtain and document assent from the subjects.

e. Dissent or resistance. Describe how a subject's objection or resistance to participation (including non-verbal) during the research will be identified, and what will occur in response.

8.9 Research use of human fetal tissue obtained from elective abortion. Federal and UW Policy specify some requirements for the consent process. If you are conducting this type of research, check the boxes to confirm these requirements will be followed.

- ☐ Informed consent for the donation of fetal tissue for research use will be obtained by someone other than the person who obtained the informed consent for abortion.
- ☐ Informed consent for the donation of fetal tissue for research use will be obtained after the informed consent for abortion.
- ☐ Participation in the research will not affect the method of abortion.
- ☐ No enticements, benefits, or financial incentives will be used at any level of the process to incentivize abortion or the donation of human fetal tissue.
- ☐ The informed consent form for the donation of fetal tissue for use in research will be signed by both the

woman and the person who obtains the informed consent.

8.10 Consent-related materials. Upload to ***Zipline*** all consent scripts/talking points, consent forms, debriefing statements, Information Statements, Short Form consent forms, parental permission forms, and any other consent-related materials that will be used. Materials that will be used by a specific site should be uploaded to that site's **Local Site Documents** page.

- *Translations must be submitted and approved before they can be used. However, we strongly encourage you to wait to provide them until the IRB has approved the English versions.*
- *Combination forms: It may be appropriate to combine parental permission with consent, if parents are subjects as well as providing permission for the participation of their children. Similarly, a consent form may be appropriately considered an assent form for older children.*
- *For materials that cannot be uploaded: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. URLs (website addresses) may also be provided, or written descriptions of websites. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*

9 PRIVACY AND CONFIDENTIALITY

9.1 Privacy protections. Describe the steps that will be taken, if any, to address possible privacy concerns of subjects and potential subjects.

Privacy refers to the sense of being in control of access that others have to ourselves. This can be an issue with respect to recruiting, consenting, sensitivity of the data being collected, and the method of data collection.
Examples:

- *Many subjects will feel a violation of privacy if they receive a letter asking them to participate in a study because they have ____ medical condition, when their name, contact information, and medical condition were drawn from medical records without their consent. Example: the IRB expects that "cold call" recruitment letters will inform the subject about how their information was obtained.*
- *Recruiting subjects immediately prior to a sensitive or invasive procedure (e.g., in an outpatient surgery waiting room) will feel like an invasion of privacy to some individuals.*
- *Asking subjects about sensitive topics (e.g. details about sexual behavior) may feel like an invasion of privacy to some individuals.*

The data we use are all public — publicly shared and publicly visible, at the time of our data collections. However, even though these data are considered public, we do add layers of privacy protection for individuals who would have a reasonable expectation of privacy — e.g. those who are not public figures and not purposefully trying to manipulate others for political or financial gain. For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. However, **we do publish account names for public accounts** such as celebrities, media personalities, journalists, politicians, companies, etc. when the identity of the account is important for understanding the phenomena of study. We also publish the publicly available account names (which may or may not be traceable to real names) of accounts with high follower counts (>100,000 followers) that are repeatedly and purposefully manipulating the platform (intentionally spreading false information) for political or financial gain.

9.2 Identification of individuals in publications and presentations. Will potentially identifiable information about subjects be used in publications and presentations, or is it possible that individual identities could be inferred from what is planned to be published or presented?

☐ **No**

[X] **Yes** → If yes, will subject consent be obtained for this use?

[ ] **Yes**

[X] **No** → If no, describe the steps that will be taken to protect subjects (or small groups of subjects) from being identifiable.

For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. For presentations and publications, we will hide the account details for accounts that are not public figures or extremely high-visibility accounts (>100,000 followers).

9.3 State mandatory reporting. Each state has reporting laws that require some types of individuals to report some kinds of abuse, and medical conditions that are under public health surveillance. These include:

- Child abuse
- Abuse, abandonment, neglect, or financial exploitation of a vulnerable adult
- Sexual assault
- Serious physical assault
- Medical conditions subject to mandatory reporting (notification) for public health surveillance

Are you or a member of the research team likely to learn of any of the above events or circumstances while conducting the research **AND** feel obligated to report it to state authorities?

[X] **No**

[ ] **Yes** → If yes, the UW IRB expects subjects to be informed of this possibility in the consent form or during the consent process, unless you provide a rationale for not doing so:

9.4 Retention of identifiers and data. Check the box below to indicate assurance that any identifiers (or links between identifiers and data/specimens) and data that are part of the research records will not be destroyed until after the end of the applicable records retention requirements (e.g. Washington State; funding agency or sponsor; Food and Drug Administration). If it is important to say something about destruction of identifiers (or links to identifiers) in the consent form, state something like "the link between your identifier and the research data will be destroyed after the records retention period required by state and/or federal law."

This question can be left blank for conversion applications (existing paper applications that are being "converted" into a Zipline application.)

See the "Research Data" sections of the following website for UW Records management for the Washington State research rectords retention schedules that apply in general to the UW (not involving UW Medicine data):
http://f2.washington.edu/fm/recmgt/gs/research?title=R

See the "Research Records and Data" information in Section 8 of this document for the retention schedules for UW Medicine Records: ***https://www.uwmedicine.org/recordsmanagementuwm-records-retention-schedule.pdf***

[X] **Confirm**

9.5 Certificates of Confidentiality. Will a federal Certificate of Confidentiality be obtained for the research data?
NOTE: Answer "No" if the study is funded by NIH or the CDC, because all NIH-funded and CDC-funded studies automatically have a Certificate.

[X] **No**

[ ] **Yes**

9.6 Data and specimen security protections. Identify the data classifications and the security protections that will be provided for all sites where data will be collected, transmitted, or stored, referring to the **GUIDANCE Data and Security Protections** for the minimum requirements for each data classification level. ***It is not possible to answer this question without reading this document. Data security protections should not conflict with records retention requirements.***

a. Which level of protections will be applied to the data and specimens? If more than one level will be used, describe which level will apply to which data and which specimens and at which sites.

Level 1 (publicly available data)

b. Use this space to provide additional information, details, or to describe protections that do not fit into one of the levels. If there are any protections within the level listed in 9.6.a which will *not* be followed, list those here, including identifying the sites where this exception will apply. For example, if you intend to store subject identifiers with study data (not permitted under requirement U9 for Risk Levels 3-5), then indicate this in the box below (e.g., "We will not adhere to requirement U9 for screening data").

Though these data ARE publicly available at the time of our collection, it is possible that our analyses will reveal illegal (voter suppression efforts) or socially unacceptable (intentional lying) behavior by specific social media users (some of them public figures). It is even possible that our data and/or analyses could be used in prosecutions (for example, we have data from past collections that could be useful in understanding how the January 6 were planned). So, though the data are publicly available, there are risks for people whose content is picked up in our data collections — in part because our analyses are designed to identify "bad actors".

10 RISK / BENEFIT ASSESSMENT

10.1 Anticipated risks. Describe the reasonably foreseeable risks of harm, discomforts, and hazards to the subjects and others of the research procedures. For each harm, discomfort, or hazard:

- Describe the magnitude, probability, duration, and/or reversibility of the harm, discomfort, or hazard, AND
- Describe how the risks will be reduced or managed. Do not describe data security protections here, these are already described in Question 9.6.

- *Consider possible physical, psychological, social, legal, and economic harms, including possible negative effects on financial standing, employability, insurability, educational advancement or reputation. For example, a breach of confidentiality might have these effects.*
- *Examples of "others": embryo, fetus, or nursing child; family members; a specific group.*
- *Ensure applicable risk information from any Investigator Brochures, Drug Package Inserts, and/or Device Manuals is included in your description.*
- *Do not include the risks of non-research procedures that are already being performed.*
- *If the study design specifies that subjects will be assigned to a specific condition or intervention, then the condition or intervention is a research procedure - even if it is a standard of care.*
- *Examples of mitigation strategies: inclusion/exclusion criteria; applying appropriate data security measures to prevent unauthorized access to individually identifiable data; coding data; taking blood samples to monitor something that indicates drug toxicity.*
- *As with all questions on this application, you may refer to uploaded documents.*

There is some reputation all risk for accounts at appear in our analyses—for example by exposing that an account participated in the spread of misinformation, this could have a negative impact on that account's reputation. In some cases, where our data reveal libel (e.g. Rudy Guiliani accusing Dominion Voting machines of switching votes), our analyses could inform lawsuits. Similarly, by showing how a specific account organized protests that led to violence, our analyses could have criminal legal implications. For these reasons, we attempt to obscure in our reporting the accounts of private citizens who were not intentionally participating in illegal action. However, for public individuals (like Guiliani), we will not withhold account information.

10.2 Reproductive risks. Are there any risks of the study procedures to men and women (who are subjects, or partner of subjects) related to pregnancy, fertility, lactation or effects on a fetus or neonate?

Examples: direct teratogenic effects; possible germline effects; effects on fertility; effects on a woman's ability to continue a pregnancy; effects on future pregnancies.

[X] **No** → If no go to question 10.3
[ ] **Yes** → If yes, answer the following questions:

a. Risks. Describe the magnitude, probability, duration and/or reversibility of the risks.

b. Steps to minimize risk. Describe the specific steps that will be taken to minimize the magnitude, probability, or duration of these risks.

Examples: inform the subjects about the risks and how to minimize them; require a pregnancy test before and during the study; require subjects to use contraception; advise subjects about banking of sperm and ova.

If the use of contraception will be required: describe the allowable methods and the time period when contraception must be used.

c. Pregnancy. Describe what will be done if a subject (or a subject's partner) becomes pregnant

For example; will subjects be required to immediately notify study staff, so that the study procedures can be discontinue or modified, or for a discussion of risks, and/or referrals or counseling?

10.3 MRI risk management. A rare but serious adverse reaction called nephrogenic systemic fibrosis (NSF) has been observed in individuals with kidney disease who received gadolinium-based contrast agents (GBCAs) for the scans. Also, a few healthy individuals have a severe allergic reaction to GBCAs.

a. Use of gadolinium. Will any of the MRI scans involve the use of a gadolinium-based contrast agent (GBCA?)

[X] **No**
[ ] **Yes** → If yes, which agents will be used? *Check all that apply.*

	Brand Name	Generic Name	Chemical Structure
[ ]	Dotarem	Gadoterate meglumine	Macrocylic
[ ]	Eovist / Primovist	Gadoxetate disodium	Linear
[ ]	Gadavist	Gadobutro	Macrocyclic
[ ]	Magnevist	Gadpentetate dimeglumine	Linear
[ ]	MultiHance	Gadobenate dimeglumine	Linear
[ ]	Omniscan	Gadodiamide	Linear
[ ]	OptiMARK	Gadoversetamide	Linear
[ ]	ProHance	Gadoteridol	Macrocyclic
[ ]	Other, provide name:		

1.) The FDA has concluded that gadolinium is retained in the body and brain for a significantly longer time than previously recognized, especially for linear GBCAs. The health-related risks of this longer retention are not yet clearly established. However, the UW IRB expects researchers to provide a compelling justification for using a linear GBCA instead of a macrocyclic GBCA, to manage the risks associated with GBCAs.

Describe why it is important to use a GBCA with the MRI scan(s). Describe the dose that will be used and (if it is more than the standard clinical dose recommended by the manufacturer) why it is necessary to use a higher dose. If a linear GBCA will be used, explain why a macrocyclic GBCA cannot be used.

2.) Information for subjects. Confirm by checking this box that subjects will be provided with the FDA-approved Patient Medication Guide for the GBCA being used in the research or that the same information will be inserted into the consent form.

☐ **Confirmed**

b. Who will (1) calculate the dose of GBCA; (2) prepare it for injection; (3) insert and remove the IV catheter; (4) administer the GBCA; and (5) monitor for any adverse effects of the GCBA? Also, what are the qualifications and training of these individual(s)?

c. Describe how the renal function of subjects will be assessed prior to MRI scans and how that information will be used to exclude subjects at risk for NSF.

d. Describe the protocol for handling a severe allergic reaction to the GBCA or any other medical event/emergency during the MRI scan, including who will be responsible for which actions.

10.4 Unforeseeable risks. Are there any research procedures that may have risks that are currently unforeseeable?

Example: using a drug that hasn't been used before in this subject population.

☒ **No**
☐ **Yes** → If yes, identify the procedures.

10.5 Subjects who will be under regional or general anesthesiology. Will any research procedures occur while patients are under general or regional anesthesia, or during the 3 hours preceding general or regional anesthesia (supplied for non-research reasons)?

☐ **No**
☐ **Yes** → If yes, check all the boxes that apply.

☐ Administration of any drug for research purposes

☐ Inserting an intra-venous (central or peripheral) or intra-arterial line for research purposes

☐ Obtaining samples of blood, urine, bone marrow or cerebrospinal fluid for research

☐ Obtaining a research sample from tissue or organs that would not otherwise be removed during surgery

☐ Administration of a radio-isotope for research purposes**

☐ Implantation of an experimental device

☐ Other manipulations or procedures performed solely for research purposes (e.g., experimental liver dialysis, experimental brain stimulation)

If any of the boxes are checked:
Provide the name and institutional affiliation of a physician anesthesiologist who is a member of the research team or who will serve as a safety consultant about the interactions between the research procedures and the general or regional anesthesia of the subject-patients. If the procedures will be performed at a UW Medicine facility or affiliate, the anesthesiologist must be a UW faculty member, and the Vice Chair of Clinical Research in the UW Department of Anesthesiology and Pain Medicine must be consulted in advance for feasibility, safety and billing.

*** If the box about radio-isotopes is checked: the study team is responsible for informing in advance all appropriate clinical personnel (e.g., nurses, technicians, anesthesiologists, surgeons) about the administration and use of the radio-isotope, to ensure that any personal safety issues (e.g., pregnancy) can be appropriately addressed. This is a condition of IRB approval.*

10.6 Data and Safety Monitoring. A Data and Safety Monitoring Plan (DSMP) is required for clinical trials (as defined by NIH). If required for this research, or if there is a DSMP for the research regardless of whether it is required, upload the DSMP to ***Zipline***. If it is embedded in another document being uploading (for example, a Study Protocol) use the text box below to name the document that has the DSMP. Alternatively, provide a description of the DSMP in the text box below. For guidance on developing a DSMP, see the ITHS webpage on Data and Safety Monitoring Plans.

10.7 Un-blinding. If this is a double-blinded or single-blinded study in which the participant and/or relevant study team members do not know the group to which the participant is assigned: describe the circumstances under which un-blinding would be necessary, and to whom the un-blinded information would be provided.

10.8 Withdrawal of participants. If applicable, describe the anticipated circumstances under which participants will be withdrawn from the research without their consent. Also, describe any procedures for orderly withdrawal of a participant, regardless of the reason, including whether it will involve partial withdrawal from procedures and any intervention but continued data collection or long-term follow-up.

10.9 Anticipated direct benefits to participants. If there are any direct research-related benefits that some or all individual participants are likely to experience from taking part in the research, describe them below:

Do not include benefits to society or others, and do not include subject payment (if any). Examples: medical benefits such as laboratory tests (if subjects receive the results); psychological resources made available to participants; training or education that is provided.

N/A

10.10 Return of individual research results.

In this section, provide your plans for the return of individual results. An "individual research result" is any information collected, generated or discovered in the course of a research study that is linked to the identity of a research participant. These may be results from screening procedures, results that are actively sought for purposes of the study, results that are discovered unintentionally, or after analysis of the collected data and/or results has been completed.

*See the **GUIDANCE Return of Individual Results** for information about results that should and should not be returned, validity of results, the Clinical Laboratory Improvement Amendment (CLIA), consent requirements and communicating results.*

a. Is it anticipated that the research will produce any individual research results that are clinically actionable?

"Clinically actionable" means that there are established therapeutic or preventive interventions or other available actions that have the potential to change the clinical course of the disease/condition, or lead to an improved health outcome.

In general, every effort should be made to offer results that are clinically actionable, valid and pose life-threatening or severe health consequences if not treated or addressed quickly. Other clinically actionable results should be offered if this can be accomplished without compromising the research.

- [X] **No**
- [ ] **Yes** → If yes, answer the following questions (a.1-a.3).

a.1. Describe the clinically actionable results that are anticipated and explain which results, if any, could be urgent (i.e. because they pose life-threatening or severe health consequences if not treated or addressed quickly).

Examples of urgent results include very high calcium levels, highly elevated liver function test results, positive results for reportable STDs.

a.2. Explain which of these results will be offered to subjects.

a.3. Explain which results will not be offered to subjects and provide the rationale for not offering these results.

Reasons not to offer the results might include:

- *There are serious questions regarding validity or reliability*
- *Returning the results has the potential to cause bias*
- *There are insufficient resources to communicate the results effectively and appropriately*
- *Knowledge of the result could cause psychosocial harm to subjects*

b. Is there a plan for offering subjects any results that are not clinically actionable?

Examples: non-actionable genetic results, clinical tests in the normal range, experimental and/or uncertain results.

- [ ] **No**
- [ ] **Yes** → If yes, explain which results will be offered to subjects and provide the rationale for

c. Describe the validity and reliability of any results that will be offered to subjects.

The IRB will consider evidence of validity such as studies demonstrating diagnostic, prognostic, or predictive value, use of confirmatory testing, and quality management systems.

d. Describe the process for communicating results to subjects and facilitating understanding of the results. In the description, include who will approach the participant with regard to the offer of results, who will communicate the result (if different), the circumstances, timing, and communication methods that will be used.

e. Describe any plans to share results with family members (e.g. in the event a subject becomes incapacitated or deceased).

f. Check the box to indicate that any plans for return of individual research results have been described in the consent document. If there are no plans to provide results to participants, this should be stated in the consent form.

*See the **GUIDANCE Return of Individual Results** for information about consent requirements.*

☐ **Confirmed**

10.11 Commercial products or patents. Is it possible that a commercial product or patent could result from this study?

☐ **No**
☐ **Yes** → If yes, describe whether subjects might receive any remuneration/compensation and, if yes, how the amount will be determined.

11 ECONOMIC BURDEN TO PARTICIPANTS

11.1 Financial responsibility for research-related injuries. Answer this question only if the lead researcher is not a UW student, staff member, or faculty member whose primary paid appointment is at the UW.

For each institution involved in conducting the research: Describe who will be financially responsible for research-related injuries experienced by subjects, and any limitations. Describe the process (if any) by which participants may obtain treatment/compensation.

11.2 Costs to subjects. Describe any research-related costs for which subjects and/or their health insurance may be responsible (examples might include: CT scan required for research eligibility screening; co-pays; surgical costs when a subject is randomized to a specific procedure; cost of a device; travel and parking expenses that will not be reimbursed).

12 RESOURCES

12.1 Faculty Advisor. (For researchers who are students, residents, fellows, or post-docs.) Provide the following information about the faculty advisor.

- Advisor's name
- Your relationship with your advisor (for example: graduate advisor; course instructor)
- Your plans for communication/consultation with your advisor about progress, problems, and changes.

PI (Kate Starbird) is faculty

12.2 UW Principal Investigator Qualifications. Upload a current or recent Curriculum Vitae (CV), Biosketch (as provided to federal funding agencies), or similar document to the Local Site Documents page in Zipline. The purpose of this is to address the PI's qualifications to conduct the proposed research (education, experience, training, certifications, etc.).

For help with creating a CV, see http://adai.uw.edu/grants/nsf_biosketch_template.pdf and https://education.uwmedicine.org/student-affairs/career-advising/year-4/residency-applications/curriculum-vitae/

☐ **The CV will be uploaded.**

12.3 UW Study team qualifications. Describe the qualifications and/or training for each UW study team member to fulfill their role on the study and perform study procedures. (You may be asked about non-UW study team members during the review; they should not be described here.) You may list these individuals by name, however if you list an individual by name, you will need to modify this application if that individual is replaced. Alternatively, you can describe study roles and the qualifications and training the PI or study leadership will require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.

Describe: The role (or name of person), the study activities they will perform, and the qualifications or training that are relevant to performing those study activities.

Examples:
Research Study Coordinator: Obtain consent, administer surveys, blood draw. Will have previous experience coordinating clinical research and be a certified phlebotomist in WA.
Undergraduate Research Assistant: Obtain consent, perform all study procedures. Will have had coursework in research methods, complete an orientation to human subjects protections given by the department, and will receive training from the PI or the graduate student project lead on obtaining consent and debriefing subjects.
Acupuncturist: Perform acupuncture procedures and administer surveys. Must be licensed with WA State DoH and complete training in administering research surveys given by the project director, an experienced survey researcher.
Co-Investigator: Supervise MRI and CT scan procedures and data interpretation, obtain consent. MD, specialty in interventional radiology and body imaging. 5-years clinical research experience.

12.4 Study team training and communication. Describe how it will be ensured that each study team member is adequately trained and informed about the research procedures and requirements (including any changes) as well as their research-related duties and functions.

☐ **There is no study team.**

13 OTHER APPROVALS, PERMISSIONS, and REGULATORY ISSUES

13.1 Approvals and permissions. Identify any other approvals or permissions that will be obtained. For example: from a school, external site/organization, funding agency, employee union, UW Medicine clinical unit.

Do not attach the approvals and permissions unless requested by the IRB.

N/A

13.2 Financial Conflict of Interest. Does any UW member of the team have ownership or other Significant Financial Interest (SFI) with this research as defined by UW policy GIM 10?

☐ **No**

☐ **Yes** → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

- ☐ **No** → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination
- ☐ **Yes** → If yes, upload the Conflict Management Plan for every UW team member who has a FCOI with respect to the research, to ***Zipline***. If it is not yet available, use the text box to describe whether the Significant Financial Interest has been disclosed already to the UW Office of Research and include the FIDS Disclosure ID if available.

To: Matt DeButts[mdebutts@stanford.edu]
Cc: [redacted]@uw.edu]; Renee DiResta[rdiresta@stanford.edu]; Jeffrey T. Hancock[hancockj@stanford.edu]; Mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Fri 10/14/2022 6:25:31 PM
Subject: Re: Tropes coding -- reduce?
Received: Fri 10/14/2022 6:25:33 PM

My sense is that if we reduce those too far, they become less useful. IMO, the specificity of tropes and how repeatable they are at that level of specificity are the most interesting piece of this.
If we generalize and reduce categories we may want to revisit the research questions.

Kate

On Oct 14, 2022, at 11:10 AM, Matt DeButts <mdebutts@stanford.edu> wrote:

Hi [redacted] (and all),
I spoke with Jeff about reducing the Tropes code categories by a few if possible. I'm planning to do that this weekend. I have a hard copy of the descriptions (from Jeff). Can someone share me the online version?

Once I've proposed reductions, perhaps [redacted] and I can start working on the inter-coder reliability?

What's the timeline we want this done by?

Hope you all are well!
Matt

Matt DeButts
PhD student, Stanford University
Twitter: @debutts
WeChat: mattdebutts

To: SMS Political Influencers[smspoliticalinfluencers@gmail.com]
Cc: Renee DiResta[rdiresta@stanford.edu]; Matt DeButts[mdebutts@stanford.edu]; Isabella Gc[isabellagc2010@gmail.com]
From: Kate Starbird
Sent: Mon 3/7/2022 7:41:28 PM
Subject: Submission to Social Media + Society
Received: Mon 3/7/2022 7:41:38 PM
SocialMediaAndSociety-paper.docx
SocialMediaAndSociety-paper-anonymized.docx

Hi folks,
We are attaching our submission for the Social Media + Society special issue on political influencers. We're including both an anonymized paper and one with author names and financial acknowledgments included.

Thank you for the extra week to reduce length. We removed as much as we could (~40%) while still maintaining enough to support our larger claims.

Please let us know if there's anything we need to fix or clarify.

Thank you,
Kate

Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Authors: Kate Starbird*, Renée DiResta†, Matt DeButts†, Isabella Garcia-Camargo†

* University of Washington, HCDE, Center for an Informed Public
† Stanford Internet Observatory

Abstract

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud that sought to undermine trust in election procedures and results. This narrative took hold among a substantial portion of the U.S. population, eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — from hyperpartisan media to political operatives to ordinary people — contributed to producing and amplifying misleading narratives, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated, "top-down" efforts, we highlight "bottom-up" dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This narrative took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for some, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021.

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon this framing, expanding the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. Additionally, while Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives that constituted this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-

down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of "influencers" in shaping and amplifying these misleading narratives — differentiating between credentialed and uncredentialed influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. That campaign took shape through the production and spread of numerous misleading claims of voter fraud that echoed through social media, hyper-partisan online news outlets, and out from cable news shows to vast audiences. Its foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast with research on disinformation during the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019), here we surface the domestic and *participatory* nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents' of those campaigns, they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-drive) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. And through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. Social media platforms expanded 'media' beyond a one-to-many broadcast format and facilitated an "architecture of participation" (O'Reilly, 2007). The resulting rise of the "citizen journalist" (Gillmor, 2006) destabilized the foundations of journalism, by changing who gets to serve as "gatekeepers" as well as the rules, standards, and pace of news production (Bruns, 2003). This shift towards citizen journalism catalyzed the development of new classes of media, micro-media or "media-of-one" outlets whose reporting style and structure resemble traditional news but are often produced by a single individual and their hyper-partisan cousins, i.e. small digital outlets that primarily produce or republish from elsewhere politically-partisan content (Ray, 2021). Some members of this new class of digital-first, self-defined "journalists" and "media outlets" sit between traditional journalism and activism (Wall, 2015), and have increasing influence in the public sphere.

Another type of "influencer" has emerged at the newly blurred boundaries of media, celebrity, and marketing. Located outside the gatekeeping institutions of the mass media era, these influencers seek to build large followings around a particular expertise or passion. While some work in media, many position themselves not as journalists but as ordinary people, using a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Marketing research, which was among the first disciplines to identify and characterize the "influencer", was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer" (Figure 1), to differentiate influence on the basis of follower count. Borrowing from this framework, in this research we use a similar following-based classification scheme.

Research on the social media influencer has examined not just the figure's power to market goods and services, but also to shape public opinion on culture, mobilize activists, and intervene in politics. Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might "trend" on social media, and how trends might inform subsequent media coverage (McGregor, 2020). Here we explore the unique roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

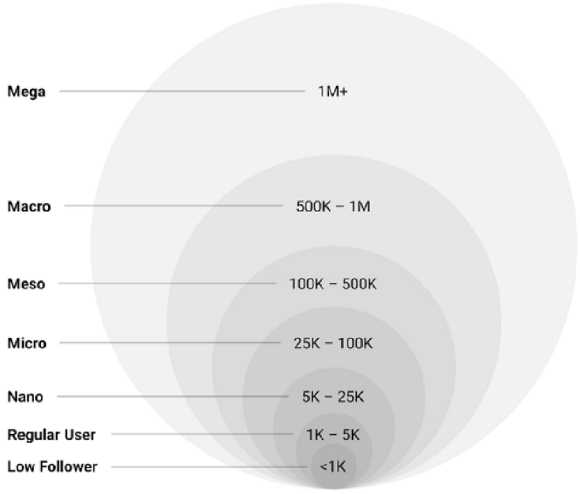


Figure 1. Audience size classification for Twitter accounts, adapted from Mediakix (2021)

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three from different periods of this campaign that are both representative of the kinds of narratives that spread, and reveal the participatory nature of this campaign:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locales, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our collectors captured tweets that contained voting-related terms (such as “vote”, “voter”, “voting”, and “ballot”), and terms related to claims of voter or election fraud, and terms related to potentially salient locations. In addition to passive collective of these known keywords, we also identified and documented new false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this cumulative dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our collection method has some limitations. During high volume events, collections on the Twitter Streaming API can incur rate limits. Using comparisons of retweet counts (comparing the number of retweets we captured to the retweet counts embedded in meta-data) we estimate that for Sonoma Ballots and MaidenGate, we likely have 90% or more of all tweets with our selected keywords; for SharpieGate, which spread on Election Day and the three subsequent days, we estimate that we captured ~70% of related tweets. Importantly, for highly retweeted tweets (which we primarily focus on here) we can recreate the original tweet from metadata in retweets. However, for SharpieGate, though we capture most of the amplification, we do lose insight into exactly who retweeted each tweet as it spread — and our overall counts for retweets and quotes are likely undercounts. It is important to note that all engagement and followers metrics for Twitter are reported as they were at the time of their posting. For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether or not they’ve been suspended, how they credentialed themselves, their tweet patterns across the Election 2020 discourse, and the role they played in seeding, shaping, and/or amplifying the narrative.

In addition to data collected directly from these platforms, we also follow links in these data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified and have less than 100K followers. We make exceptions, however, for public figures, including journalists and elected officials. Given that this work is situated on the intersection between social media influencers and politically-driven disinformation campaigns, we feel it is important to highlight the roles played by specific high-visibility accounts and pages in media and politics.

3.4 Methodology

For our analysis, we employ a grounded, interpretative approach, building upon Charmaz’s approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. Similar to the work outlined in Maddock et al. (2015), we focus on specific rumors or stories, then use visualizations and descriptive statistical analysis to identify high level patterns and anomalies and deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative

"work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerges from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). All four authors of this paper participated in the EIP. We initially began studying these cases as they were "going viral" and have continued analysis in the many months since, creating temporal and network graphs and used those graphs to guide content analysis of specific posts or accounts; closely analyzing hundreds of social media post to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights that emerge from the iterative exploration of high-level visualizations and low-level content analysis. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and other hyper-partisan media outlets. A primary actor in this campaign was then-President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged. The tweet above, posted by President Trump's official account (@realDonaldTrump) in June 2020 was one of numerous social media posts by President Trump promoting a false narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud:

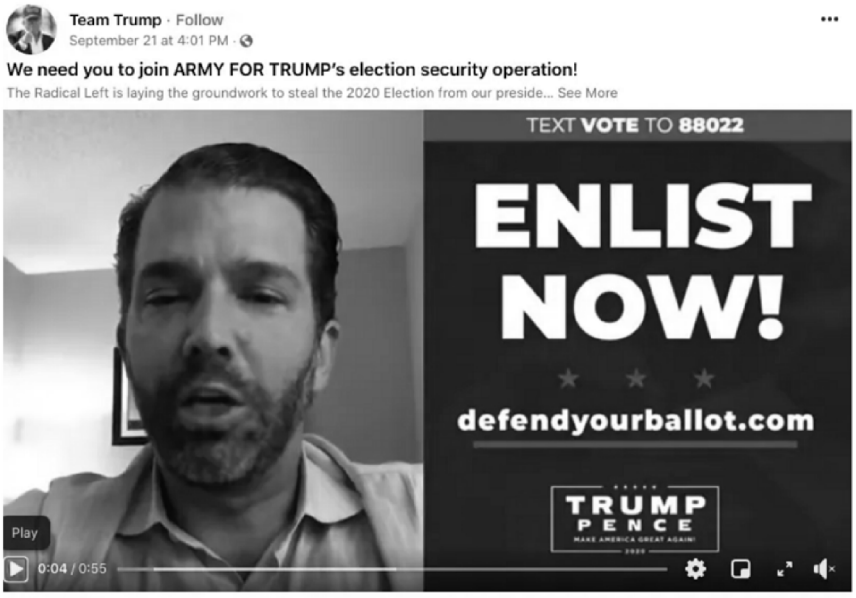


Figure 3: Facebook post from the Trump Campaign encouraging followers to "Enlist Now" to join the "Army for Trump".

The campaign provided instructions for serving as poll observers and online forms for its supporters to submit evidence of election issues. Our data reveal that, likely mobilized by the "Army for Trump" messaging and the repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters went to the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being dumped, discarded, or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, Elijah Schaffer, a self-described journalist for right wing media outlet The Blaze, concluded his exposition with the words, "Big if true."



Figure 4: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election concluded (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

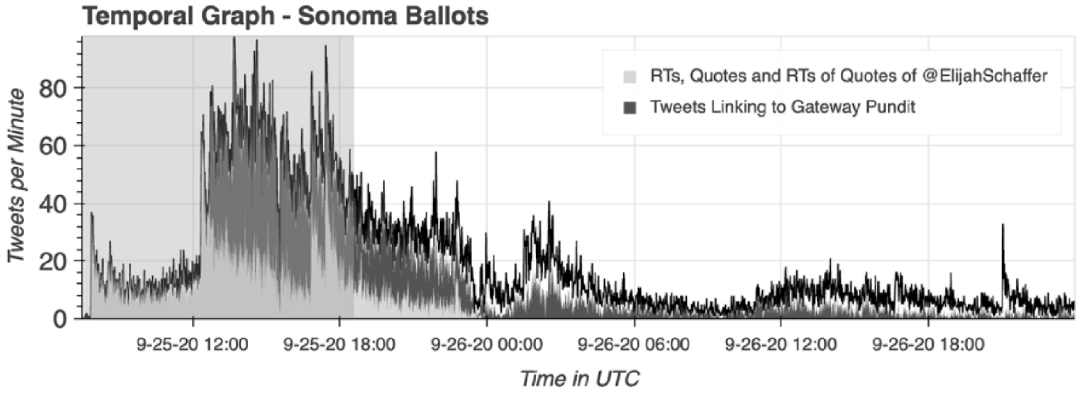


Figure 5: Temporal graph (tweets per minute) of the Sonoma Ballots story (Black). The shaded pink area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The shaded red area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified

with a “blue-check”, had 244K followers at the time of this tweet — a “meso” influencer-sized account.

Approximately five hours after Schaffer’s tweet, a right-wing news outlet posted an article and accompanying tweet featuring the same photos and claims:

@gatewaypundit (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, the Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud, through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers at the time (“meso” level) — and would grow to more than 460K followers before being suspended on January 10, 2021 (in response to the events of January 6). Gateway Pundit’s article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement, which persisted for several hours.

As Figure 5 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit’s article. These dynamics are consistent with Benkler et al’s characterization of 2020 disinformation as driven from the top-down by media and political elites (2020), but in this case the “elites” were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

However, both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a “reader,” who attributed the photograph to his father. Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer’s tweet — that they did not have enough visibility to spread the claims organically from their own account, so they contacted “influencers” to assist them. Krafft and Donovan (2020) refer to this as “trading up,” a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory audiences of hyper-partisan media collaborate in the co-creation of stories that fit existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of “mega influencer” Donald Trump Jr., one of President Trump’s sons, who retweeted Schaffer’s original tweet at 17:26 UTC, nearly 10 hours after the original tweet. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, a noted “repeat spreader” of misleading voter fraud claims (CIP et al., 2021). Trump Jr’s account often acted as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

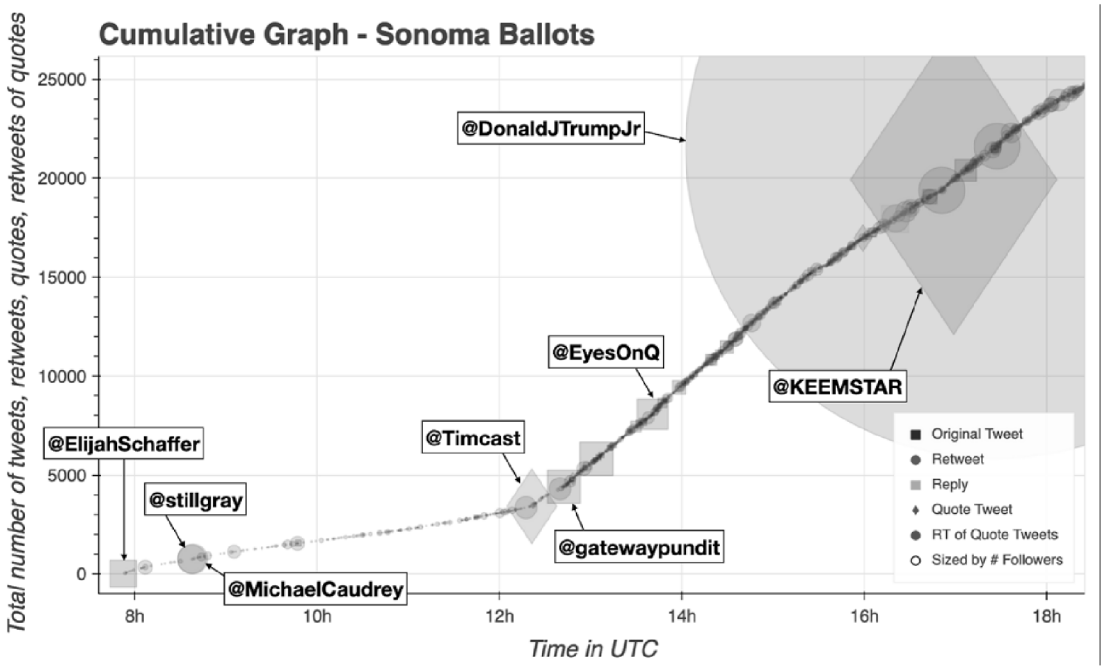


Figure 6. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 5).

Figure 6, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include @stillgray (260K followers), the verified account of Ian Miles Cheong, an influencer who rose to prominence by defending female gamers during the #GamerGate controversy but who has shifted towards more right wing stances and who maintains influence in pro-Trump discourse primarily through Twitter, and the verified account Michael Coudrey (272K followers), an entrepreneur who throughout Autumn 2020 repeatedly tweeted misleading claims and provocative assertions about election fraud.

Another account that played a role in the spread of this narrative is @Timcast (686K followers), a micro-media journalist who grew to prominence through live-streaming the Occupy protests and whose work increasingly resonates with right-wing audiences. His tweet precipitates and contributes to the surge that occurs around 12:20 UTC, which is also assisted by a tweet at 13:40 UTC from @EyesOnQ (279K followers), a now-suspended account that gained influence through tweets about the pro-Trump QAnon conspiracy theory. After @EyesOnQ's tweet we see a large number of micro-influencers (accounts with 10-250K followers) helping to sustain the spread of this narrative. @EyesOnQ and many of its retweeters have since been suspended. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded

dramatically. However, the claims persisted on the Gateway Pundit and experienced something of a second life on Facebook a few days later (though at much lower volume), only to fade out completely after that.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, is much more complex than Sonoma Ballots, integrating several related claims (some true, some false) that weaved together to form a false "voter fraud" narrative, surfacing both bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

The core assertion of SharpieGate was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this was causing ballots to be rejected (misleading; these ballots were rarely rejected) — essentially disenfranchising those voters (false, ballots rejected automatically were counted using alternative methods). Although Election Day's first Sharpie claims surfaced in Chicago, the discourse later shifted to Arizona as the narrative evolved to assert that pens were intentionally given to Trump voters as part of a strategy to deliberately disenfranchise Trump-leaning voters.

In reality, Sharpie pens were recommended for in-person voting in Arizona (Citizens Clean Elections Commission), because they dry faster than ink pens, which smear the vote-reading machines when the ballots are fed in too quickly — as happens during high-volume, Election Day voting. The ballots had been designed so that bleed-through would not affect vote-counting. Unfortunately, many Arizona voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this (admittedly somewhat abstruse) electoral process.

SharpieGate unfolded in five distinct stages, described in detail below.

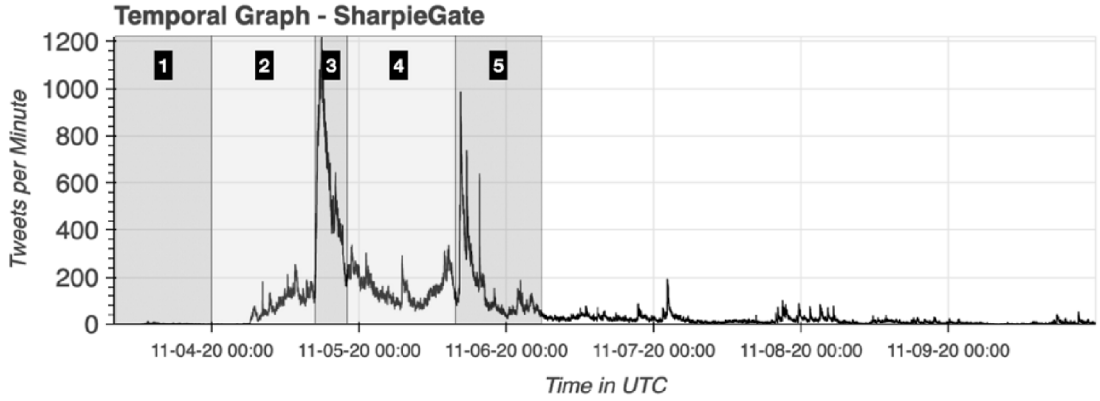


Figure 7. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development/amplification of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a Chicago voter and low-follower (77) Twitter account tweeted his concern that his precinct's ballot reader appeared to be struggling with his Sharpie-marked ballot. There is no evidence that this person was a Trump-voter. His tweet received no engagements.

Thirty minutes later, a conservative media personality in the Chicago area, @AmyJacobson (22.5K followers, a "nano" sized audience), echoed the low-follower account's concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone would grow more alarmist, quoting her original tweet and adding in all-caps that ballots were being placed in a BOX.

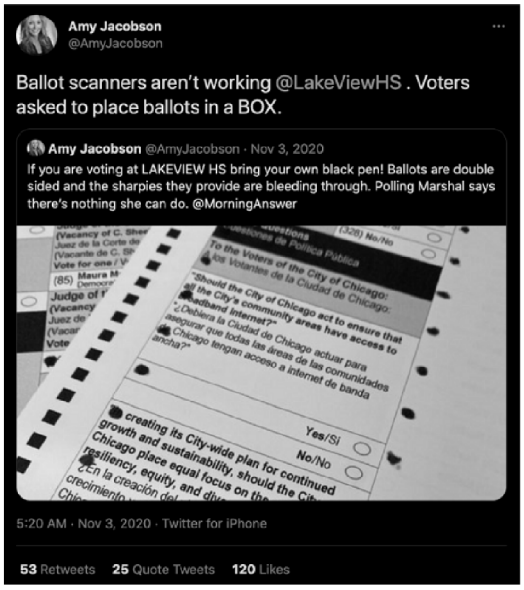


Figure 8. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets about Sharpies were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets of Jacobson became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to trade up — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day were focused around Chicago, another parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, shortly after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
shoulders. <embedded image of a ballot with Sharpie bleed-through from the
backside and a clear Trump vote on the frontside>
```

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that had become a site for aggregating right wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: an accusation of poll worker indifference to Sharpie bleed-through. The leading question of "Electioneering?" implies that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling for its audience whom the assumed target of this potential conspiracy was.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another regular user (1.7K followers) — this one with conservative and pro-Trump markers in its handle and profile description — tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim on Twitter, but received very little amplification on Twitter.

Facebook appears to have hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own to the polls. It garnered 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that voters' ballots were being "canceled" due to Sharpie pen use, including a screenshot of a vote-tracking website as evidence. The post received 70 comments, mostly on Election Day, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed in Arizona, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had set the stage for clashes within polling places, as poll workers attempted to force voters to use county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming that election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpie pen, confirmed the bleed-through, and expressed anxiety about whether their vote had counted. One user posted a link to the Trump campaign's "Defend Your Ballot" website and encouraged people to report their issues with Sharpie pens. Another user asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Joe Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive about an hour after Fox's Arizona call (Figures 7 & 9). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge around explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a:(2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time). The suspension occurred just minutes after the account was quote-tweeted by conservative activist Charlie Kirk..

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within text-based posts echoing some of its claims, then later within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first came from an unverified, low follower account replying to another tweet claiming fraud in Pennsylvania and was amplified 54 times. A second tweet with the embedded the video was posted by a micro-influencer (unverified, 56.6K followers) who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 3544 times, quoted 1765, and spread widely through retweets of those quote tweets. One of the quote tweets was from an unverified low follower account of a person in Arizona:

Tweet 2c:(2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!! <Quote tweet of the above>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author would trade up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account — by mentioning or replying to them. The tweet record indicates that the author of this highly viral quote tweet was legitimately concerned about the issue. About 12 hours later, she notes that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

As the video began to spread, another tweet from an unverified, low follower account re-embedded it, explicitly connecting the use of Sharpies to the fact that Arizona had been called for candidate Biden. That tweet received considerable attention as well, accumulating 17,898 amplifying engagements.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these originate from

unverified, low-follower accounts, and the other two with unverified micro-influencers that have since been suspended from Twitter. All but one have markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that they were, at least in part, politically motivated to share this content. Amplification during this time occurs, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @CharlieKirk11 (verified, 1.8M followers). Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (CIP et al., 2021). Between midnight and 17:00 UTC on November 4, as the SharpieGate narrative begins to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

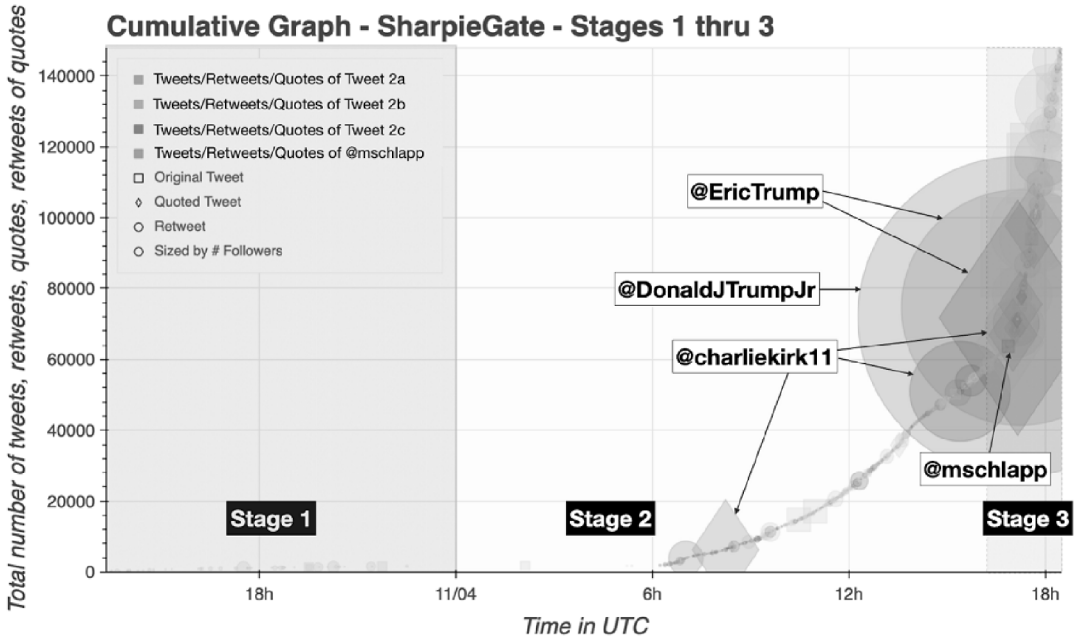


Figure 9. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored if they are tweets, retweets, or quote tweets of Tweets 2a, 2b, 2c or @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC (10am-11:30am AZ time), the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half. In that single hour, it received more amplification than in the preceding 24 hours combined. Figure 9 reveals that the surge is, in part, catalyzed by the following tweet, from conservative operative Matt Schlapp:

@mschlapp (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

Schlapp's account had 228K followers at the time. The tweet — which, unlike many of the earlier viral tweets, couched the claims about Sharpie pens in uncertainty — received 4335 retweets and was quoted 1356 times resulting in 9551 retweets. More interesting than the absolute numbers here is how Schlapp's tweet echoed through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC (1.3M followers), conservative news outlet TownHall's editor @KatiePavlich (865K followers), and President Trump's sons, @EricTrump (4.4M followers) and @DonaldJTrumpJr (6.0M followers). In this case, Schlapp served as an influencer's influencer, helping to move the developing conspiracy theory from its origins in low follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign. Interestingly, Schlapp was involved in contesting a previous election — he was in attendance during the "Brooks Brothers riot" that successfully stalled the recount effort in 2000 (Kamen, 2005).

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posts another quote tweet asking "What's going on here?", conservative author @DineshDSouza (1.8M followers), the founder of "Students for Trump" @RyanAFournier (1.1M followers), the founder of the "Walkaway" movement @BrandonStraka (640K followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. These corrective tweets were not highly retweeted (relative to the earlier tweets pushing the misleading claims), but instead accompanied a steady decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier. However, a few new threads emerged, aggregating claims of rejected ballots and making calls to action (e.g. recommendations to call lawyers, instructions for AZ voters to go to a website to check the status of their ballots).

6.5 Stage 5: Conservative Mega-Influencers Drive a Resurgence

On Twitter, we see another resurgence of the SharpieGate narrative on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a mega-influencer with 850K followers:

@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote fairy visits overnight...

Maria's tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader "election fraud" narrative. Interestingly, her post only hinted towards a conspiracy, without providing a coherent theory. The tweet began to spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the "fraud" framing and issued a call to action to the FBI and DOJ.

Bartiromo's tweet was also quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton (1.2M followers) and Trump-supporting lawyer @RudyGiuliani (883K followers); and retweeted by similar accounts including @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq (310K followers), and former GOP Speaker of the House @NewtGingrich (2.4M followers). Bartiromo's tweet generated a surge of about 25K SharpieGate tweets in one hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's (and transgender people's) prior legal names ("maiden" names). This theory emerged as a direct result of agitation by online political influencers, and it both supported and drew support from the larger meta-narrative of the stolen election.

On Twitter, the first salient mention of issues with "maiden names" in the context of voting and voter fraud concerns occurs in the following tweet:

Peoples_Pundit (2020-11-08 15:03): Just so everyone can see, here's the voter file in Philly and the query parameters. Also important to understand, we always have dirty rolls B/C the state is always behind in learning of CoAs, deaths, duplicate records, maiden names, etc.

It's simply not believable nor possible. <embedded screenshot of an online dashboard with voting statistics from Pennsylvania>.

The posting account, @Peoples_Pundit (unverified, 160K followers), belonged to a conservative micro-influencer who described himself as a "data journalist." Over the next few days, his tweet was retweeted 1431 times. Early amplifiers included Epoch Times contributor @themarketswork (118K followers) and the unverified account of Trump-supporting lawyer @SidneyPowell1 (506K followers).

@Peoples_Pundit's tweet also spread through 97 quote tweets and (and 32 retweets of those quotes). Many quote tweets added hashtags like #StoptheSteal or phrases such as "Audit the vote!", contextualizing this claim alongside other evidence of a purported stolen election. Other users attempted to draw attention from right-wing influencers, tagging pro-Trump political figures such as @RudyGiuliani and @DonaldJTrumpJr, mega-influencers like @JackPosobiec, and the President's personal account (@realDonaldTrump).

7.1 An Aspiring Influencer Makes a Call to Action

Over the next two days, low-level chatter about maiden names on Twitter persisted, including a few users who shared personal experiences about being given multiple ballots and several "friend of a friend" stories of people voting with their maiden name. The concern about maiden names consolidated into the MaidenGate conspiracy primarily through the work of one user: a person who used the pseudonym L (which we will use here). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 10 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss well-worn rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L began investigating the Epstein trial; in October, she investigated Hunter Biden. Over these months, her account gained a following, burgeoning to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including pro-Trump activist media outlet @ProjectVeritas, conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

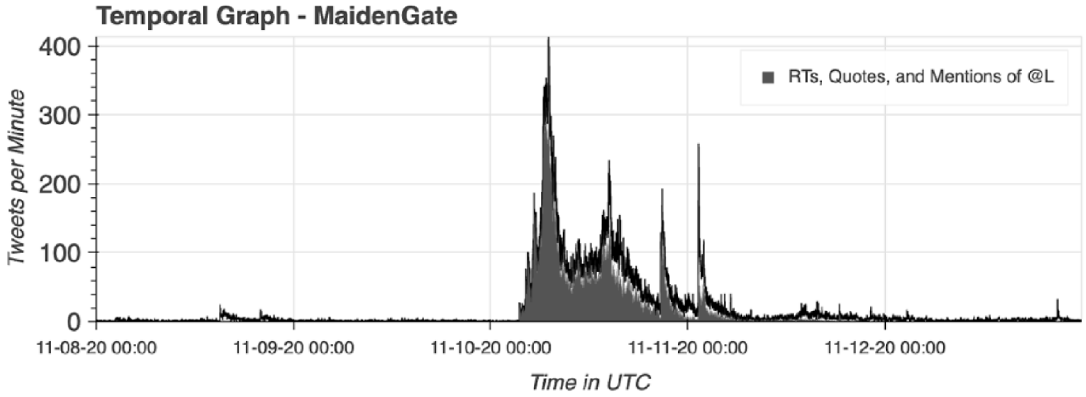


Figure 10. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in red.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claim fraud, receive about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets began to take off — with 30,000 retweets, quotes, and retweets of quotes in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of regular users and micro-level influencers. A few of these accounts attempt to trade up to more influential accounts, tagging (among others) verified right-wing mega-influencer @JackPosobiec and verified meso-influencer Ian Miles Cheong (@stillgray, 309K followers).

@L began to retweet and quote others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon, another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro-, meso-, and macro-influencers — and eventually to mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen (259K followers) retweeted @L's call to action without comment. Lauren was a host at BlazeTV, the same hyper-partisan news outlet for which @ElijahSchaffer (initiator of Sonoma Ballots) worked. Shortly thereafter, meso-influencer Ian Miles Cheong (@stillgray), who had been tagged into conversation minutes earlier, and who played a similar role as an early amplifier of Sonoma Ballots, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar (70K followers), who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's call-to-action tweets. At 6:24 UTC, conservative activist @CharlieKirk (1.9M followers), who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

The first recorded appearance of the #MaidenGate hashtag occured at 4:33 UTC, eighteen minutes after @L's initial plea to her followers for help. A low-follower account quote-tweeted @L, adding "#MaidenGate?". Subsequent users dropped the question mark. Within hours, it would be promoted by micro-, meso-, macro-, and mega-influencers; within two days, *The New York Times* would write about (and debunk) it.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K (crossing the threshold of meso-influencer) about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was "looking into @L's #MaidenGate" and attempted to solicit ten people who could "confirm that you voted under your name and that also a vote was cast under your maiden name?" He concluded by saying that he will "have L call me" — and later confirmed via tweet that they had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L's accusations around 8:00 UTC. Like other savvier influencers, he couched the claims in uncertainty while creating anticipation of something big: "We don't know the top of this. This is either a small problem, or it's a problem that will shake America to the core. We're going to find out. [...] I have no leanings. All I care about is the evidence." Alexander did note that it was not clear if the issue was systemic — and continued to press those reporting for evidence that someone had actually voted, not just that a registration existed, under their maiden names. His live broadcast got 41,000 viewers, helping to carry over the #MaidenGate claims to Alexander's growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander's team created — and later tweeted out — a Google Document to consolidate information around the ongoing "investigation." The sheet offered detailed advice for filing complaints about potential voter fraud using one's maiden name, providing links to voter registration websites in dozens of states. (On Twitter, Alexander would later offer support to people for filing affidavits to add their claims to the legal record, a tactic seen across multiple "voter fraud" conspiracy theorizing efforts at the time.) The Google document's watermark read "stopthesteal.us", providing evidence that the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the situation, and YouTube announced it would append to #MaidenGate videos an information panel stating Joe Biden had won the presidential race. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal meta-conspiracy moved onto investigating and formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — in particular around whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of the disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how some of the specific narratives within the broader disinformation campaign took shape and spread, complicates that view. In all three of these cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences. *Political influencers* both mediate and shape these efforts, acting as "opinion leaders" that frame information from elites to online audiences, and promote online audiences back to the elites in turn (Katz & Lazarsfeld, 1955). This view aligns with previous research on participatory propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here. Elites repeatedly invoked the prospect of a "rigged election" to set an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our three case studies we observe groups of low-follower accounts and uncredentialed aspirational influencers collaborating with credentialed meso- to mega-influencers to construct and propagate narratives.

In Sonoma Ballots, "journalists" at partisan media outlets launched the narrative based on photographs supplied by one of their "readers" — and all seem to have believed (or wanted to believe) that they had uncovered genuine evidence of ballot fraud. Similarly, in SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence they gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, a conspiracy theory takes form.

Mediating this bidirectional (top-down, bottom-up) information flow, we see the rise of the **political influencer**, whose liminal identity — neither elite nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds — frustrates researchers' attempts to place them within traditional models of information flow and the role of media. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contended that "opinion leaders" contextualized and represented content from mass media to audiences from whom they commanded trust. We suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, and especially at the role of audiences and influencers not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful approach to understanding these dynamics is through the lens of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (cite) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the Trump campaign's "voter fraud" theory.

Improvisation requires structure (Crossan, 1998) — at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we can see that shared understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we can see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower accounts and regular users shared their own experiences. Micro influencers amplified the experiences of others, and tried to help move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, we can see a long-time political operative performing on top of an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010),

and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, “A key characteristic of improvisation is that individuals take different leads at different times” (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

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11.0 References

Bastos, Marco, and Johan Farkas. "“Donald Trump is my President!”: The internet research agency propaganda machine." *Social Media + Society* 5, no. 3 (2019): 2056305119865466.

Benkler, Yochai, Casey Tilton, Bruce Etling, Hal Roberts, Justin Clark, Robert Faris, Jonas Kaiser, and Carolyn Schmitt. "Mail-in voter fraud: Anatomy of a disinformation campaign." *Berkman Center Research Publication* 2020-6 (2020).

Bittman, Ladislav. *The KGB and Soviet Disinformation: An Insider's View*. Pergamon-Brassey's, Washington, DC. 1985.

Bruns, Axel. "Gatewatching, not gatekeeping: Collaborative online news." *Media International Australia* 107, no. 1 (2003): 31-44.

Center for an Informed Public (CIP), Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election*. Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

Centola, Damon. "Influencers, Backfire Effects, and the Power of the Periphery." *Personal Networks: Classic Readings and New Directions in Egocentric Analysis* (2021): 73.

Charmaz, Kathy. *Constructing Grounded Theory*. Sage, 2014.

Citizens Clean Elections Commission. "Official Information Regarding the Use of Sharpies in Maricopa County." Available at: https://www.azcleanelections.gov/election-security/sharpies

Crossan, Mary M. "Improvisation in action." *Organization Science* 9, no. 5 (1998): 593-599.

Geiger, R. Stuart, and David Ribes. "Trace ethnography: Following coordination through documentary practices." In *2011 44th Hawaii International Conference on System Sciences*, pp. 1-10. IEEE, 2011.

Gillmor, Dan. *We the media: Grassroots journalism by the people, for the people*. O'Reilly Media, Inc., 2006.

Jack, Caroline. "Lexicon of lies: Terms for problematic information." *Data & Society* 3, no. 22 (2017): 1094-1096.

Kamen, Al. "Miami 'Riot' Squad: Where Are They Now?" *Washington Post*. (January 24, 2005). Available: https://www.washingtonpost.com/archive/politics/2005/01/24/miami-riot-squad-where-are-they-now/8c5457b9-ebf5-4a4a-937a-68b07c5e6334/

Lazarfield, P., and Eliu Katz. *Personal Influence: the part played by people in the flow of mass communication*. The Free Press, 1955.

Kendra, James, and Tricia Wachtendorf. "Improvisation, creativity, and the art of emergency management." *Understanding and responding to terrorism* 19 (2007): 324-335.

Krafft, P. M., and Joan Donovan. "Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign." *Political Communication 37*, no. 2 (2020): 194-214.

Hearn, Alison, and Stephanie Schoenhoff. "From celebrity to influencer." *A companion to celebrity* (2016): 194-212.

Mack, David and Caroline Haskins. "Trump Supporters Breached The Offices Of Members Of Congress." *Buzzfeed News*. (January 6, 2021). Available at: https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, Jim, Kate Starbird, Haneen J. Al-Hassani, Daniel E. Sandoval, Mania Orand, and Robert M. Mason. "Characterizing online rumoring behavior using multi-dimensional signatures." In *Proceedings of the 18th ACM Conference on Computer Supported Cooperative Work & Social Computing*, pp. 228-241. 2015.

Marwick, Alice, and danah boyd. "To see and be seen: Celebrity practice on Twitter." *Convergence* 17, no. 2 (2011): 139-158.

McGregor, Shannon C. ""Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion." *Public Opinion Quarterly* 84, no. S1 (2020): 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, David, Giampiero EG Beroggi, and William A. Wallace. "Decision support for improvisation during emergency response operations." *International journal of emergency management* 1, no. 1 (2001): 30-38.

NPR/PBS NewsHour/Marist. National Poll: Trust in Elections, Threat to Democracy. (November 2021). Available at: https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

O'Reilly, Tim. "What is Web 2.0: Design Patterns and Business Models for the Next Generation of Software." *Communications & Strategies*, no. 1 (2007): 17. Available at SSRN: https://ssrn.com/abstract=1008839

Rae, Maria. "Hyperpartisan news: Rethinking the media for populist politics." *New Media & Society* 23, no. 5 (2021): 1117-1132.

Reuters. "Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots." *Reuters*. (September 29, 2020). Available: https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

Solis, Brian, and Alan Webber. "The rise of digital influence." *Altimeter Group* (2012). Available: https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, Kate, Ahmer Arif, and Tom Wilson. "Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations." Proceedings of the ACM on Human-Computer Interaction 3, no. CSCW (2019): 1-26.

Wall, Melissa. "Citizen Journalism: A retrospective on what we know, an agenda for what we don't." *Digital journalism* 3, no. 6 (2015): 797-813.

Wanless, Alicia, and Michael Berk. "Participatory propaganda: The engagement of audiences in the spread of persuasive communications." In *Proceedings of the Social Media and Social Order, Culture Conflict 2.0 Conference*. 2017.

Wootson, Cleve. "Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'" *Washington Post* (November 27, 2016). Available: https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

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From: Kate Starbird
Sent: Sat 9/18/2021 8:05:36 PM
Subject: Draft of our social media IRB application
Received: Sat 9/18/2021 8:05:39 PM
APPLICATION_IRB_RapidResponse_SocialMedia.docx

Hi everyone,
After exchanging emails with our IRB and following up with Renee and Jeff, we have a plan of sorts for the IRB. It involves breaking our IRB applications up into 3 parts:

- Social Media analysis (UW and Stanford have to do this separately, because it's likely to be Exempt)
  - Submit ASAP and begin basic research and rapid response research
- Ethnographic work (UW files single IRB for both institutions)
  - Submit this Fall, begin studying collaborations in Winter 2022
- Surveys and Experiments (UW files single IRB for both institutions)
  - Develop these in Winter/Spring and submit Spring/Summer; Begin in Fall 2022

I'm attaching the draft application for our SaTC IRB for the Social Media component. If you have time to review and give feedback, I'd appreciate it. I plan to submit early next week (Tuesday). In particular, I'd like to draw your attention to all of (9) and specifically (10.1). I tried to specifically outline how we plan to report on these data along with some of the potential "harms". I'd like to make sure that we're really clear with the IRB about our data reporting practices. If they come back and say this isn't Exempt, we'll have to shift back to a single IRB for both institutions.

Kate

The Human Subjects Division (HSD) strives to ensure that people with disabilities have access to all services and content. **If you experience any accessibility-related issues with this form or any aspect of the application process, email hsdinfo@uw.edu for assistance.**

INSTRUCTIONS

- **This form is only for studies that will be reviewed by the UW IRB**. Before completing this form, check HSD's website to confirm that this should not be reviewed by an external (non-UW) IRB.
- **If you are requesting a determination** about whether the planned activity is human subjects research or qualifies for exempt status, you may skip all questions except those marked with a ◯. For example **1.1** must be answered.
- **Answer all questions**. If a question is not applicable to the research or if you believe you have already answered a question elsewhere in the application, state "NA" (and if applicable, refer to the question where you provided the information). If you do not answer a question, the IRB does not know whether the question was overlooked or whether it is not applicable. This may result in unnecessary "back and forth" for clarification. Use non-technical language as much as possible.
- To check a box, place an "X" in the box. To fill in a text box, make sure your cursor is within the gray text box bar before typing or pasting text.
- For collaborative or multi-site research, describe only the UW activities unless you are requesting that the UW IRB provide the review and oversight for non-UW collaborators or co-investigators as well.
- You may reference other documents (such as a grant application) if they provide the requested information in non-technical language. Be sure to provide the document name, page(s), and specific sections, and upload it to ***Zipline***. Also, describe any changes that may have occurred since the document was written (for example, changes that you've made during or after the grant review process). In some cases, you may need to provide additional details in the answer space as well as referencing a document.
- **NOTE: Do not convert this Word document to PDF.** The ability to use "tracked changes" is required in order to modify your study and respond to screening requests.

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1 OVERVIEW

Study Title: Rapid Response to Disinformation: Social Media Analysis

1.1 Home institution. Identify the institution through which the lead researcher listed on the IRB application will conduct the research. Provide any helpful explanatory information.

In general, the home institution is the institution (1) that provides the researcher's paycheck and that considers him/her to be a paid employee, or (2) at which the researcher is a matriculated student. Scholars, faculty, fellows, and students who are visiting the UW and who are the lead researcher: identify your home institution and describe the purpose and duration of your UW visit, as well as the UW department/center with which you are affiliated while at the UW.

Note that many UW clinical faculty members are paid employees of non-UW institutions.

*The UW IRB provides IRB review and oversight for only those researchers who meet the criteria described in the **SOP Use of the UW IRB**.*

University of Washington

1.2 Consultation history. Has there been any consultation with someone at HSD about this study?

It is not necessary to obtain advance consultation. However, if advance consultation was obtained, answering this question will help ensure that the IRB is aware of and considers the advice and guidance provided in that consultation.

☐ **No**
☒ **Yes** → If yes, briefly describe the consultation: approximate date, with whom, and method (e.g., by email, phone call, in-person meeting).

Jenny Maki, email. Sept 13-17.

1.3 Similar and/or related studies. Are there any related IRB applications that provide context for the proposed activities?

Examples of studies for which there is likely to be a related IRB application: Using samples or data collected by another study; recruiting subjects from a registry established by a colleague's research activity; conducting Phase 2 of a multi-part project, or conducting a continuation of another study; serving as the data coordinating center for a multi-site study that includes a UW site.

Providing this information (if relevant) may significantly improve the efficiency and consistency of the IRB's review.

☐ **No**
☒ **Yes** → If yes, briefly describe the other studies or applications and how they relate to the proposed activities. If the other applications were reviewed by the UW IRB, please also provide: the UW IRB number, the study title, and the lead researcher's name.

The proposed work connects to the following IRBs:

STUDY00003903: Unraveling Online Disinformation Trajectories — Social Media Analysis (PI: Starbird). This IRB covers related research analyzing publicly available social media data to better understand how disinformation spreads online.

STUDY00009923: How Scientific Data, Knowledge, and Expertise Mobilize in Online Media during the COVID-19 Crisis (PI: Spiro). This IRB covers research analyzing online activities to better understand the flow of information related to Covid-19.

1.4 Externally-imposed urgency or time deadlines. Are there any externally-imposed deadlines or urgency that affect the proposed activity?

HSD recognizes that everyone would like their IRB applications to be reviewed as quickly as possible. To ensure fairness, it is HSD policy to review applications in the order in which they are received. However, HSD will assign a higher priority to research with externally-imposed urgency that is beyond the control of the researcher. Researchers are encouraged to communicate as soon as possible with their HSD staff contact person when there is an urgent situation (in other words, before submitting the IRB application). Examples: a researcher plans to test an experimental vaccine that has just been developed for a newly emerging epidemic; a researcher has an unexpected opportunity to collect data from students when the end of the school year is only four weeks away.

HSD may ask for documentation of the externally-imposed urgency. A higher priority should not be requested to compensate for a researcher's failure to prepare an IRB application in a timely manner. Note that IRB review requires a certain minimum amount of time; without sufficient time, the IRB may not be able to review and approve an application by a deadline.

[ ] **No**
[X] **Yes** → If yes, briefly describe the urgency or deadline as well as the reason for it.

There's currently a hold on our budget for this research, and it would be great to remove that so we can hire researchers. Some urgency, but no specific deadline.

1.5 Objectives Using lay language, describe the purpose, specific aims, or objectives that will be met by this specific project. If hypotheses are being tested, describe them. You will be asked to describe the specific procedures in a later section.

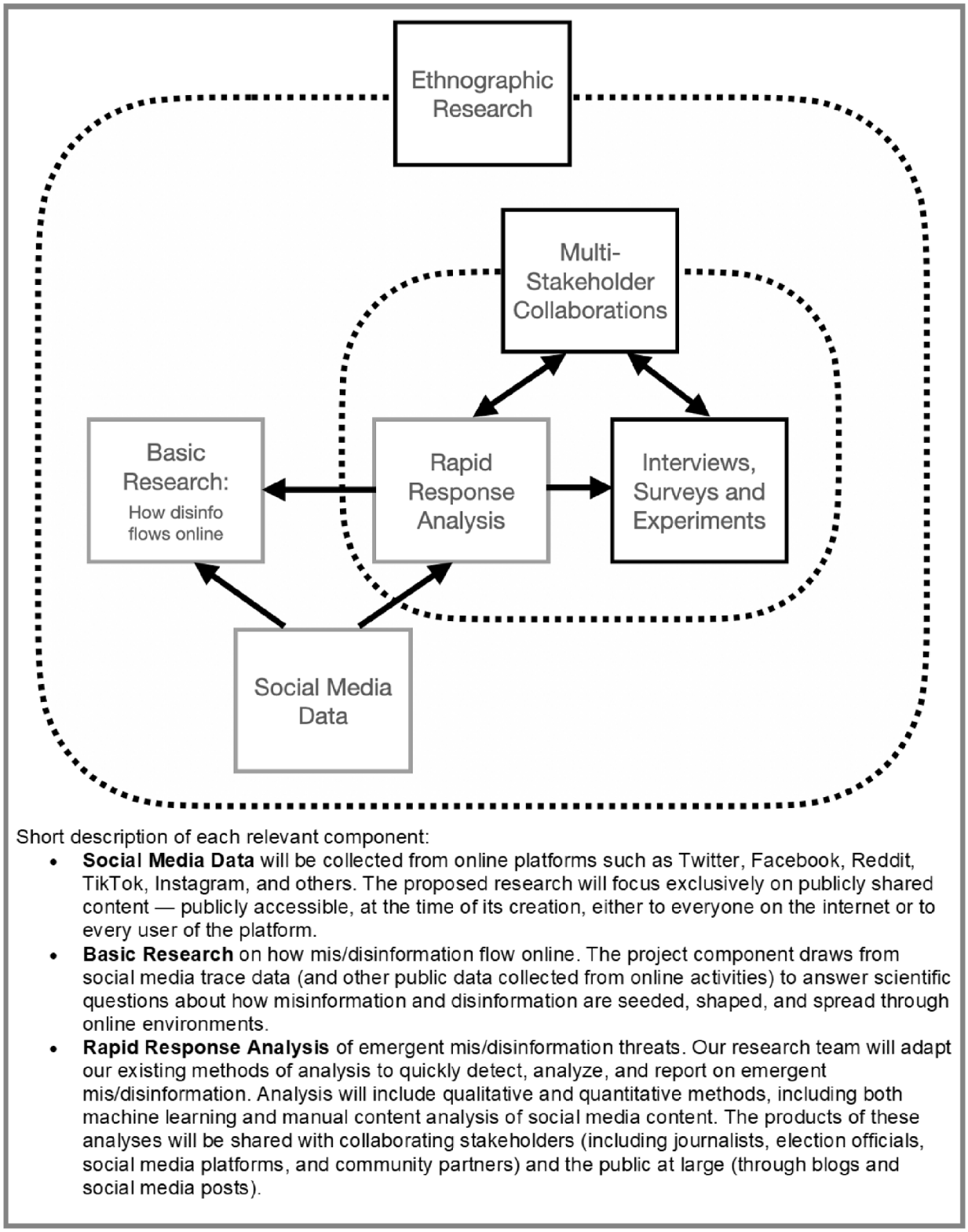
If this application involves the use of a HUD "humanitarian" device: describe whether the use is for "on-label" clinical patient care, "off-label" clinical patient care, and/or research (collecting safety and/or effectiveness data).

This research is part of a larger research project where we will conduct basic research as well as "rapid response" research on public social media data (and study the rapid response activities). **This IRB proposal is focused on the social media data collection and analysis.**

The larger project has integrated three objectives. This IRB directly relates to the first two.

1. **To enhance understandings of how mis- and disinformation spread online — especially in relation to elections and crisis events.**
2. **To develop, deploy, and evaluate methods for analyzing online misinformation for "rapid analysis" of emerging mis- and disinformation.**
3. To develop, deploy, and evaluate collaborative frameworks for working with diverse stakeholders (journalists, social media companies, government officials, community organizations) to quickly identify, analyze, and communicate about online mis- and disinformation.

The project has several distinct but interacting components, illustrated and defined below. The social media data feed into both the basic research and the rapid response analysis. These components in the blue boxes are covered in this proposal.



Short description of each relevant component:

- **Social Media Data** will be collected from online platforms such as Twitter, Facebook, Reddit, TikTok, Instagram, and others. The proposed research will focus exclusively on publicly shared content — publicly accessible, at the time of its creation, either to everyone on the internet or to every user of the platform.
- **Basic Research** on how mis/disinformation flow online. The project component draws from social media trace data (and other public data collected from online activities) to answer scientific questions about how misinformation and disinformation are seeded, shaped, and spread through online environments.
- **Rapid Response Analysis** of emergent mis/disinformation threats. Our research team will adapt our existing methods of analysis to quickly detect, analyze, and report on emergent mis/disinformation. Analysis will include qualitative and quantitative methods, including both machine learning and manual content analysis of social media content. The products of these analyses will be shared with collaborating stakeholders (including journalists, election officials, social media platforms, and community partners) and the public at large (through blogs and social media posts).

1.6 Study design. Provide a one-sentence description of the general study design and/or type of methodology.

Your answer will help HSD in assigning applications to reviewers and in managing workload. Examples: a longitudinal observational study; a double-blind, placebo-controlled randomized study; ethnographic interviews; web scraping from a convenience sample of blogs; medical record review; coordinating center for a multi-site study.

This IRB proposal focuses on mixed (qualitative, quantitative and visual) analysis of social media data and other data that is publicly available online.

1.7 Intent. Check all the descriptors that apply to your activity. You must place an "X" in at least one box.

This question is essential for ensuring that your application is correctly reviewed. Please read each option carefully.

	Descriptor
☐	1. Class project or other activity whose purpose is to provide an educational experience for the researcher (for example, to learn about the process or methods of doing research).
☐	2. Part of an institution, organization, or program's own internal operational monitoring.
☐	3. Improve the quality of service provided by a specific institution, organization, or program.
☒	4. Designed to expand the knowledge base of a scientific discipline or other scholarly field of study, and produce results that: • Are expected to be applicable to a larger population beyond the site of data collection or the specific subjects studied, or • Are intended to be used to develop, test, or support theories, principles, and statements of relationships, or to inform policy beyond the study.
☐	5. Focus directly on the specific individuals about whom the information or biospecimens are collected through oral history, journalism, biography, or historical scholarship activities, to provide an accurate and evidence-based portrayal of the individuals.
☐	6. A quality improvement or program improvement activity conducted to improve the implementation (delivery or quality) of an accepted practice, or to collect data about the implementation of the practice for clinical, practical, or administrative purposes. This does not include the evaluation of the efficacy of different accepted practices, or a comparison of their efficacy.
☐	7. Public health surveillance activities conducted, requested, or authorized by a public health authority for the sole purpose of identifying or investigating potential public health signals or timely awareness and priority setting during a situation that threatens public health.
☐	8. Preliminary, exploratory, or research development activities (such as pilot and feasibility studies, or reliability/validation testing of a questionnaire)
☐	9. Expanded access use of a drug or device not yet approved for this purpose
☐	10. Use of a Humanitarian Use Device
☐	11. Other. Explain:

1.8 Background, experience, and preliminary work. Answer this question **only** if the proposed activity has one or more of the following characteristics. The purpose of this question is to provide the IRB with information that is relevant to its risk/benefit analysis.

- Involves more than minimal risk (physical or non-physical)
- Is a clinical trial, or
- Involves having the subjects use a drug, biological, botanical, nutritional supplement, or medical device.

"Minimal risk" means that the probability and magnitude of harm or discomfort anticipated in the research are not greater than those ordinarily encountered in daily life or during the performance of routine physical or psychological examinations or tests.

a. Background. Provide the rationale and the scientific or scholarly background for the proposed activity, based on existing literature (or clinical knowledge). Describe the gaps in current knowledge that the project is intended to address.

This should be a plain language description. Do not provide scholarly citations. Limit your answer to less than one page, or refer to an attached document with background information that is no more than three pages long.

Addressing pervasive misinformation — especially intentional *disinformation* — is one of society's most pressing challenges. Disinformation affects human health (Zarocostas, 2020; Roozenbeek et al., 2020), planetary health (Oreskes & Conway, 2011; van der Linden et al., 2017), diplomacy (Rid, 2020; Goldman, 2016), elections (Faris et al., 2017; Bak-Coleman et al., 2020; Benkler et al., 2020) and collective decision-making more broadly (Starbird et al., 2019). Disinformation reduces our ability to respond to emerging threats and disasters. The COVID-19 pandemic and the recent 2020 U.S. elections provide evidence of the direct impact of disinformation; resistance to public health policies (Carrieri et al., 2019; Roozenbeek et al., 2020) and the U.S. Capitol riots on Jan. 6, 2021 (Reader, 2021) are notable examples. In other cases, effects are indirect and difficult to measure. Both indicate we need to better understand how disinformation is seeded, cultivated, and spread.

Disinformation's most consequential effects are the degradation of trust in the democratic process, degradation of trust in institutions, and degradation of trust in each other (Bradshaw & Howard, 2018). Disinformation is an attack on our collective ability to make sense of information and to build shared realities — the kind of common ground that a democratic society needs to stand upon to govern itself (Farrell & Shneier, 2018). Even the institution of science, which has maintained high levels of trust for decades, has begun to see declines among some parts of the population in the United States (West & Bergstrom, 2021; Iyengar & Massey, 2018; Gauchat, 2012).

Despite increased attention on the issue of disinformation, knowledge gaps exist. Researchers typically define disinformation as information intended to mislead, but in practice, both veracity and intention can be difficult to determine. The participatory and diffuse nature of disinformation (Starbird et al., 2019) makes it especially challenging to detect and address. We need a better understanding of what disinformation is and how it functions — and the proposed research seeks to enhance this understanding.

But even if we could consistently and accurately characterize and detect disinformation, can we do this fast enough in practice and in ways that mitigate the negative effects of disinformation rather than amplify them? How do we integrate real-time responses across diverse stakeholders, e.g., social media platforms, journalists, and governments? And how do we communicate about emergent disinformation campaigns in ways that are useful to these and other stakeholders, including the public at large? It is these questions that we hope to address with this research.

b. Experience and preliminary work. Briefly describe experience or preliminary work or data (if any) that you, your team, or your collaborators/co-investigators have that supports the feasibility and/or safety of this study.

It is not necessary to summarize all discussion that has led to the development of the study protocol. The IRB is interested only in short summaries about experiences or preliminary work that suggest the study is feasible and that risks are reasonable relative to the benefits. Examples: Your team has already conducted a Phase 1 study of an experimental drug which supports the Phase 2 study being proposed in this application; your team has already done a small pilot study showing that the reading skills intervention described in this application is feasible in an after-school program with classroom aides; your team has experience with the type of surgery that is required to implant the study device; the study coordinator is experienced in working with subjects who have significant cognitive impairment.

Researchers on our team have extensive experience applying mixed-methods to the analysis of social media data to better understand how mis- and disinformation take root and spread across the internet (e.g. 51 et al., 2016; 51 et al., 2018, 51 et al., 2018, Starbird et al., 2018; Starbird et al., 2019). We have established the infrastructure to collect, store, analyze, and (in cases where it aligns with terms of service) share online data — e.g. public data from social media platforms — for research.

We have previously organized and participated in "rapid response" efforts to address emergent disinformation. In Fall 2020, our two research teams (at UW and Stanford) collaborated with two external analysis teams and a variety of stakeholders — including journalists, social media platforms, government officials, and community organizations — as part of the "Election Integrity Partnership" to conduct rapid analysis of online misinformation related to the election. Findings from these research efforts were quickly communicated with partners and the public at large — through articles, blogs, and social media posts (e.g. Browning, 2020; Starbird et al., 2020; Tollefson, 2021). A final report (Center for an Informed Public et al., 2020) documents the extent of these activities.

51 and Kate Starbird. (2018). Acting the Part: Examining Information Operations within #BlackLivesMatter Discourse. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 20.

Kellen Browning. (November 3, 2020). After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows. *New York Times*. Available at: https://www.nytimes.com/2020/11/03/technology/after-twitter-labels-trumps-tweet-about-pennsylvania-its-spread-slows.html

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election*. Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

Kate Starbird, Michael Caulfield, Renee DiResta, Jevin West, Emma Spiro, 51, Rachel Moran, and 51 October 26, 2020. "Uncertainty and misinformation: What to expect on election night and days after." Blog posted by *Election Integrity Partnership*. https://www.eipartnership.net/news/what-to-expect

Kate Starbird, 51 (2019). Disinformation as Collaborative Work: Surfacing the Participatory Nature of Strategic Information Operations. *PACMHCI. 3, Computer-Supported Cooperative Work (CSCW 2019)*. Article 127.

51 and Kate Starbird. (2018). Assembling Strategic Narratives: Information Operations as Collaborative Work within an Online Community. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 183.

Kate Starbird, [51] and Daniel Scarnecchia. (2018). Ecosystem or Echo-System? Exploring Content Sharing across Alternative Media Domains. Presented at *12th International AAAI Conference on Web and Social Media (ICWSM 2018)*, Stanford, CA, (pp. 365-374).

[51] Kate Starbird and Emma Spiro. (2016). Rumors at the Speed of Light? Modeling the Rate of Rumor Transmission during Crisis. *Hawaii International Conference on System Sciences (HICSS 2016)*. (pp. 1969-1978).

Jeff Tollefson. "Tracking QAnon: how Trump turned conspiracy-theory research upside down." *Nature Communications*. February 4, 2021. https://www.nature.com/articles/d41586-021-00257-y

1.9 Supplements. Check all boxes that apply, to identify relevant Supplements that should be completed and uploaded to ***Zipline***.

This section is here instead of at the end of the form to reduce the risk of duplicating information in this IRB Protocol form that you will need to provide in these Supplements.

Check all That Apply	Type of Research	Supplement Name
☐	**Department of Defense** The research involves Department of Defense funding, facilities, data, or personnel.	SUPPLEMENT Department of Defense
☐	**Department of Energy** The research involves Department of Energy funding, facilities, data, or personnel.	SUPPLEMENT Department of Energy
☐	**Drug, biologic, botanical, supplement** Procedures involve the use of any drug, biologic, botanical or supplement, even if the item is not the focus of the proposed research	SUPPLEMENT Drugs
☐	**Emergency exception to informed consent** Research that requires this special consent waiver for research involving more than minimal risk	SUPPLEMENT Exception from Informed Consent for Emergency Research (EFIC)
☐	**Genomic data sharing** Genomic data are being collected and will be deposited in an external database (such as the NIH dbGaP database) for sharing with other researchers, and the UW is being asked to provide the required certification or to ensure that the consent forms can be certified	SUPPLEMENT Genomic Data Sharing
☐	**Medical device** Procedures involve the use of any medical device, even if the device is not the focus of the proposed research, except when the device is FDA-approved and is being used through a clinical facility in the manner for which it is approved	SUPPLEMENT Devices
☐	**Multi-site or collaborative study** The UW IRB is being asked to review on behalf of one or more non-UW institutions in a multi-site or collaborative study.	SUPPLEMENT Multi-site or Collaborative Research

☐	**Non-UW Individual Investigators** The UW IRB is being asked to review on behalf of one or more non-UW individuals who are not affiliated with another organization for the purpose of the research.	SUPPLEMENT Non-UW Individual Investigators
☐	**Other REDCap Installation Attestation for Electronic Consent** The research will use a non-UW installation of REDCap for conducting and/or documenting informed consent.	SUPPLEMENT Other REDCap Installation
☒	None of the above	

1.10 **Confirm by checking the box below** that you will comply with the COVID requirements described on HSD's COVID webpage, which are based on the location of the in-person study procedures and the vaccination status of study team members and study participants.

Review the HSD website for current guidelines about which in-person research activities are allowable.

☒ **Confirmed**

2 PARTICIPANTS

2.1 **Participants**. Describe the general characteristics of the subject populations or groups, including age range, gender, health status, and any other relevant characteristics.

This proposal has several different components that have different kinds of participants.

For **Basic Research and "Rapid Response" Research** on how mis- and disinformation flow online, we will conduct mixed (quantitative and qualitative) analysis on social media data collected from multiple platforms, including Twitter, Facebook, Instagram, YouTube, Reddit, TikTok, and others.

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories.

We will limit our analysis to social media data that was shared through public accounts — data that was publicly visible (to any/all users of those platforms) at the time of collection. "Participants" will be social media users who shared or engaged with social media content captured by our collections — e.g. accounts that shared tweets with specific keywords related to elections, crises and breaking news events or specific disinformation campaigns. These can include people from all over the world and people of any age. Due to the nature of our collections, we do not foresee children comprising a large portion of participants captured in our collections. However, there will likely be some posts and/or engagements from children (13-17) included in these collections.

Platforms of study include, but are not limited to: Twitter, Facebook (public posts, pages and groups), Instagram (public pages), YouTube, Reddit, TikTok, Parler, Amazon.

2.2 Inclusion and exclusion criteria.

a. Inclusion criteria. Describe the specific criteria that will be used to decide who will be included in the research from among interested or potential subjects. Define any technical terms in lay language.

"Participants" in the social media data analysis will be people who operate accounts that shared content related to one of the events, misinformation incidents, or disinformation campaigns we are studying.

b. Exclusion criteria. Describe the specific criteria that will be used to decide who will be excluded from the research from subjects who meet the inclusion criteria listed above. Define any technical terms in lay language.

There are no exclusion criteria.

2.3 Prisoners. IRB approval is required in order to include prisoners in research, even when prisoners are not an intended target population.

Is the research likely to have subjects who become prisoners while participating in the study?

For example, a longitudinal study of youth with drug problems is likely to have subjects who will be prisoners at some point during the study.

[X] **No**
[ ] **Yes** → If yes, if a subject becomes a prisoner while participating in the study, will any study procedures and/or data collection related to the subject be continued while the subject is a prisoner?

[ ] **No**
[ ] **Yes** → If yes, describe the procedures and/or data collection that will continue with prisoner subjects

2.4 Will the proposed research recruit or obtain data from individuals that are known to be prisoners?

*For records reviews: if the records do not indicate prisoner status and prisoners are not a target population, select "No". See the **GUIDANCE Prisoners** for the definition of "prisoner", which is not necessarily tied to the type of facility in which a person is residing.*

[X] **No**
[ ] **Yes** → If yes, answer the following questions (i – iv).

i. Describe the type of prisoners, and their location(s):

ii. One concern about prisoner research is whether the effect of participation on prisoners' general living conditions, medical care, quality of food, amenities, and/or opportunity for earnings in prison will be so great that it will make it difficult for prisoners to adequately consider the research risks. How will the chances of this be reduced?

iii. Describe what will be done to make sure that (a) recruitment and subject selection procedures will be fair to all eligible prisoners and (b) prison authorities or other prisoners will not be able to arbitrarily prevent or require particular prisoners from participating.

iv. If the research is funded by one of these federal departments and agencies (Health & Human Services; Energy; Defense; Homeland Security; CIA; Social Security Administration), and/or will involve prisoners in federal facilities or in state/local facilities outside of Washington State: check the box below to provide assurance that study team members will (a) not encourage or facilitate the use of a prisoner's participation in the research to influence parole or pardon decisions, and (b) clearly inform each prisoner in advance (for example, in a consent form) that participation in the research will have no effect on his or her parole or pardon.

☐ **Confirmed**

2.5 **Protected populations**. IRB approval is required for the use of the subject populations listed here. Check the boxes for any of these populations that will be purposefully included. (In other words, being a part of the population is an inclusion criterion for the study.)

The WORKSHEETS describe the criteria for approval but do not need to be completed and should not be submitted.

Population	Worksheet
☐ Fetuses in utero	WORKSHEET Pregnant Women
☐ Neonates of uncertain viability	WORKSHEET Neonates
☐ Non-viable neonates	WORKSHEET Neonates
☐ Pregnant women	WORKSHEET Pregnant Women

a. If you check any of the boxes above, use this space to provide any information that may be relevant for the IRB to consider.

2.6 **Native Americans or non-U.S. indigenous populations.** Will Native American or non-U.S. indigenous populations be actively recruited through a tribe, tribe-focused organization, or similar community-based organization?

Indigenous people are defined in international or national legislation as having a set of specific rights based on their historical ties to a particular territory and their cultural or historical distinctiveness from other populations that are often politically dominant.

Examples: a reservation school or health clinic; recruiting during a tribal community gathering

☒ **No**

☐ **Yes** → If yes, name the tribe, tribal-focused organization, or similar community-based organization. The UW IRB expects that tribal/indigenous approval will be obtained before beginning the research. This may or may not involve approval from a tribal IRB. The study team and any collaborators/investigators are also responsible for identifying any tribal laws that may affect the research.

2.7 Third party subjects. Will the research collect private identifiable information about *other individuals* from the study subjects? Common examples include: collecting medical history information or contact information about family members, friends, co-workers.

"Identifiable" means any direct or indirect identifier that, alone or in combination, would allow you or another member of the research team to readily identify the person. For example, suppose that the research is about immigration history. If subjects are asked questions about their grandparents but are not asked for names or other information that would allow easy identification of the grandparents, then private identifiable information is not being collected about the grandparents and the grandparents are not subjects.

[X] **No**
[ ] **Yes** → If yes, these individuals are considered human subjects in the study. Describe them and what data will be collected about them.

2.8 Number of subjects. Is it possible to predict or describe the maximum number of subjects (or subject units) needed to complete the study, for each subject group?

Subject units mean units within a group. For most research studies, a group will consist of individuals. However, the unit of interest in some research is not the individual. Examples:

- *Dyads such as caregiver-and-Alzheimer's patient, or parent and child*
- *Families*
- *Other units, such as student-parent-teacher*

Subject group means categories of subjects that are meaningful for the specific study. Some research has only one subject group – for example, all UW students taking Introductory Psychology. Some common ways in which subjects are grouped include:

- *By intervention – for example, an intervention group and a control group.*
- *By subject population or setting – for example, urban versus rural families*
- *By age – for example, children who are 6, 10, or 14 years old.*

The IRB reviews the number of subjects in the context of risks and benefits. Unless otherwise specified, if the IRB determines that the research involves no more than minimal risk: there are no restrictions on the total number of subjects that may be enrolled. If the research involves more than minimal risk: The number of enrolled subjects must be limited to the number described in this application. If it is necessary later to increase the number of subjects, submit a Modification. Exceeding the IRB-approved number (over-enrollment) will be considered non-compliance.

[X] **No** → If no, provide the rationale in the box below. Also, provide any other available information about the scope/size of the research. You do not need to complete the table.

Example: It may not be possible to predict the number of subjects who will complete an online survey advertised through Craigslist, but you can state that the survey will be posted for two weeks and the number who respond is the number who will be in the study.

We will collect social media data during many different, high-visibility events (such as crisis events and elections) and data related to specific misinformation incidents and disinformation campaigns between 2021 and 2025. These data potentially include billions of posts, from millions of different users.

[ ] **Yes** → If yes, for each subject group, use the table below to provide the estimate of the maximum desired number of individuals (or other subject unit, such as families) who will complete the research.

Group name/description	Maximum desired number of individuals (or other subject unit, such as families) who will complete the research

	Provide numbers for the site(s) reviewed by the UW IRB and for the study-wide total number; example: 20/100

3 NON-UW RESEARCH SETTING

Complete this section only if UW investigators and people named in the SUPPLEMENT: Non-UW Individual Investigators will conduct research procedures outside of UW and Harborview

3.1 Reason for locations. Describe the reason(s) for choosing the locations.

This is especially important when the research will occur in locations or with populations that may be vulnerable to exploitation. One of the three ethical principles the IRB must consider is justice: ensuring that reasonable, non-exploitative, and well-considered procedures are administered fairly, with a fair distribution of costs and potential benefits.

We will collect our data using infrastructure housed on UW campus (primarily at the Center for an Informed Public). We will conduct our analyses using that same infrastructure housed on the UW campus. With remote work, some researchers will be using machines in their own homes to access our UW infrastructure as well as directly access content on the social media platforms and through tools provided by those platforms (e.g. Crowdtangle). Our collections will be focused on elections, crises and other breaking news events, and public health concerns (e.g. vaccine hesitancy). The data we collect and analyze may be shared by people anywhere in the world.

3.2 Local context. Culturally appropriate procedures and an understanding of local context are an important part of protecting subjects. Describe any site-specific cultural issues, customs, beliefs, or values that may affect the research, how it is conducted, or how consent is obtained or documented.

Examples: It would be culturally inappropriate in some international settings for a woman to be directly contacted by a male researcher; instead, the researcher may need to ask a male family member for permission before the woman can be approached. It may be appropriate to obtain permission from community leaders prior to obtaining consent from individual members of a group. In some distinct cultural groups, signing forms may not be the norm.

This federal site maintains an international list of human research standards and requirements:
http://www.hhs.gov/ohrp/international/index.html

N/A

3.3 Location-specific laws. Describe any local laws that may affect the research (especially the research design and consent procedures). The most common examples are laws about:

- **Specimens** – for example, some countries will not allow biospecimens to be taken out of the country.
- **Age of consent** – laws about when an individual is considered old enough to be able to provide consent vary across states, and across countries.
- **Legally authorized representative** – laws about who can serve as a legally authorized representative (and who has priority when more than one person is available) vary across states and countries.
- **Use of healthcare records** – many states (including Washington State) have laws that are similar to the federal HIPAA law but that have additional requirements.

N/A

3.4 Location-specific administrative or ethical requirements. Describe local administrative or ethical requirements that affect the research.

Example: A school district may require researchers to obtain permission from the head district office as well as school principals before approaching teachers or students; a factory in China may allow researchers to interview factory workers but not allow the workers to be paid for their participation.

N/A

3.5 If the PI is a student: Does the research involve traveling outside of the US?

[X] **No**

[ ] **Yes** → If yes, confirm by checking the box that (1) you will register with the UW Office of Global Affairs before traveling; (2) you will notify your advisor when the registration is complete; and (3) you will request a UW Travel Waiver if the research involves travel to the list of countries requiring a UW Travel Waiver.

[ ] **Confirmed**

4 RECRUITING and SCREENING PARTICIPANTS

4.1 Recruiting and Screening. Describe how subjects will be identified, recruited, and screened. Include information about: how, when, where, and in what setting. Identify who (by position or role, not name) will approach and recruit subjects, and who will screen them for eligibility.

Note: Per UW Medicine policy, the UW Medicine eCare/MyChart system may not be used for research recruitment purposes.

We will collect data about elections, crises and other breaking news events, as well as specific misinformation incidents (when a piece of misinformation goes viral) and disinformation campaigns. Our collections will be based on 1) specific search terms; 2) influential accounts; 3) specific channels, groups or threads.

1) Specific search terms. For example, during the 2022 U.S. midterm elections, we will collect data using terms like election, vote, voter, voting, midterm, fraud and on specific candidate and location names.
2) Influential accounts. We may collect data containing content from and engagements with influential accounts — including high visibility accounts with many followers; verified accounts; accounts of public officials or organizations (like candidates and campaigns).
3) Groups. We may identify specific channels, groups, or #hashtags to collect relevant conversations about

4) the events and phenomena we are interested in — for example, YouTube channels that repeatedly post disinformation, a public Facebook group for a local election, or a "community" on Reddit where conspiracy theories are often discussed.

4.2 Recruitment materials.

a. What materials (if any) will be used to recruit and screen subjects?

Examples: talking points for phone or in-person conversations; video or audio presentations; websites; social media messages; written materials such as letters, flyers for posting, brochures, or printed advertisements; questionnaires filled out by potential subjects.

None. There are no recruiting or screening processes.

b. Upload descriptions of each type of material (or the materials themselves) to ***Zipline***. If letters or emails will be sent to any subjects, these should include a statement about how the subject's name and contact information were obtained. No sensitive information about the person (such as a diagnosis of a medical condition) should be included in the letter. The text of these letters and emails must be uploaded to ***Zipline*** (i.e., a description will not suffice).

HSD encourages researchers to consider uploading descriptions of most recruitment and screening materials instead of the materials themselves. The goal is to provide the researchers with the flexibility to change some information on the materials without submitting a Modification for IRB approval of the changes. Examples:

- *Provide a list of talking points that will be used for phone or in-person conversations instead of a script.*
- *For the description of a flyer, include the information that it will provide the study phone number and the name of a study contact person (without providing the actual phone number or name). This means that a Modification would not be necessary if/when the study phone number or contact person changes. Also, instead of listing the inclusion/exclusion criteria, the description below might state that the flyer will list one or a few of the major inclusion/exclusion criteria.*
- *For the description of a video or a website, include a description of the possible visual elements and a list of the content (e.g., study phone number; study contact person; top three inclusion/exclusion criteria; payment of $50; study name; UW researcher).*

4.3 Relationship with participant population. Do any members of the study team have an existing relationship with the study population(s)?

Examples: a study team member may have a dual role with the study population (for example, being their clinical care provider, teacher, laboratory directory or tribal leader in addition to recruiting them for his/her research).

[X] **No**
[ ] **Yes** → If yes, describe the nature of the relationship.

4.4 Payment to participants. The IRB must evaluate subject payment for the possibility that it will unduly influence subjects to participate. Refer to GUIDANCE Subject Payment when designing subject payment plans. Provide the following information about your plans for paying research subjects in the text box below or note that the information can be found in the consent form.

- The total amount/value of the payment
- Schedule/timing of the payment [i.e., when will subjects receive the payment(s)]
- Purpose of the payment [e.g., reimbursement, compensation, incentive]
- Whether payment will be "pro-rated" so that participants who are unable to complete the research may still receive some part of the payment

The IRB expects the consent process or study information provided to the subjects to include all of the above-listed information about payment, including the number and amount of payments, and especially when subjects can expect to receive payment.

One of the most frequent complaints received by HSD is from subjects who expected to receive cash or a check on the day that they completed a study and who were angry or disappointed when payment took 6-8 weeks to reach them.

Researchers should review current UW Financial Management requirements about when Social Security Numbers must be collected, and when research payment must be reported to the UW Tax Office and the IRS: https://finance.uw.edu/ps/how-pay/research-subjects.

4.5 Non-monetary compensation. Describe any non-monetary compensation that will be provided. Example: extra credit for students; a toy for a child. If class credit will be offered to students, there must be an alternate way for the students to earn the extra credit without participating in the research.

N/A

4.6 Will data or specimens be accessed or obtained for recruiting and screening procedures prior to enrollment?

Examples: names and contact information; the information gathered from records that were screened; results of screening questionnaires or screening blood tests; Protected Health Information (PHI) from screening medical records to identify possible subjects.

[X] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the data and/or specimens (including PHI) and whether it will be retained as part of the study data.

4.7 Consent for recruiting and screening. Will consent be obtained for any of the recruiting and screening procedures? (Section 8: Consent of Adults asks about consent for the main study procedures).

"Consent" includes: consent from individuals for their own participation; parental permission; assent from children; consent from a legally authorized representative for adult individuals who are unable to provide consent.

Examples:

- *For a study in which names and contact information will be obtained from a registry: the registry should have consent from the registry participants to release their names and contact information to researchers.*
- *For a study in which possible subjects are identified by screening records: there will be no consent process.*
- *For a study in which individuals respond to an announcement and call into a study phone line: the study team person talking to the individual may obtain non-written consent to ask eligibility questions over the phone.*

[ ] **No** → If no, skip the rest of this section; go to question **5.1**.

[ ] **Yes** → If yes, describe the consent process.

a. Documentation of consent. Will a written or verifiable electronic signature from the subject on a consent form be used to document consent for the **recruiting and screening procedures**?

☐ **No** → If no, describe the information that will be provided during the consent process and for which procedures.

☐ **Yes, written** → If yes, and a **written** signature will be used to document consent:
- Upload the consent form to ***Zipline***.

☐ **Yes, electronic** → If yes, and an **electronic** signature will be used to document consent:
- Upload the consent form to ***Zipline***.
- **If the eSignature process or method for recruiting and screening is different than for the main study procedures**, use the questions about electronic consent in Section 8.3 and 8.4 to differentiate between recruiting/screening and main study electronic consent. **If electronic consent will be used for recruiting/screening but not main study consent**, use 8.3 and 8.4 to describe eConsent and note that it is only for recruiting/screening.

5 PROCEDURES

5.1 Study procedures. Using lay language, provide a complete description of the study procedures, including the sequence, intervention or manipulation (if any), drug dosing information (if any), blood volumes and frequency of draws (if any), use of records, time required, and setting/location. If it is available: Upload a study flow sheet or table to ***Zipline***.

For studies comparing standards of care: It is important to accurately identify the research procedures. See UW IRB ***POLICY Risks of Harm from Standard Care*** *and the draft guidance from the federal Office of Human Research Protections,* ***"Guidance on Disclosing Reasonably Foreseeable Risks in Research Evaluating Standards of Care";*** *October 20, 2014. Information about pediatric blood volume and frequency of draws that would qualify for expedited review can be found in this* **reference table** *on the Seattle Children's IRB website.*

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team, using individual UW researchers' machines and shared infrastructure at the UW Center for an Informed Public, through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API). This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by the mediating entity (e.g. Crowdtangle).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories. This data will either be A) downloaded, stored, and analyzed on infrastructure at the UW Center for an Informed Public, or B) analyzed remotely using infrastructure operated by collaborating partner.

We will analyze these data as individual researchers and within collaborative teams using a mixture of methods — including qualitative, quantitative, and visual methods.

5.2 Recordings. Does the research involve creating audio or video recordings?

- [X] **No** → If no, go to question **5.3.**
- [ ] **Yes** → If yes, verify that you have described what will be recorded in 5.1 and answer question **a**.

a. Before recording, will consent for being recorded be obtained from subjects and any other individuals who may be recorded?

- [ ] **No** → If no, email hsdinfo@uw.edu before submitting this application in Zipline. In the email, include a brief description of the research and a note that individuals will be recorded without their advance consent.
- [ ] **Yes**

5.3 MRI scans. Will any subjects have a Magnetic Resonance Imaging (MRI) scan as part of the study procedures?

This means scans that are performed solely for research purposes or clinical scans that are modified for research purposes (for example, using a gadolinium-based contrast agent when it is not required for clinical reasons).

- [X] **No** → If no, go to question **5.4**.
- [ ] **Yes** → If yes, answer questions **a** through **c**.

a. Describe the MRI scan(s). Specifically:

- What is the purpose of the scan(s)? *Examples: obtain research data; safety assessment associated with a research procedure.*
- Which subjects will receive an MRI scan?
- Describe the minimum and maximum number of scans per subject, and over what time period the scans will occur. *For example: all subjects will undergo two MRI scans, six months apart.*

b. MRI facility. At which facility(ies) will the MRI scans occur? Check all that apply.

- [ ] UWMC Radiology/Imaging Services (the UWMC clinical facility)
- [ ] DISC Diagnostic Imaging Sciences Center (UWMC research facility)
- [ ] CHN Center for Human Neuroscience MRI Center (Arts & Sciences research facility)
- [ ] BMIC Biomolecular Imaging Center (South Lake Union research facility)
- [ ] Harborview Radiology/Imaging Services (the Harborview clinical facility)
- [ ] SCCA Imaging Services
- [ ] Northwest Diagnostic Imaging
- [ ] Other: identify in the text box below:

c. Personnel. For MRI scans that will be conducted at the DISC, CHN or BMIC research facilities: Indicate who will be responsible for operating the MRI scanner by checking all that apply.

- [ ] MRI technician who is formally qualified
- [ ] Researcher who has completed scanner operator training provided by a qualified MRI operator

5.4 Data variables. Describe the specific data that will be obtained (including a description of the most sensitive items). Alternatively, a list of the data variables may be uploaded to ***Zipline***.

Only public data, including public social media posts and publicly available information on user profiles will be obtained. Metadata associated with this content will also be archived. This includes for example the number of social relationships (e.g. "followers" or "friends") that an account has, the self-reported location of the account, and links to external media that were included in the post.

5.5 Data sources. For all types of data that will be accessed or collected for this research: Identify whether the data are being obtained from the subjects (or subjects' specimens) or whether they are being obtained from some other source (and identify the source).

If you have already provided this information in Question 5.1, you do not need to repeat the information here.

See 5.1

5.6 Identifiability of data and specimens. Answer these questions carefully and completely. This will allow HSD to accurately determine the type of review that is required and the relevant compliance requirements. Review the following definitions before answering the questions:

Access *means to view or perceive data, but not to possess or record it. See, in contrast, the definition of "obtain".*
Identifiable *means that the identity of an individual is or may be readily (1) ascertained by the researcher or any other member of the study team from specific data variables or from a combination of data variables, or (2) associated with the information.*
Direct identifiers *are direct links between a subject and data/specimens. Examples include (but are not limited to): name, date of birth, medical record number, email or IP address, pathology or surgery accession number, student number, or a collection of data that is (when taken together) identifiable.*
Indirect identifiers *are information that links between direct identifiers and data/specimens. Examples: a subject code or pseudonym.*
Key *refers to a single place where direct identifiers and indirect identifiers are linked together so that, for example, coded data can be identified as relating to a specific person. Example: a master list that contains the data code and the identifiers linked to the codes.*
Obtain *means to possess or record in any fashion (writing, electronic document, video, email, voice recording, etc.) for research purposes and to retain for any length of time. This is different from* ***accessing****, which means to view or perceive data.*

a. Will you or any members of your team have access to any direct or indirect identifiers?

[X] **Yes** → If yes, describe which identifiers and for which data/specimens.

We will collect social media posts and account information for each participant. Some social media accounts are anonymous and other contain pieces of identifying information such as when people include their real names. Following the Terms of Service for these platforms, we will collect, store and analyze the data and metadata a user provides for their account.

[ ] **No** → If no, select the reason(s) why you (and all members of your team) will not have access to direct or indirect identifiers.

- [ ] There will be no identifiers.
- [ ] Identifiers or the key have been (or will have been) destroyed before access.
- [ ] There is an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) to study team members under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

b. Will you or any study team members obtain any direct or indirect identifiers?

☒ **Yes** → If yes, describe which identifiers and for which data/specimens.

We have and will continue to collect social media posts and account information for each participant. We will obtain only information which the user provides for their account.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not obtain direct or indirect identifiers.

☐ There will be no identifiers.

☐ Identifiers or the key have been (or will have been) destroyed before access.

☐ There will be an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

c. If any identifiers will be obtained, indicate how the identifiers will be stored (and for which data). NOTE: Do not describe the data security plan here – that information is requested in section 9.6.

☒ Identifiers will be stored with the data. Describe the data to which this applies:

Following Terms of Service for the platforms that are sources of data for the project, we will collect and store information together with the content of social media posts.

☐ Identifiers and study data will be stored separately but a link will be maintained between the identifiers and the study data (for example, through the use of a code). Describe the data to which this applies:

☐ Identifiers and study data will be stored separately, with no link between the identifiers and the study data. Describe the data to which this applies:

d. Research collaboration. Will individuals who provide coded information or specimens for the research also collaborate on other activities for this research? If yes, identify the activities and provide the name of the collaborator's institution/organization.

Examples include but are not limited to: (1) study, interpretation, or analysis of the data that results from the coded information or specimens; and (2) authorship on presentations or manuscripts related to this work.

No.

5.7 Protected Health Information (PHI). Will participants' identifiable PHI be accessed, obtained, used, or disclosed for any reason (for example, to identify or screen potential subjects, to obtain study data or specimens, for study follow-up) that does not involve the creation or obtaining of a Limited Data Set?

PHI is individually identifiable healthcare record information or clinical specimens from an organization considered a "covered entity" by federal HIPAA regulations, in any form or media, whether electronic, paper, or oral. ***You must answer yes to this question if the research involves identifiable health care records (e.g., medical, dental, pharmacy, nursing, billing, etc.), identifiable healthcare information from a clinical department repository, or observations or recordings of clinical interactions.***

For information about what constitutes the UW Covered Entity, see UW Medicine Compliance Patient Information Privacy Policy 101 and diagram of the healthcare components.

[X] **No** → If no, skip the rest of this question; go to question **5.8**.

[ ] **Yes** → If yes, answer all of the questions below.

a. Describe the PHI and the reason for using it. *Be specific. For example, will any "free text" fields (such as physician notes) be accessed, obtained, or used?*

b. Is any of the PHI located in Washington State?

[ ] **No**
[ ] **Yes**

c. Describe the pathway of how the PHI will be accessed or obtained, starting with the source/location and then describing the system/path/mechanism by which it will be identified, accessed, and copied for the research. *Be specific. For example: directly view records; search through a department's clinical database; submit a request to Leaf.*

d. For which PHI will subjects provide HIPAA authorization before the PHI is accessed, obtained and/or used?

Confirm by checking the box that the UW Medicine HIPAA Authorization form maintained on the HSD website will be used to access, obtain, use, or disclose any UW Medicine PHI.

[ ] **Confirmed**

e. Will you obtain any HIPAA authorizations electronically (i.e., e-signature)?

[ ] **No**
[ ] **Yes**

If 'Yes', confirm by checking the box that you have read and understand the 'Special Considerations' section of the **GUIDANCE Electronic Informed Consent** for

information regarding the use of electronic signatures and HIPAA authorizations.

☐ **Confirmed**

f. For which PHI will HIPAA authorization NOT be obtained from the subjects?

Provide the following assurances by checking the boxes.

☐ The minimum necessary amount of PHI to accomplish the purposes described in this application will be accessed, obtained and/or used.

☐ The PHI will not be reused or disclosed to any other person or entity, except as required by law, for authorized oversight of the research study, or for other research for which the use or disclosure of PHI would be permitted.

☐ The HIPAA "accounting for disclosures" requirement will be fulfilled, if applicable. See UW Medicine Compliance Policy #104.

☐ There will be reasonable safeguards to protect against identifying, directly or indirectly, any patient in any report of the research.

5.8 Genomic data sharing. Will the research obtain or generate genomic data?

☒ **No**
☐ **Yes** → If yes, answer the question below.

a. Will genomic data from this research be sent to a national database (for example, NIH's dbGaP database)?

☐ **No**
☐ **Yes** → If yes, complete the **SUPPLEMENT Genomic Data Sharing** and upload it to ***Zipline***.

5.9 Whole genome sequencing. For research involving biospecimens: Will the research include whole genome sequencing?

Whole genome sequencing is sequencing of a human germline or somatic specimen with the intent to generate the genome or exome sequence of that specimen.

☐ **No**
☐ **Yes**

5.10 Possible secondary use or sharing of information, specimens, or subject contact information. Is it likely that the obtained or collected information, specimens, or subject contact information will be used for any of the following:

- Future research not described in this application (in other words, secondary research)
- Submission to a repository, registry, or database managed by the study team, colleagues, or others for research purposes
- Sharing with others for their own research

Please consider the broadest possible future plans and whether consent will be obtained now from the subjects for future sharing or research uses (which it may not be possible to describe in detail at this time). Answer **YES** even if future sharing or uses will use de-identified information or specimens. Answer **NO** if sharing is unlikely or if the only sharing will be through the NIH Genomic Data Sharing described in question 5.8.

Many federal grants and contracts now require data or specimen sharing as a condition of funding, and many journals require data sharing as a condition of publication. "Sharing" may include (for example): informal arrangements to share banked data/specimens with other investigators; establishing a repository that will formally share with other researchers through written agreements; or sending data/specimens to a third party repository/archive/entity such as the Social Science Open Access Repository (SSOAR), or the UCLA Ethnomusicology Archive.

☐ **No**
☐ **Yes** → If yes, answer all of the questions below.

a. Describe what will be stored for future use, including whether any direct or indirect (e.g., subject codes) identifiers will be stored.

b. Describe what will be shared with other researchers or with a repository/database/registry, including whether direct identifiers will be shared and (for specimens) what data will be released with the specimens.

c. Who will oversee and/or manage the sharing?

d. Describe the possible future uses, including limitations or restrictions (if any) on future uses or users. As stated above, consider the broadest possible uses.
Examples: data will be used only for cardiovascular research; data will not be used for research on population origins.

e. Consent. Will consent be obtained now from subjects for the secondary use, banking and/or future sharing?

☐ **No**
☐ **Yes** → If yes, be sure to include the information about this consent process in the consent form (if there is one) and in the answers to the consent questions in Section 8.

f. Withdrawal. Will subjects be able to withdraw their data/specimens from secondary use, banking or sharing?

☐ **No**
☐ **Yes** → If yes, describe how, and whether there are any limitations on withdrawal.

Example: data can be withdrawn from the repository but cannot be retrieved after they are released.

g. Agreements for sharing or release. Confirm by checking the box that the sharing or release will comply with UW (and, if applicable, UW Medicine) policies that require a formal agreement with the recipient for release of data or specimens to individuals or entities other than federal databases.

Data Use Agreements or Gatekeeping forms are used for data; Material Transfer Agreements are used for specimens (or specimens plus data). Do not attach any template agreement forms; the IRB neither reviews nor approves them

☐ **Confirmed**

5.11 Communication with subjects during the study. Describe the types of communication (if any) the research team will have with already-enrolled subjects during the study. Provide a description instead of the actual materials themselves.

Examples: email, texts, phone, or letter reminders about appointments or about returning study materials such as a questionnaire; requests to confirm contact information.

5.12 Future contact with subjects. Is there a plan to retain any contact information for subjects so that they can be contacted in the future?

☐ **No**
☐ **Yes** → If yes, describe the purpose of the future contact, and whether use of the contact information will be limited to the study team; if not, describe who else could be provided with the contact information. Describe the criteria for approving requests for the information.

Examples: inform subjects about other studies; ask subjects for additional information or medical record access that is not currently part of the study proposed in this application; obtain another sample.

5.13 Alternatives to participation. Are there any alternative procedures or treatments that might be advantageous to the subjects?

If there are no alternative procedures or treatments, select "No". Examples of advantageous alternatives: earning extra class credit in some time-equivalent way other than research participation; obtaining supportive care or a standard clinical treatment from a health care provider instead of participating in research with an experimental drug.

☐ **No**
☐ **Yes** → If yes, describe the alternatives.

5.14 Upload to *Zipline* all data collection forms (if any) that will be directly used by or with the subjects, and any scripts/talking points that will be used to collect the data. Do not include data collection forms that will be used to abstract data from other sources (such as medical or academic records), or video recordings.

- ***Examples**: survey, questionnaires, subject logs or diaries, focus group questions.*
- ***NOTE:** Sometimes the IRB can approve the general content of surveys and other data collection instruments rather than the specific form itself. This prevents the need to submit a modification request for future minor changes that do not add new topics or increase the sensitivity of the questions. To request this general approval, use the text box below to identify the questionnaires/surveys/ etc. for which you are seeking this more general approval. Then briefly describe the scope of the topics that will be covered and the most personal and sensitive questions. The HSD staff person who screens this application will let you know whether this is sufficient or whether you will need to provide more information.*
- ***For materials that cannot be uploaded**: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. You may also provide URLs (website addresses) or written descriptions below. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*
- ***For data that will be gathered in an evolving way**: This refers to data collection/questions that are not pre-determined but rather are shaped during interactions with participants in response to observations and responses made during those interactions. If this applies to the proposed research, provide a description of the process by which the data collection/questions will be established during the interactions with subjects, how the data collection/questions will be documented, the topics likely to be addressed, the most sensitive type of information likely to be gathered, and the limitations (if any) on topics that will be raised or pursued.*

Use this text box (if desired) to provide:

- Short written descriptions of materials that cannot be uploaded, such as URLs
- A description of the process that will be used for data that will be gathered in an evolving way.
- The general content of questionnaires, surveys and similar instruments for which general approval is being sought. (See the **NOTE** bullet point in the instructions above.)

5.15 SARS-CoV-2 testing. Will the subjects be tested for the SARS-CoV-2 coronavirus?

If the only testing is to screen the subjects (question 2.8), you do not need to answer this question

☒ **No**
☐ **Yes** → If yes:

- Name the testing lab
- Confirm that the lab and its use of this test is CLIA-certified or certified by the Washington State Department of Health
- Describe whether you will return the results to the participants and, if yes, who will do it and how (including any information you would provide to subjects with positive test results).

6 CHILDREN (MINORS) and PARENTAL PERMISSION

6.1 Involvement of minors. Does the research include minors (children)?

Minor or child means someone who has not yet attained the legal age for consent for the research procedures, as described in the applicable laws of the jurisdiction in which the research will be conducted. This may or may not be the same as the definition used by funding agencies such as the National Institutes of Health.

- In Washington State the generic age of consent is 18, meaning that anyone under the age of 18 is considered a child.
- There are some procedures for which the age of consent is much lower in Washington State.
- The generic age of consent may be different in other states, and in other countries.

☐ **No** → If no, go to Section 8.

☐ **Yes** → If yes, provide the age range of the minor subjects for this study and the legal age for consent in the study population(s). If there is more than one answer, explain.

☒ **Don't know** → This means is it not possible to know the age of the subjects. For example, this may be true for some research involving social media, the Internet, or a dataset that is obtained from another researcher or from a government agency. Go to Section 8.

6.2 Parental permission. Parental permission means actively obtaining the permission of the parents. This is not the same as "passive" or "opt out" permission where it is assumed that parents are allowing their children to participate because they have been provided with information about the research and have not objected or returned a form indicating they don't want their children to participate.

a. Will parental permission be obtained for:

☐ All of the research procedures → Go to question **6.2b.**

☐ None of the research procedures → Use the table below to provide justification, and skip question 6.2b.

☐ Some of the research procedures → Use the table below to identify the procedures for which parental permission will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO parental permission[2]	Reason why parental permission will not be obtained	Will parents be informed about the research?[3] YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐

	☐	☐
	☐	☐

Table footnotes

1. *If the answer is the same for all children groups or all procedures: collapse the answer across the groups and/or procedures.*
2. *If identifiable information or biospecimens will be obtained without parent permission, any waiver granted by the IRB does not override parents' refusal to provide broad consent (for example, through the Northwest Biotrust).*
3. *Will parents be informed about the research beforehand even though active permission is not being obtained?*

b. Indicate the plan for obtaining parental permission. One or both boxes must be checked.

☐ Both parents, unless one parent is deceased, unknown, incompetent, or not reasonably available; or when only one parent has legal responsibility for the care and custody of the child

☐ One parent, even if the other parent is alive, known, competent, reasonably available, and shares legal responsibility for the care and custody of the child.

This is all that is required for minimal risk research.

If both boxes are checked, explain:

6.3 Children who are wards. Will any of the children be wards of the State or any other agency, institution, or entity?

☐ **No**
☐ **Yes** → If yes, an advocate may need to be appointed for each child who is a ward. The advocate must be in addition to any other individual acting on behalf of the child as guardian or in loco parentis. The same individual can serve as advocate for all children who are wards.

Describe who will be the advocate(s). The description must address the following points:

- Background and experience
- Willingness to act in the best interests of the child for the duration of the research
- Independence of the research, research team, and any guardian organization

6.4 UW Office for Youth Programs Development and Support. If the project involves interaction (in-person or remotely) with individuals under the age of 18, researchers must comply with **UW Administrative Policy Statement 10.13** and the requirements listed at this website. This includes activities that are deemed to be Not Research or Exempt. It does not apply to third-party led research (i.e., research conducted by a non-UW PI). Information and FAQs for researchers are available.

This point is advisory only; there is no need to provide a response.

7 ASSENT OF CHILDREN (MINORS)

Go to Section 8 if your research does not involve children (minors).

7.1 Assent of children (minors). Though children do not have the legal capacity to "consent" to participate in research, they should be involved in the process if they are able to "assent" by having a study explained to them and/or by reading a simple form about the study, and then giving their verbal choice about whether they want to participate. They may also provide a written assent if they are older. See **WORKSHEET Children** for circumstances in which a child's assent may be unnecessary or inappropriate.

a. Will assent be obtained for:

☐ All research procedures and child groups	→ Go to question **7.2.**
☐ None of the research procedures and child groups	→ Use the table below to provide justification, then skip to question **7.6**
☐ Some of your research procedures and child groups	→ Use the table below to identify the procedures for which assent will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be obtained	Reason why assent will not be obtained

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse your answer across the groups and/or procedures.*

7.2 Assent process. Describe how assent will be obtained, for each child group. If the research involves children of different ages, answer separately for each group. If the children are non-English speakers, include a description of how their comprehension of the information will be evaluated.

7.3 Dissent or resistance. Describe how a child's objection or resistance to participation (including non-verbal indications) will be identified during the research, and what the response will be.

7.4 E-consent. Will any electronic processes (email, websites, electronic signatures, etc.) be used to present assent information to subjects/and or to obtain documentation (signatures) of assent? If yes, describe how this will be done.

7.5 Documentation of assent. Which of the following statements describes whether documentation of assent will be obtained?

☐ None of the research procedures and child groups	→ Use the table below to provide justification, then go to question **7.5.b**
☐ All of the research procedures and child groups	→ Go to question **7.5.a**, do not complete the table
☐ Some of the research procedures and/or child groups	→ Complete the table below and then to go question **7.5.a**

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be documented

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse the answer across the groups and/or procedures.*

a. Describe how assent will be documented. If the children are functionally illiterate or are not fluent in English, include a description of the documentation process for them.

b. Upload all assent materials (talking points, videos, forms, etc.) to ***Zipline***. Assent materials are not required to provide all of the standard elements of adult consent; the information should be appropriate to the age, population, and research procedures. The documents should be in Word, if possible.

7.6 Children who reach the legal age of consent during participation in longitudinal research.

Children who were enrolled at a young age and continue for many years: It is best practice to re-obtain assent (or to obtain it for the first time, if it was not obtained at the beginning of their participation).
Children who reach the legal age of consent: Informed consent must be obtained from the now-adult subject for (1) any ongoing interactions or interventions with the subjects, or (2) the continued analysis of specimens or data for which the subject's identify is readily identifiable to the researcher, unless the IRB waives this requirement.

a. Describe the plans (if any) to re-obtain assent from children.

b. Describe the plans (if any) to obtain consent for children who reach the legal age of consent.

- If adult consent will be obtained from them, describe what will happen regarding now-adult subjects who cannot be contacted.
- If consent will not obtained or will not be possible: explain why.

7.7 Other regulatory requirements. (This is for information only; no answer or response is required.) Researchers are responsible for determining whether their research conducted in schools, with student records, or over the Internet comply with permission, consent, and inspection requirements of the following federal regulations:

- PPRA – Protection of Pupil Rights Amendment
- FERPA – Family Education Rights and Privacy Act
- COPPA – Children's Online Privacy Protection Act

8 CONSENT OF ADULTS

Review the following definitions before answering the questions in this section.

CONSENT	is the process of informing potential subjects about the research and asking them whether they want to participate. It does not necessarily include the signing of a consent form.
CONSENT DOCUMENTATION	refers to how a subject's decision to participate in the research is documented. This is typically obtained by having the subject sign a consent form.
CONSENT FORM	is a document signed by subjects, by which they agree to participate in the research as described in the consent form and in the consent process.
ELEMENTS OF CONSENT	are specific information that is required to be provided to subjects.

CHARACTERISTICS OF CONSENT	are the qualities of the consent process as a whole. These are:
	• Consent must be legally effective.
	• The process minimizes the possibility of coercion or undue influence.
	• Subjects or their representatives must be given sufficient opportunity to discuss and consider participation.
	• The information provided must:
	  ○ Begin with presentation of key information (for consent materials over 2,000 words)
	  ○ Be what a reasonable person would want to have
	  ○ Be organized and presented so as to facilitate understanding
	  ○ Be provided in sufficient detail
	  ○ Not ask or appear to ask subjects to waive their rights

PARENTAL PERMISSION	is the parent's active permission for the child to participate in the research. Parental permission is subject to the same requirements as consent, including written documentation of permission and required elements.
SHORT FORM CONSENT	is an alternative way of obtaining written documentation of consent that is most commonly used with individuals who are illiterate or whose language is one for which translated consent forms are not available.
WAIVER OF CONSENT	means there is IRB approval for not obtaining consent or for not including some of the elements of consent in the consent process. **NOTE**: If you plan to obtain identifiable information or identifiable biospecimens without consent, any waiver granted by the IRB does not override a subject's refusal to provide broad consent (for example, the Northwest Biotrust).

WAIVER OF DOCUMENTATION OF CONSENT	means that there is IRB approval for not obtaining written documentation of consent.

8.1 Groups Identify the groups to which the answers in this section apply.

☐ Adult subjects

☐ Parents who are providing permission for their children to participate in research

→ *If you selected **PARENTS**, the word "consent" below should also be interpreted as applying to parental permission and "subjects" should also be interpreted as applying to the parents.*

8.2 The consent process and characteristics. This series of questions is about whether consent will be obtained for all procedures except recruiting and screening and, if yes, how.

The issue of consent for recruiting and screening activities is addressed in question 4.7. You do not need to repeat your answer to question 4.6.

a. Are there any procedures for which consent will not be obtained?

☐ **No**

☐ **Yes** → If yes, use the table below to identify the procedures for which consent will not be obtained. "All" is an acceptable answer for some studies.

Be sure to consider all research procedures and plans, including future contact, and sharing/banking of data and specimens for future work.

Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO consent process	Reason why consent will not be obtained	Will subjects be provided with info about the research after they finish? YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all groups, collapse your answer across the groups and/or procedures.*

b. Describe the consent process, if consent will be obtained for any or all procedures, for any or all groups. Address groups and procedures separately if the consent processes are different.

Be sure to include:

- *The location/setting where consent will be obtained*
- *Who will obtain consent (refer to positions, roles, or titles, not names)*
- *How subjects will be provided sufficient opportunity to discuss the study with the research team and consider participation*

c. Comprehension. Describe the methods that will be used to ensure or test the subjects' understanding of the information during the consent process.

d. Influence. Does the research involve any subject groups that might find it difficult to say "no" to participation because of the setting or their relationship with someone on the study team, even if they aren't pressured to participate?

Examples: Student participants being recruited into their teacher's research; patients being recruited into their healthcare provider's research, study team members who are participants; outpatients recruited from an outpatient surgery waiting room just prior to their surgery.

☐ **No**
☐ **Yes** → If yes, describe what will be done to reduce any effect of the setting or relationship on the participation decision.

Examples: a study coordinator will obtain consent instead of the subjects' physician; the researcher will not know which subjects agreed to participate; subjects will have two days to decide after hearing about the study.

e. Information provided is tailored to needs of subject population. Describe the basis for concluding that the information that will be provided to subjects (via written or oral methods) is what a *reasonable member of the subject population(s)* would want to know. If the research consent materials contain a key information section, also describe the basis for concluding that the information presented in that section is that which is *most likely* to assist the selected subject population with making a decision. See **GUIDANCE Key Information for Consent Materials**.

For example: Consultation with publications about research subjects' preferences, disease-focused nonprofit groups, patient interest groups, or other researchers/study staff with experience with the specific population. It may also involve directly consulting selected members of the study population.

f. Ongoing process. For research that involves multiple or continued interaction with subjects over time, describe the opportunities (if any) that will be given to subjects to ask questions or to change their minds about participating.

8.3 Electronic presentation of consent information. Will any part of the consent-related information be provided electronically for some or all of the subjects?

This refers to the use of electronic systems and processes instead of (or in addition to) a paper consent form. For example, an emailed consent form, a passive or an interactive website, graphics, audio, video podcasts. See GUIDANCE Electronic Informed Consent for information about electronic consent requirements at UW.

☐ **No** → If no, skip to question 8.4
☐ **Yes** → If yes, answer questions **a** through **e**

a. Describe the electronic consent methodology and the information that will be provided.

All informational materials must be made available to the IRB. Website content should be provided as a Word document. It is considered best practice to give subjects information about multi-page/multi-screen information that will help them assess how long it will take them to complete the process. For example, telling them that it will take about 15 minutes, or that it involves reading six screens or pages.

b. Describe how the information can be navigated (if relevant). *For example, will the subject be able to proceed forward or backward within the system, or to stop and continue at a later time?*

c. In a standard paper-based consent process, the subjects generally have the opportunity to go through the consent form with study staff and/or to ask study staff about any question they may have after reading the consent form. Describe what will be done, if anything, to facilitate the subject's comprehension and opportunity to ask questions when consent information is presented electronically. Include a description of any provisions to help ensure privacy and confidentiality during this process.

Examples: hyperlinks, help text, telephone calls, text messages or other type of electronic messaging, video conference, live chat with remotely located study team members.

d. What will happen if there are individuals who wish to participate but who do not have access to the consent methodology being used, or who do not wish to use it? Are there alternative ways in which they can obtain the information, or will there be some assistance available? If this is a clinical trial, these individuals cannot be excluded from the research unless there is a compelling rationale.

For example, consider individuals who lack familiarity with electronic systems, have poor eyesight or impaired motor skills, or who do not have easy email or internet access.

e. How will the research team ensure continued accessibility of consent materials and information during the study?

f. How will additional information be provided to subjects during the research, including any significant new findings (such as new risk information) If this is not an issue, explain why.

8.4 Written documentation of consent. Which of the statements below describe whether documentation of consent will be obtained? NOTE: This question does not apply to screening and recruiting procedures which have already been addressed in question 4.7.

Documentation of consent that is obtained electronically is not considered written consent unless it is obtained by a method that allows verification of the individual's signature. In other words, saying "yes" by email is rarely considered to be written documentation of consent

a. Is written documentation of consent being obtained for:

☐ None of the research procedures	→ Use the table below to provide justification then go to question **8.5.**
☐ All of the research procedures	→ Do not complete the table; go to question **8.4.b.**
☐ Some of the research procedures	→ Use the table below to identify the procedures for which written documentation of consent will not be obtained from adult subjects.

Adult subject group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO documentation of consent	Will they be provided with a written statement describing the research (optional)? YES	NO
		☐	☐
		☐	☐
		☐	☐
		☐	☐
		☐	☐

Table footnotes

1. *If the answer is the same for all adult groups or all procedures, collapse the answer across the groups and/or procedures.*

b. Electronic consent signature. For studies in which documentation of consent will be obtained: will subjects use an electronic method to provide their consent signature?

- *See the GUIDANCE Electronic Informed Consent for information about options (including REDCap e-signature and the DocuSign system) and any associated requirements.*
- *FDA-regulated studies must use a system that complies with the FDA's "Part 11" requirements about electronic systems and records. Note that the UW-IT supported DocuSign e-signature system does not meet this requirement.*
- *Having subjects check a box at the beginning of an emailed or web-based questionnaire is not considered legally effective documentation of consent.*

☐ **No**
☐ **Yes** → If yes, indicate which methodology will be used.

☐ **UW ITHS REDCap** (excludes REDCap Mobile application, which is a separate software application for use with a mobile device for consent when internet service is absent or unreliable)

☐ **Other REDCap installation** → Please name the institutional version you will be using (e.g. Vanderbilt, Univ. of Cincinnati) in the field below and provide a completed **SUPPLEMENT Other REDCap Installation** with your submission.

☐ **UW DocuSign**

☐ **Other** → Please describe in the field below and provide a signed TEMPLATE Other E-signature Attestation Letter with your submission.

b.1 Is this method legally valid in the jurisdiction where the research will occur?
NOTE: UW ITHS REDCap (excludes REDCap Mobile application) and UW DocuSign have been vetted for compliance with WA State and federal laws regarding electronic signatures.

☐ **No**
☐ **Yes** → If yes, what is the source of information about legal validity?

b.2 Will verification of the subject's identity be obtained if the signature is not personally witnessed by a member of the study team? Note that this is required for FDA-regulated studies.

See the GUIDANCE Electronic Informed Consent for information and examples

☐ **No** → If no, provide the rationale for why this is not required or necessary to protect subjects or the integrity of the research. Also, what would be the risks to the actual subject if somebody other than the intended signer provides the consent signature?

☐ **Yes** → If yes, describe how subject identity will be verified, providing a non- technical description that the reviewer will understand.

b.3 How will the requirement be met to provide a copy of the consent information (consent form) to individuals who provide an e-signature?

The copy can be paper or electronic and may be provided on an electronic storage device or via email. If the electronic consent information uses hyperlinks or other websites or podcasts to convey information specifically related to the research, the information in these hyperlinks should be included in the copy provided to the subjects and the website must be maintained for the duration of the entire study.

8.5 Non-English-speaking or -reading adult subjects. Will the research enroll adult subjects who do not speak English or who lack fluency or literacy in English?

☐ **No**
☐ **Yes** → If yes, describe the process that will be used to ensure that the oral and written information provided to them during the consent process and throughout the study will be in a language readily understandable to them and (for written materials such as consent forms or questionnaires) at an appropriate reading/comprehension level.

a. Interpretation. Describe how interpretation will be provided, and when. Also, describe the qualifications of the interpreter(s) – for example, background, experience, language proficiency in English and in the other language, certification, other credentials, familiarity with the research-related vocabulary in English and the target language.

b. Translations. Describe how translations will be obtained for all study materials (not just consent forms). Also, describe the method for ensuring that the translations meet the UW IRB's requirement that translated documents will be linguistically accurate, at an appropriate reading level for the participant population, and culturally sensitive for the locale in which they will be used.

8.6 Barriers to written documentation of consent. There are many possible barriers to obtaining written documentation of consent. Consider, for example, individuals who are functionally illiterate; do not read English well; or have sensory or motor impairments that may impede the ability to read and sign a consent form.

a. Describe the plans (if any) for obtaining written documentation of consent from potential subjects who may have difficulty with the standard documentation process (that is, reading and signing a consent form). Skip this question if written documentation of consent is not being obtained for any part of the research.

Examples of solutions: Translated consent forms; use of the Short Form consent process; reading the form to the person before they sign it; excluding individuals who cannot read and understand the consent form.

8.7 Deception. Will information be deliberately withheld, or will false information be provided, to any of the subjects?

Note: "Blinding" subjects to their study group/condition/arm is not considered to be deception, but not telling them ahead of time that they will be subject to an intervention or about the purpose of the procedure(s) is deception.

- [X] **No**
- [ ] **Yes** → If yes, describe what information and why.

Example: It may be necessary to deceive subjects about the purpose of the study (describe why).

a. Will subjects be informed beforehand that they will be unaware of or misled regarding the nature or purposes of the research? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes**

b. Will subjects be debriefed later? (Note: this is not necessarily required.)

- [ ] **No**
- [ ] **Yes** → If yes, describe how and when this will occur. Upload any debriefing materials, including talking points or a script, to ***Zipline***.

8.8 Cognitively impaired adults, and other adults unable to consent. Will such individuals be included in the research?

Examples: individuals with Traumatic Brain Injury (TBI) or dementia; individuals who are unconscious, or who are significantly intoxicated.

- [X] **No** → If no, go to question **8.9**.
- [ ] **Yes** → If yes, answer the following questions.

a. Rationale. Provide the rationale for including this population.

b. Capacity for consent / decision making capacity. Describe the process that will be used to determine whether a cognitively impaired individual is capable of consent decision making with respect to the research protocol and setting.

b.1. If there will be repeated interactions with the impaired subjects over a time period when cognitive capacity could increase or diminish, also describe how (if at all) decision-making capacity will be re-assessed and (if appropriate) consent obtained during that time.

c. Permission (surrogate consent). If the research will include adults who cannot consent for themselves, describe the process for obtaining permission ("surrogate consent") from a legally authorized representative (LAR).

*For research conducted in Washington State, see the **GUIDANCE Legally Authorized Representative** to learn which individuals meet the state definition of "legally authorized representative".*

d. Assent. Describe whether assent will be required of all, some, or none of the subjects. If some, indicate which subjects will be required to assent and which will not (and why not). Describe any process that will be used to obtain and document assent from the subjects.

e. Dissent or resistance. Describe how a subject's objection or resistance to participation (including non-verbal) during the research will be identified, and what will occur in response.

8.9 Research use of human fetal tissue obtained from elective abortion. Federal and UW Policy specify some requirements for the consent process. If you are conducting this type of research, check the boxes to confirm these requirements will be followed.

- ☐ Informed consent for the donation of fetal tissue for research use will be obtained by someone other than the person who obtained the informed consent for abortion.
- ☐ Informed consent for the donation of fetal tissue for research use will be obtained after the informed consent for abortion.
- ☐ Participation in the research will not affect the method of abortion.
- ☐ No enticements, benefits, or financial incentives will be used at any level of the process to incentivize abortion or the donation of human fetal tissue.
- ☐ The informed consent form for the donation of fetal tissue for use in research will be signed by both the

woman and the person who obtains the informed consent.

8.10 Consent-related materials. Upload to ***Zipline*** all consent scripts/talking points, consent forms, debriefing statements, Information Statements, Short Form consent forms, parental permission forms, and any other consent-related materials that will be used. Materials that will be used by a specific site should be uploaded to that site's **Local Site Documents** page.

- *Translations must be submitted and approved before they can be used. However, we strongly encourage you to wait to provide them until the IRB has approved the English versions.*
- *Combination forms: It may be appropriate to combine parental permission with consent, if parents are subjects as well as providing permission for the participation of their children. Similarly, a consent form may be appropriately considered an assent form for older children.*
- *For materials that cannot be uploaded: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. URLs (website addresses) may also be provided, or written descriptions of websites. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*

9 PRIVACY AND CONFIDENTIALITY

9.1 Privacy protections. Describe the steps that will be taken, if any, to address possible privacy concerns of subjects and potential subjects.

Privacy refers to the sense of being in control of access that others have to ourselves. This can be an issue with respect to recruiting, consenting, sensitivity of the data being collected, and the method of data collection.
Examples:

- *Many subjects will feel a violation of privacy if they receive a letter asking them to participate in a study because they have ____ medical condition, when their name, contact information, and medical condition were drawn from medical records without their consent. Example: the IRB expects that "cold call" recruitment letters will inform the subject about how their information was obtained.*
- *Recruiting subjects immediately prior to a sensitive or invasive procedure (e.g., in an outpatient surgery waiting room) will feel like an invasion of privacy to some individuals.*
- *Asking subjects about sensitive topics (e.g. details about sexual behavior) may feel like an invasion of privacy to some individuals.*

The data we use are all public — publicly shared and publicly visible, at the time of our data collections. However, even though these data are considered public, we do add layers of privacy protection for individuals who would have a reasonable expectation of privacy — e.g. those who are not public figures and not purposefully trying to manipulate others for political or financial gain. For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. However, **we do publish account names for public accounts** such as celebrities, media personalities, journalists, politicians, companies, etc. when the identity of the account is important for understanding the phenomena of study. We also publish the publicly available account names (which may or may not be traceable to real names) of accounts with high follower counts (>100,000 followers) that are repeatedly and purposefully manipulating the platform (intentionally spreading false information) for political or financial gain.

9.2 Identification of individuals in publications and presentations. Will potentially identifiable information about subjects be used in publications and presentations, or is it possible that individual identities could be inferred from what is planned to be published or presented?

☐ **No**

[X] **Yes** → If yes, will subject consent be obtained for this use?

[ ] **Yes**

[X] **No** → If no, describe the steps that will be taken to protect subjects (or small groups of subjects) from being identifiable.

For the social media data we collect, **we do not publish account names or personal details of private citizens or members of the public who would have a reasonable expectation of privacy**. For presentations and publications, we will hide the account details for accounts that are not public figures or extremely high-visibility accounts (>100,000 followers).

9.3 State mandatory reporting. Each state has reporting laws that require some types of individuals to report some kinds of abuse, and medical conditions that are under public health surveillance. These include:

- Child abuse
- Abuse, abandonment, neglect, or financial exploitation of a vulnerable adult
- Sexual assault
- Serious physical assault
- Medical conditions subject to mandatory reporting (notification) for public health surveillance

Are you or a member of the research team likely to learn of any of the above events or circumstances while conducting the research **AND** feel obligated to report it to state authorities?

[X] **No**

[ ] **Yes** → If yes, the UW IRB expects subjects to be informed of this possibility in the consent form or during the consent process, unless you provide a rationale for not doing so:

9.4 Retention of identifiers and data. Check the box below to indicate assurance that any identifiers (or links between identifiers and data/specimens) and data that are part of the research records will not be destroyed until after the end of the applicable records retention requirements (e.g. Washington State; funding agency or sponsor; Food and Drug Administration). If it is important to say something about destruction of identifiers (or links to identifiers) in the consent form, state something like "the link between your identifier and the research data will be destroyed after the records retention period required by state and/or federal law."

This question can be left blank for conversion applications (existing paper applications that are being "converted" into a Zipline application.)

See the "Research Data" sections of the following website for UW Records management for the Washington State research rectords retention schedules that apply in general to the UW (not involving UW Medicine data):
http://f2.washington.edu/fm/recmgt/gs/research?title=R

See the "Research Records and Data" information in Section 8 of this document for the retention schedules for UW Medicine Records: ***https://www.uwmedicine.org/recordsmanagementuwm-records-retention-schedule.pdf***

[X] **Confirm**

9.5 Certificates of Confidentiality. Will a federal Certificate of Confidentiality be obtained for the research data?
NOTE: Answer "No" if the study is funded by NIH or the CDC, because all NIH-funded and CDC-funded studies automatically have a Certificate.

[X] **No**

[ ] **Yes**

9.6 Data and specimen security protections. Identify the data classifications and the security protections that will be provided for all sites where data will be collected, transmitted, or stored, referring to the **GUIDANCE Data and Security Protections** for the minimum requirements for each data classification level. ***It is not possible to answer this question without reading this document. Data security protections should not conflict with records retention requirements.***

a. Which level of protections will be applied to the data and specimens? If more than one level will be used, describe which level will apply to which data and which specimens and at which sites.

Level 1 (publicly available data)

b. Use this space to provide additional information, details, or to describe protections that do not fit into one of the levels. If there are any protections within the level listed in 9.6.a which will *not* be followed, list those here, including identifying the sites where this exception will apply. For example, if you intend to store subject identifiers with study data (not permitted under requirement U9 for Risk Levels 3-5), then indicate this in the box below (e.g., "We will not adhere to requirement U9 for screening data").

Though these data ARE publicly available at the time of our collection, it is possible that our analyses will reveal illegal (voter suppression efforts) or socially unacceptable (intentional lying) behavior by specific social media users (some of them public figures). It is even possible that our data and/or analyses could be used in prosecutions (for example, we have data from past collections that could be useful in understanding how the January 6 were planned). So, though the data are publicly available, there are risks for people whose content is picked up in our data collections — in part because our analyses are designed to identify "bad actors".

10 RISK / BENEFIT ASSESSMENT

10.1 Anticipated risks. Describe the reasonably foreseeable risks of harm, discomforts, and hazards to the subjects and others of the research procedures. For each harm, discomfort, or hazard:

- Describe the magnitude, probability, duration, and/or reversibility of the harm, discomfort, or hazard, AND
- Describe how the risks will be reduced or managed. Do not describe data security protections here, these are already described in Question 9.6.

- *Consider possible physical, psychological, social, legal, and economic harms, including possible negative effects on financial standing, employability, insurability, educational advancement or reputation. For example, a breach of confidentiality might have these effects.*
- *Examples of "others": embryo, fetus, or nursing child; family members; a specific group.*
- *Ensure applicable risk information from any Investigator Brochures, Drug Package Inserts, and/or Device Manuals is included in your description.*
- *Do not include the risks of non-research procedures that are already being performed.*
- *If the study design specifies that subjects will be assigned to a specific condition or intervention, then the condition or intervention is a research procedure - even if it is a standard of care.*
- *Examples of mitigation strategies: inclusion/exclusion criteria; applying appropriate data security measures to prevent unauthorized access to individually identifiable data; coding data; taking blood samples to monitor something that indicates drug toxicity.*
- *As with all questions on this application, you may refer to uploaded documents.*

There is some reputation all risk for accounts at appear in our analyses—for example by exposing that an account participated in the spread of misinformation, this could have a negative impact on that account's reputation. In some cases, where our data reveal libel (e.g. Rudy Guiliani accusing Dominion Voting machines of switching votes), our analyses could inform lawsuits. Similarly, by showing how a specific account organized protests that led to violence, our analyses could have criminal legal implications. For these reasons, we attempt to obscure in our reporting the accounts of private citizens who were not intentionally participating in illegal action. However, for public individuals (like Guiliani), we will not withhold account information.

10.2 Reproductive risks. Are there any risks of the study procedures to men and women (who are subjects, or partner of subjects) related to pregnancy, fertility, lactation or effects on a fetus or neonate?

Examples: direct teratogenic effects; possible germline effects; effects on fertility; effects on a woman's ability to continue a pregnancy; effects on future pregnancies.

[X] **No** → If no go to question 10.3
[ ] **Yes** → If yes, answer the following questions:

a. Risks. Describe the magnitude, probability, duration and/or reversibility of the risks.

b. Steps to minimize risk. Describe the specific steps that will be taken to minimize the magnitude, probability, or duration of these risks.

Examples: inform the subjects about the risks and how to minimize them; require a pregnancy test before and during the study; require subjects to use contraception; advise subjects about banking of sperm and ova.

If the use of contraception will be required: describe the allowable methods and the time period when contraception must be used.

c. Pregnancy. Describe what will be done if a subject (or a subject's partner) becomes pregnant

For example; will subjects be required to immediately notify study staff, so that the study procedures can be discontinue or modified, or for a discussion of risks, and/or referrals or counseling?

10.3 MRI risk management. A rare but serious adverse reaction called nephrogenic systemic fibrosis (NSF) has been observed in individuals with kidney disease who received gadolinium-based contrast agents (GBCAs) for the scans. Also, a few healthy individuals have a severe allergic reaction to GBCAs.

a. Use of gadolinium. Will any of the MRI scans involve the use of a gadolinium-based contrast agent (GBCA?)

[X] **No**
[ ] **Yes** → If yes, which agents will be used? *Check all that apply.*

	Brand Name	Generic Name	Chemical Structure
[ ]	Dotarem	Gadoterate meglumine	Macrocylic
[ ]	Eovist / Primovist	Gadoxetate disodium	Linear
[ ]	Gadavist	Gadobutro	Macrocyclic
[ ]	Magnevist	Gadpentetate dimeglumine	Linear
[ ]	MultiHance	Gadobenate dimeglumine	Linear
[ ]	Omniscan	Gadodiamide	Linear
[ ]	OptiMARK	Gadoversetamide	Linear
[ ]	ProHance	Gadoteridol	Macrocyclic
[ ]	Other, provide name:		

1.) The FDA has concluded that gadolinium is retained in the body and brain for a significantly longer time than previously recognized, especially for linear GBCAs. The health-related risks of this longer retention are not yet clearly established. However, the UW IRB expects researchers to provide a compelling justification for using a linear GBCA instead of a macrocyclic GBCA, to manage the risks associated with GBCAs.

Describe why it is important to use a GBCA with the MRI scan(s). Describe the dose that will be used and (if it is more than the standard clinical dose recommended by the manufacturer) why it is necessary to use a higher dose. If a linear GBCA will be used, explain why a macrocyclic GBCA cannot be used.

2.) Information for subjects. Confirm by checking this box that subjects will be provided with the FDA-approved Patient Medication Guide for the GBCA being used in the research or that the same information will be inserted into the consent form.

☐ **Confirmed**

b. Who will (1) calculate the dose of GBCA; (2) prepare it for injection; (3) insert and remove the IV catheter; (4) administer the GBCA; and (5) monitor for any adverse effects of the GCBA? Also, what are the qualifications and training of these individual(s)?

c. Describe how the renal function of subjects will be assessed prior to MRI scans and how that information will be used to exclude subjects at risk for NSF.

d. Describe the protocol for handling a severe allergic reaction to the GBCA or any other medical event/emergency during the MRI scan, including who will be responsible for which actions.

10.4 Unforeseeable risks. Are there any research procedures that may have risks that are currently unforeseeable?

Example: using a drug that hasn't been used before in this subject population.

☒ **No**
☐ **Yes** → If yes, identify the procedures.

10.5 Subjects who will be under regional or general anesthesiology. Will any research procedures occur while patients are under general or regional anesthesia, or during the 3 hours preceding general or regional anesthesia (supplied for non-research reasons)?

☐ **No**
☐ **Yes** → If yes, check all the boxes that apply.

☐ Administration of any drug for research purposes

☐ Inserting an intra-venous (central or peripheral) or intra-arterial line for research purposes

☐ Obtaining samples of blood, urine, bone marrow or cerebrospinal fluid for research

☐ Obtaining a research sample from tissue or organs that would not otherwise be removed during surgery

☐ Administration of a radio-isotope for research purposes**

☐ Implantation of an experimental device

☐ Other manipulations or procedures performed solely for research purposes (e.g., experimental liver dialysis, experimental brain stimulation)

If any of the boxes are checked:
Provide the name and institutional affiliation of a physician anesthesiologist who is a member of the research team or who will serve as a safety consultant about the interactions between the research procedures and the general or regional anesthesia of the subject-patients. If the procedures will be performed at a UW Medicine facility or affiliate, the anesthesiologist must be a UW faculty member, and the Vice Chair of Clinical Research in the UW Department of Anesthesiology and Pain Medicine must be consulted in advance for feasibility, safety and billing.

*** If the box about radio-isotopes is checked: the study team is responsible for informing in advance all appropriate clinical personnel (e.g., nurses, technicians, anesthesiologists, surgeons) about the administration and use of the radio-isotope, to ensure that any personal safety issues (e.g., pregnancy) can be appropriately addressed. This is a condition of IRB approval.*

10.6 Data and Safety Monitoring. A Data and Safety Monitoring Plan (DSMP) is required for clinical trials (as defined by NIH). If required for this research, or if there is a DSMP for the research regardless of whether it is required, upload the DSMP to ***Zipline***. If it is embedded in another document being uploading (for example, a Study Protocol) use the text box below to name the document that has the DSMP. Alternatively, provide a description of the DSMP in the text box below. For guidance on developing a DSMP, see the ITHS webpage on Data and Safety Monitoring Plans.

10.7 Un-blinding. If this is a double-blinded or single-blinded study in which the participant and/or relevant study team members do not know the group to which the participant is assigned: describe the circumstances under which un-blinding would be necessary, and to whom the un-blinded information would be provided.

10.8 Withdrawal of participants. If applicable, describe the anticipated circumstances under which participants will be withdrawn from the research without their consent. Also, describe any procedures for orderly withdrawal of a participant, regardless of the reason, including whether it will involve partial withdrawal from procedures and any intervention but continued data collection or long-term follow-up.

10.9 Anticipated direct benefits to participants. If there are any direct research-related benefits that some or all individual participants are likely to experience from taking part in the research, describe them below:

Do not include benefits to society or others, and do not include subject payment (if any). Examples: medical benefits such as laboratory tests (if subjects receive the results); psychological resources made available to participants; training or education that is provided.

N/A

10.10 Return of individual research results.

In this section, provide your plans for the return of individual results. An "individual research result" is any information collected, generated or discovered in the course of a research study that is linked to the identity of a research participant. These may be results from screening procedures, results that are actively sought for purposes of the study, results that are discovered unintentionally, or after analysis of the collected data and/or results has been completed.

*See the **GUIDANCE Return of Individual Results** for information about results that should and should not be returned, validity of results, the Clinical Laboratory Improvement Amendment (CLIA), consent requirements and communicating results.*

a. Is it anticipated that the research will produce any individual research results that are clinically actionable?

"Clinically actionable" means that there are established therapeutic or preventive interventions or other available actions that have the potential to change the clinical course of the disease/condition, or lead to an improved health outcome.

In general, every effort should be made to offer results that are clinically actionable, valid and pose life-threatening or severe health consequences if not treated or addressed quickly. Other clinically actionable results should be offered if this can be accomplished without compromising the research.

- [X] **No**
- [ ] **Yes** → If yes, answer the following questions (a.1-a.3).

a.1. Describe the clinically actionable results that are anticipated and explain which results, if any, could be urgent (i.e. because they pose life-threatening or severe health consequences if not treated or addressed quickly).

Examples of urgent results include very high calcium levels, highly elevated liver function test results, positive results for reportable STDs.

a.2. Explain which of these results will be offered to subjects.

a.3. Explain which results will not be offered to subjects and provide the rationale for not offering these results.

Reasons not to offer the results might include:

- *There are serious questions regarding validity or reliability*
- *Returning the results has the potential to cause bias*
- *There are insufficient resources to communicate the results effectively and appropriately*
- *Knowledge of the result could cause psychosocial harm to subjects*

b. Is there a plan for offering subjects any results that are not clinically actionable?

Examples: non-actionable genetic results, clinical tests in the normal range, experimental and/or uncertain results.

- [ ] **No**
- [ ] **Yes** → If yes, explain which results will be offered to subjects and provide the rationale for

c. Describe the validity and reliability of any results that will be offered to subjects.

The IRB will consider evidence of validity such as studies demonstrating diagnostic, prognostic, or predictive value, use of confirmatory testing, and quality management systems.

d. Describe the process for communicating results to subjects and facilitating understanding of the results. In the description, include who will approach the participant with regard to the offer of results, who will communicate the result (if different), the circumstances, timing, and communication methods that will be used.

e. Describe any plans to share results with family members (e.g. in the event a subject becomes incapacitated or deceased).

f. Check the box to indicate that any plans for return of individual research results have been described in the consent document. If there are no plans to provide results to participants, this should be stated in the consent form.

*See the **GUIDANCE Return of Individual Results** for information about consent requirements.*

☐ **Confirmed**

10.11 Commercial products or patents. Is it possible that a commercial product or patent could result from this study?

☐ **No**
☐ **Yes** → If yes, describe whether subjects might receive any remuneration/compensation and, if yes, how the amount will be determined.

11 ECONOMIC BURDEN TO PARTICIPANTS

11.1 Financial responsibility for research-related injuries. Answer this question only if the lead researcher is not a UW student, staff member, or faculty member whose primary paid appointment is at the UW.

For each institution involved in conducting the research: Describe who will be financially responsible for research-related injuries experienced by subjects, and any limitations. Describe the process (if any) by which participants may obtain treatment/compensation.

11.2 Costs to subjects. Describe any research-related costs for which subjects and/or their health insurance may be responsible (examples might include: CT scan required for research eligibility screening; co-pays; surgical costs when a subject is randomized to a specific procedure; cost of a device; travel and parking expenses that will not be reimbursed).

12 RESOURCES

12.1 Faculty Advisor. (For researchers who are students, residents, fellows, or post-docs.) Provide the following information about the faculty advisor.

- Advisor's name
- Your relationship with your advisor (for example: graduate advisor; course instructor)
- Your plans for communication/consultation with your advisor about progress, problems, and changes.

PI (Kate Starbird) is faculty

12.2 UW Principal Investigator Qualifications. Upload a current or recent Curriculum Vitae (CV), Biosketch (as provided to federal funding agencies), or similar document to the Local Site Documents page in Zipline. The purpose of this is to address the PI's qualifications to conduct the proposed research (education, experience, training, certifications, etc.).

For help with creating a CV, see http://adai.uw.edu/grants/nsf_biosketch_template.pdf and https://education.uwmedicine.org/student-affairs/career-advising/year-4/residency-applications/curriculum-vitae/

☐ **The CV will be uploaded.**

12.3 UW Study team qualifications. Describe the qualifications and/or training for each UW study team member to fulfill their role on the study and perform study procedures. (You may be asked about non-UW study team members during the review; they should not be described here.) You may list these individuals by name, however if you list an individual by name, you will need to modify this application if that individual is replaced. Alternatively, you can describe study roles and the qualifications and training the PI or study leadership will require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.

Describe: The role (or name of person), the study activities they will perform, and the qualifications or training that are relevant to performing those study activities.

Examples:
Research Study Coordinator: Obtain consent, administer surveys, blood draw. Will have previous experience coordinating clinical research and be a certified phlebotomist in WA.
Undergraduate Research Assistant: Obtain consent, perform all study procedures. Will have had coursework in research methods, complete an orientation to human subjects protections given by the department, and will receive training from the PI or the graduate student project lead on obtaining consent and debriefing subjects.
Acupuncturist: Perform acupuncture procedures and administer surveys. Must be licensed with WA State DoH and complete training in administering research surveys given by the project director, an experienced survey researcher.
Co-Investigator: Supervise MRI and CT scan procedures and data interpretation, obtain consent. MD, specialty in interventional radiology and body imaging. 5-years clinical research experience.

12.4 Study team training and communication. Describe how it will be ensured that each study team member is adequately trained and informed about the research procedures and requirements (including any changes) as well as their research-related duties and functions.

☐ **There is no study team.**

13 OTHER APPROVALS, PERMISSIONS, and REGULATORY ISSUES

13.1 Approvals and permissions. Identify any other approvals or permissions that will be obtained. For example: from a school, external site/organization, funding agency, employee union, UW Medicine clinical unit.

Do not attach the approvals and permissions unless requested by the IRB.

N/A

13.2 Financial Conflict of Interest. Does any UW member of the team have ownership or other Significant Financial Interest (SFI) with this research as defined by UW policy GIM 10?

☐ **No**

☐ **Yes** → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

- ☐ **No** → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination
- ☐ **Yes** → If yes, upload the Conflict Management Plan for every UW team member who has a FCOI with respect to the research, to ***Zipline***. If it is not yet available, use the text box to describe whether the Significant Financial Interest has been disclosed already to the UW Office of Research and include the FIDS Disclosure ID if available.

To: Jeff Hancock[hancockj@stanford.edu]
Cc: Elena Cryst[ecryst@stanford.edu]; Renee DiResta[rdiresta@stanford.edu]; Sunny Xun Liu[sunnyxliu@stanford.edu]
From: Kate Starbird
Sent: Thur 9/16/2021 4:27:29 PM
Subject: Re: IRB for NSF grant, UW leading w/ another institution
Received: Thur 9/16/2021 4:27:31 PM
APPLICATION_IRB_Protocol_v3.60_2021.08.26-V1.docx

Here's a current draft of the IRB — but it's both incomplete and (with feedback from the Uw IRB) needs to have the social media collection/analysis separated from the other components. I should have that part in its own IRB proposal by the end of the weekend.

On Sep 16, 2021, at 9:22 AM, Jeff Hancock <hancockj@stanford.edu> wrote:

Sounds good - just got the invite.
--jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Thu, Sep 16, 2021 at 9:21 AM Elena Cryst <ecryst@stanford.edu> wrote:

Hi all –

Looking forward to receiving the draft IRB from you Kate. I won't be able to get to working on the protocol submission until next week. It would be helpful for me to join your meeting tomorrow to have all the appropriate background info.

Sunny – I'll touch base with you separately on a few additional grant admin items.

—

Elena Cryst, MBA (she/her)

Assistant Director

Stanford Internet Observatory

https://io.stanford.edu

Book an appointment

From: Jeff Hancock <hancockj@stanford.edu>
Date: Thursday, September 16, 2021 at 9:15 AM
To: Kate Starbird <kstarbi@uw.edu>, Elena Cryst <ecryst@stanford.edu>
Cc: Renee DiResta <rdiresta@stanford.edu>, Sunny Xun Liu <sunnyxliu@stanford.edu>
Subject: Re: IRB for NSF grant, UW leading w/ another institution

Hi Kate, Renee and Elena,

I'm also adding Sunny who will help us with IRB (and everything). Kate this all sounds good. Renee and Elena, let me know if you need help with the IRB. If you add me and Sunny to the protocol we can help directly.

Kate, talking tomorrow around other part sounds good. I'm free after 1.30.

--Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

On Thu, Sep 16, 2021 at 7:52 AM Kate Starbird <kstarbi@uw.edu> wrote:

Hi Jeff/Renee,

We have been communicating with our IRB folks. It looks like we'll have to split the IRB up into two different parts and for one of those parts (the basic social media analysis), because it's likely to be "not human subjects" or "exempt", both teams will have to file an IRB separately (to our different institutions). Apparently, one institution can't act as a "single IRB" for exempt or non-human subjects research.

Renee, I'm happy to send over what I draft for our IRB so you can use the same language to get yours started. It's probably very similar to an IRB you already have… so, you maybe need to talk to your folks to see if you can just add this grant to that existing IRB or whether you have to file a new one.

Jeff, for the other piece, it would be great to have at least one component of your team's research (whatever you hope to do in the next 6-12 months) sketched out so we can include in this proposal. I'm happy to chat sometime to think that through. (We do have some time pressure on the IRB, so maybe trying to sneak that into tomorrow or early next week — if you have any open slots — would be good.)

Let me know if we should plan to some time to chat this through.

Kate

Begin forwarded message:

From: HSD Rely <hsdrely@uw.edu>

Subject: RE: IRB for NSF grant, UW leading w/ another institution

Date: September 15, 2021 at 3:00:51 PM PDT

To: Kate Starbird <kstarbi@uw.edu>, Crystal Welliver <welliver@uw.edu>

Cc: Mallory Shaw <mdshaw87@uw.edu>

Hello,

The UW IRB is willing to be the single IRB if the project is determined by the IRB to be non-exempt human subjects research. If the IRB determines that the project is entirely a mixture of not human subjects research and exempt human subjects research, your Stanford collaborators will need to seek their own determinations. If the UW IRB needs to be the single IRB, we can serve without charging fees or other costs.

Looking through the grant, we noticed portions that do not qualify as human subjects research under UW policies like activities that solely use publicly available data. These portions will not be covered under the single IRB review so your Stanford collaborators will need to follow their institution's policies on whether a formal determination of not human subjects research is needed for those activities.

Activities that solely involve publicly available data should be included in a separate application. If the remaining activities that involve private data or interactions with participants are strongly interrelated like your initial email suggests, all of these activities should be included in one application. The IRB will need to evaluate all human subjects activities as a whole to determine whether this study qualifies for single IRB review since the activities are so interrelated. You can specify that you are only seeking approval for the initial activities at the moment, which will allow you to not need to provide as many details on the later activities but some information is required at the beginning. If my understanding of your initial email is incorrect and some activities can be separated out into discreet projects, those can be submitted as separate applications if that is easier.

Finally, as to how to describe the rapid response efforts, I am not sure how to recommend you communicate that because I am not clear on what is going on. If this is a feedback loop, then you could mention that you will do activities iteratively until you reach whatever is your endpoint. If it is something else, I would need to know more in order to advise you on the best way to represent this.

Hopefully this helps you get started but let me know if you have additional questions.

Thanks,

Jenny Maki

IRB Reliance Administrator

(206) 543 – 4798

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, September 15, 2021 11:35 AM
To: Crystal Welliver <welliver@uw.edu>
Cc: HSD Rely <hsdrely@uw.edu>; Mallory Shaw <mdshaw87@uw.edu>
Subject: Re: IRB for NSF grant, UW leading w/ another institution

Stanford IRB has not done any review on this. I'm including the letter they sent to that confirms they had not yet developed the protocols (or received IRB approval).

Kate Starbird

Associate Professor, UW HCDE

Co-Founder and Director of the Center for an Informed Public

kstarbi@uw.edu

> On Sep 15, 2021, at 11:06 AM, Crystal Welliver <welliver@uw.edu> wrote:
>
> Hi Jenny,
>
> Yes – the eGC1 is A165026.

Crystal

From: HSD Rely <hsdrely@uw.edu>
Sent: Wednesday, September 15, 2021 10:54 AM
To: Kate Starbird <kstarbi@uw.edu>
Cc: Mallory Shaw <mdshaw87@uw.edu>; Crystal Welliver <welliver@uw.edu>
Subject: Re: IRB for NSF grant, UW leading w/ another institution

Hi Kate,

Is the eGC1 for this project A165026? Before I bring this to the rest of the team to discuss, I want to make sure that I have the correct information and grant application to look at.

I also ask because the grant application that I found for this eGC1 lists that Stanford already has IRB approval on July 1, 2021. Usually a letter of support to cede review to another agency is not listed as IRB approval on a grant application because the single IRB review has not been done and no reliance agreement is in place. Please explain what this date is referring to and confirm that the Stanford IRB has done no review or made no determinations about this study.

Thanks,

Jenny Maki

IRB Reliance Administrator

206-543-4798

From: Kate Starbird <kstarbi@uw.edu>
Sent: Wednesday, September 15, 2021 10:25 AM
To: HSD Rely <hsdrely@uw.edu>
Cc: Mallory Shaw <mdshaw87@uw.edu>; Crystal Welliver <welliver@uw.edu>
Subject: Re: IRB for NSF grant, UW leading w/ another institution

Hello Jenny,

including Crystal Welliver, cced here.

this won't damage our ability to accept this $3M grant.

exempt status (exposing people to toxic content including conspiracy theories).

I'd be happy to jump on a call to chat more about this.

Thanks again for your time!

Kate Starbird

On Sep 14, 2021, at 2:38 PM, HSD Rely <hsdrely@uw.edu> wrote:

Hi Dr. Starbird,

Before I answer your specific questions, I have some preliminary questions.

Did you consult with anybody at UW HSD before you submitted the NSF application about whether the UW IRB could serve as the single IRB for this project? We ask that all researchers submitting grant applications consult with us prior to the grant submission about whether we can be the single IRB. This ensures that we have the right expertise and staffing levels to serve as the single IRB successfully. If we are not consulted prior to the submission, we may have to decline to be the single IRB which can cause problems with any just-in-time approvals. I ask about this because I could not find this project in our letters of support to serve as the single IRB but I may have missed it. Those letters of support can be very helpful in structuring the IRB application.

Also, is everything you have written into the NSF grant application included in brief description of aims and activities in section 1 of the draft IRB protocol? If there are additional aims and activities, please provide the grant application to us for a quick review. UW IRB will not serve as the single IRB if we determine that the study will receive an exempt determination because these studies are not eligible for single IRB review. Looking at what is currently written in section 1.5 especially, my impression is that this study would receive an exempt determination. If that is the case, then I would direct you to the corresponding review team to answer your specific questions.

Hopefully my questions make sense but let me know if anything is unclear.

Thanks,

Jenny Maki

IRB Reliance Administrator

206-543-4798

From: Kate Starbird <kstarbi@uw.edu>

Sent: Tuesday, September 14, 2021 2:16 PM
To: HSD Rely <hsdrely@uw.edu>
Cc: Mallory Shaw <mdshaw87@uw.edu>
Subject: IRB for NSF grant, UW leading w/ another institution

Hello,

I'm reaching out with questions around an IRB proposal our team (HCDE/iSchool) is developing. The project has been awarded (by the NSF) and is awaiting IRB approval.

And I'm hoping to open up a discussion to ask some questions we have about how best to structure the IRB.

We're the lead institution on a collaborative NSF grant (collaborating with Stanford). We have a letter from Stanford stating that they will be relying upon us for the "single IRB".

The work includes several complementary research components. Some are UW-focused. Some are collaborative. And a few elements are Stanford-led. I'm attaching an early draft of our IRB which provide some info about the different components. I'm also including a graphic below.

I have several questions, including:

- Should we put all the components in the same IRB? Or split them out (social media analysis vs. ethnography vs. surveys and experiments)?
- What about components for which we aren't yet ready to execute (materials are still in development or depend upon other aspects)? For example, the surveys and experiments are not yet ready to launch and will be informed by other research components.
- The research is oriented around collaborative rapid response efforts — which we are studying as a kind of "intervention" — and which inform and are informed by the other research elements. Does that make sense? How do we best communicate that?

I'd be happy to get on a call to chat about the project and get your sense of how best to structure the IRB.

Thank you,

Kate Starbird

Associate Professor, UW HCDE

Co-Founder and Director of the Center for an Informed Public

kstarbi@uw.edu

<SaTC-IRB-slide-SS2.png>

The Human Subjects Division (HSD) strives to ensure that people with disabilities have access to all services and content. **If you experience any accessibility-related issues with this form or any aspect of the application process, email hsdinfo@uw.edu for assistance.**

INSTRUCTIONS

- **This form is only for studies that will be reviewed by the UW IRB**. Before completing this form, check HSD's website to confirm that this should not be reviewed by an external (non-UW) IRB.
- **If you are requesting a determination** about whether the planned activity is human subjects research or qualifies for exempt status, you may skip all questions except those marked with a ◯. For example **1.1** must be answered.
- **Answer all questions**. If a question is not applicable to the research or if you believe you have already answered a question elsewhere in the application, state "NA" (and if applicable, refer to the question where you provided the information). If you do not answer a question, the IRB does not know whether the question was overlooked or whether it is not applicable. This may result in unnecessary "back and forth" for clarification. Use non-technical language as much as possible.
- To check a box, place an "X" in the box. To fill in a text box, make sure your cursor is within the gray text box bar before typing or pasting text.
- For collaborative or multi-site research, describe only the UW activities unless you are requesting that the UW IRB provide the review and oversight for non-UW collaborators or co-investigators as well.
- You may reference other documents (such as a grant application) if they provide the requested information in non-technical language. Be sure to provide the document name, page(s), and specific sections, and upload it to ***Zipline***. Also, describe any changes that may have occurred since the document was written (for example, changes that you've made during or after the grant review process). In some cases, you may need to provide additional details in the answer space as well as referencing a document.
- **NOTE: Do not convert this Word document to PDF.** The ability to use "tracked changes" is required in order to modify your study and respond to screening requests.

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1 OVERVIEW

Study Title: Rapid-Response Frameworks for Mitigating Online Disinformation

1.1 Home institution. Identify the institution through which the lead researcher listed on the IRB application will conduct the research. Provide any helpful explanatory information.

In general, the home institution is the institution (1) that provides the researcher's paycheck and that considers him/her to be a paid employee, or (2) at which the researcher is a matriculated student. Scholars, faculty, fellows, and students who are visiting the UW and who are the lead researcher: identify your home institution and describe the purpose and duration of your UW visit, as well as the UW department/center with which you are affiliated while at the UW.

Note that many UW clinical faculty members are paid employees of non-UW institutions.

*The UW IRB provides IRB review and oversight for only those researchers who meet the criteria described in the **SOP Use of the UW IRB**.*

University of Washington

1.2 Consultation history. Has there been any consultation with someone at HSD about this study?

It is not necessary to obtain advance consultation. However, if advance consultation was obtained, answering this question will help ensure that the IRB is aware of and considers the advice and guidance provided in that consultation.

☐ **No**
☐ **Yes** → If yes, briefly describe the consultation: approximate date, with whom, and method (e.g., by email, phone call, in-person meeting).

1.3 Similar and/or related studies. Are there any related IRB applications that provide context for the proposed activities?

Examples of studies for which there is likely to be a related IRB application: Using samples or data collected by another study; recruiting subjects from a registry established by a colleague's research activity; conducting Phase 2 of a multi-part project, or conducting a continuation of another study; serving as the data coordinating center for a multi-site study that includes a UW site.

Providing this information (if relevant) may significantly improve the efficiency and consistency of the IRB's review.

☐ **No**
☒ **Yes** → If yes, briefly describe the other studies or applications and how they relate to the proposed activities. If the other applications were reviewed by the UW IRB, please also provide: the UW IRB number, the study title, and the lead researcher's name.

The proposed work connects to the following IRBs:

STUDY00003903: Unraveling Online Disinformation Trajectories — Social Media Analysis (PI: Starbird). This IRB covers related research analyzing publicly available social media data to better understand how disinformation spreads online.

STUDY00011061: Journalism Collaboration Misinfo/Disinfo Reporting (PI: Haughey). This IRB covers related research examining collaborations between researchers and journalists to analyze (and, for the journalists, to report on) online disinformation.

STUDY00009923: How Scientific Data, Knowledge, and Expertise Mobilize in Online Media during the COVID-19 Crisis (PI: Spiro). This IRB covers research analyzing online activities to better understand the flow of information related to Covid-19.

1.4 **Externally-imposed urgency or time deadlines.** Are there any externally-imposed deadlines or urgency that affect the proposed activity?

HSD recognizes that everyone would like their IRB applications to be reviewed as quickly as possible. To ensure fairness, it is HSD policy to review applications in the order in which they are received. However, HSD will assign a higher priority to research with externally-imposed urgency that is beyond the control of the researcher. Researchers are encouraged to communicate as soon as possible with their HSD staff contact person when there is an urgent situation (in other words, before submitting the IRB application). Examples: a researcher plans to test an experimental vaccine that has just been developed for a newly emerging epidemic; a researcher has an unexpected opportunity to collect data from students when the end of the school year is only four weeks away.

HSD may ask for documentation of the externally-imposed urgency. A higher priority should not be requested to compensate for a researcher's failure to prepare an IRB application in a timely manner. Note that IRB review requires a certain minimum amount of time; without sufficient time, the IRB may not be able to review and approve an application by a deadline.

☐ **No**
☐ **Yes** → If yes, briefly describe the urgency or deadline as well as the reason for it.

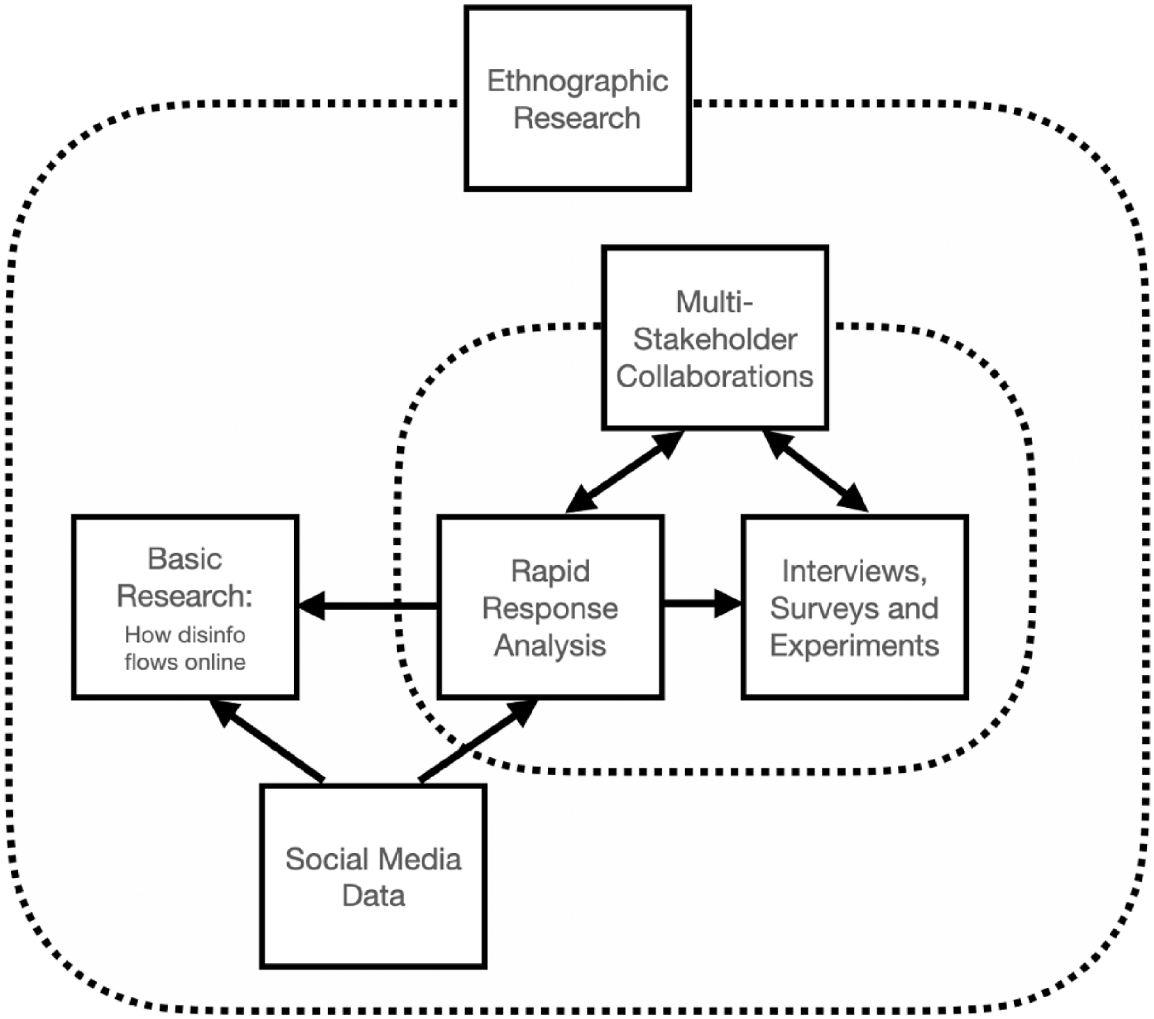
1.5 Objectives Using lay language, describe the purpose, specific aims, or objectives that will be met by this specific project. If hypotheses are being tested, describe them. You will be asked to describe the specific procedures in a later section.

If this application involves the use of a HUD "humanitarian" device: describe whether the use is for "on-label" clinical patient care, "off-label" clinical patient care, and/or research (collecting safety and/or effectiveness data).

The research has multiple objectives:

1. To enhance understandings of how mis- and disinformation spread online.
2. To develop, deploy, and evaluate methods for analyzing online misinformation for "rapid analysis" of emerging mis- and disinformation.
3. To develop, deploy, and evaluate collaborative frameworks for working with diverse stakeholders (journalists, social media companies, government officials, community organizations) to quickly identify, analyze, and communicate about online mis- and disinformation.

It has several distinct but interacting components, illustrated and defined below.



Short description of each component:

- **Basic Research** on how mis/disinformation flow online. The project component draws from social media trace data (and other public data collected from online activities) to answer scientific questions about how misinformation and disinformation are seeded, shaped, and spread through online environments.
- **Rapid Response Analysis** of emergent mis/disinformation threats. Our research team will adapt our existing methods of analysis to quickly detect, analyze, and report on emergent mis/disinformation. Analysis will include qualitative and quantitative methods, including both machine learning and manual content analysis of social media content. The products of these analyses will be shared with collaborating stakeholders (including journalists, election officials, social media platforms, and community partners) and the public at large (through blogs and social media posts).
- **Multi-Stakeholder Collaborations** for collaboratively identifying, analyzing and communicating about emergent mis/disinformation. We will build collaborations with relevant stakeholders, including other research teams, journalists, election officials, social media platforms, and community partners to identify potential mis/disinformation and share the products of our analyses — so that these groups can take action to communicate with their members and/or audiences and thereby mitigate the potential impact of disinformation.
- **Interviews, Surveys, and Experiments for Communication Strategies** for the products of our rapid analyses. Researchers will work with collaborating partners to develop and evaluate techniques for communicating the products of our rapid analyses. This research component will integrate interviews and surveys to understand communication practices and needs with experiments to evaluate the efficacy of different communication practices based on the actual products of our rapid response research.
- **Ethnographic Research** of multi-stakeholder collaborations for rapid response. Using participant observation and interviews with members of collaborating teams ("multi-stakeholder collaborations" above), researchers will seek to understand how these rapid response collaborations are working and identify how they can be improved. One objective of this element is to produce "frameworks" that other teams can use to develop similar rapid response teams and collaborative efforts to address mis/disinformation.

1.6 Study design. Provide a one-sentence description of the general study design and/or type of methodology.

Your answer will help HSD in assigning applications to reviewers and in managing workload. Examples: a longitudinal observational study; a double-blind, placebo-controlled randomized study; ethnographic interviews; web scraping from a convenience sample of blogs; medical record review; coordinating center for a multi-site study.

This is a multi-method study that includes collaborative qualitative/quantitative analysis of social media and other online data, surveys and experiments with stakeholders around communicating the results of those analyses, and ethnographic research to study these multi-stakeholder collaborations.

1.7 Intent. Check all the descriptors that apply to your activity. You must place an "X" in at least one box.

This question is essential for ensuring that your application is correctly reviewed. Please read each option carefully.

Descriptor	
1. Class project or other activity whose purpose is to provide an educational experience for the researcher (for example, to learn about the process or methods of doing research).	☐
2. Part of an institution, organization, or program's own internal operational monitoring.	☐
3. Improve the quality of service provided by a specific institution, organization, or program.	☐

4. Designed to expand the knowledge base of a scientific discipline or other scholarly field of study, and produce results that:

[X]
- Are expected to be applicable to a larger population beyond the site of data collection or the specific subjects studied, or
- Are intended to be used to develop, test, or support theories, principles, and statements of relationships, or to inform policy beyond the study.

[ ] 5. Focus directly on the specific individuals about whom the information or biospecimens are collected through oral history, journalism, biography, or historical scholarship activities, to provide an accurate and evidence-based portrayal of the individuals.

[ ] 6. A quality improvement or program improvement activity conducted to improve the implementation (delivery or quality) of an accepted practice, or to collect data about the implementation of the practice for clinical, practical, or administrative purposes. This does not include the evaluation of the efficacy of different accepted practices, or a comparison of their efficacy.

[ ] 7. Public health surveillance activities conducted, requested, or authorized by a public health authority for the sole purpose of identifying or investigating potential public health signals or timely awareness and priority setting during a situation that threatens public health.

[ ] 8. Preliminary, exploratory, or research development activities (such as pilot and feasibility studies, or reliability/validation testing of a questionnaire)

[ ] 9. Expanded access use of a drug or device not yet approved for this purpose

[ ] 10. Use of a Humanitarian Use Device

[ ] 11. Other. Explain:

1.8 Background, experience, and preliminary work. Answer this question **only** if the proposed activity has one or more of the following characteristics. The purpose of this question is to provide the IRB with information that is relevant to its risk/benefit analysis.

- Involves more than minimal risk (physical or non-physical)
- Is a clinical trial, or
- Involves having the subjects use a drug, biological, botanical, nutritional supplement, or medical device.

"Minimal risk" means that the probability and magnitude of harm or discomfort anticipated in the research are not greater than those ordinarily encountered in daily life or during the performance of routine physical or psychological examinations or tests.

a. Background. Provide the rationale and the scientific or scholarly background for the proposed activity, based on existing literature (or clinical knowledge). Describe the gaps in current knowledge that the project is intended to address.

This should be a plain language description. Do not provide scholarly citations. Limit your answer to less than one page, or refer to an attached document with background information that is no more than three pages long.

Addressing pervasive misinformation — especially intentional *disinformation* — is one of society's most pressing challenges. Disinformation affects human health (Zarocostas, 2020; Roozenbeek et al., 2020), planetary health (Oreskes & Conway, 2011; van der Linden et al., 2017), diplomacy (Rid, 2020; Goldman, 2016), elections (Faris et al., 2017; Bak-Coleman et al., 2020; Benkler et al., 2020)

and collective decision-making more broadly (Starbird et al., 2019). Disinformation reduces our ability to respond to emerging threats and disasters. The COVID-19 pandemic and the recent 2020 U.S. elections provide evidence of the direct impact of disinformation; resistance to public health policies (Carrieri et al., 2019; Roozenbeek et al., 2020) and the U.S. Capitol riots on Jan. 6, 2021 (Reader, 2021) are notable examples. In other cases, effects are indirect and difficult to measure. Both indicate we need to better understand how disinformation is seeded, cultivated, and spread.

Disinformation's most consequential effects are the degradation of trust in the democratic process, degradation of trust in institutions, and degradation of trust in each other (Bradshaw & Howard, 2018). Disinformation is an attack on our collective ability to make sense of information and to build shared realities — the kind of common ground that a democratic society needs to stand upon to govern itself (Farrell & Shneier, 2018). Even the institution of science, which has maintained high levels of trust for decades, has begun to see declines among some parts of the population in the United States (West & Bergstrom, 2021; Iyengar & Massey, 2018; Gauchat, 2012).

Despite increased attention on the issue of disinformation, knowledge gaps exist. Researchers typically define disinformation as information intended to mislead, but in practice, both veracity and intention can be difficult to determine. The participatory and diffuse nature of disinformation (Starbird et al., 2019) makes it especially challenging to detect and address. We need a better understanding of what disinformation is and how it functions — and the proposed research seeks to enhance this understanding.

But even if we could consistently and accurately characterize and detect disinformation, can we do this fast enough in practice and in ways that mitigate the negative effects of disinformation rather than amplify them? How do we integrate real-time responses across diverse stakeholders, e.g., social media platforms, journalists, and governments? And how do we communicate about emergent disinformation campaigns in ways that are useful to these and other stakeholders, including the public at large? It is these questions that we hope to address with this research.

[Move in citations from SaTC Proposal]

b. Experience and preliminary work. Briefly describe experience or preliminary work or data (if any) that you, your team, or your collaborators/co-investigators have that supports the feasibility and/or safety of this study.

It is not necessary to summarize all discussion that has led to the development of the study protocol. The IRB is interested only in short summaries about experiences or preliminary work that suggest the study is feasible and that risks are reasonable relative to the benefits. Examples: Your team has already conducted a Phase 1 study of an experimental drug which supports the Phase 2 study being proposed in this application; your team has already done a small pilot study showing that the reading skills intervention described in this application is feasible in an after-school program with classroom aides; your team has experience with the type of surgery that is required to implant the study device; the study coordinator is experienced in working with subjects who have significant cognitive impairment.

Researchers on our team have extensive experience applying mixed-methods to the analysis of social media data to better understand how mis- and disinformation take root and spread across the internet (e.g. 51 et al., 2016; 51 et al., 2018, 51 et al., 2018, Starbird et al., 2018; Starbird et al., 2019). We have established the infrastructure to collect, store, analyze, and (in cases where it aligns with terms of service) share online data — e.g. public data from social media platforms — for research.

Members of our team have also been studying how journalists working on the "misinformation beat" rely on various resources — including external sources — to help them understand how mis- and disinformation spread online (Haughey et al., 2020). That work (which includes active collaborations around analysis and ethnographic work to study those collaborations) continues to study collaborations between journalists and researchers (existing IRB mentioned above). The proposed

research will expand that inquiry to include other collaborative partners.

We have previously organized and participated in "rapid response" efforts to address emergent disinformation. In Fall 2020, our two research teams (at UW and Stanford) collaborated with two external analysis teams and a variety of stakeholders — including journalists, social media platforms, government officials, and community organizations — as part of the "Election Integrity Partnership" to conduct rapid analysis of online misinformation related to the election. Findings from these research efforts were quickly communicated with partners and the public at large — through articles, blogs, and social media posts (e.g. Browning, 2020; Starbird et al., 2020; Tollefson, 2021). A final report (Center for an Informed Public et al., 2020) documents the extent of these activities. The research outlined in this IRB dovetails on that effort and seeks to understand how these collaborations "work" and how they might evolve in the future to help address emergent mis- and disinformation about elections and crises (from pandemics to climate change).

51 , and Kate Starbird. (2018). Acting the Part: Examining Information Operations within #BlackLivesMatter Discourse. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 20.

Kellen Browning. (November 3, 2020). After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows. *New York Times*. Available at: https://www.nytimes.com/2020/11/03/technology/after-twitter-labels-trumps-tweet-about-pennsylvania-its-spread-slows.html

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election.* Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

51 , and Kate Starbird. (2020). On the Misinformation Beat: Understanding the Work of Investigative Journalists Reporting on Problematic Information Online. *Proc. ACM Hum.Comput. Interact. 4, CSCW2*, Article 133 (October 2020), 22 pages. https://doi.org/10.1145/3415204

Kate Starbird, Michael Caulfield, Renee DiResta, Jevin West, Emma Spiro, 51 Rachel Moran, and 51 . October 26, 2020. "Uncertainty and misinformation: What to expect on election night and days after." Blog posted by *Election Integrity Partnership*. https://www.eipartnership.net/news/what-to-expect

Kate Starbird, 51 (2019). Disinformation as Collaborative Work: Surfacing the Participatory Nature of Strategic Information Operations. *PACMHCI. 3, Computer-Supported Cooperative Work (CSCW 2019)*. Article 127.

51 and Kate Starbird. (2018). Assembling Strategic Narratives: Information Operations as Collaborative Work within an Online Community. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 183.

Kate Starbird, 51 and Daniel Scarnecchia. (2018). Ecosystem or Echo-System? Exploring Content Sharing across Alternative Media Domains. Presented at *12th International AAAI Conference on Web and Social Media (ICWSM 2018)*, Stanford, CA, (pp. 365-374).

51 Kate Starbird and Emma Spiro. (2016). Rumors at the Speed of Light? Modeling the Rate of Rumor Transmission during Crisis. *Hawaii International Conference on System Sciences (HICSS*

2016). (pp. 1969-1978).

Jeff Tollefson. "Tracking QAnon: how Trump turned conspiracy-theory research upside down." *Nature Communications*. February 4, 2021. https://www.nature.com/articles/d41586-021-00257-y

1.9 Supplements. Check all boxes that apply, to identify relevant Supplements that should be completed and uploaded to ***Zipline***.

This section is here instead of at the end of the form to reduce the risk of duplicating information in this IRB Protocol form that you will need to provide in these Supplements.

Check all That Apply	Type of Research	Supplement Name
☐	**Department of Defense** The research involves Department of Defense funding, facilities, data, or personnel.	SUPPLEMENT Department of Defense
☐	**Department of Energy** The research involves Department of Energy funding, facilities, data, or personnel.	SUPPLEMENT Department of Energy
☐	**Drug, biologic, botanical, supplement** Procedures involve the use of any drug, biologic, botanical or supplement, even if the item is not the focus of the proposed research	SUPPLEMENT Drugs
☐	**Emergency exception to informed consent** Research that requires this special consent waiver for research involving more than minimal risk	SUPPLEMENT Exception from Informed Consent for Emergency Research (EFIC)
☐	**Genomic data sharing** Genomic data are being collected and will be deposited in an external database (such as the NIH dbGaP database) for sharing with other researchers, and the UW is being asked to provide the required certification or to ensure that the consent forms can be certified	SUPPLEMENT Genomic Data Sharing
☐	**Medical device** Procedures involve the use of any medical device, even if the device is not the focus of the proposed research, except when the device is FDA-approved and is being used through a clinical facility in the manner for which it is approved	SUPPLEMENT Devices
☒	**Multi-site or collaborative study** The UW IRB is being asked to review on behalf of one or more non-UW institutions in a multi-site or collaborative study.	SUPPLEMENT Multi-site or Collaborative Research
☐	**Non-UW Individual Investigators** The UW IRB is being asked to review on behalf of one or more non-UW individuals who are not affiliated with another organization for the purpose of the research.	SUPPLEMENT Non-UW Individual Investigators
☐	**Other REDCap Installation Attestation for Electronic Consent** The research will use a non-UW installation of REDCap for conducting and/or documenting informed consent.	SUPPLEMENT Other REDCap Installation
☐	None of the above	

☐

1.10 **Confirm by checking the box below** that you will comply with the COVID requirements described on HSD's COVID webpage, which are based on the location of the in-person study procedures and the vaccination status of study team members and study participants.

Review the HSD website for current guidelines about which in-person research activities are allowable.

[X] **Confirmed**

2 PARTICIPANTS

2.1 **Participants**. Describe the general characteristics of the subject populations or groups, including age range, gender, health status, and any other relevant characteristics.

This proposal has several different components that have different kinds of participants.

For **Basic Research** on how mis- and disinformation flow online, we will conduct mixed (quantitative and qualitative) analysis on social media data collected from multiple platforms, including Twitter, Facebook, Instagram, YouTube, Reddit, TikTok, and others.

All of our research will rely on public data — originally shared publicly on social media and visible (at the time of posting) either to anyone on the Internet or all users of the specific platform. There are three different types of collections:

1. *Public data, directly collected* by our team through public application programming interfaces (APIs), web scraping programs, and manual screenshots.
2. *Public data, collected through a mediating entity* — for example via special APIs provided to qualified academic researchers via an application process (e.g. Social Science One, Twitter's Academic API, Facebook's Crowdtangle API or FORT API).
3. *Public data, shared by a collaborating partner.* Researchers are increasingly making available their collections of social media data, through private websites, data repositories hosted at academic institutions and non-profits (e.g. PushShift) and data sharing networks. We plan to utilize social media data collected by others that are publicly available within these repositories.

We will limit our analysis to social media data that was shared through public accounts — data that was publicly visible (to any/all users of those platforms) at the time of collection. "Participants" will be social media users who shared or engaged with social media content captured by our collections — e.g. tweets with specific keywords related to current events generally or disinformation campaigns specifically. These can include people from all over the world and people of any age. Due to the nature of our collections, we do not foresee children comprising a large portion of participants captured in our collections. However, there will likely be some posts and/or engagements from children (13-17) included in these collections.

For our **Interviews, Surveys, and Experiments for Communication Strategies** component:

1. Interview and survey participants include members of stakeholder organizations (such as AARP, First Draft, and others)
2. We will also conduct surveys on the audiences of stakeholder organizations.
3. Experiments...

For our **Ethnographic Research**, participants include members of our and our collaborators' research teams as well as members of stakeholder organizations. Everyone participating in the collaboration (on

any of the stakeholder teams) will be asked to participate, either indirectly only (through observation) or both directly (via interviews) and indirectly. Participants will primarily be adults, though there may be a very small number (1-2) of student-researchers in the observation groups who are not yet 18. Most will be US-based, but it's possible that we will be collaborating with international partners as well. There are no other exclusion criteria.

2.2 Inclusion and exclusion criteria.

a. Inclusion criteria. Describe the specific criteria that will be used to decide who will be included in the research from among interested or potential subjects. Define any technical terms in lay language.

"Participants" in the social media data analysis will be people who operate accounts that shared content related to one of the "events" or "misinformation incidents" we are studying.

<surveys/experiments>

Participants in the ethnographic analysis include members of our and our collaborators' research teams as well as members of stakeholder organizations. Participants will be the members of these groups who are collaborating on our "rapid response" project or working with other team members who are.

b. Exclusion criteria. Describe the specific criteria that will be used to decide who will be excluded from the research from subjects who meet the inclusion criteria listed above. Define any technical terms in lay language.

There are no exclusion criteria.

2.3 Prisoners. IRB approval is required in order to include prisoners in research, even when prisoners are not an intended target population.

Is the research likely to have subjects who become prisoners while participating in the study?

For example, a longitudinal study of youth with drug problems is likely to have subjects who will be prisoners at some point during the study.

[X] **No**
[ ] **Yes** → If yes, if a subject becomes a prisoner while participating in the study, will any study procedures and/or data collection related to the subject be continued while the subject is a prisoner?

  [ ] **No**
  [ ] **Yes** → If yes, describe the procedures and/or data collection that will continue with prisoner subjects

2.4 Will the proposed research recruit or obtain data from individuals that are known to be prisoners?

*For records reviews: if the records do not indicate prisoner status and prisoners are not a target population, select "No". See the **GUIDANCE Prisoners** for the definition of "prisoner", which is not necessarily tied to the type of facility in which a person is residing.*

[X] **No**
[ ] **Yes** → If yes, answer the following questions (i – iv).

i. Describe the type of prisoners, and their location(s):

ii. One concern about prisoner research is whether the effect of participation on prisoners' general living conditions, medical care, quality of food, amenities, and/or opportunity for earnings in prison will be so great that it will make it difficult for prisoners to adequately consider the research risks. How will the chances of this be reduced?

iii. Describe what will be done to make sure that (a) recruitment and subject selection procedures will be fair to all eligible prisoners and (b) prison authorities or other prisoners will not be able to arbitrarily prevent or require particular prisoners from participating.

iv. If the research is funded by one of these federal departments and agencies (Health & Human Services; Energy; Defense; Homeland Security; CIA; Social Security Administration), and/or will involve prisoners in federal facilities or in state/local facilities outside of Washington State: check the box below to provide assurance that study team members will (a) not encourage or facilitate the use of a prisoner's participation in the research to influence parole or pardon decisions, and (b) clearly inform each prisoner in advance (for example, in a consent form) that participation in the research will have no effect on his or her parole or pardon.

☐ **Confirmed**

2.5 Protected populations. IRB approval is required for the use of the subject populations listed here. Check the boxes for any of these populations that will be purposefully included. (In other words, being a part of the population is an inclusion criterion for the study.)

The WORKSHEETS describe the criteria for approval but do not need to be completed and should not be submitted.

Population	Worksheet
☐ Fetuses in utero	WORKSHEET Pregnant Women
☐ Neonates of uncertain viability	WORKSHEET Neonates
☐ Non-viable neonates	WORKSHEET Neonates
☐ Pregnant women	WORKSHEET Pregnant Women

a. If you check any of the boxes above, use this space to provide any information that may be relevant for the IRB to consider.

2.6 Native Americans or non-U.S. indigenous populations. Will Native American or non-U.S. indigenous populations be actively recruited through a tribe, tribe-focused organization, or similar community-based organization?

Indigenous people are defined in international or national legislation as having a set of specific rights based on their historical ties to a particular territory and their cultural or historical distinctiveness from other populations that are often politically dominant.

Examples: a reservation school or health clinic; recruiting during a tribal community gathering

☒ **No**
☐ **Yes** → If yes, name the tribe, tribal-focused organization, or similar community-based organization. The UW IRB expects that tribal/indigenous approval will be obtained before beginning the research.

This may or may not involve approval from a tribal IRB. The study team and any collaborators/investigators are also responsible for identifying any tribal laws that may affect the

2.7 Third party subjects. Will the research collect private identifiable information about *other individuals* from the study subjects? Common examples include: collecting medical history information or contact information about family members, friends, co-workers.

"Identifiable" means any direct or indirect identifier that, alone or in combination, would allow you or another member of the research team to readily identify the person. For example, suppose that the research is about immigration history. If subjects are asked questions about their grandparents but are not asked for names or other information that would allow easy identification of the grandparents, then private identifiable information is not being collected about the grandparents and the grandparents are not subjects.

☐ **No**
☐ **Yes** → If yes, these individuals are considered human subjects in the study. Describe them and what data will be collected about them.

2.8 Number of subjects. Is it possible to predict or describe the maximum number of subjects (or subject units) needed to complete the study, for each subject group?

Subject units mean units within a group. For most research studies, a group will consist of individuals. However, the unit of interest in some research is not the individual. Examples:

- *Dyads such as caregiver-and-Alzheimer's patient, or parent and child*
- *Families*
- *Other units, such as student-parent-teacher*

Subject group means categories of subjects that are meaningful for the specific study. Some research has only one subject group – for example, all UW students taking Introductory Psychology. Some common ways in which subjects are grouped include:

- *By intervention – for example, an intervention group and a control group.*
- *By subject population or setting – for example, urban versus rural families*
- *By age – for example, children who are 6, 10, or 14 years old.*

The IRB reviews the number of subjects in the context of risks and benefits. Unless otherwise specified, if the IRB determines that the research involves no more than minimal risk: there are no restrictions on the total number of subjects that may be enrolled. If the research involves more than minimal risk: The number of enrolled subjects must be limited to the number described in this application. If it is necessary later to increase the number of subjects, submit a Modification. Exceeding the IRB-approved number (over-enrollment) will be considered non-compliance.

☐ **No** → If no, provide the rationale in the box below. Also, provide any other available information about the scope/size of the research. You do not need to complete the table.

Example: It may not be possible to predict the number of subjects who will complete an online survey advertised through Craigslist, but you can state that the survey will be posted for two weeks and the number who respond is the number who will be in the study.

☐ **Yes** → If yes, for each subject group, use the table below to provide the estimate of the maximum desired number of individuals (or other subject unit, such as families) who will complete the research.

Group name/description	Maximum desired number of individuals (or other subject unit, such as families) who will complete the research ***Provide numbers for the site(s) reviewed by the UW IRB and for the study-wide total number; example: 20/100***

3 NON-UW RESEARCH SETTING

Complete this section only if UW investigators and people named in the SUPPLEMENT: Non-UW Individual Investigators will conduct research procedures outside of UW and Harborview

3.1 Reason for locations. Describe the reason(s) for choosing the locations.

This is especially important when the research will occur in locations or with populations that may be vulnerable to exploitation. One of the three ethical principles the IRB must consider is justice: ensuring that reasonable, non-exploitative, and well-considered procedures are administered fairly, with a fair distribution of costs and potential benefits.

3.2 Local context. Culturally appropriate procedures and an understanding of local context are an important part of protecting subjects. Describe any site-specific cultural issues, customs, beliefs, or values that may affect the research, how it is conducted, or how consent is obtained or documented.

Examples: It would be culturally inappropriate in some international settings for a woman to be directly contacted by a male researcher; instead, the researcher may need to ask a male family member for permission before the woman can be approached. It may be appropriate to obtain permission from community leaders prior to obtaining consent from individual members of a group. In some distinct cultural groups, signing forms may not be the norm.

This federal site maintains an international list of human research standards and requirements:
http://www.hhs.gov/ohrp/international/index.html

3.3 Location-specific laws. Describe any local laws that may affect the research (especially the research design and consent procedures). The most common examples are laws about:

- **Specimens** – for example, some countries will not allow biospecimens to be taken out of the country.
- **Age of consent** – laws about when an individual is considered old enough to be able to provide consent vary across states, and across countries.
- **Legally authorized representative** – laws about who can serve as a legally authorized representative (and who has priority when more than one person is available) vary across states and countries.
- **Use of healthcare records** – many states (including Washington State) have laws that are similar to the federal HIPAA law but that have additional requirements.

3.4 Location-specific administrative or ethical requirements. Describe local administrative or ethical requirements that affect the research.

Example: A school district may require researchers to obtain permission from the head district office as well as school principals before approaching teachers or students; a factory in China may allow researchers to interview factory workers but not allow the workers to be paid for their participation.

3.5 If the PI is a student: Does the research involve traveling outside of the US?

☐ **No**

☐ **Yes** → If yes, confirm by checking the box that (1) you will register with the UW Office of Global Affairs before traveling; (2) you will notify your advisor when the registration is complete; and (3) you will request a UW Travel Waiver if the research involves travel to the list of countries requiring a UW Travel Waiver.

☐ **Confirmed**

4 RECRUITING and SCREENING PARTICIPANTS

4.1 Recruiting and Screening. Describe how subjects will be identified, recruited, and screened. Include information about: how, when, where, and in what setting. Identify who (by position or role, not name) will approach and recruit subjects, and who will screen them for eligibility.

Note: Per UW Medicine policy, the UW Medicine eCare/MyChart system may not be used for research recruitment purposes.

4.2 Recruitment materials.

a. What materials (if any) will be used to recruit and screen subjects?

Examples: talking points for phone or in-person conversations; video or audio presentations; websites; social media messages; written materials such as letters, flyers for posting, brochures, or printed advertisements; questionnaires filled out by potential subjects.

b. Upload descriptions of each type of material (or the materials themselves) to ***Zipline***. If letters or emails will be sent to any subjects, these should include a statement about how the subject's name and contact information were obtained. No sensitive information about the person (such as a diagnosis of a medical condition) should be included in the letter. The text of these letters and emails must be uploaded to ***Zipline*** (i.e., a description will not suffice).

HSD encourages researchers to consider uploading descriptions of most recruitment and screening materials instead of the materials themselves. The goal is to provide the researchers with the flexibility to change some information on the materials without submitting a Modification for IRB approval of the changes. Examples:

- *Provide a list of talking points that will be used for phone or in-person conversations instead of a script.*
- *For the description of a flyer, include the information that it will provide the study phone number and the name of a study contact person (without providing the actual phone number or name). This means that a Modification would not be necessary if/when the study phone number or contact person changes. Also, instead of listing the inclusion/exclusion criteria, the description below might state that the flyer will list one or a few of the major inclusion/exclusion criteria.*
- *For the description of a video or a website, include a description of the possible visual elements and a list of the content (e.g., study phone number; study contact person; top three inclusion/exclusion criteria; payment of $50; study name; UW researcher).*

4.3 Relationship with participant population. Do any members of the study team have an existing relationship with the study population(s)?

Examples: a study team member may have a dual role with the study population (for example, being their clinical care provider, teacher, laboratory directory or tribal leader in addition to recruiting them for his/her research).

☐ **No**
☐ **Yes** → If yes, describe the nature of the relationship.

4.4 Payment to participants. The IRB must evaluate subject payment for the possibility that it will unduly influence subjects to participate. Refer to GUIDANCE Subject Payment when designing subject payment plans. Provide the following information about your plans for paying research subjects in the text box below or note that the information can be found in the consent form.

- The total amount/value of the payment
- Schedule/timing of the payment [i.e., when will subjects receive the payment(s)]
- Purpose of the payment [e.g., reimbursement, compensation, incentive]
- Whether payment will be "pro-rated" so that participants who are unable to complete the research may still receive some part of the payment

The IRB expects the consent process or study information provided to the subjects to include all of the above-listed information about payment, including the number and amount of payments, and especially when subjects can expect to receive payment.

One of the most frequent complaints received by HSD is from subjects who expected to receive cash or a check on the day that they completed a study and who were angry or disappointed when payment took 6-8 weeks to reach them.

Researchers should review current UW Financial Management requirements about when Social Security Numbers must be collected, and when research payment must be reported to the UW Tax Office and the IRS: https://finance.uw.edu/ps/how-pay/research-subjects.

4.5 Non-monetary compensation. Describe any non-monetary compensation that will be provided. Example: extra credit for students; a toy for a child. If class credit will be offered to students, there must be an alternate way for the students to earn the extra credit without participating in the research.

4.6 Will data or specimens be accessed or obtained for recruiting and screening procedures prior to enrollment?

Examples: names and contact information; the information gathered from records that were screened; results of screening questionnaires or screening blood tests; Protected Health Information (PHI) from screening medical records to identify possible subjects.

☐ **No** → If no, skip the rest of this section; go to question **5.1**.

☐ **Yes** → If yes, describe the data and/or specimens (including PHI) and whether it will be retained as part of the study data.

4.7 Consent for recruiting and screening. Will consent be obtained for any of the recruiting and screening procedures? (Section 8: Consent of Adults asks about consent for the main study procedures).

"Consent" includes: consent from individuals for their own participation; parental permission; assent from children; consent from a legally authorized representative for adult individuals who are unable to provide consent.

Examples:

- *For a study in which names and contact information will be obtained from a registry: the registry should have consent from the registry participants to release their names and contact information to researchers.*
- *For a study in which possible subjects are identified by screening records: there will be no consent process.*
- *For a study in which individuals respond to an announcement and call into a study phone line: the study team person talking to the individual may obtain non-written consent to ask eligibility questions over the phone.*

☐ **No** → If no, skip the rest of this section; go to question **5.1**.

☐ **Yes** → If yes, describe the consent process.

a. Documentation of consent. Will a written or verifiable electronic signature from the subject on a consent form be used to document consent for the **recruiting and screening procedures**?

☐ **No** → If no, describe the information that will be provided during the consent process and for which procedures.

☐ **Yes, written** → If yes, and a **written** signature will be used to document consent:
- Upload the consent form to ***Zipline***.

☐ **Yes, electronic** → If yes, and an **electronic** signature will be used to document consent:
- Upload the consent form to ***Zipline***.
- **If the eSignature process or method for recruiting and screening is different than for the main study procedures**, use the questions about electronic consent in Section 8.3 and 8.4 to differentiate between recruiting/screening and main study electronic consent. **If electronic consent will be used for recruiting/screening but not main study consent**, use 8.3 and 8.4 to describe eConsent and note that it is only for recruiting/screening.

5 PROCEDURES

5.1 Study procedures. Using lay language, provide a complete description of the study procedures, including the sequence, intervention or manipulation (if any), drug dosing information (if any), blood volumes and frequency of draws (if any), use of records, time required, and setting/location. If it is available: Upload a study flow sheet or table to ***Zipline***.

For studies comparing standards of care: It is important to accurately identify the research procedures. See UW IRB ***POLICY Risks of Harm from Standard Care*** *and the draft guidance from the federal Office of Human Research Protections,* ***"Guidance on Disclosing Reasonably Foreseeable Risks in Research Evaluating Standards of Care";*** *October 20, 2014. Information about pediatric blood volume and frequency of draws that would qualify for expedited review can be found in this* **reference table** *on the Seattle Children's IRB website.*

5.2 Recordings. Does the research involve creating audio or video recordings?

☐ **No** → If no, go to question **5.3**.
☐ **Yes** → If yes, verify that you have described what will be recorded in 5.1 and answer question **a.**

a. Before recording, will consent for being recorded be obtained from subjects and any other individuals who may be recorded?

☐ **No** → If no, email hsdinfo@uw.edu before submitting this application in Zipline. In the email, include a brief description of the research and a note that individuals will be recorded without their advance consent.

☐ **Yes**

5.3 MRI scans. Will any subjects have a Magnetic Resonance Imaging (MRI) scan as part of the study procedures?

This means scans that are performed solely for research purposes or clinical scans that are modified for research purposes (for example, using a gadolinium-based contrast agent when it is not required for clinical reasons).

☐ **No** → If no, go to question **5.4**.

☐ **Yes** → If yes, answer questions **a** through **c**.

a. Describe the MRI scan(s). Specifically:

- What is the purpose of the scan(s)? *Examples: obtain research data; safety assessment associated with a research procedure.*
- Which subjects will receive an MRI scan?
- Describe the minimum and maximum number of scans per subject, and over what time period the scans will occur. *For example: all subjects will undergo two MRI scans, six months apart.*

b. MRI facility. At which facility(ies) will the MRI scans occur? Check all that apply.

☐	UWMC Radiology/Imaging Services (the UWMC clinical facility)
☐	DISC Diagnostic Imaging Sciences Center (UWMC research facility)
☐	CHN Center for Human Neuroscience MRI Center (Arts & Sciences research facility)
☐	BMIC Biomolecular Imaging Center (South Lake Union research facility)
☐	Harborview Radiology/Imaging Services (the Harborview clinical facility)
☐	SCCA Imaging Services
☐	Northwest Diagnostic Imaging
☐	Other: identify in the text box below:

c. Personnel. For MRI scans that will be conducted at the DISC, CHN or BMIC research facilities: Indicate who will be responsible for operating the MRI scanner by checking all that apply.

☐	MRI technician who is formally qualified
☐	Researcher who has completed scanner operator training provided by a qualified MRI operator

5.4 **Data variables.** Describe the specific data that will be obtained (including a description of the most sensitive items). Alternatively, a list of the data variables may be uploaded to ***Zipline***.

5.5 **Data sources.** For all types of data that will be accessed or collected for this research: Identify whether the data are being obtained from the subjects (or subjects' specimens) or whether they are being obtained from some other source (and identify the source).

If you have already provided this information in Question 5.1, you do not need to repeat the information here.

5.6 Identifiability of data and specimens. Answer these questions carefully and completely. This will allow HSD to accurately determine the type of review that is required and the relevant compliance requirements. Review the following definitions before answering the questions:

__Access__ means to view or perceive data, but not to possess or record it. See, in contrast, the definition of "obtain".
__Identifiable__ means that the identity of an individual is or may be readily (1) ascertained by the researcher or any other member of the study team from specific data variables or from a combination of data variables, or (2) associated with the information.
__Direct identifiers__ are direct links between a subject and data/specimens. Examples include (but are not limited to): name, date of birth, medical record number, email or IP address, pathology or surgery accession number, student number, or a collection of data that is (when taken together) identifiable.
__Indirect identifiers__ are information that links between direct identifiers and data/specimens. Examples: a subject code or pseudonym.
__Key__ refers to a single place where direct identifiers and indirect identifiers are linked together so that, for example, coded data can be identified as relating to a specific person. Example: a master list that contains the data code and the identifiers linked to the codes.
__Obtain__ means to possess or record in any fashion (writing, electronic document, video, email, voice recording, etc.) for research purposes and to retain for any length of time. This is different from __accessing__, which means to view or perceive data.

a. Will you or any members of your team have access to any direct or indirect identifiers?

☐ **Yes** → If yes, describe which identifiers and for which data/specimens.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not have access to direct or indirect identifiers.

- ☐ There will be no identifiers.
- ☐ Identifiers or the key have been (or will have been) destroyed before access.
- ☐ There is an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) to study team members under any circumstances.

  This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.
- ☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.
- ☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

b. Will you or any study team members obtain any direct or indirect identifiers?

☐ **Yes** → If yes, describe which identifiers and for which data/specimens.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not obtain direct or indirect identifiers.

- ☐ There will be no identifiers.
- ☐ Identifiers or the key have been (or will have been) destroyed before access.

☐ There will be an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

c. If any identifiers will be obtained, indicate how the identifiers will be stored (and for which data). NOTE: Do not describe the data security plan here – that information is requested in section 9.6.

☐ Identifiers will be stored with the data. Describe the data to which this applies:

☐ Identifiers and study data will be stored separately but a link will be maintained between the identifiers and the study data (for example, through the use of a code). Describe the data to which this applies:

☐ Identifiers and study data will be stored separately, with no link between the identifiers and the study data. Describe the data to which this applies:

d. Research collaboration. Will individuals who provide coded information or specimens for the research also collaborate on other activities for this research? If yes, identify the activities and provide the name of the collaborator's institution/organization.

Examples include but are not limited to: (1) study, interpretation, or analysis of the data that results from the coded information or specimens; and (2) authorship on presentations or manuscripts related to this work.

5.7 Protected Health Information (PHI). Will participants' identifiable PHI be accessed, obtained, used, or disclosed for any reason (for example, to identify or screen potential subjects, to obtain study data or specimens, for study follow-up) that does not involve the creation or obtaining of a Limited Data Set?

PHI is individually identifiable healthcare record information or clinical specimens from an organization considered a "covered entity" by federal HIPAA regulations, in any form or media, whether electronic, paper, or oral. ***You must answer yes to this question if the research involves identifiable health care records (e.g., medical, dental, pharmacy, nursing, billing, etc.), identifiable healthcare information from a clinical department repository, or observations or recordings of clinical interactions.***

For information about what constitutes the UW Covered Entity, see UW Medicine Compliance Patient Information Privacy Policy 101 and diagram of the healthcare components.

☐ **No** → If no, skip the rest of this question; go to question **5.8**.

☐ **Yes** → If yes, answer all of the questions below.

a. Describe the PHI and the reason for using it. *Be specific. For example, will any "free text" fields (such as physician notes) be accessed, obtained, or used?*

b. Is any of the PHI located in Washington State?

☐ **No**
☐ **Yes**

c. Describe the pathway of how the PHI will be accessed or obtained, starting with the source/location and then describing the system/path/mechanism by which it will be identified, accessed, and copied for the research. *Be specific. For example: directly view records; search through a department's clinical database; submit a request to Leaf.*

d. For which PHI will subjects provide HIPAA authorization before the PHI is accessed, obtained and/or used?

Confirm by checking the box that the UW Medicine HIPAA Authorization form maintained on the HSD website will be used to access, obtain, use, or disclose any UW Medicine PHI.

☐ **Confirmed**

e. Will you obtain any HIPAA authorizations electronically (i.e., e-signature)?

☐ **No**
☐ **Yes**

If 'Yes', confirm by checking the box that you have read and understand the 'Special Considerations' section of the **GUIDANCE Electronic Informed Consent** for information regarding the use of electronic signatures and HIPAA authorizations.

☐ **Confirmed**

f. For which PHI will HIPAA authorization NOT be obtained from the subjects?

Provide the following assurances by checking the boxes.

☐ The minimum necessary amount of PHI to accomplish the purposes described in this application will be accessed, obtained and/or used.

☐ The PHI will not be reused or disclosed to any other person or entity, except as required by law, for authorized oversight of the research study, or for other research for which the use or disclosure of PHI would be permitted.

☐ The HIPAA "accounting for disclosures" requirement will be fulfilled, if applicable. See UW Medicine Compliance Policy #104.

☐ There will be reasonable safeguards to protect against identifying, directly or indirectly, any patient in any report of the research.

5.8 Genomic data sharing. Will the research obtain or generate genomic data?

No

Yes
→ If yes, answer the question below.

a. Will genomic data from this research be sent to a national database (for example, NIH's dbGaP database)?

No

Yes
→ If yes, complete the **SUPPLEMENT Genomic Data Sharing** and upload it to ***Zipline***.

5.9 Whole genome sequencing. For research involving biospecimens: Will the research include whole genome sequencing?

Whole genome sequencing is sequencing of a human germline or somatic specimen with the intent to generate the genome or exome sequence of that specimen.

No

Yes

5.10 Possible secondary use or sharing of information, specimens, or subject contact information. Is it likely that the obtained or collected information, specimens, or subject contact information will be used for any of the following:

- Future research not described in this application (in other words, secondary research)
- Submission to a repository, registry, or database managed by the study team, colleagues, or others for research purposes
- Sharing with others for their own research

Please consider the broadest possible future plans and whether consent will be obtained now from the subjects for future sharing or research uses (which it may not be possible to describe in detail at this time). Answer **YES** even if future sharing or uses will use de-identified information or specimens. Answer **NO** if sharing is unlikely or if the only sharing will be through the NIH Genomic Data Sharing described in question 5.8.

Many federal grants and contracts now require data or specimen sharing as a condition of funding, and many journals require data sharing as a condition of publication. "Sharing" may include (for example): informal arrangements to share banked data/specimens with other investigators; establishing a repository that will formally share with other researchers through written agreements; or sending data/specimens to a third party repository/archive/entity such as the Social Science Open Access Repository (SSOAR), or the UCLA Ethnomusicology Archive.

No

Yes
→ If yes, answer all of the questions below.

a. Describe what will be stored for future use, including whether any direct or indirect (e.g., subject codes) identifiers will be stored.

b. Describe what will be shared with other researchers or with a repository/database/registry, including whether direct identifiers will be shared and (for specimens) what data will be released with the specimens.

c. Who will oversee and/or manage the sharing?

d. Describe the possible future uses, including limitations or restrictions (if any) on future uses or users. As stated above, consider the broadest possible uses.

Examples: data will be used only for cardiovascular research; data will not be used for research on population origins.

e. Consent. Will consent be obtained now from subjects for the secondary use, banking and/or future sharing?

No

Yes
→ If yes, be sure to include the information about this consent process in the consent form (if there is one) and in the answers to the consent questions in Section 8.

f. Withdrawal. Will subjects be able to withdraw their data/specimens from secondary use, banking or sharing?

No

Yes
→ If yes, describe how, and whether there are any limitations on withdrawal.

Example: data can be withdrawn from the repository but cannot be retrieved after they are released.

g. Agreements for sharing or release. Confirm by checking the box that the sharing or release will comply with UW (and, if applicable, UW Medicine) policies that require a formal agreement with the recipient for release of data or specimens to individuals or entities other than federal databases.

Data Use Agreements or Gatekeeping forms are used for data; Material Transfer Agreements are used for specimens (or specimens plus data). Do not attach any template agreement forms; the IRB neither reviews nor approves them

Confirmed

5.11 Communication with subjects during the study. Describe the types of communication (if any) the research team will have with already-enrolled subjects during the study. Provide a description instead of the actual materials themselves.

Examples: email, texts, phone, or letter reminders about appointments or about returning study materials such as a questionnaire; requests to confirm contact information.

5.12 Future contact with subjects. Is there a plan to retain any contact information for subjects so that they can be contacted in the future?

No

Yes

→ If yes, describe the purpose of the future contact, and whether use of the contact information will be limited to the study team; if not, describe who else could be provided with the contact information. Describe the criteria for approving requests for the information.

Examples: inform subjects about other studies; ask subjects for additional information or medical record access that is not currently part of the study proposed in this application; obtain another sample.

5.13 Alternatives to participation. Are there any alternative procedures or treatments that might be advantageous to the subjects?

If there are no alternative procedures or treatments, select "No". Examples of advantageous alternatives: earning extra class credit in some time-equivalent way other than research participation; obtaining supportive care or a standard clinical treatment from a health care provider instead of participating in research with an experimental drug.

No

Yes
→ If yes, describe the alternatives.

5.14 Upload to *Zipline* all data collection forms (if any) that will be directly used by or with the subjects, and any scripts/talking points that will be used to collect the data. Do not include data collection forms that will be used to abstract data from other sources (such as medical or academic records), or video recordings.

- ***Examples****: survey, questionnaires, subject logs or diaries, focus group questions.*
- ***NOTE:*** *Sometimes the IRB can approve the general content of surveys and other data collection instruments rather than the specific form itself. This prevents the need to submit a modification request for future minor changes that do not add new topics or increase the sensitivity of the questions. To request this general approval, use the text box below to identify the questionnaires/surveys/ etc. for which you are seeking this more general approval. Then briefly describe the scope of the topics that will be covered and the most personal and sensitive questions. The HSD staff person who screens this application will let you know whether this is sufficient or whether you will need to provide more information.*
- ***For materials that cannot be uploaded****: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. You may also provide URLs (website addresses) or written descriptions below. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*
- ***For data that will be gathered in an evolving way****: This refers to data collection/questions that are not pre-determined but rather are shaped during interactions with participants in response to observations and responses made during those interactions. If this applies to the proposed research, provide a description of the process by which the data collection/questions will be established during the interactions with subjects, how the data collection/questions will be documented, the topics likely to be addressed, the most sensitive type of information likely to be gathered, and the limitations (if any) on topics that will be raised or pursued.*

Use this text box (if desired) to provide:

- Short written descriptions of materials that cannot be uploaded, such as URLs
- A description of the process that will be used for data that will be gathered in an evolving way.
- The general content of questionnaires, surveys and similar instruments for which general approval is being sought. (See the **NOTE** bullet point in the instructions above.)

5.15 SARS-CoV-2 testing. Will the subjects be tested for the SARS-CoV-2 coronavirus?
If the only testing is to screen the subjects (question 2.8), you do not need to answer this question

No

Yes
→ If yes:

- Name the testing lab
- Confirm that the lab and its use of this test is CLIA-certified or certified by the Washington State Department of Health

- Describe whether you will return the results to the participants and, if yes, who will do it and how (including any information you would provide to subjects with positive test results).

6 CHILDREN (MINORS) and PARENTAL PERMISSION

6.1 Involvement of minors. Does the research include minors (children)?

Minor or child means someone who has not yet attained the legal age for consent for the research procedures, as described in the applicable laws of the jurisdiction in which the research will be conducted. This may or may not be the same as the definition used by funding agencies such as the National Institutes of Health.

- In Washington State the generic age of consent is 18, meaning that anyone under the age of 18 is considered a child.
- There are some procedures for which the age of consent is much lower in Washington State.
- The generic age of consent may be different in other states, and in other countries.

☐ **No** → If no, go to Section 8.

☐ **Yes** → If yes, provide the age range of the minor subjects for this study and the legal age for consent in the study population(s). If there is more than one answer, explain.

☐ **Don't know** → This means is it not possible to know the age of the subjects. For example, this may be true for some research involving social media, the Internet, or a dataset that is obtained from another researcher or from a government agency. Go to Section 8.

6.2 Parental permission. Parental permission means actively obtaining the permission of the parents. This is not the same as "passive" or "opt out" permission where it is assumed that parents are allowing their children to participate because they have been provided with information about the research and have not objected or returned a form indicating they don't want their children to participate.

a. Will parental permission be obtained for:

☐ All of the research procedures	→ Go to question **6.2b.**
☐ None of the research procedures	→ Use the table below to provide justification, and skip question 6.2b.

☐ Some of the research procedures → Use the table below to identify the procedures for which parental permission will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO parental permission[2]	Reason why parental permission will not be obtained	Will parents be informed about the research?[3] YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all children groups or all procedures: collapse the answer across the groups and/or procedures.*
2. *If identifiable information or biospecimens will be obtained without parent permission, any waiver granted by the IRB does not override parents' refusal to provide broad consent (for example, through the Northwest Biotrust).*
3. *Will parents be informed about the research beforehand even though active permission is not being obtained?*

b. Indicate the plan for obtaining parental permission. One or both boxes must be checked.

☐ Both parents, unless one parent is deceased, unknown, incompetent, or not reasonably available; or when only one parent has legal responsibility for the care and custody of the child

☐ One parent, even if the other parent is alive, known, competent, reasonably available, and shares legal responsibility for the care and custody of the child.

This is all that is required for minimal risk research.

If both boxes are checked, explain:

6.3 Children who are wards. Will any of the children be wards of the State or any other agency, institution, or entity?

☐ **No**

☐ **Yes** → If yes, an advocate may need to be appointed for each child who is a ward. The advocate must be in addition to any other individual acting on behalf of the child as guardian or in loco parentis. The same individual can serve as advocate for all children who are wards.

Describe who will be the advocate(s). The description must address the following points:

- Background and experience
- Willingness to act in the best interests of the child for the duration of the research
- Independence of the research, research team, and any guardian organization

6.4 UW Office for Youth Programs Development and Support. If the project involves interaction (in-person or remotely) with individuals under the age of 18, researchers must comply with **UW Administrative Policy Statement 10.13** and the requirements listed at this website. This includes activities that are deemed to be Not Research or Exempt. It does not apply to third-party led research (i.e., research conducted by a non-UW PI). Information and FAQs for researchers are available.

This point is advisory only; there is no need to provide a response.

7 ASSENT OF CHILDREN (MINORS)

Go to Section 8 if your research does not involve children (minors).

7.1 Assent of children (minors). Though children do not have the legal capacity to "consent" to participate in research, they should be involved in the process if they are able to "assent" by having a study explained to them and/or by reading a simple form about the study, and then giving their verbal choice about whether they want to participate. They may also provide a written assent if they are older. See **WORKSHEET Children** for circumstances in which a child's assent may be unnecessary or inappropriate.

a. Will assent be obtained for:

☐ All research procedures and child groups	→ Go to question **7.2.**
☐ None of the research procedures and child groups	→ Use the table below to provide justification, then skip to question **7.6**
☐ Some of your research procedures and child groups	→ Use the table below to identify the procedures for which assent will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be obtained	Reason why assent will not be obtained

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse your answer across the groups and/or procedures.*

7.2 Assent process. Describe how assent will be obtained, for each child group. If the research involves children of different ages, answer separately for each group. If the children are non-English speakers, include a description of how their comprehension of the information will be evaluated.

7.3 Dissent or resistance. Describe how a child's objection or resistance to participation (including non-verbal indications) will be identified during the research, and what the response will be.

7.4 E-consent. Will any electronic processes (email, websites, electronic signatures, etc.) be used to present assent information to subjects/and or to obtain documentation (signatures) of assent? If yes, describe how this will be done.

7.5 Documentation of assent. Which of the following statements describes whether documentation of assent will be obtained?

☐ None of the research procedures and child groups	→ Use the table below to provide justification, then go to question **7.5.b**
☐ All of the research procedures and child groups	→ Go to question **7.5.a**, do not complete the table
☐ Some of the research procedures and/or child groups	→ Complete the table below and then to go question **7.5.a**

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be documented

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse the answer across the groups and/or procedures.*

a. Describe how assent will be documented. If the children are functionally illiterate or are not fluent in English, include a description of the documentation process for them.

b. Upload all assent materials (talking points, videos, forms, etc.) to ***Zipline***. Assent materials are not required to provide all of the standard elements of adult consent; the information should be appropriate to the age, population, and research procedures. The documents should be in Word, if possible.

7.6 Children who reach the legal age of consent during participation in longitudinal research.

Children who were enrolled at a young age and continue for many years: It is best practice to re-obtain assent (or to obtain it for the first time, if it was not obtained at the beginning of their participation).
Children who reach the legal age of consent: Informed consent must be obtained from the now-adult subject for (1) any ongoing interactions or interventions with the subjects, or (2) the continued analysis of specimens or data for which the subject's identify is readily identifiable to the researcher, unless the IRB waives this requirement.

a. Describe the plans (if any) to re-obtain assent from children.

b. Describe the plans (if any) to obtain consent for children who reach the legal age of consent.

- If adult consent will be obtained from them, describe what will happen regarding now-adult subjects who cannot be contacted.
- If consent will not obtained or will not be possible: explain why.

7.7 Other regulatory requirements. (This is for information only; no answer or response is required.) Researchers are responsible for determining whether their research conducted in schools, with student records, or over the Internet comply with permission, consent, and inspection requirements of the following federal regulations:

- PPRA – Protection of Pupil Rights Amendment
- FERPA – Family Education Rights and Privacy Act
- COPPA – Children's Online Privacy Protection Act

8 CONSENT OF ADULTS

Review the following definitions before answering the questions in this section.

CONSENT	is the process of informing potential subjects about the research and asking them whether they want to participate. It does not necessarily include the signing of a consent form.
CONSENT DOCUMENTATION	refers to how a subject's decision to participate in the research is documented. This is typically obtained by having the subject sign a consent form.
CONSENT FORM	is a document signed by subjects, by which they agree to participate in the research as described in the consent form and in the consent process.
ELEMENTS OF CONSENT	are specific information that is required to be provided to subjects.

CHARACTERISTICS OF CONSENT	are the qualities of the consent process as a whole. These are:
	• Consent must be legally effective.
	• The process minimizes the possibility of coercion or undue influence.
	• Subjects or their representatives must be given sufficient opportunity to discuss and consider participation.
	• The information provided must:
	  ○ Begin with presentation of key information (for consent materials over 2,000 words)
	  ○ Be what a reasonable person would want to have
	  ○ Be organized and presented so as to facilitate understanding
	  ○ Be provided in sufficient detail
	  ○ Not ask or appear to ask subjects to waive their rights

PARENTAL PERMISSION	is the parent's active permission for the child to participate in the research. Parental permission is subject to the same requirements as consent, including written documentation of permission and required elements.
SHORT FORM CONSENT	is an alternative way of obtaining written documentation of consent that is most commonly used with individuals who are illiterate or whose language is one for which translated consent forms are not available.
WAIVER OF CONSENT	means there is IRB approval for not obtaining consent or for not including some of the elements of consent in the consent process. **NOTE:** If you plan to obtain identifiable information or identifiable biospecimens without consent, any waiver granted by the IRB does not override a subject's refusal to provide broad consent (for example, the Northwest Biotrust).
WAIVER OF DOCUMENTATION OF CONSENT	means that there is IRB approval for not obtaining written documentation of consent.

8.1 Groups Identify the groups to which the answers in this section apply.

☐ Adult subjects

☐ Parents who are providing permission for their children to participate in research

→ *If you selected **PARENTS**, the word "consent" below should also be interpreted as applying to parental permission and "subjects" should also be interpreted as applying to the parents.*

8.2 The consent process and characteristics. This series of questions is about whether consent will be obtained for all procedures except recruiting and screening and, if yes, how.

The issue of consent for recruiting and screening activities is addressed in question 4.7. You do not need to repeat your answer to question 4.6.

a. Are there any procedures for which consent will not be obtained?

☐ **No**

☐ **Yes** → If yes, use the table below to identify the procedures for which consent will not be obtained. "All" is an acceptable answer for some studies.

Be sure to consider all research procedures and plans, including future contact, and sharing/banking of data and specimens for future work.

Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO consent process	Reason why consent will not be obtained	Will subjects be provided with info about the research after they finish? YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all groups, collapse your answer across the groups and/or procedures.*

b. Describe the consent process, if consent will be obtained for any or all procedures, for any or all groups. Address groups and procedures separately if the consent processes are different.

Be sure to include:

- *The location/setting where consent will be obtained*
- *Who will obtain consent (refer to positions, roles, or titles, not names)*
- *How subjects will be provided sufficient opportunity to discuss the study with the research team and consider participation*

c. Comprehension. Describe the methods that will be used to ensure or test the subjects' understanding of the information during the consent process.

d. Influence. Does the research involve any subject groups that might find it difficult to say "no" to participation because of the setting or their relationship with someone on the study team, even if they aren't pressured to participate?

Examples: Student participants being recruited into their teacher's research; patients being recruited into their healthcare provider's research, study team members who are participants; outpatients recruited from an outpatient surgery waiting room just prior to their surgery.

☐ **No**
☐ **Yes** → If yes, describe what will be done to reduce any effect of the setting or relationship on the participation decision.

Examples: a study coordinator will obtain consent instead of the subjects' physician; the researcher will not know which subjects agreed to participate; subjects will have two days to decide after hearing about the study.

e. Information provided is tailored to needs of subject population. Describe the basis for concluding that the information that will be provided to subjects (via written or oral methods) is what a *reasonable member of the subject population(s)* would want to know. If the research consent materials contain a key information section, also describe the basis for concluding that the information presented in that section is that which is *most likely* to assist the selected subject population with making a decision. See **GUIDANCE Key Information for Consent Materials**.

For example: Consultation with publications about research subjects' preferences, disease-focused nonprofit groups, patient interest groups, or other researchers/study staff with experience with the specific population. It may also involve directly consulting selected members of the study population.

f. Ongoing process. For research that involves multiple or continued interaction with subjects over time, describe the opportunities (if any) that will be given to subjects to ask questions or to change their minds about participating.

8.3 Electronic presentation of consent information. Will any part of the consent-related information be provided electronically for some or all of the subjects?

This refers to the use of electronic systems and processes instead of (or in addition to) a paper consent form. For example, an emailed consent form, a passive or an interactive website, graphics, audio, video podcasts. See GUIDANCE Electronic Informed Consent for information about electronic consent requirements at UW.

☐ **No** → If no, skip to question 8.4
☐ **Yes** → If yes, answer questions **a** through **e**

a. Describe the electronic consent methodology and the information that will be provided.

All informational materials must be made available to the IRB. Website content should be provided as a Word document. It is considered best practice to give subjects information about multi-page/multi-screen information that will help them assess how long it will take them to complete the process. For example, telling them that it will take about 15 minutes, or that it involves reading six screens or pages.

b. Describe how the information can be navigated (if relevant). *For example, will the subject be able to proceed forward or backward within the system, or to stop and continue at a later time?*

c. In a standard paper-based consent process, the subjects generally have the opportunity to go through the consent form with study staff and/or to ask study staff about any question they may have after reading the consent form. Describe what will be done, if anything, to facilitate the subject's comprehension and opportunity to ask questions when consent information is presented electronically. Include a description of any provisions to help ensure privacy and confidentiality during this process.

Examples: hyperlinks, help text, telephone calls, text messages or other type of electronic messaging, video conference, live chat with remotely located study team members.

d. What will happen if there are individuals who wish to participate but who do not have access to the consent methodology being used, or who do not wish to use it? Are there alternative ways in which they can obtain the information, or will there be some assistance available? If this is a clinical trial, these individuals cannot be excluded from the research unless there is a compelling rationale.

For example, consider individuals who lack familiarity with electronic systems, have poor eyesight or impaired motor skills, or who do not have easy email or internet access.

e. How will the research team ensure continued accessibility of consent materials and information during the study?

f. How will additional information be provided to subjects during the research, including any significant new findings (such as new risk information) If this is not an issue, explain why.

8.4 Written documentation of consent. Which of the statements below describe whether documentation of consent will be obtained? NOTE: This question does not apply to screening and recruiting procedures which have already been addressed in question 4.7.

Documentation of consent that is obtained electronically is not considered written consent unless it is obtained by a method that allows verification of the individual's signature. In other words, saying "yes" by email is rarely considered to be written documentation of consent

a. Is written documentation of consent being obtained for:

☐ None of the research procedures	→ Use the table below to provide justification then go to question **8.5.**
☐ All of the research procedures	→ Do not complete the table; go to question **8.4.b.**
☐ Some of the research procedures	→ Use the table below to identify the procedures for which written documentation of consent will not be obtained from adult subjects.

Adult subject group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO documentation of consent	Will they be provided with a written statement describing the research (optional)? YES	NO
		☐	☐
		☐	☐
		☐	☐

	☐	☐
	☐	☐

Table footnotes

1. *If the answer is the same for all adult groups or all procedures, collapse the answer across the groups and/or procedures.*

b. Electronic consent signature. For studies in which documentation of consent will be obtained: will subjects use an electronic method to provide their consent signature?

- *See the GUIDANCE Electronic Informed Consent for information about options (including REDCap e-signature and the DocuSign system) and any associated requirements.*
- *FDA-regulated studies must use a system that complies with the FDA's "Part 11" requirements about electronic systems and records. Note that the UW-IT supported DocuSign e-signature system does not meet this requirement.*
- *Having subjects check a box at the beginning of an emailed or web-based questionnaire is not considered legally effective documentation of consent.*

☐ **No**
☐ **Yes** → If yes, indicate which methodology will be used.

☐ **UW ITHS REDCap** (excludes REDCap Mobile application, which is a separate software application for use with a mobile device for consent when internet service is absent or unreliable)

☐ **Other REDCap installation** → Please name the institutional version you will be using (e.g. Vanderbilt, Univ. of Cincinnati) in the field below and provide a completed **SUPPLEMENT Other REDCap Installation** with your submission.

☐ **UW DocuSign**

☐ **Other** → Please describe in the field below and provide a signed TEMPLATE Other E-signature Attestation Letter with your submission.

b.1 Is this method legally valid in the jurisdiction where the research will occur?
NOTE: UW ITHS REDCap (excludes REDCap Mobile application) and UW DocuSign have been vetted for compliance with WA State and federal laws regarding electronic signatures.

☐ **No**
☐ **Yes** → If yes, what is the source of information about legal validity?

b.2 Will verification of the subject's identity be obtained if the signature is not personally witnessed by a member of the study team? Note that this is required for FDA-regulated studies.

See the GUIDANCE Electronic Informed Consent for information and examples

☐ **No** → If no, provide the rationale for why this is not required or necessary to protect subjects or the integrity of the research. Also, what would be the risks to the actual subject if somebody other than the intended signer provides the consent signature?

☐ **Yes** → If yes, describe how subject identity will be verified, providing a non- technical description that the reviewer will understand.

b.3 How will the requirement be met to provide a copy of the consent information (consent form) to individuals who provide an e-signature?

The copy can be paper or electronic and may be provided on an electronic storage device or via email. If the electronic consent information uses hyperlinks or other websites or podcasts to convey information specifically related to the research, the information in these hyperlinks should be included in the copy provided to the subjects and the website must be maintained for the duration of the entire study.

8.5 Non-English-speaking or -reading adult subjects. Will the research enroll adult subjects who do not speak English or who lack fluency or literacy in English?

☐ **No**
☐ **Yes** → If yes, describe the process that will be used to ensure that the oral and written information provided to them during the consent process and throughout the study will be in a language readily understandable to them and (for written materials such as consent forms or questionnaires) at an appropriate reading/comprehension level.

a. Interpretation. Describe how interpretation will be provided, and when. Also, describe the qualifications of the interpreter(s) – for example, background, experience, language proficiency in English and in the other language, certification, other credentials, familiarity with the research-related vocabulary in English and the target language.

b. Translations. Describe how translations will be obtained for all study materials (not just consent forms). Also, describe the method for ensuring that the translations meet the UW IRB's requirement that translated documents will be linguistically accurate, at an appropriate reading level for the participant population, and culturally sensitive for the locale in which they will be used.

8.6 Barriers to written documentation of consent. There are many possible barriers to obtaining written documentation of consent. Consider, for example, individuals who are functionally illiterate; do not read English well; or have sensory or motor impairments that may impede the ability to read and sign a consent form.

a. Describe the plans (if any) for obtaining written documentation of consent from potential subjects who may have difficulty with the standard documentation process (that is, reading and signing a consent form). Skip this question if written documentation of consent is not being obtained for any part of the research.

Examples of solutions: Translated consent forms; use of the Short Form consent process; reading the form to the person before they sign it; excluding individuals who cannot read and understand the consent form.

8.7 Deception. Will information be deliberately withheld, or will false information be provided, to any of the subjects?
Note: "Blinding" subjects to their study group/condition/arm is not considered to be deception, but not telling them ahead of time that they will be subject to an intervention or about the purpose of the procedure(s) is deception.

☐ **No**
☐ **Yes** → If yes, describe what information and why.
Example: It may be necessary to deceive subjects about the purpose of the study (describe why).

a. Will subjects be informed beforehand that they will be unaware of or misled regarding the nature or purposes of the research? (Note: this is not necessarily required.)

☐ **No**
☐ **Yes**

b. Will subjects be debriefed later? (Note: this is not necessarily required.)

☐ **No**
☐ **Yes** → If yes, describe how and when this will occur. Upload any debriefing materials, including talking points or a script, to ***Zipline***.

8.8 Cognitively impaired adults, and other adults unable to consent. Will such individuals be included in the research?

Examples: individuals with Traumatic Brain Injury (TBI) or dementia; individuals who are unconscious, or who are significantly intoxicated.

☐ **No** → If no, go to question **8.9**.
☐ **Yes** → If yes, answer the following questions.

a. Rationale. Provide the rationale for including this population.

b. Capacity for consent / decision making capacity. Describe the process that will be used to determine whether a cognitively impaired individual is capable of consent decision making with respect to the research protocol and setting.

b.1. If there will be repeated interactions with the impaired subjects over a time period when cognitive capacity could increase or diminish, also describe how (if at all) decision-making capacity will be re-assessed and (if appropriate) consent obtained during that time.

c. Permission (surrogate consent). If the research will include adults who cannot consent for themselves, describe the process for obtaining permission ("surrogate consent") from a legally authorized representative (LAR).

*For research conducted in Washington State, see the **GUIDANCE Legally Authorized Representative** to learn which individuals meet the state definition of "legally authorized representative".*

d. Assent. Describe whether assent will be required of all, some, or none of the subjects. If some, indicate which subjects will be required to assent and which will not (and why not). Describe any process that will be used to obtain and document assent from the subjects.

e. Dissent or resistance. Describe how a subject's objection or resistance to participation (including non-verbal) during the research will be identified, and what will occur in response.

8.9 Research use of human fetal tissue obtained from elective abortion. Federal and UW Policy specify some requirements for the consent process. If you are conducting this type of research, check the boxes to confirm these requirements will be followed.

- ☐ Informed consent for the donation of fetal tissue for research use will be obtained by someone other than the person who obtained the informed consent for abortion.
- ☐ Informed consent for the donation of fetal tissue for research use will be obtained after the informed consent for abortion.
- ☐ Participation in the research will not affect the method of abortion.
- ☐ No enticements, benefits, or financial incentives will be used at any level of the process to incentivize abortion or the donation of human fetal tissue.
- ☐ The informed consent form for the donation of fetal tissue for use in research will be signed by both the

___ woman and the person who obtains the informed consent.

8.10 Consent-related materials. Upload to ***Zipline*** all consent scripts/talking points, consent forms, debriefing statements, Information Statements, Short Form consent forms, parental permission forms, and any other consent-related materials that will be used. Materials that will be used by a specific site should be uploaded to that site's **Local Site Documents** page.

- *Translations must be submitted and approved before they can be used. However, we strongly encourage you to wait to provide them until the IRB has approved the English versions.*
- *Combination forms: It may be appropriate to combine parental permission with consent, if parents are subjects as well as providing permission for the participation of their children. Similarly, a consent form may be appropriately considered an assent form for older children.*
- *For materials that cannot be uploaded: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. URLs (website addresses) may also be provided, or written descriptions of websites. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*

9 PRIVACY AND CONFIDENTIALITY

9.1 Privacy protections. Describe the steps that will be taken, if any, to address possible privacy concerns of subjects and potential subjects.

Privacy refers to the sense of being in control of access that others have to ourselves. This can be an issue with respect to recruiting, consenting, sensitivity of the data being collected, and the method of data collection.
Examples:

- *Many subjects will feel a violation of privacy if they receive a letter asking them to participate in a study because they have ____ medical condition, when their name, contact information, and medical condition were drawn from medical records without their consent. Example: the IRB expects that "cold call" recruitment letters will inform the subject about how their information was obtained.*
- *Recruiting subjects immediately prior to a sensitive or invasive procedure (e.g., in an outpatient surgery waiting room) will feel like an invasion of privacy to some individuals.*
- *Asking subjects about sensitive topics (e.g. details about sexual behavior) may feel like an invasion of privacy to some individuals.*

9.2 Identification of individuals in publications and presentations. Will potentially identifiable information about subjects be used in publications and presentations, or is it possible that individual identities could be inferred from what is planned to be published or presented?

☐ **No**
☐ **Yes** → If yes, will subject consent be obtained for this use?
  ☐ **Yes**
  ☐ **No** → If no, describe the steps that will be taken to protect subjects (or small groups of subjects) from being identifiable.

9.3 State mandatory reporting. Each state has reporting laws that require some types of individuals to report some kinds of abuse, and medical conditions that are under public health surveillance. These include:

- Child abuse
- Abuse, abandonment, neglect, or financial exploitation of a vulnerable adult
- Sexual assault
- Serious physical assault
- Medical conditions subject to mandatory reporting (notification) for public health surveillance

Are you or a member of the research team likely to learn of any of the above events or circumstances while conducting the research **AND** feel obligated to report it to state authorities?

☐ **No**
☐ **Yes** → If yes, the UW IRB expects subjects to be informed of this possibility in the consent form or during the consent process, unless you provide a rationale for not doing so:

9.4 Retention of identifiers and data. Check the box below to indicate assurance that any identifiers (or links between identifiers and data/specimens) and data that are part of the research records will not be destroyed until after the end of the applicable records retention requirements (e.g. Washington State; funding agency or sponsor; Food and Drug Administration). If it is important to say something about destruction of identifiers (or links to identifiers) in the consent form, state something like "the link between your identifier and the research data will be destroyed after the records retention period required by state and/or federal law."

This question can be left blank for conversion applications (existing paper applications that are being "converted" into a Zipline application.)

See the "Research Data" sections of the following website for UW Records management for the Washington State research records retention schedules that apply in general to the UW (not involving UW Medicine data):
http://f2.washington.edu/fm/recmgt/gs/research?title=R

See the "Research Records and Data" information in Section 8 of this document for the retention schedules for UW Medicine Records: ***https://www.uwmedicine.org/recordsmanagementuwm-records-retention-schedule.pdf***

☐ **Confirm**

9.5 Certificates of Confidentiality. Will a federal Certificate of Confidentiality be obtained for the research data?
NOTE: Answer "No" if the study is funded by NIH or the CDC, because all NIH-funded and CDC-funded studies automatically have a Certificate.

☐ **No**
☐ **Yes**

9.6 Data and specimen security protections. Identify the data classifications and the security protections that will be provided for all sites where data will be collected, transmitted, or stored, referring to the **GUIDANCE Data and Security Protections** for the minimum requirements for each data classification level. ***It is not possible to answer this question without reading this document. Data security protections should not conflict with records retention requirements.***

a. Which level of protections will be applied to the data and specimens? If more than one level will be used, describe which level will apply to which data and which specimens and at which sites.

b. Use this space to provide additional information, details, or to describe protections that do not fit into one of the levels. If there are any protections within the level listed in 9.6.a which will *not* be followed, list those

here, including identifying the sites where this exception will apply. For example, if you intend to store subject identifiers with study data (not permitted under requirement U9 for Risk Levels 3-5), then indicate this in the box below (e.g., "We will not adhere to requirement U9 for screening data").

10 RISK / BENEFIT ASSESSMENT

10.1 Anticipated risks. Describe the reasonably foreseeable risks of harm, discomforts, and hazards to the subjects and others of the research procedures. For each harm, discomfort, or hazard:

- Describe the magnitude, probability, duration, and/or reversibility of the harm, discomfort, or hazard, AND
- Describe how the risks will be reduced or managed. Do not describe data security protections here, these are already described in Question 9.6.

- *Consider possible physical, psychological, social, legal, and economic harms, including possible negative effects on financial standing, employability, insurability, educational advancement or reputation. For example, a breach of confidentiality might have these effects.*
- *Examples of "others": embryo, fetus, or nursing child; family members; a specific group.*
- *Ensure applicable risk information from any Investigator Brochures, Drug Package Inserts, and/or Device Manuals is included in your description.*
- *Do not include the risks of non-research procedures that are already being performed.*
- *If the study design specifies that subjects will be assigned to a specific condition or intervention, then the condition or intervention is a research procedure - even if it is a standard of care.*
- *Examples of mitigation strategies: inclusion/exclusion criteria; applying appropriate data security measures to prevent unauthorized access to individually identifiable data; coding data; taking blood samples to monitor something that indicates drug toxicity.*
- *As with all questions on this application, you may refer to uploaded documents.*

10.2 Reproductive risks. Are there any risks of the study procedures to men and women (who are subjects, or partner of subjects) related to pregnancy, fertility, lactation or effects on a fetus or neonate?

Examples: direct teratogenic effects; possible germline effects; effects on fertility; effects on a woman's ability to continue a pregnancy; effects on future pregnancies.

☐ **No** → If no go to question 10.3
☐ **Yes** → If yes, answer the following questions:

a. Risks. Describe the magnitude, probability, duration and/or reversibility of the risks.

b. Steps to minimize risk. Describe the specific steps that will be taken to minimize the magnitude, probability, or duration of these risks.

Examples: inform the subjects about the risks and how to minimize them; require a pregnancy test before and during the study; require subjects to use contraception; advise subjects about banking of sperm and ova.

If the use of contraception will be required: describe the allowable methods and the time period when contraception must be used.

c. Pregnancy. Describe what will be done if a subject (or a subject's partner) becomes pregnant

For example; will subjects be required to immediately notify study staff, so that the study procedures can be discontinue or modified, or for a discussion of risks, and/or referrals or counseling?

10.3 MRI risk management. A rare but serious adverse reaction called nephrogenic systemic fibrosis (NSF) has been observed in individuals with kidney disease who received gadolinium-based contrast agents (GBCAs) for the scans. Also, a few healthy individuals have a severe allergic reaction to GBCAs.

a. Use of gadolinium. Will any of the MRI scans involve the use of a gadolinium-based contrast agent (GBCA?)

☐ **No**
☐ **Yes** → If yes, which agents will be used? *Check all that apply.*

	Brand Name	Generic Name	Chemical Structure
☐	Dotarem	Gadoterate meglumine	Macrocylic
☐	Eovist / Primovist	Gadoxetate disodium	Linear
☐	Gadavist	Gadobutro	Macrocyclic
☐	Magnevist	Gadpentetate dimeglumine	Linear
☐	MultiHance	Gadobenate dimeglumine	Linear
☐	Omniscan	Gadodiamide	Linear
☐	OptiMARK	Gadoversetamide	Linear
☐	ProHance	Gadoteridol	Macrocyclic
☐	Other, provide name:		

1.) The FDA has concluded that gadolinium is retained in the body and brain for a significantly longer time than previously recognized, especially for linear GBCAs. The health-related risks of this longer retention are not yet clearly established. However, the UW IRB expects researchers to provide a compelling justification for using a linear GBCA instead of a macrocyclic GBCA, to manage the risks associated with GBCAs.

Describe why it is important to use a GBCA with the MRI scan(s). Describe the dose that will be used and (if it is more than the standard clinical dose recommended by the manufacturer) why it is necessary to use a higher dose. If a linear GBCA will be used, explain why a macrocyclic GBCA cannot be used.

2.) Information for subjects. Confirm by checking this box that subjects will be provided with the FDA-approved Patient Medication Guide for the GBCA being used in the research or that the same information will be inserted into the consent form.

☐ **Confirmed**

b. Who will (1) calculate the dose of GBCA; (2) prepare it for injection; (3) insert and remove the IV catheter; (4) administer the GBCA; and (5) monitor for any adverse effects of the GCBA? Also, what are the qualifications and training of these individual(s)?

c. Describe how the renal function of subjects will be assessed prior to MRI scans and how that information will be used to exclude subjects at risk for NSF.

d. Describe the protocol for handling a severe allergic reaction to the GBCA or any other medical event/emergency during the MRI scan, including who will be responsible for which actions.

10.4 Unforeseeable risks. Are there any research procedures that may have risks that are currently unforeseeable?

Example: using a drug that hasn't been used before in this subject population.

☐ **No**
☐ **Yes** → If yes, identify the procedures.

10.5 Subjects who will be under regional or general anesthesiology. Will any research procedures occur while patients are under general or regional anesthesia, or during the 3 hours preceding general or regional anesthesia (supplied for non-research reasons)?

☐ **No**
☐ **Yes** → If yes, check all the boxes that apply.

- ☐ Administration of any drug for research purposes
- ☐ Inserting an intra-venous (central or peripheral) or intra-arterial line for research purposes
- ☐ Obtaining samples of blood, urine, bone marrow or cerebrospinal fluid for research purposes
- ☐ Obtaining a research sample from tissue or organs that would not otherwise be removed during surgery
- ☐ Administration of a radio-isotope for research purposes**
- ☐ Implantation of an experimental device
- ☐ Other manipulations or procedures performed solely for research purposes (e.g., experimental liver dialysis, experimental brain stimulation)

If any of the boxes are checked:
Provide the name and institutional affiliation of a physician anesthesiologist who is a member of the research team or who will serve as a safety consultant about the interactions between the research procedures and the general or regional anesthesia of the subject-patients. If the procedures will be performed at a UW Medicine facility or affiliate, the anesthesiologist must be a UW faculty member, and the Vice Chair of Clinical Research in the UW Department of Anesthesiology and Pain Medicine must be consulted in advance for feasibility, safety and billing.

*** If the box about radio-isotopes is checked: the study team is responsible for informing in advance all appropriate clinical personnel (e.g., nurses, technicians, anesthesiologists, surgeons) about the administration and use of the radio-isotope, to ensure that any personal safety issues (e.g., pregnancy) can be appropriately addressed. This is a condition of IRB approval.*

10.6 Data and Safety Monitoring. A Data and Safety Monitoring Plan (DSMP) is required for clinical trials (as defined by NIH). If required for this research, or if there is a DSMP for the research regardless of whether it is required, upload the DSMP to ***Zipline***. If it is embedded in another document being uploading (for example, a Study Protocol) use the text box below to name the document that has the DSMP. Alternatively, provide a description of the DSMP in the text box below. For guidance on developing a DSMP, see the ITHS webpage on Data and Safety Monitoring Plans.

10.7 Un-blinding. If this is a double-blinded or single-blinded study in which the participant and/or relevant study team members do not know the group to which the participant is assigned: describe the circumstances under which un-blinding would be necessary, and to whom the un-blinded information would be provided.

10.8 Withdrawal of participants. If applicable, describe the anticipated circumstances under which participants will be withdrawn from the research without their consent. Also, describe any procedures for orderly withdrawal of a participant, regardless of the reason, including whether it will involve partial withdrawal from procedures and any intervention but continued data collection or long-term follow-up.

10.9 Anticipated direct benefits to participants. If there are any direct research-related benefits that some or all individual participants are likely to experience from taking part in the research, describe them below:

Do not include benefits to society or others, and do not include subject payment (if any). Examples: medical benefits such as laboratory tests (if subjects receive the results); psychological resources made available to participants; training or education that is provided.

10.10 Return of individual research results.

In this section, provide your plans for the return of individual results. An "individual research result" is any information collected, generated or discovered in the course of a research study that is linked to the identity of a research participant. These may be results from screening procedures, results that are actively sought for purposes of the study, results that are discovered unintentionally, or after analysis of the collected data and/or results has been completed.

*See the **GUIDANCE Return of Individual Results** for information about results that should and should not be returned, validity of results, the Clinical Laboratory Improvement Amendment (CLIA), consent requirements and communicating results.*

a. Is it anticipated that the research will produce any individual research results that are clinically actionable?

"Clinically actionable" means that there are established therapeutic or preventive interventions or other available actions that have the potential to change the clinical course of the disease/condition, or lead to an improved health outcome.

In general, every effort should be made to offer results that are clinically actionable, valid and pose life-threatening or severe health consequences if not treated or addressed quickly. Other clinically actionable results should be offered if this can be accomplished without compromising the research.

☐ **No**
☐ **Yes** → If yes, answer the following questions (a.1-a.3).

a.1. Describe the clinically actionable results that are anticipated and explain which results, if any, could be urgent (i.e. because they pose life-threatening or severe health consequences if not treated or addressed quickly).

Examples of urgent results include very high calcium levels, highly elevated liver function test results, positive results for reportable STDs.

a.2. Explain which of these results will be offered to subjects.

a.3. Explain which results will not be offered to subjects and provide the rationale for not offering these results.

Reasons not to offer the results might include:

- *There are serious questions regarding validity or reliability*
- *Returning the results has the potential to cause bias*
- *There are insufficient resources to communicate the results effectively and appropriately*
- *Knowledge of the result could cause psychosocial harm to subjects*

b. Is there a plan for offering subjects any results that are not clinically actionable?

Examples: non-actionable genetic results, clinical tests in the normal range, experimental and/or uncertain results.

☐ **No**
☐ **Yes** → If yes, explain which results will be offered to subjects and provide the rationale for offering these results.

c. Describe the validity and reliability of any results that will be offered to subjects.

The IRB will consider evidence of validity such as studies demonstrating diagnostic, prognostic, or predictive value, use of confirmatory testing, and quality management systems.

d. Describe the process for communicating results to subjects and facilitating understanding of the results. In the description, include who will approach the participant with regard to the offer of results, who will communicate the result (if different), the circumstances, timing, and communication methods that will be used.

e. Describe any plans to share results with family members (e.g. in the event a subject becomes incapacitated or deceased).

f. Check the box to indicate that any plans for return of individual research results have been described in the consent document. If there are no plans to provide results to participants, this should be stated in the consent form.

*See the **GUIDANCE Return of Individual Results** for information about consent requirements.*

☐ **Confirmed**

10.11 Commercial products or patents. Is it possible that a commercial product or patent could result from this study?

☐ **No**
☐ **Yes** → If yes, describe whether subjects might receive any remuneration/compensation and, if yes, how the amount will be determined.

11 ECONOMIC BURDEN TO PARTICIPANTS

11.1 Financial responsibility for research-related injuries. Answer this question only if the lead researcher is not a UW student, staff member, or faculty member whose primary paid appointment is at the UW.

For each institution involved in conducting the research: Describe who will be financially responsible for research-related injuries experienced by subjects, and any limitations. Describe the process (if any) by which participants may obtain treatment/compensation.

11.2 Costs to subjects. Describe any research-related costs for which subjects and/or their health insurance may be responsible (examples might include: CT scan required for research eligibility screening; co-pays; surgical costs when a subject is randomized to a specific procedure; cost of a device; travel and parking expenses that will not be reimbursed).

12 RESOURCES

12.1 Faculty Advisor. (For researchers who are students, residents, fellows, or post-docs.) Provide the following information about the faculty advisor.

- Advisor's name
- Your relationship with your advisor (for example: graduate advisor; course instructor)
- Your plans for communication/consultation with your advisor about progress, problems, and changes.

12.2 UW Principal Investigator Qualifications. Upload a current or recent Curriculum Vitae (CV), Biosketch (as provided to federal funding agencies), or similar document to the Local Site Documents page in Zipline. The purpose of this is to address the PI's qualifications to conduct the proposed research (education, experience, training, certifications, etc.).

For help with creating a CV, see http://adai.uw.edu/grants/nsf_biosketch_template.pdf and https://education.uwmedicine.org/student-affairs/career-advising/year-4/residency-applications/curriculum-vitae/

☐ **The CV will be uploaded.**

12.3 UW Study team qualifications. Describe the qualifications and/or training for each UW study team member to fulfill their role on the study and perform study procedures. (You may be asked about non-UW study team members during the review; they should not be described here.) You may list these individuals by name, however if you list an individual by name, you will need to modify this application if that individual is replaced. Alternatively, you can describe study roles and the qualifications and training the PI or study leadership will

require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.

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☐ **There is no study team.**

13 OTHER APPROVALS, PERMISSIONS, and REGULATORY ISSUES

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☐ **No**
☐ **Yes** → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

- ☐ **No** → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination
- ☐ **Yes** → If yes, upload the Conflict Management Plan for every UW team member who has a FCOI with respect to the research, to ***Zipline***. If it is not yet available, use the text box to describe whether the Significant Financial Interest has been disclosed

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Yes → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

No → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination

Yes

require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.
Describe: The role (or name of person), the study activities they will perform, and the qualifications or training that are relevant to performing those study activities.

Examples:
Research Study Coordinator: Obtain consent, administer surveys, blood draw. Will have previous experience coordinating clinical research and be a certified phlebotomist in WA.
Undergraduate Research Assistant: Obtain consent, perform all study procedures. Will have had coursework in research methods, complete an orientation to human subjects protections given by the department, and will receive training from the PI or the graduate student project lead on obtaining consent and debriefing subjects.
Acupuncturist: Perform acupuncture procedures and administer surveys. Must be licensed with WA State DoH and complete training in administering research surveys given by the project director, an experienced survey researcher.
Co-Investigator: Supervise MRI and CT scan procedures and data interpretation, obtain consent. MD, specialty in interventional radiology and body imaging. 5-years clinical research experience.

12.4 Study team training and communication. Describe how it will be ensured that each study team member is adequately trained and informed about the research procedures and requirements (including any changes) as well as their research-related duties and functions.

There is no study team.

13.1 Approvals and permissions. Identify any other approvals or permissions that will be obtained. For example: from a school, external site/organization, funding agency, employee union, UW Medicine clinical unit.

Do not attach the approvals and permissions unless requested by the IRB.

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No → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination

Yes

To: Jeff Hancock[hancockj@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Tue 9/14/2021 9:01:57 PM
Subject: IRB follow-up
Received: Tue 9/14/2021 9:02:00 PM
APPLICATION_IRB_Protocol_v3.60_2021.08.26-V1.docx

Hi Jeff,

Following up on our conversation, we're learning that we do need the IRB to go through review to activate the funding on this grant (on our end). I'm getting in touch with our IRB folks to ask some questions (for example about adding new components as we go), but I do think we'll want at least one active component from your (Jeff's) piece. (From our conversations, I think Renee's work will be covered by the same protocols that cover our social media analysis.)

Jeff, if we were to get some part of the work on your end added to our IRB (as both a placeholder and an impetus to start work), what would it be? Could you sketch out what it would look like so I can add it to our initial IRB proposal?

I'm sending over a (very incomplete) draft of our proposal so you can see the structure of the form — and the specific questions we need to answer (which I imagine aren't too different from what you're used to). Here's a rough outline of what we'd need:

General Research Design
Participants
Recruiting Protocols
Information/Consent Process

Feel free to either add content in the attached Word doc (tracking changes) or send over content in another document (and I can integrate). Let me know if you have any questions!

We'll be reaching out later this week to schedule a project launch meeting (but I'm hoping to get the discussion started with my IRB folks, ASAP).

The Human Subjects Division (HSD) strives to ensure that people with disabilities have access to all services and content. **If you experience any accessibility-related issues with this form or any aspect of the application process, email hsdinfo@uw.edu for assistance.**

INSTRUCTIONS

- **This form is only for studies that will be reviewed by the UW IRB**. Before completing this form, check HSD's website to confirm that this should not be reviewed by an external (non-UW) IRB.
- **If you are requesting a determination** about whether the planned activity is human subjects research or qualifies for exempt status, you may skip all questions except those marked with a ◯. For example **1.1** must be answered.
- **Answer all questions**. If a question is not applicable to the research or if you believe you have already answered a question elsewhere in the application, state "NA" (and if applicable, refer to the question where you provided the information). If you do not answer a question, the IRB does not know whether the question was overlooked or whether it is not applicable. This may result in unnecessary "back and forth" for clarification. Use non-technical language as much as possible.
- To check a box, place an "X" in the box. To fill in a text box, make sure your cursor is within the gray text box bar before typing or pasting text.
- For collaborative or multi-site research, describe only the UW activities unless you are requesting that the UW IRB provide the review and oversight for non-UW collaborators or co-investigators as well.
- You may reference other documents (such as a grant application) if they provide the requested information in non-technical language. Be sure to provide the document name, page(s), and specific sections, and upload it to ***Zipline***. Also, describe any changes that may have occurred since the document was written (for example, changes that you've made during or after the grant review process). In some cases, you may need to provide additional details in the answer space as well as referencing a document.
- **NOTE: Do not convert this Word document to PDF.** The ability to use "tracked changes" is required in order to modify your study and respond to screening requests.

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5 Procedures		

1 OVERVIEW

Study Title: Rapid-Response Frameworks for Mitigating Online Disinformation

1.1 Home institution. Identify the institution through which the lead researcher listed on the IRB application will conduct the research. Provide any helpful explanatory information.

In general, the home institution is the institution (1) that provides the researcher's paycheck and that considers him/her to be a paid employee, or (2) at which the researcher is a matriculated student. Scholars, faculty, fellows, and students who are visiting the UW and who are the lead researcher: identify your home institution and describe the purpose and duration of your UW visit, as well as the UW department/center with which you are affiliated while at the UW.

Note that many UW clinical faculty members are paid employees of non-UW institutions.

*The UW IRB provides IRB review and oversight for only those researchers who meet the criteria described in the **SOP Use of the UW IRB**.*

University of Washington

1.2 Consultation history. Has there been any consultation with someone at HSD about this study?

It is not necessary to obtain advance consultation. However, if advance consultation was obtained, answering this question will help ensure that the IRB is aware of and considers the advice and guidance provided in that consultation.

☐ **No**
☐ **Yes** → If yes, briefly describe the consultation: approximate date, with whom, and method (e.g., by email, phone call, in-person meeting).

1.3 Similar and/or related studies. Are there any related IRB applications that provide context for the proposed activities?

Examples of studies for which there is likely to be a related IRB application: Using samples or data collected by another study; recruiting subjects from a registry established by a colleague's research activity; conducting Phase 2 of a multi-part project, or conducting a continuation of another study; serving as the data coordinating center for a multi-site study that includes a UW site.

Providing this information (if relevant) may significantly improve the efficiency and consistency of the IRB's review.

☐ **No**
☒ **Yes** → If yes, briefly describe the other studies or applications and how they relate to the proposed activities. If the other applications were reviewed by the UW IRB, please also provide: the UW IRB number, the study title, and the lead researcher's name.

The proposed work connects to the following IRBs:

STUDY00003903: Unraveling Online Disinformation Trajectories — Social Media Analysis (PI: Starbird). This IRB covers related research analyzing publicly available social media data to better understand how disinformation spreads online.

STUDY00011061: Journalism Collaboration Misinfo/Disinfo Reporting (PI: Haughey). This IRB covers related research examining collaborations between researchers and journalists to analyze (and, for the journalists, to report on) online disinformation.

STUDY00009923: How Scientific Data, Knowledge, and Expertise Mobilize in Online Media during the COVID-19 Crisis (PI: Spiro). This IRB covers research analyzing online activities to better understand the flow of information related to Covid-19.

1.4 **Externally-imposed urgency or time deadlines.** Are there any externally-imposed deadlines or urgency that affect the proposed activity?

HSD recognizes that everyone would like their IRB applications to be reviewed as quickly as possible. To ensure fairness, it is HSD policy to review applications in the order in which they are received. However, HSD will assign a higher priority to research with externally-imposed urgency that is beyond the control of the researcher. Researchers are encouraged to communicate as soon as possible with their HSD staff contact person when there is an urgent situation (in other words, before submitting the IRB application). Examples: a researcher plans to test an experimental vaccine that has just been developed for a newly emerging epidemic; a researcher has an unexpected opportunity to collect data from students when the end of the school year is only four weeks away.

HSD may ask for documentation of the externally-imposed urgency. A higher priority should not be requested to compensate for a researcher's failure to prepare an IRB application in a timely manner. Note that IRB review requires a certain minimum amount of time; without sufficient time, the IRB may not be able to review and approve an application by a deadline.

☐ **No**
☐ **Yes** → If yes, briefly describe the urgency or deadline as well as the reason for it.

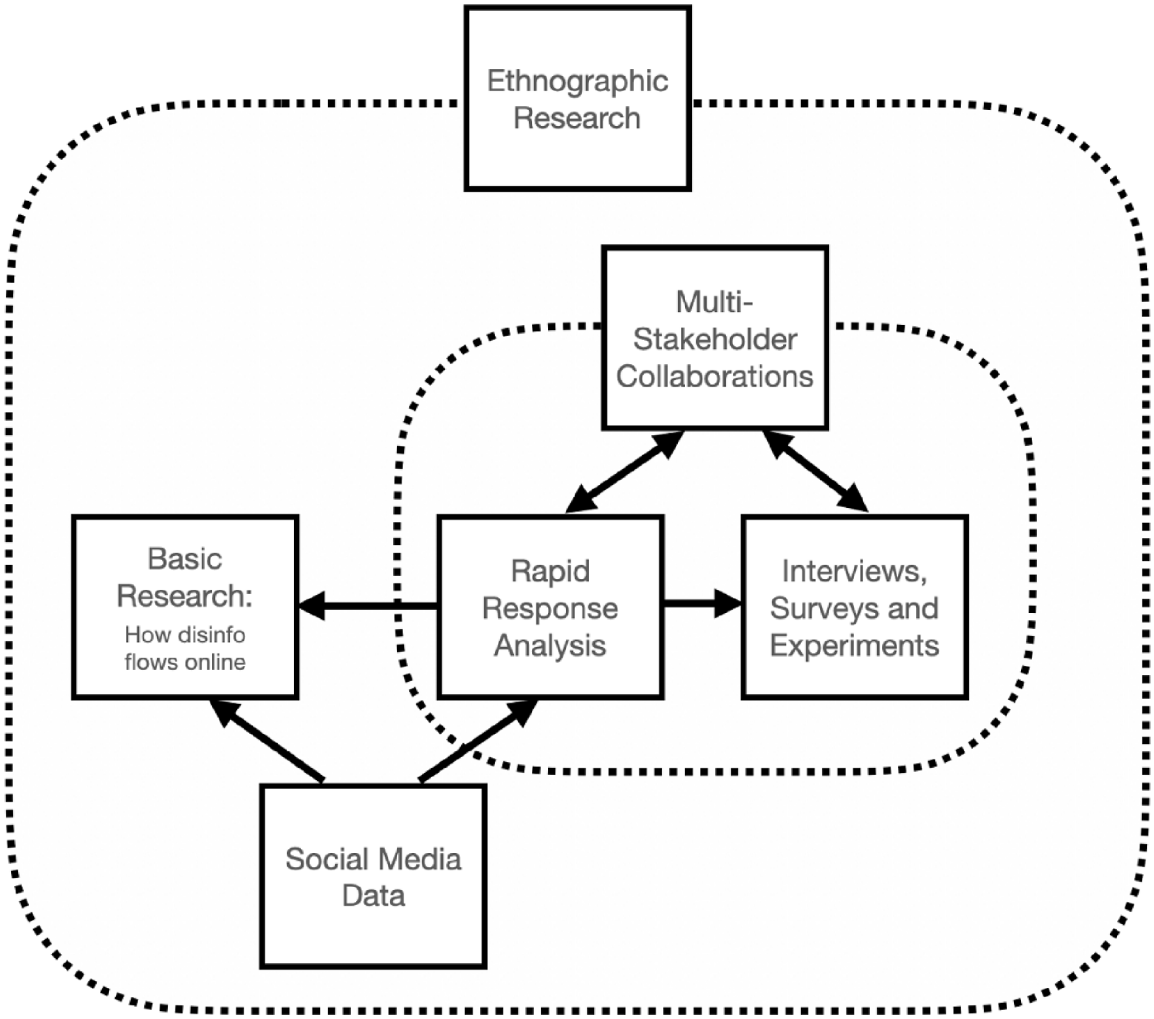
1.5 Objectives Using lay language, describe the purpose, specific aims, or objectives that will be met by this specific project. If hypotheses are being tested, describe them. You will be asked to describe the specific procedures in a later section.

If this application involves the use of a HUD "humanitarian" device: describe whether the use is for "on-label" clinical patient care, "off-label" clinical patient care, and/or research (collecting safety and/or effectiveness data).

The research has multiple objectives:

1. To enhance understandings of how mis- and disinformation spread online.
2. To develop, deploy, and evaluate methods for analyzing online misinformation for "rapid analysis" of emerging mis- and disinformation.
3. To develop, deploy, and evaluate collaborative frameworks for working with diverse stakeholders (journalists, social media companies, government officials, community organizations) to quickly identify, analyze, and communicate about online mis- and disinformation.

It has several distinct but interacting components, illustrated and defined below.



Short description of each component:

- **Basic Research** on how mis/disinformation flow online. The project component draws from social media trace data (and other public data collected from online activities) to answer scientific questions about how misinformation and disinformation are seeded, shaped, and spread through online environments.
- **Rapid Response Analysis** of emergent mis/disinformation threats. Our research team will adapt our existing methods of analysis to quickly detect, analyze, and report on emergent mis/disinformation. Analysis will include qualitative and quantitative methods, including both machine learning and manual content analysis of social media content. The products of these analyses will be shared with collaborating stakeholders (including journalists, election officials, social media platforms, and community partners) and the public at large (through blogs and social media posts).
- **Multi-Stakeholder Collaborations** for collaboratively identifying, analyzing and communicating about emergent mis/disinformation. We will build collaborations with relevant stakeholders, including other research teams, journalists, election officials, social media platforms, and community partners to identify potential mis/disinformation and share the products of our analyses — so that these groups can take action to communicate with their members and/or audiences and thereby mitigate the potential impact of disinformation.
- **Interviews, Surveys, and Experiments for Communication Strategies** for the products of our rapid analyses. Researchers will work with collaborating partners to develop and evaluate techniques for communicating the products of our rapid analyses. This research component will integrate interviews and surveys to understand communication practices and needs with experiments to evaluate the efficacy of different communication practices based on the actual products of our rapid response research.
- **Ethnographic Research** of multi-stakeholder collaborations for rapid response. Using participant observation and interviews with members of collaborating teams ("multi-stakeholder collaborations" above), researchers will seek to understand how these rapid response collaborations are working and identify how they can be improved. One objective of this element is to produce "frameworks" that other teams can use to develop similar rapid response teams and collaborative efforts to address mis/disinformation.

1.6 Study design. Provide a one-sentence description of the general study design and/or type of methodology.

Your answer will help HSD in assigning applications to reviewers and in managing workload. Examples: a longitudinal observational study; a double-blind, placebo-controlled randomized study; ethnographic interviews; web scraping from a convenience sample of blogs; medical record review; coordinating center for a multi-site study.

This is a multi-method study that includes collaborative qualitative/quantitative analysis of social media and other online data, surveys and experiments with stakeholders around communicating the results of those analyses, and ethnographic research to study these multi-stakeholder collaborations.

1.7 Intent. Check all the descriptors that apply to your activity. You must place an "X" in at least one box.

This question is essential for ensuring that your application is correctly reviewed. Please read each option carefully.

Descriptor	
☐	1. Class project or other activity whose purpose is to provide an educational experience for the researcher (for example, to learn about the process or methods of doing research).
☐	2. Part of an institution, organization, or program's own internal operational monitoring.
☐	3. Improve the quality of service provided by a specific institution, organization, or program.

4. Designed to expand the knowledge base of a scientific discipline or other scholarly field of study, and produce results that:

[X]
- Are expected to be applicable to a larger population beyond the site of data collection or the specific subjects studied, or
- Are intended to be used to develop, test, or support theories, principles, and statements of relationships, or to inform policy beyond the study.

[ ] 5. Focus directly on the specific individuals about whom the information or biospecimens are collected through oral history, journalism, biography, or historical scholarship activities, to provide an accurate and evidence-based portrayal of the individuals.

[ ] 6. A quality improvement or program improvement activity conducted to improve the implementation (delivery or quality) of an accepted practice, or to collect data about the implementation of the practice for clinical, practical, or administrative purposes. This does not include the evaluation of the efficacy of different accepted practices, or a comparison of their efficacy.

[ ] 7. Public health surveillance activities conducted, requested, or authorized by a public health authority for the sole purpose of identifying or investigating potential public health signals or timely awareness and priority setting during a situation that threatens public health.

[ ] 8. Preliminary, exploratory, or research development activities (such as pilot and feasibility studies, or reliability/validation testing of a questionnaire)

[ ] 9. Expanded access use of a drug or device not yet approved for this purpose

[ ] 10. Use of a Humanitarian Use Device

[ ] 11. Other. Explain:

1.8 Background, experience, and preliminary work. Answer this question **only** if the proposed activity has one or more of the following characteristics. The purpose of this question is to provide the IRB with information that is relevant to its risk/benefit analysis.

- Involves more than minimal risk (physical or non-physical)
- Is a clinical trial, or
- Involves having the subjects use a drug, biological, botanical, nutritional supplement, or medical device.

"Minimal risk" means that the probability and magnitude of harm or discomfort anticipated in the research are not greater than those ordinarily encountered in daily life or during the performance of routine physical or psychological examinations or tests.

a. Background. Provide the rationale and the scientific or scholarly background for the proposed activity, based on existing literature (or clinical knowledge). Describe the gaps in current knowledge that the project is intended to address.

This should be a plain language description. Do not provide scholarly citations. Limit your answer to less than one page, or refer to an attached document with background information that is no more than three pages long.

Addressing pervasive misinformation — especially intentional *disinformation* — is one of society's most pressing challenges. Disinformation affects human health (Zarocostas, 2020; Roozenbeek et al., 2020), planetary health (Oreskes & Conway, 2011; van der Linden et al., 2017), diplomacy (Rid, 2020; Goldman, 2016), elections (Faris et al., 2017; Bak-Coleman et al., 2020; Benkler et al., 2020)

and collective decision-making more broadly (Starbird et al., 2019). Disinformation reduces our ability to respond to emerging threats and disasters. The COVID-19 pandemic and the recent 2020 U.S. elections provide evidence of the direct impact of disinformation; resistance to public health policies (Carrieri et al., 2019; Roozenbeek et al., 2020) and the U.S. Capitol riots on Jan. 6, 2021 (Reader, 2021) are notable examples. In other cases, effects are indirect and difficult to measure. Both indicate we need to better understand how disinformation is seeded, cultivated, and spread.

Disinformation's most consequential effects are the degradation of trust in the democratic process, degradation of trust in institutions, and degradation of trust in each other (Bradshaw & Howard, 2018). Disinformation is an attack on our collective ability to make sense of information and to build shared realities — the kind of common ground that a democratic society needs to stand upon to govern itself (Farrell & Shneier, 2018). Even the institution of science, which has maintained high levels of trust for decades, has begun to see declines among some parts of the population in the United States (West & Bergstrom, 2021; Iyengar & Massey, 2018; Gauchat, 2012).

Despite increased attention on the issue of disinformation, knowledge gaps exist. Researchers typically define disinformation as information intended to mislead, but in practice, both veracity and intention can be difficult to determine. The participatory and diffuse nature of disinformation (Starbird et al., 2019) makes it especially challenging to detect and address. We need a better understanding of what disinformation is and how it functions — and the proposed research seeks to enhance this understanding.

But even if we could consistently and accurately characterize and detect disinformation, can we do this fast enough in practice and in ways that mitigate the negative effects of disinformation rather than amplify them? How do we integrate real-time responses across diverse stakeholders, e.g., social media platforms, journalists, and governments? And how do we communicate about emergent disinformation campaigns in ways that are useful to these and other stakeholders, including the public at large? It is these questions that we hope to address with this research.

[Move in citations from SaTC Proposal]

b. Experience and preliminary work. Briefly describe experience or preliminary work or data (if any) that you, your team, or your collaborators/co-investigators have that supports the feasibility and/or safety of this study.

It is not necessary to summarize all discussion that has led to the development of the study protocol. The IRB is interested only in short summaries about experiences or preliminary work that suggest the study is feasible and that risks are reasonable relative to the benefits. Examples: Your team has already conducted a Phase 1 study of an experimental drug which supports the Phase 2 study being proposed in this application; your team has already done a small pilot study showing that the reading skills intervention described in this application is feasible in an after-school program with classroom aides; your team has experience with the type of surgery that is required to implant the study device; the study coordinator is experienced in working with subjects who have significant cognitive impairment.

Researchers on our team have extensive experience applying mixed-methods to the analysis of social media data to better understand how mis- and disinformation take root and spread across the internet (e.g. 51 et al., 2016; 51 et al., 2018, 51 et al., 2018, Starbird et al., 2018; Starbird et al., 2019). We have established the infrastructure to collect, store, analyze, and (in cases where it aligns with terms of service) share online data — e.g. public data from social media platforms — for research.

Members of our team have also been studying how journalists working on the "misinformation beat" rely on various resources — including external sources — to help them understand how mis- and disinformation spread online (Haughey et al., 2020). That work (which includes active collaborations around analysis and ethnographic work to study those collaborations) continues to study collaborations between journalists and researchers (existing IRB mentioned above). The proposed

research will expand that inquiry to include other collaborative partners.

We have previously organized and participated in "rapid response" efforts to address emergent disinformation. In Fall 2020, our two research teams (at UW and Stanford) collaborated with two external analysis teams and a variety of stakeholders — including journalists, social media platforms, government officials, and community organizations — as part of the "Election Integrity Partnership" to conduct rapid analysis of online misinformation related to the election. Findings from these research efforts were quickly communicated with partners and the public at large — through articles, blogs, and social media posts (e.g. Browning, 2020; Starbird et al., 2020; Tollefson, 2021). A final report (Center for an Informed Public et al., 2020) documents the extent of these activities. The research outlined in this IRB dovetails on that effort and seeks to understand how these collaborations "work" and how they might evolve in the future to help address emergent mis- and disinformation about elections and crises (from pandemics to climate change).

51 and Kate Starbird. (2018). Acting the Part: Examining Information Operations within #BlackLivesMatter Discourse. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 20.

Kellen Browning. (November 3, 2020). After Twitter Labels Trump's Tweet About Pennsylvania, Its Spread Slows. *New York Times*. Available at: https://www.nytimes.com/2020/11/03/technology/after-twitter-labels-trumps-tweet-about-pennsylvania-its-spread-slows.html

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election.* Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

51, and Kate Starbird. (2020). On the Misinformation Beat: Understanding the Work of Investigative Journalists Reporting on Problematic Information Online. *Proc. ACM Hum.Comput. Interact. 4, CSCW2*, Article 133 (October 2020), 22 pages. https://doi.org/10.1145/3415204

Kate Starbird, Michael Caulfield, Renee DiResta, Jevin West, Emma Spiro, 51, Rachel Moran, and 51. October 26, 2020. "Uncertainty and misinformation: What to expect on election night and days after." Blog posted by *Election Integrity Partnership*. https://www.eipartnership.net/news/what-to-expect

Kate Starbird, 51. (2019). Disinformation as Collaborative Work: Surfacing the Participatory Nature of Strategic Information Operations. *PACMHCI. 3, Computer-Supported Cooperative Work (CSCW 2019)*. Article 127.

51, and Kate Starbird. (2018). Assembling Strategic Narratives: Information Operations as Collaborative Work within an Online Community. *PACMHCI. 2, Computer-Supported Cooperative Work (CSCW 2018)*. Article 183.

Kate Starbird, 51, and Daniel Scarnecchia. (2018). Ecosystem or Echo-System? Exploring Content Sharing across Alternative Media Domains. Presented at *12th International AAAI Conference on Web and Social Media (ICWSM 2018)*, Stanford, CA, (pp. 365-374).

51 Kate Starbird and Emma Spiro. (2016). Rumors at the Speed of Light? Modeling the Rate of Rumor Transmission during Crisis. *Hawaii International Conference on System Sciences (HICSS*

2016). (pp. 1969-1978).

Jeff Tollefson. "Tracking QAnon: how Trump turned conspiracy-theory research upside down." *Nature Communications*. February 4, 2021. https://www.nature.com/articles/d41586-021-00257-y

1.9 Supplements. Check all boxes that apply, to identify relevant Supplements that should be completed and uploaded to ***Zipline***.

This section is here instead of at the end of the form to reduce the risk of duplicating information in this IRB Protocol form that you will need to provide in these Supplements.

Check all That Apply	Type of Research	Supplement Name
☐	**Department of Defense** The research involves Department of Defense funding, facilities, data, or personnel.	SUPPLEMENT Department of Defense
☐	**Department of Energy** The research involves Department of Energy funding, facilities, data, or personnel.	SUPPLEMENT Department of Energy
☐	**Drug, biologic, botanical, supplement** Procedures involve the use of any drug, biologic, botanical or supplement, even if the item is not the focus of the proposed research	SUPPLEMENT Drugs
☐	**Emergency exception to informed consent** Research that requires this special consent waiver for research involving more than minimal risk	SUPPLEMENT Exception from Informed Consent for Emergency Research (EFIC)
☐	**Genomic data sharing** Genomic data are being collected and will be deposited in an external database (such as the NIH dbGaP database) for sharing with other researchers, and the UW is being asked to provide the required certification or to ensure that the consent forms can be certified	SUPPLEMENT Genomic Data Sharing
☐	**Medical device** Procedures involve the use of any medical device, even if the device is not the focus of the proposed research, except when the device is FDA-approved and is being used through a clinical facility in the manner for which it is approved	SUPPLEMENT Devices
☒	**Multi-site or collaborative study** The UW IRB is being asked to review on behalf of one or more non-UW institutions in a multi-site or collaborative study.	SUPPLEMENT Multi-site or Collaborative Research
☐	**Non-UW Individual Investigators** The UW IRB is being asked to review on behalf of one or more non-UW individuals who are not affiliated with another organization for the purpose of the research.	SUPPLEMENT Non-UW Individual Investigators
☐	**Other REDCap Installation Attestation for Electronic Consent** The research will use a non-UW installation of REDCap for conducting and/or documenting informed consent.	SUPPLEMENT Other REDCap Installation
☐	None of the above	

☐

1.10 **Confirm by checking the box below** that you will comply with the COVID requirements described on HSD's COVID webpage, which are based on the location of the in-person study procedures and the vaccination status of study team members and study participants.

Review the HSD website for current guidelines about which in-person research activities are allowable.

[X] **Confirmed**

2 PARTICIPANTS

2.1 **Participants**. Describe the general characteristics of the subject populations or groups, including age range, gender, health status, and any other relevant characteristics.

2.2 **Inclusion and exclusion criteria.**

a. Inclusion criteria. Describe the specific criteria that will be used to decide who will be included in the research from among interested or potential subjects. Define any technical terms in lay language.

b. Exclusion criteria. Describe the specific criteria that will be used to decide who will be excluded from the research from subjects who meet the inclusion criteria listed above. Define any technical terms in lay language.

2.3 **Prisoners**. IRB approval is required in order to include prisoners in research, even when prisoners are not an intended target population.

Is the research likely to have subjects who become prisoners while participating in the study?

For example, a longitudinal study of youth with drug problems is likely to have subjects who will be prisoners at some point during the study.

☐ **No**
☐ **Yes** → If yes, if a subject becomes a prisoner while participating in the study, will any study procedures and/or data collection related to the subject be continued while the subject is a prisoner?

☐ **No**
☐ **Yes** → If yes, describe the procedures and/or data collection that will continue with prisoner subjects

2.4 Will the proposed research recruit or obtain data from individuals that are known to be prisoners?

*For records reviews: if the records do not indicate prisoner status and prisoners are not a target population, select "No". See the **GUIDANCE Prisoners** for the definition of "prisoner", which is not necessarily tied to the type of facility in which a person is residing.*

☐ **No**
☐ **Yes** → If yes, answer the following questions (i – iv).

i. Describe the type of prisoners, and their location(s):

ii. One concern about prisoner research is whether the effect of participation on prisoners' general living conditions, medical care, quality of food, amenities, and/or opportunity for earnings in prison will be so great that it will make it difficult for prisoners to adequately consider the research risks. How will the chances of this be reduced?

iii. Describe what will be done to make sure that (a) recruitment and subject selection procedures will be fair to all eligible prisoners and (b) prison authorities or other prisoners will not be able to arbitrarily prevent or require particular prisoners from participating.

iv. If the research is funded by one of these federal departments and agencies (Health & Human Services; Energy; Defense; Homeland Security; CIA; Social Security Administration), and/or will involve prisoners in federal facilities or in state/local facilities outside of Washington State: check the box below to provide assurance that study team members will (a) not encourage or facilitate the use of a prisoner's participation in the research to influence parole or pardon decisions, and (b) clearly inform each prisoner in advance (for example, in a consent form) that participation in the research will have no effect on his or her parole or pardon.

☐ **Confirmed**

2.5 **Protected populations**. IRB approval is required for the use of the subject populations listed here. Check the boxes for any of these populations that will be purposefully included. (In other words, being a part of the population is an inclusion criterion for the study.)

The WORKSHEETS describe the criteria for approval but do not need to be completed and should not be submitted.

Population	Worksheet
☐ Fetuses in utero	WORKSHEET Pregnant Women
☐ Neonates of uncertain viability	WORKSHEET Neonates
☐ Non-viable neonates	WORKSHEET Neonates
☐ Pregnant women	WORKSHEET Pregnant Women

a. If you check any of the boxes above, use this space to provide any information that may be relevant for the IRB to consider.

2.6 **Native Americans or non-U.S. indigenous populations.** Will Native American or non-U.S. indigenous populations be actively recruited through a tribe, tribe-focused organization, or similar community-based organization?

Indigenous people are defined in international or national legislation as having a set of specific rights based on their historical ties to a particular territory and their cultural or historical distinctiveness from other populations that are often politically dominant.

Examples: a reservation school or health clinic; recruiting during a tribal community gathering

☐ **No**

☐ **Yes** → If yes, name the tribe, tribal-focused organization, or similar community-based organization. The UW IRB expects that tribal/indigenous approval will be obtained before beginning the research. This may or may not involve approval from a tribal IRB. The study team and any collaborators/investigators are also responsible for identifying any tribal laws that may affect the research.

2.7 Third party subjects. Will the research collect private identifiable information about *other individuals* from the study subjects? Common examples include: collecting medical history information or contact information about family members, friends, co-workers.

"Identifiable" means any direct or indirect identifier that, alone or in combination, would allow you or another member of the research team to readily identify the person. For example, suppose that the research is about immigration history. If subjects are asked questions about their grandparents but are not asked for names or other information that would allow easy identification of the grandparents, then private identifiable information is not being collected about the grandparents and the grandparents are not subjects.

☐ **No**
☐ **Yes** → If yes, these individuals are considered human subjects in the study. Describe them and what data will be collected about them.

2.8 Number of subjects. Is it possible to predict or describe the maximum number of subjects (or subject units) needed to complete the study, for each subject group?

Subject units mean units within a group. For most research studies, a group will consist of individuals. However, the unit of interest in some research is not the individual. Examples:

- *Dyads such as caregiver-and-Alzheimer's patient, or parent and child*
- *Families*
- *Other units, such as student-parent-teacher*

Subject group means categories of subjects that are meaningful for the specific study. Some research has only one subject group – for example, all UW students taking Introductory Psychology. Some common ways in which subjects are grouped include:

- *By intervention – for example, an intervention group and a control group.*
- *By subject population or setting – for example, urban versus rural families*
- *By age – for example, children who are 6, 10, or 14 years old.*

The IRB reviews the number of subjects in the context of risks and benefits. Unless otherwise specified, if the IRB determines that the research involves no more than minimal risk: there are no restrictions on the total number of subjects that may be enrolled. If the research involves more than minimal risk: The number of enrolled subjects must be limited to the number described in this application. If it is necessary later to increase the number of subjects, submit a Modification. Exceeding the IRB-approved number (over-enrollment) will be considered non-compliance.

☐ **No** → If no, provide the rationale in the box below. Also, provide any other available information about the scope/size of the research. You do not need to complete the table.

Example: It may not be possible to predict the number of subjects who will complete an online survey advertised through Craigslist, but you can state that the survey will be posted for two weeks and the number who respond is the number who will be in the study.

☐ **Yes** → If yes, for each subject group, use the table below to provide the estimate of the maximum desired number of individuals (or other subject unit, such as families) who will complete the research.

Group name/description	Maximum desired number of individuals (or other subject unit, such as families) who will complete the research ***Provide numbers for the site(s) reviewed by the UW IRB and for the study-wide total number; example: 20/100***

3 NON-UW RESEARCH SETTING

Complete this section only if UW investigators and people named in the SUPPLEMENT: Non-UW Individual Investigators will conduct research procedures outside of UW and Harborview

3.1 Reason for locations. Describe the reason(s) for choosing the locations.

This is especially important when the research will occur in locations or with populations that may be vulnerable to exploitation. One of the three ethical principles the IRB must consider is justice: ensuring that reasonable, non-exploitative, and well-considered procedures are administered fairly, with a fair distribution of costs and potential benefits.

3.2 Local context. Culturally appropriate procedures and an understanding of local context are an important part of protecting subjects. Describe any site-specific cultural issues, customs, beliefs, or values that may affect the research, how it is conducted, or how consent is obtained or documented.

Examples: It would be culturally inappropriate in some international settings for a woman to be directly contacted by a male researcher; instead, the researcher may need to ask a male family member for permission before the woman can be approached. It may be appropriate to obtain permission from community leaders prior to obtaining consent from individual members of a group. In some distinct cultural groups, signing forms may not be the norm.

This federal site maintains an international list of human research standards and requirements:
http://www.hhs.gov/ohrp/international/index.html

3.3 Location-specific laws. Describe any local laws that may affect the research (especially the research design and consent procedures). The most common examples are laws about:

- **Specimens** – for example, some countries will not allow biospecimens to be taken out of the country.
- **Age of consent** – laws about when an individual is considered old enough to be able to provide consent vary across states, and across countries.
- **Legally authorized representative** – laws about who can serve as a legally authorized representative (and who has priority when more than one person is available) vary across states and countries.
- **Use of healthcare records** – many states (including Washington State) have laws that are similar to the federal HIPAA law but that have additional requirements.

3.4 Location-specific administrative or ethical requirements. Describe local administrative or ethical requirements that affect the research.

Example: A school district may require researchers to obtain permission from the head district office as well as school principals before approaching teachers or students; a factory in China may allow researchers to interview factory workers but not allow the workers to be paid for their participation.

3.5 If the PI is a student: Does the research involve traveling outside of the US?

☐ **No**

☐ **Yes** → If yes, confirm by checking the box that (1) you will register with the UW Office of Global Affairs before traveling; (2) you will notify your advisor when the registration is complete; and (3) you will request a UW Travel Waiver if the research involves travel to the list of countries requiring a UW Travel Waiver.

☐ **Confirmed**

4 RECRUITING and SCREENING PARTICIPANTS

4.1 Recruiting and Screening. Describe how subjects will be identified, recruited, and screened. Include information about: how, when, where, and in what setting. Identify who (by position or role, not name) will approach and recruit subjects, and who will screen them for eligibility.

Note: Per UW Medicine policy, the UW Medicine eCare/MyChart system may not be used for research recruitment purposes.

4.2 Recruitment materials.

a. What materials (if any) will be used to recruit and screen subjects?

Examples: talking points for phone or in-person conversations; video or audio presentations; websites; social media messages; written materials such as letters, flyers for posting, brochures, or printed advertisements; questionnaires filled out by potential subjects.

b. Upload descriptions of each type of material (or the materials themselves) to ***Zipline***. If letters or emails will be sent to any subjects, these should include a statement about how the subject's name and contact information were obtained. No sensitive information about the person (such as a diagnosis of a medical condition) should be included in the letter. The text of these letters and emails must be uploaded to ***Zipline*** (i.e., a description will not suffice).

HSD encourages researchers to consider uploading descriptions of most recruitment and screening materials instead of the materials themselves. The goal is to provide the researchers with the flexibility to change some information on the materials without submitting a Modification for IRB approval of the changes. Examples:

- *Provide a list of talking points that will be used for phone or in-person conversations instead of a script.*
- *For the description of a flyer, include the information that it will provide the study phone number and the name of a study contact person (without providing the actual phone number or name). This means that a Modification would not be necessary if/when the study phone number or contact person changes. Also, instead of listing the inclusion/exclusion criteria, the description below might state that the flyer will list one or a few of the major inclusion/exclusion criteria.*
- *For the description of a video or a website, include a description of the possible visual elements and a list of the content (e.g., study phone number; study contact person; top three inclusion/exclusion criteria; payment of $50; study name; UW researcher).*

4.3 Relationship with participant population. Do any members of the study team have an existing relationship with the study population(s)?

Examples: a study team member may have a dual role with the study population (for example, being their clinical care provider, teacher, laboratory directory or tribal leader in addition to recruiting them for his/her research).

☐ **No**
☐ **Yes** → If yes, describe the nature of the relationship.

4.4 Payment to participants. The IRB must evaluate subject payment for the possibility that it will unduly influence subjects to participate. Refer to GUIDANCE Subject Payment when designing subject payment plans. Provide the following information about your plans for paying research subjects in the text box below or note that the information can be found in the consent form.

- The total amount/value of the payment
- Schedule/timing of the payment [i.e., when will subjects receive the payment(s)]
- Purpose of the payment [e.g., reimbursement, compensation, incentive]
- Whether payment will be "pro-rated" so that participants who are unable to complete the research may still receive some part of the payment

The IRB expects the consent process or study information provided to the subjects to include all of the above-listed information about payment, including the number and amount of payments, and especially when subjects can expect to receive payment.

One of the most frequent complaints received by HSD is from subjects who expected to receive cash or a check on the day that they completed a study and who were angry or disappointed when payment took 6-8 weeks to reach them.

Researchers should review current UW Financial Management requirements about when Social Security Numbers must be collected, and when research payment must be reported to the UW Tax Office and the IRS: https://finance.uw.edu/ps/how-pay/research-subjects.

4.5 Non-monetary compensation. Describe any non-monetary compensation that will be provided. Example: extra credit for students; a toy for a child. If class credit will be offered to students, there must be an alternate way for the students to earn the extra credit without participating in the research.

4.6 Will data or specimens be accessed or obtained for recruiting and screening procedures prior to enrollment?

Examples: names and contact information; the information gathered from records that were screened; results of screening questionnaires or screening blood tests; Protected Health Information (PHI) from screening medical records to identify possible subjects.

☐ **No** → If no, skip the rest of this section; go to question **5.1**.

☐ **Yes** → If yes, describe the data and/or specimens (including PHI) and whether it will be retained as part of the study data.

4.7 Consent for recruiting and screening. Will consent be obtained for any of the recruiting and screening procedures? (Section 8: Consent of Adults asks about consent for the main study procedures).

"Consent" includes: consent from individuals for their own participation; parental permission; assent from children; consent from a legally authorized representative for adult individuals who are unable to provide consent.

Examples:

- *For a study in which names and contact information will be obtained from a registry: the registry should have consent from the registry participants to release their names and contact information to researchers.*
- *For a study in which possible subjects are identified by screening records: there will be no consent process.*
- *For a study in which individuals respond to an announcement and call into a study phone line: the study team person talking to the individual may obtain non-written consent to ask eligibility questions over the phone.*

☐ **No** → If no, skip the rest of this section; go to question **5.1**.

☐ **Yes** → If yes, describe the consent process.

a. Documentation of consent. Will a written or verifiable electronic signature from the subject on a consent form be used to document consent for the **recruiting and screening procedures**?

☐ **No** → If no, describe the information that will be provided during the consent process and for which procedures.

☐ **Yes, written** → If yes, and a **written** signature will be used to document consent:
- Upload the consent form to ***Zipline***.

☐ **Yes, electronic** → If yes, and an **electronic** signature will be used to document consent:
- Upload the consent form to ***Zipline***.
- **If the eSignature process or method for recruiting and screening is different than for the main study procedures**, use the questions about electronic consent in Section 8.3 and 8.4 to differentiate between recruiting/screening and main study electronic consent. **If electronic consent will be used for recruiting/screening but not main study consent**, use 8.3 and 8.4 to describe eConsent and note that it is only for recruiting/screening.

5 PROCEDURES

5.1 Study procedures. Using lay language, provide a complete description of the study procedures, including the sequence, intervention or manipulation (if any), drug dosing information (if any), blood volumes and frequency of draws (if any), use of records, time required, and setting/location. If it is available: Upload a study flow sheet or table to ***Zipline***.

For studies comparing standards of care: It is important to accurately identify the research procedures. See UW IRB ***POLICY Risks of Harm from Standard Care*** *and the draft guidance from the federal Office of Human Research Protections,* ***"Guidance on Disclosing Reasonably Foreseeable Risks in Research Evaluating Standards of Care";*** *October 20, 2014. Information about pediatric blood volume and frequency of draws that would qualify for expedited review can be found in this* **reference table** *on the Seattle Children's IRB website.*

5.2 Recordings. Does the research involve creating audio or video recordings?

☐ **No** → If no, go to question **5.3**.
☐ **Yes** → If yes, verify that you have described what will be recorded in 5.1 and answer question **a.**

a. Before recording, will consent for being recorded be obtained from subjects and any other individuals who may be recorded?

☐ **No** → If no, email hsdinfo@uw.edu before submitting this application in Zipline. In the email, include a brief description of the research and a note that individuals will be recorded without their advance consent.

☐ **Yes**

5.3 MRI scans. Will any subjects have a Magnetic Resonance Imaging (MRI) scan as part of the study procedures?

This means scans that are performed solely for research purposes or clinical scans that are modified for research purposes (for example, using a gadolinium-based contrast agent when it is not required for clinical reasons).

☐ **No** → If no, go to question **5.4**.

☐ **Yes** → If yes, answer questions **a** through **c**.

a. Describe the MRI scan(s). Specifically:

- What is the purpose of the scan(s)? *Examples: obtain research data; safety assessment associated with a research procedure.*
- Which subjects will receive an MRI scan?
- Describe the minimum and maximum number of scans per subject, and over what time period the scans will occur. *For example: all subjects will undergo two MRI scans, six months apart.*

b. MRI facility. At which facility(ies) will the MRI scans occur? Check all that apply.

☐	UWMC Radiology/Imaging Services (the UWMC clinical facility)
☐	DISC Diagnostic Imaging Sciences Center (UWMC research facility)
☐	CHN Center for Human Neuroscience MRI Center (Arts & Sciences research facility)
☐	BMIC Biomolecular Imaging Center (South Lake Union research facility)
☐	Harborview Radiology/Imaging Services (the Harborview clinical facility)
☐	SCCA Imaging Services
☐	Northwest Diagnostic Imaging
☐	Other: identify in the text box below:

c. Personnel. For MRI scans that will be conducted at the DISC, CHN or BMIC research facilities: Indicate who will be responsible for operating the MRI scanner by checking all that apply.

☐	MRI technician who is formally qualified
☐	Researcher who has completed scanner operator training provided by a qualified MRI operator

5.4 **Data variables.** Describe the specific data that will be obtained (including a description of the most sensitive items). Alternatively, a list of the data variables may be uploaded to ***Zipline***.

5.5 **Data sources.** For all types of data that will be accessed or collected for this research: Identify whether the data are being obtained from the subjects (or subjects' specimens) or whether they are being obtained from some other source (and identify the source).

If you have already provided this information in Question 5.1, you do not need to repeat the information here.

5.6 Identifiability of data and specimens. Answer these questions carefully and completely. This will allow HSD to accurately determine the type of review that is required and the relevant compliance requirements. Review the following definitions before answering the questions:

__Access__ means to view or perceive data, but not to possess or record it. See, in contrast, the definition of "obtain".
__Identifiable__ means that the identity of an individual is or may be readily (1) ascertained by the researcher or any other member of the study team from specific data variables or from a combination of data variables, or (2) associated with the information.
__Direct identifiers__ are direct links between a subject and data/specimens. Examples include (but are not limited to): name, date of birth, medical record number, email or IP address, pathology or surgery accession number, student number, or a collection of data that is (when taken together) identifiable.
__Indirect identifiers__ are information that links between direct identifiers and data/specimens. Examples: a subject code or pseudonym.
__Key__ refers to a single place where direct identifiers and indirect identifiers are linked together so that, for example, coded data can be identified as relating to a specific person. Example: a master list that contains the data code and the identifiers linked to the codes.
__Obtain__ means to possess or record in any fashion (writing, electronic document, video, email, voice recording, etc.) for research purposes and to retain for any length of time. This is different from __accessing__, which means to view or perceive data.

a. Will you or any members of your team have access to any direct or indirect identifiers?

☐ **Yes** → If yes, describe which identifiers and for which data/specimens.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not have access to direct or indirect identifiers.

- ☐ There will be no identifiers.
- ☐ Identifiers or the key have been (or will have been) destroyed before access.
- ☐ There is an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) to study team members under any circumstances.

  This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.
- ☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.
- ☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

b. Will you or any study team members obtain any direct or indirect identifiers?

☐ **Yes** → If yes, describe which identifiers and for which data/specimens.

☐ **No** → If no, select the reason(s) why you (and all members of your team) will not obtain direct or indirect identifiers.

- ☐ There will be no identifiers.
- ☐ Identifiers or the key have been (or will have been) destroyed before access.

☐ There will be an agreement with the holder of the identifiers (or key) that prohibits the release of the identifiers (or key) under any circumstances.

This agreement should be available upon request from the IRB. Examples: a Data Use Agreement, Repository Gatekeeping form, or documented email.

☐ There are written policies and procedures for the repository/database/data management center that prohibit the release of the identifiers (or identifying link). This includes situations involving an Honest Broker.

☐ There are other legal requirements prohibiting the release of the identifiers or key. Describe them below.

c. If any identifiers will be obtained, indicate how the identifiers will be stored (and for which data). NOTE: Do not describe the data security plan here – that information is requested in section 9.6.

☐ Identifiers will be stored with the data. Describe the data to which this applies:

☐ Identifiers and study data will be stored separately but a link will be maintained between the identifiers and the study data (for example, through the use of a code). Describe the data to which this applies:

☐ Identifiers and study data will be stored separately, with no link between the identifiers and the study data. Describe the data to which this applies:

d. Research collaboration. Will individuals who provide coded information or specimens for the research also collaborate on other activities for this research? If yes, identify the activities and provide the name of the collaborator's institution/organization.

Examples include but are not limited to: (1) study, interpretation, or analysis of the data that results from the coded information or specimens; and (2) authorship on presentations or manuscripts related to this work.

5.7 Protected Health Information (PHI). Will participants' identifiable PHI be accessed, obtained, used, or disclosed for any reason (for example, to identify or screen potential subjects, to obtain study data or specimens, for study follow-up) that does not involve the creation or obtaining of a Limited Data Set?

PHI is individually identifiable healthcare record information or clinical specimens from an organization considered a "covered entity" by federal HIPAA regulations, in any form or media, whether electronic, paper, or oral. ***You must answer yes to this question if the research involves identifiable health care records (e.g., medical, dental, pharmacy, nursing, billing, etc.), identifiable healthcare information from a clinical department repository, or observations or recordings of clinical interactions.***

For information about what constitutes the UW Covered Entity, see UW Medicine Compliance Patient Information Privacy Policy 101 and diagram of the healthcare components.

☐ **No** → If no, skip the rest of this question; go to question **5.8**.

☐ **Yes** → If yes, answer all of the questions below.

a. Describe the PHI and the reason for using it. *Be specific. For example, will any "free text" fields (such as physician notes) be accessed, obtained, or used?*

b. Is any of the PHI located in Washington State?

☐ **No**
☐ **Yes**

c. Describe the pathway of how the PHI will be accessed or obtained, starting with the source/location and then describing the system/path/mechanism by which it will be identified, accessed, and copied for the research. *Be specific. For example: directly view records; search through a department's clinical database; submit a request to Leaf.*

d. For which PHI will subjects provide HIPAA authorization before the PHI is accessed, obtained and/or used?

Confirm by checking the box that the UW Medicine HIPAA Authorization form maintained on the HSD website will be used to access, obtain, use, or disclose any UW Medicine PHI.

☐ **Confirmed**

e. Will you obtain any HIPAA authorizations electronically (i.e., e-signature)?

☐ **No**
☐ **Yes**

If 'Yes', confirm by checking the box that you have read and understand the 'Special Considerations' section of the **GUIDANCE Electronic Informed Consent** for information regarding the use of electronic signatures and HIPAA authorizations.

☐ **Confirmed**

f. For which PHI will HIPAA authorization NOT be obtained from the subjects?

Provide the following assurances by checking the boxes.

☐ The minimum necessary amount of PHI to accomplish the purposes described in this application will be accessed, obtained and/or used.

☐ The PHI will not be reused or disclosed to any other person or entity, except as required by law, for authorized oversight of the research study, or for other research for which the use or disclosure of PHI would be permitted.

☐ The HIPAA "accounting for disclosures" requirement will be fulfilled, if applicable. See UW Medicine Compliance Policy #104.

☐ There will be reasonable safeguards to protect against identifying, directly or indirectly, any patient in any report of the research.

5.8 Genomic data sharing. Will the research obtain or generate genomic data?

No

Yes
→ If yes, answer the question below.

a. Will genomic data from this research be sent to a national database (for example, NIH's dbGaP database)?

No

Yes
→ If yes, complete the **SUPPLEMENT Genomic Data Sharing** and upload it to ***Zipline***.

5.9 Whole genome sequencing. For research involving biospecimens: Will the research include whole genome sequencing?

Whole genome sequencing is sequencing of a human germline or somatic specimen with the intent to generate the genome or exome sequence of that specimen.

No

Yes

5.10 Possible secondary use or sharing of information, specimens, or subject contact information. Is it likely that the obtained or collected information, specimens, or subject contact information will be used for any of the following:

- Future research not described in this application (in other words, secondary research)
- Submission to a repository, registry, or database managed by the study team, colleagues, or others for research purposes
- Sharing with others for their own research

Please consider the broadest possible future plans and whether consent will be obtained now from the subjects for future sharing or research uses (which it may not be possible to describe in detail at this time). Answer **YES** even if future sharing or uses will use de-identified information or specimens. Answer **NO** if sharing is unlikely or if the only sharing will be through the NIH Genomic Data Sharing described in question 5.8.

Many federal grants and contracts now require data or specimen sharing as a condition of funding, and many journals require data sharing as a condition of publication. "Sharing" may include (for example): informal arrangements to share banked data/specimens with other investigators; establishing a repository that will formally share with other researchers through written agreements; or sending data/specimens to a third party repository/archive/entity such as the Social Science Open Access Repository (SSOAR), or the UCLA Ethnomusicology Archive.

No

Yes
→ If yes, answer all of the questions below.

a. Describe what will be stored for future use, including whether any direct or indirect (e.g., subject codes) identifiers will be stored.

b. Describe what will be shared with other researchers or with a repository/database/registry, including whether direct identifiers will be shared and (for specimens) what data will be released with the specimens.

c. Who will oversee and/or manage the sharing?

d. Describe the possible future uses, including limitations or restrictions (if any) on future uses or users. As stated above, consider the broadest possible uses.

Examples: data will be used only for cardiovascular research; data will not be used for research on population origins.

e. Consent. Will consent be obtained now from subjects for the secondary use, banking and/or future sharing?

No

Yes
→ If yes, be sure to include the information about this consent process in the consent form (if there is one) and in the answers to the consent questions in Section 8.

f. Withdrawal. Will subjects be able to withdraw their data/specimens from secondary use, banking or sharing?

No

Yes
→ If yes, describe how, and whether there are any limitations on withdrawal.

Example: data can be withdrawn from the repository but cannot be retrieved after they are released.

g. Agreements for sharing or release. Confirm by checking the box that the sharing or release will comply with UW (and, if applicable, UW Medicine) policies that require a formal agreement with the recipient for release of data or specimens to individuals or entities other than federal databases.

Data Use Agreements or Gatekeeping forms are used for data; Material Transfer Agreements are used for specimens (or specimens plus data). Do not attach any template agreement forms; the IRB neither reviews nor approves them

Confirmed

5.11 Communication with subjects during the study. Describe the types of communication (if any) the research team will have with already-enrolled subjects during the study. Provide a description instead of the actual materials themselves.

Examples: email, texts, phone, or letter reminders about appointments or about returning study materials such as a questionnaire; requests to confirm contact information.

5.12 Future contact with subjects. Is there a plan to retain any contact information for subjects so that they can be contacted in the future?

No

Yes

→ If yes, describe the purpose of the future contact, and whether use of the contact information will be limited to the study team; if not, describe who else could be provided with the contact information. Describe the criteria for approving requests for the information.

Examples: inform subjects about other studies; ask subjects for additional information or medical record access that is not currently part of the study proposed in this application; obtain another sample.

5.13 Alternatives to participation. Are there any alternative procedures or treatments that might be advantageous to the subjects?

If there are no alternative procedures or treatments, select "No". Examples of advantageous alternatives: earning extra class credit in some time-equivalent way other than research participation; obtaining supportive care or a standard clinical treatment from a health care provider instead of participating in research with an experimental drug.

No

Yes
→ If yes, describe the alternatives.

5.14 Upload to *Zipline* all data collection forms (if any) that will be directly used by or with the subjects, and any scripts/talking points that will be used to collect the data. Do not include data collection forms that will be used to abstract data from other sources (such as medical or academic records), or video recordings.

- ***Examples****: survey, questionnaires, subject logs or diaries, focus group questions.*
- ***NOTE:*** *Sometimes the IRB can approve the general content of surveys and other data collection instruments rather than the specific form itself. This prevents the need to submit a modification request for future minor changes that do not add new topics or increase the sensitivity of the questions. To request this general approval, use the text box below to identify the questionnaires/surveys/ etc. for which you are seeking this more general approval. Then briefly describe the scope of the topics that will be covered and the most personal and sensitive questions. The HSD staff person who screens this application will let you know whether this is sufficient or whether you will need to provide more information.*
- ***For materials that cannot be uploaded****: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. You may also provide URLs (website addresses) or written descriptions below. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*
- ***For data that will be gathered in an evolving way****: This refers to data collection/questions that are not pre-determined but rather are shaped during interactions with participants in response to observations and responses made during those interactions. If this applies to the proposed research, provide a description of the process by which the data collection/questions will be established during the interactions with subjects, how the data collection/questions will be documented, the topics likely to be addressed, the most sensitive type of information likely to be gathered, and the limitations (if any) on topics that will be raised or pursued.*

Use this text box (if desired) to provide:

- Short written descriptions of materials that cannot be uploaded, such as URLs
- A description of the process that will be used for data that will be gathered in an evolving way.
- The general content of questionnaires, surveys and similar instruments for which general approval is being sought. (See the **NOTE** bullet point in the instructions above.)

5.15 SARS-CoV-2 testing. Will the subjects be tested for the SARS-CoV-2 coronavirus?
If the only testing is to screen the subjects (question 2.8), you do not need to answer this question

No

Yes
→ If yes:

- Name the testing lab
- Confirm that the lab and its use of this test is CLIA-certified or certified by the Washington State Department of Health

- Describe whether you will return the results to the participants and, if yes, who will do it and how (including any information you would provide to subjects with positive test results).

6 CHILDREN (MINORS) and PARENTAL PERMISSION

6.1 Involvement of minors. Does the research include minors (children)?

Minor or child means someone who has not yet attained the legal age for consent for the research procedures, as described in the applicable laws of the jurisdiction in which the research will be conducted. This may or may not be the same as the definition used by funding agencies such as the National Institutes of Health.

- In Washington State the generic age of consent is 18, meaning that anyone under the age of 18 is considered a child.
- There are some procedures for which the age of consent is much lower in Washington State.
- The generic age of consent may be different in other states, and in other countries.

☐ **No** → If no, go to Section 8.

☐ **Yes** → If yes, provide the age range of the minor subjects for this study and the legal age for consent in the study population(s). If there is more than one answer, explain.

☐ **Don't know** → This means is it not possible to know the age of the subjects. For example, this may be true for some research involving social media, the Internet, or a dataset that is obtained from another researcher or from a government agency. Go to Section 8.

6.2 Parental permission. Parental permission means actively obtaining the permission of the parents. This is not the same as "passive" or "opt out" permission where it is assumed that parents are allowing their children to participate because they have been provided with information about the research and have not objected or returned a form indicating they don't want their children to participate.

a. Will parental permission be obtained for:

☐ All of the research procedures	→ Go to question **6.2b.**
☐ None of the research procedures	→ Use the table below to provide justification, and skip question 6.2b.

☐ Some of the research procedures → Use the table below to identify the procedures for which parental permission will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO parental permission[2]	Reason why parental permission will not be obtained	Will parents be informed about the research?[3] YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all children groups or all procedures: collapse the answer across the groups and/or procedures.*
2. *If identifiable information or biospecimens will be obtained without parent permission, any waiver granted by the IRB does not override parents' refusal to provide broad consent (for example, through the Northwest Biotrust).*
3. *Will parents be informed about the research beforehand even though active permission is not being obtained?*

b. Indicate the plan for obtaining parental permission. One or both boxes must be checked.

☐ Both parents, unless one parent is deceased, unknown, incompetent, or not reasonably available; or when only one parent has legal responsibility for the care and custody of the child

☐ One parent, even if the other parent is alive, known, competent, reasonably available, and shares legal responsibility for the care and custody of the child.

This is all that is required for minimal risk research.

If both boxes are checked, explain:

6.3 Children who are wards. Will any of the children be wards of the State or any other agency, institution, or entity?

☐ **No**

☐ **Yes** → If yes, an advocate may need to be appointed for each child who is a ward. The advocate must be in addition to any other individual acting on behalf of the child as guardian or in loco parentis. The same individual can serve as advocate for all children who are wards.

Describe who will be the advocate(s). The description must address the following points:

- Background and experience
- Willingness to act in the best interests of the child for the duration of the research
- Independence of the research, research team, and any guardian organization

6.4 UW Office for Youth Programs Development and Support. If the project involves interaction (in-person or remotely) with individuals under the age of 18, researchers must comply with **UW Administrative Policy Statement 10.13** and the requirements listed at this website. This includes activities that are deemed to be Not Research or Exempt. It does not apply to third-party led research (i.e., research conducted by a non-UW PI). Information and FAQs for researchers are available.

This point is advisory only; there is no need to provide a response.

7 ASSENT OF CHILDREN (MINORS)

Go to Section 8 if your research does not involve children (minors).

7.1 Assent of children (minors). Though children do not have the legal capacity to "consent" to participate in research, they should be involved in the process if they are able to "assent" by having a study explained to them and/or by reading a simple form about the study, and then giving their verbal choice about whether they want to participate. They may also provide a written assent if they are older. See **WORKSHEET Children** for circumstances in which a child's assent may be unnecessary or inappropriate.

a. Will assent be obtained for:

☐ All research procedures and child groups	→ Go to question **7.2.**
☐ None of the research procedures and child groups	→ Use the table below to provide justification, then skip to question **7.6**
☐ Some of your research procedures and child groups	→ Use the table below to identify the procedures for which assent will not be obtained.

Be sure to consider all research procedures and plans, including screening, future contact, and sharing/banking of data and specimens for future work.

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be obtained	Reason why assent will not be obtained

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse your answer across the groups and/or procedures.*

7.2 Assent process. Describe how assent will be obtained, for each child group. If the research involves children of different ages, answer separately for each group. If the children are non-English speakers, include a description of how their comprehension of the information will be evaluated.

7.3 Dissent or resistance. Describe how a child's objection or resistance to participation (including non-verbal indications) will be identified during the research, and what the response will be.

7.4 E-consent. Will any electronic processes (email, websites, electronic signatures, etc.) be used to present assent information to subjects/and or to obtain documentation (signatures) of assent? If yes, describe how this will be done.

7.5 Documentation of assent. Which of the following statements describes whether documentation of assent will be obtained?

☐ None of the research procedures and child groups	→ Use the table below to provide justification, then go to question **7.5.b**
☐ All of the research procedures and child groups	→ Go to question **7.5.a**, do not complete the table
☐ Some of the research procedures and/or child groups	→ Complete the table below and then to go question **7.5.a**

Children Group[1]	Describe the procedures or data/specimen collection (if any) for which assent will NOT be documented

Table footnotes

1. *If the answer is the same for all children groups or all procedures, collapse the answer across the groups and/or procedures.*

a. Describe how assent will be documented. If the children are functionally illiterate or are not fluent in English, include a description of the documentation process for them.

b. Upload all assent materials (talking points, videos, forms, etc.) to ***Zipline***. Assent materials are not required to provide all of the standard elements of adult consent; the information should be appropriate to the age, population, and research procedures. The documents should be in Word, if possible.

7.6 Children who reach the legal age of consent during participation in longitudinal research.

Children who were enrolled at a young age and continue for many years: It is best practice to re-obtain assent (or to obtain it for the first time, if it was not obtained at the beginning of their participation).
Children who reach the legal age of consent: Informed consent must be obtained from the now-adult subject for (1) any ongoing interactions or interventions with the subjects, or (2) the continued analysis of specimens or data for which the subject's identify is readily identifiable to the researcher, unless the IRB waives this requirement.

a. Describe the plans (if any) to re-obtain assent from children.

b. Describe the plans (if any) to obtain consent for children who reach the legal age of consent.

- If adult consent will be obtained from them, describe what will happen regarding now-adult subjects who cannot be contacted.
- If consent will not obtained or will not be possible: explain why.

7.7 Other regulatory requirements. (This is for information only; no answer or response is required.) Researchers are responsible for determining whether their research conducted in schools, with student records, or over the Internet comply with permission, consent, and inspection requirements of the following federal regulations:

- PPRA – Protection of Pupil Rights Amendment
- FERPA – Family Education Rights and Privacy Act
- COPPA – Children's Online Privacy Protection Act

8 CONSENT OF ADULTS

Review the following definitions before answering the questions in this section.

CONSENT	is the process of informing potential subjects about the research and asking them whether they want to participate. It does not necessarily include the signing of a consent form.
CONSENT DOCUMENTATION	refers to how a subject's decision to participate in the research is documented. This is typically obtained by having the subject sign a consent form.
CONSENT FORM	is a document signed by subjects, by which they agree to participate in the research as described in the consent form and in the consent process.
ELEMENTS OF CONSENT	are specific information that is required to be provided to subjects.

CHARACTERISTICS OF CONSENT	are the qualities of the consent process as a whole. These are:
	• Consent must be legally effective.
	• The process minimizes the possibility of coercion or undue influence.
	• Subjects or their representatives must be given sufficient opportunity to discuss and consider participation.
	• The information provided must:
	  ○ Begin with presentation of key information (for consent materials over 2,000 words)
	  ○ Be what a reasonable person would want to have
	  ○ Be organized and presented so as to facilitate understanding
	  ○ Be provided in sufficient detail
	  ○ Not ask or appear to ask subjects to waive their rights

PARENTAL PERMISSION	is the parent's active permission for the child to participate in the research. Parental permission is subject to the same requirements as consent, including written documentation of permission and required elements.
SHORT FORM CONSENT	is an alternative way of obtaining written documentation of consent that is most commonly used with individuals who are illiterate or whose language is one for which translated consent forms are not available.
WAIVER OF CONSENT	means there is IRB approval for not obtaining consent or for not including some of the elements of consent in the consent process. **NOTE:** If you plan to obtain identifiable information or identifiable biospecimens without consent, any waiver granted by the IRB does not override a subject's refusal to provide broad consent (for example, the Northwest Biotrust).
WAIVER OF DOCUMENTATION OF CONSENT	means that there is IRB approval for not obtaining written documentation of consent.

8.1 Groups Identify the groups to which the answers in this section apply.

☐ Adult subjects

☐ Parents who are providing permission for their children to participate in research

→ *If you selected **PARENTS**, the word "consent" below should also be interpreted as applying to parental permission and "subjects" should also be interpreted as applying to the parents.*

8.2 The consent process and characteristics. This series of questions is about whether consent will be obtained for all procedures except recruiting and screening and, if yes, how.

The issue of consent for recruiting and screening activities is addressed in question 4.7. You do not need to repeat your answer to question 4.6.

a. Are there any procedures for which consent will not be obtained?

☐ **No**

☐ **Yes** → If yes, use the table below to identify the procedures for which consent will not be obtained. "All" is an acceptable answer for some studies.

Be sure to consider all research procedures and plans, including future contact, and sharing/banking of data and specimens for future work.

Group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO consent process	Reason why consent will not be obtained	Will subjects be provided with info about the research after they finish? YES	NO
			☐	☐
			☐	☐
			☐	☐
			☐	☐
			☐	☐

Table footnotes

1. *If the answer is the same for all groups, collapse your answer across the groups and/or procedures.*

b. Describe the consent process, if consent will be obtained for any or all procedures, for any or all groups. Address groups and procedures separately if the consent processes are different.

Be sure to include:

- *The location/setting where consent will be obtained*
- *Who will obtain consent (refer to positions, roles, or titles, not names)*
- *How subjects will be provided sufficient opportunity to discuss the study with the research team and consider participation*

c. Comprehension. Describe the methods that will be used to ensure or test the subjects' understanding of the information during the consent process.

d. Influence. Does the research involve any subject groups that might find it difficult to say "no" to participation because of the setting or their relationship with someone on the study team, even if they aren't pressured to participate?

Examples: Student participants being recruited into their teacher's research; patients being recruited into their healthcare provider's research, study team members who are participants; outpatients recruited from an outpatient surgery waiting room just prior to their surgery.

☐ **No**
☐ **Yes** → If yes, describe what will be done to reduce any effect of the setting or relationship on the participation decision.

Examples: a study coordinator will obtain consent instead of the subjects' physician; the researcher will not know which subjects agreed to participate; subjects will have two days to decide after hearing about the study.

e. Information provided is tailored to needs of subject population. Describe the basis for concluding that the information that will be provided to subjects (via written or oral methods) is what a *reasonable member of the subject population(s)* would want to know. If the research consent materials contain a key information section, also describe the basis for concluding that the information presented in that section is that which is *most likely* to assist the selected subject population with making a decision. See **GUIDANCE Key Information for Consent Materials**.

For example: Consultation with publications about research subjects' preferences, disease-focused nonprofit groups, patient interest groups, or other researchers/study staff with experience with the specific population. It may also involve directly consulting selected members of the study population.

f. Ongoing process. For research that involves multiple or continued interaction with subjects over time, describe the opportunities (if any) that will be given to subjects to ask questions or to change their minds about participating.

8.3 Electronic presentation of consent information. Will any part of the consent-related information be provided electronically for some or all of the subjects?

This refers to the use of electronic systems and processes instead of (or in addition to) a paper consent form. For example, an emailed consent form, a passive or an interactive website, graphics, audio, video podcasts. See GUIDANCE Electronic Informed Consent for information about electronic consent requirements at UW.

☐ **No** → If no, skip to question 8.4
☐ **Yes** → If yes, answer questions **a** through **e**

a. Describe the electronic consent methodology and the information that will be provided.

All informational materials must be made available to the IRB. Website content should be provided as a Word document. It is considered best practice to give subjects information about multi-page/multi-screen information that will help them assess how long it will take them to complete the process. For example, telling them that it will take about 15 minutes, or that it involves reading six screens or pages.

b. Describe how the information can be navigated (if relevant). *For example, will the subject be able to proceed forward or backward within the system, or to stop and continue at a later time?*

c. In a standard paper-based consent process, the subjects generally have the opportunity to go through the consent form with study staff and/or to ask study staff about any question they may have after reading the consent form. Describe what will be done, if anything, to facilitate the subject's comprehension and opportunity to ask questions when consent information is presented electronically. Include a description of any provisions to help ensure privacy and confidentiality during this process.

Examples: hyperlinks, help text, telephone calls, text messages or other type of electronic messaging, video conference, live chat with remotely located study team members.

d. What will happen if there are individuals who wish to participate but who do not have access to the consent methodology being used, or who do not wish to use it? Are there alternative ways in which they can obtain the information, or will there be some assistance available? If this is a clinical trial, these individuals cannot be excluded from the research unless there is a compelling rationale.

For example, consider individuals who lack familiarity with electronic systems, have poor eyesight or impaired motor skills, or who do not have easy email or internet access.

e. How will the research team ensure continued accessibility of consent materials and information during the study?

f. How will additional information be provided to subjects during the research, including any significant new findings (such as new risk information) If this is not an issue, explain why.

8.4 Written documentation of consent. Which of the statements below describe whether documentation of consent will be obtained? NOTE: This question does not apply to screening and recruiting procedures which have already been addressed in question 4.7.

Documentation of consent that is obtained electronically is not considered written consent unless it is obtained by a method that allows verification of the individual's signature. In other words, saying "yes" by email is rarely considered to be written documentation of consent

a. Is written documentation of consent being obtained for:

☐ None of the research procedures	→ Use the table below to provide justification then go to question **8.5.**
☐ All of the research procedures	→ Do not complete the table; go to question **8.4.b.**
☐ Some of the research procedures	→ Use the table below to identify the procedures for which written documentation of consent will not be obtained from adult subjects.

Adult subject group[1]	Describe the procedures or data/specimen collection (if any) for which there will be NO documentation of consent	Will they be provided with a written statement describing the research (optional)? YES	NO
		☐	☐
		☐	☐
		☐	☐

	☐	☐
	☐	☐

Table footnotes

1. *If the answer is the same for all adult groups or all procedures, collapse the answer across the groups and/or procedures.*

b. Electronic consent signature. For studies in which documentation of consent will be obtained: will subjects use an electronic method to provide their consent signature?

- *See the GUIDANCE Electronic Informed Consent for information about options (including REDCap e-signature and the DocuSign system) and any associated requirements.*
- *FDA-regulated studies must use a system that complies with the FDA's "Part 11" requirements about electronic systems and records. Note that the UW-IT supported DocuSign e-signature system does not meet this requirement.*
- *Having subjects check a box at the beginning of an emailed or web-based questionnaire is not considered legally effective documentation of consent.*

☐ **No**
☐ **Yes** → If yes, indicate which methodology will be used.

☐ **UW ITHS REDCap** (excludes REDCap Mobile application, which is a separate software application for use with a mobile device for consent when internet service is absent or unreliable)

☐ **Other REDCap installation** → Please name the institutional version you will be using (e.g. Vanderbilt, Univ. of Cincinnati) in the field below and provide a completed **SUPPLEMENT Other REDCap Installation** with your submission.

☐ **UW DocuSign**

☐ **Other** → Please describe in the field below and provide a signed TEMPLATE Other E-signature Attestation Letter with your submission.

b.1 Is this method legally valid in the jurisdiction where the research will occur?
NOTE: UW ITHS REDCap (excludes REDCap Mobile application) and UW DocuSign have been vetted for compliance with WA State and federal laws regarding electronic signatures.

☐ **No**
☐ **Yes** → If yes, what is the source of information about legal validity?

b.2 Will verification of the subject's identity be obtained if the signature is not personally witnessed by a member of the study team? Note that this is required for FDA-regulated studies.

See the GUIDANCE Electronic Informed Consent for information and examples

☐ **No** → If no, provide the rationale for why this is not required or necessary to protect subjects or the integrity of the research. Also, what would be the risks to the actual subject if somebody other than the intended signer provides the consent signature?

☐ **Yes** → If yes, describe how subject identity will be verified, providing a non- technical description that the reviewer will understand.

b.3 How will the requirement be met to provide a copy of the consent information (consent form) to individuals who provide an e-signature?

The copy can be paper or electronic and may be provided on an electronic storage device or via email. If the electronic consent information uses hyperlinks or other websites or podcasts to convey information specifically related to the research, the information in these hyperlinks should be included in the copy provided to the subjects and the website must be maintained for the duration of the entire study.

8.5 Non-English-speaking or -reading adult subjects. Will the research enroll adult subjects who do not speak English or who lack fluency or literacy in English?

☐ **No**
☐ **Yes** → If yes, describe the process that will be used to ensure that the oral and written information provided to them during the consent process and throughout the study will be in a language readily understandable to them and (for written materials such as consent forms or questionnaires) at an appropriate reading/comprehension level.

a. Interpretation. Describe how interpretation will be provided, and when. Also, describe the qualifications of the interpreter(s) – for example, background, experience, language proficiency in English and in the other language, certification, other credentials, familiarity with the research-related vocabulary in English and the target language.

b. Translations. Describe how translations will be obtained for all study materials (not just consent forms). Also, describe the method for ensuring that the translations meet the UW IRB's requirement that translated documents will be linguistically accurate, at an appropriate reading level for the participant population, and culturally sensitive for the locale in which they will be used.

8.6 Barriers to written documentation of consent. There are many possible barriers to obtaining written documentation of consent. Consider, for example, individuals who are functionally illiterate; do not read English well; or have sensory or motor impairments that may impede the ability to read and sign a consent form.

a. Describe the plans (if any) for obtaining written documentation of consent from potential subjects who may have difficulty with the standard documentation process (that is, reading and signing a consent form). Skip this question if written documentation of consent is not being obtained for any part of the research.

Examples of solutions: Translated consent forms; use of the Short Form consent process; reading the form to the person before they sign it; excluding individuals who cannot read and understand the consent form.

8.7 Deception. Will information be deliberately withheld, or will false information be provided, to any of the subjects?
Note: "Blinding" subjects to their study group/condition/arm is not considered to be deception, but not telling them ahead of time that they will be subject to an intervention or about the purpose of the procedure(s) is deception.

☐ **No**
☐ **Yes** → If yes, describe what information and why.
Example: It may be necessary to deceive subjects about the purpose of the study (describe why).

a. Will subjects be informed beforehand that they will be unaware of or misled regarding the nature or purposes of the research? (Note: this is not necessarily required.)

☐ **No**
☐ **Yes**

b. Will subjects be debriefed later? (Note: this is not necessarily required.)

☐ **No**
☐ **Yes** → If yes, describe how and when this will occur. Upload any debriefing materials, including talking points or a script, to ***Zipline***.

8.8 Cognitively impaired adults, and other adults unable to consent. Will such individuals be included in the research?

Examples: individuals with Traumatic Brain Injury (TBI) or dementia; individuals who are unconscious, or who are significantly intoxicated.

☐ **No** → If no, go to question **8.9**.
☐ **Yes** → If yes, answer the following questions.

a. Rationale. Provide the rationale for including this population.

b. Capacity for consent / decision making capacity. Describe the process that will be used to determine whether a cognitively impaired individual is capable of consent decision making with respect to the research protocol and setting.

b.1. If there will be repeated interactions with the impaired subjects over a time period when cognitive capacity could increase or diminish, also describe how (if at all) decision-making capacity will be re-assessed and (if appropriate) consent obtained during that time.

c. Permission (surrogate consent). If the research will include adults who cannot consent for themselves, describe the process for obtaining permission ("surrogate consent") from a legally authorized representative (LAR).

*For research conducted in Washington State, see the **GUIDANCE Legally Authorized Representative** to learn which individuals meet the state definition of "legally authorized representative".*

d. Assent. Describe whether assent will be required of all, some, or none of the subjects. If some, indicate which subjects will be required to assent and which will not (and why not). Describe any process that will be used to obtain and document assent from the subjects.

e. Dissent or resistance. Describe how a subject's objection or resistance to participation (including non-verbal) during the research will be identified, and what will occur in response.

8.9 Research use of human fetal tissue obtained from elective abortion. Federal and UW Policy specify some requirements for the consent process. If you are conducting this type of research, check the boxes to confirm these requirements will be followed.

- ☐ Informed consent for the donation of fetal tissue for research use will be obtained by someone other than the person who obtained the informed consent for abortion.
- ☐ Informed consent for the donation of fetal tissue for research use will be obtained after the informed consent for abortion.
- ☐ Participation in the research will not affect the method of abortion.
- ☐ No enticements, benefits, or financial incentives will be used at any level of the process to incentivize abortion or the donation of human fetal tissue.
- ☐ The informed consent form for the donation of fetal tissue for use in research will be signed by both the

woman and the person who obtains the informed consent.

8.10 Consent-related materials. Upload to ***Zipline*** all consent scripts/talking points, consent forms, debriefing statements, Information Statements, Short Form consent forms, parental permission forms, and any other consent-related materials that will be used. Materials that will be used by a specific site should be uploaded to that site's **Local Site Documents** page.

- *Translations must be submitted and approved before they can be used. However, we strongly encourage you to wait to provide them until the IRB has approved the English versions.*
- *Combination forms: It may be appropriate to combine parental permission with consent, if parents are subjects as well as providing permission for the participation of their children. Similarly, a consent form may be appropriately considered an assent form for older children.*
- *For materials that cannot be uploaded: upload screenshots or written descriptions that are sufficient to enable the IRB to understand the types of data that will be collected and the nature of the experience for the participant. URLs (website addresses) may also be provided, or written descriptions of websites. Examples of materials that usually cannot be uploaded: mobile apps; computer-administered test; licensed and restricted standardized tests.*

9 PRIVACY AND CONFIDENTIALITY

9.1 Privacy protections. Describe the steps that will be taken, if any, to address possible privacy concerns of subjects and potential subjects.

Privacy refers to the sense of being in control of access that others have to ourselves. This can be an issue with respect to recruiting, consenting, sensitivity of the data being collected, and the method of data collection.
Examples:

- *Many subjects will feel a violation of privacy if they receive a letter asking them to participate in a study because they have ____ medical condition, when their name, contact information, and medical condition were drawn from medical records without their consent. Example: the IRB expects that "cold call" recruitment letters will inform the subject about how their information was obtained.*
- *Recruiting subjects immediately prior to a sensitive or invasive procedure (e.g., in an outpatient surgery waiting room) will feel like an invasion of privacy to some individuals.*
- *Asking subjects about sensitive topics (e.g. details about sexual behavior) may feel like an invasion of privacy to some individuals.*

9.2 Identification of individuals in publications and presentations. Will potentially identifiable information about subjects be used in publications and presentations, or is it possible that individual identities could be inferred from what is planned to be published or presented?

☐ **No**
☐ **Yes** → If yes, will subject consent be obtained for this use?
  ☐ **Yes**
  ☐ **No** → If no, describe the steps that will be taken to protect subjects (or small groups of subjects) from being identifiable.

9.3 State mandatory reporting. Each state has reporting laws that require some types of individuals to report some kinds of abuse, and medical conditions that are under public health surveillance. These include:

- Child abuse
- Abuse, abandonment, neglect, or financial exploitation of a vulnerable adult
- Sexual assault
- Serious physical assault
- Medical conditions subject to mandatory reporting (notification) for public health surveillance

Are you or a member of the research team likely to learn of any of the above events or circumstances while conducting the research **AND** feel obligated to report it to state authorities?

☐ **No**
☐ **Yes** → If yes, the UW IRB expects subjects to be informed of this possibility in the consent form or during the consent process, unless you provide a rationale for not doing so:

9.4 Retention of identifiers and data. Check the box below to indicate assurance that any identifiers (or links between identifiers and data/specimens) and data that are part of the research records will not be destroyed until after the end of the applicable records retention requirements (e.g. Washington State; funding agency or sponsor; Food and Drug Administration). If it is important to say something about destruction of identifiers (or links to identifiers) in the consent form, state something like "the link between your identifier and the research data will be destroyed after the records retention period required by state and/or federal law."

This question can be left blank for conversion applications (existing paper applications that are being "converted" into a Zipline application.)

See the "Research Data" sections of the following website for UW Records management for the Washington State research records retention schedules that apply in general to the UW (not involving UW Medicine data):
http://f2.washington.edu/fm/recmgt/gs/research?title=R

See the "Research Records and Data" information in Section 8 of this document for the retention schedules for UW Medicine Records: ***https://www.uwmedicine.org/recordsmanagementuwm-records-retention-schedule.pdf***

☐ **Confirm**

9.5 Certificates of Confidentiality. Will a federal Certificate of Confidentiality be obtained for the research data?
NOTE: Answer "No" if the study is funded by NIH or the CDC, because all NIH-funded and CDC-funded studies automatically have a Certificate.

☐ **No**
☐ **Yes**

9.6 Data and specimen security protections. Identify the data classifications and the security protections that will be provided for all sites where data will be collected, transmitted, or stored, referring to the **GUIDANCE Data and Security Protections** for the minimum requirements for each data classification level. ***It is not possible to answer this question without reading this document. Data security protections should not conflict with records retention requirements.***

a. Which level of protections will be applied to the data and specimens? If more than one level will be used, describe which level will apply to which data and which specimens and at which sites.

b. Use this space to provide additional information, details, or to describe protections that do not fit into one of the levels. If there are any protections within the level listed in 9.6.a which will *not* be followed, list those

here, including identifying the sites where this exception will apply. For example, if you intend to store subject identifiers with study data (not permitted under requirement U9 for Risk Levels 3-5), then indicate this in the box below (e.g., "We will not adhere to requirement U9 for screening data").

10 RISK / BENEFIT ASSESSMENT

10.1 Anticipated risks. Describe the reasonably foreseeable risks of harm, discomforts, and hazards to the subjects and others of the research procedures. For each harm, discomfort, or hazard:

- Describe the magnitude, probability, duration, and/or reversibility of the harm, discomfort, or hazard, AND
- Describe how the risks will be reduced or managed. Do not describe data security protections here, these are already described in Question 9.6.

- *Consider possible physical, psychological, social, legal, and economic harms, including possible negative effects on financial standing, employability, insurability, educational advancement or reputation. For example, a breach of confidentiality might have these effects.*
- *Examples of "others": embryo, fetus, or nursing child; family members; a specific group.*
- *Ensure applicable risk information from any Investigator Brochures, Drug Package Inserts, and/or Device Manuals is included in your description.*
- *Do not include the risks of non-research procedures that are already being performed.*
- *If the study design specifies that subjects will be assigned to a specific condition or intervention, then the condition or intervention is a research procedure - even if it is a standard of care.*
- *Examples of mitigation strategies: inclusion/exclusion criteria; applying appropriate data security measures to prevent unauthorized access to individually identifiable data; coding data; taking blood samples to monitor something that indicates drug toxicity.*
- *As with all questions on this application, you may refer to uploaded documents.*

10.2 Reproductive risks. Are there any risks of the study procedures to men and women (who are subjects, or partner of subjects) related to pregnancy, fertility, lactation or effects on a fetus or neonate?

Examples: direct teratogenic effects; possible germline effects; effects on fertility; effects on a woman's ability to continue a pregnancy; effects on future pregnancies.

☐ **No** → If no go to question 10.3
☐ **Yes** → If yes, answer the following questions:

a. Risks. Describe the magnitude, probability, duration and/or reversibility of the risks.

b. Steps to minimize risk. Describe the specific steps that will be taken to minimize the magnitude, probability, or duration of these risks.

Examples: inform the subjects about the risks and how to minimize them; require a pregnancy test before and during the study; require subjects to use contraception; advise subjects about banking of sperm and ova.

If the use of contraception will be required: describe the allowable methods and the time period when contraception must be used.

c. Pregnancy. Describe what will be done if a subject (or a subject's partner) becomes pregnant

For example; will subjects be required to immediately notify study staff, so that the study procedures can be discontinue or modified, or for a discussion of risks, and/or referrals or counseling?

10.3 MRI risk management. A rare but serious adverse reaction called nephrogenic systemic fibrosis (NSF) has been observed in individuals with kidney disease who received gadolinium-based contrast agents (GBCAs) for the scans. Also, a few healthy individuals have a severe allergic reaction to GBCAs.

a. Use of gadolinium. Will any of the MRI scans involve the use of a gadolinium-based contrast agent (GBCA?)

☐ **No**
☐ **Yes** → If yes, which agents will be used? *Check all that apply.*

	Brand Name	Generic Name	Chemical Structure
☐	Dotarem	Gadoterate meglumine	Macrocylic
☐	Eovist / Primovist	Gadoxetate disodium	Linear
☐	Gadavist	Gadobutro	Macrocyclic
☐	Magnevist	Gadpentetate dimeglumine	Linear
☐	MultiHance	Gadobenate dimeglumine	Linear
☐	Omniscan	Gadodiamide	Linear
☐	OptiMARK	Gadoversetamide	Linear
☐	ProHance	Gadoteridol	Macrocyclic
☐	Other, provide name:		

1.) The FDA has concluded that gadolinium is retained in the body and brain for a significantly longer time than previously recognized, especially for linear GBCAs. The health-related risks of this longer retention are not yet clearly established. However, the UW IRB expects researchers to provide a compelling justification for using a linear GBCA instead of a macrocyclic GBCA, to manage the risks associated with GBCAs.

Describe why it is important to use a GBCA with the MRI scan(s). Describe the dose that will be used and (if it is more than the standard clinical dose recommended by the manufacturer) why it is necessary to use a higher dose. If a linear GBCA will be used, explain why a macrocyclic GBCA cannot be used.

2.) Information for subjects. Confirm by checking this box that subjects will be provided with the FDA-approved Patient Medication Guide for the GBCA being used in the research or that the same information will be inserted into the consent form.

☐ **Confirmed**

b. Who will (1) calculate the dose of GBCA; (2) prepare it for injection; (3) insert and remove the IV catheter; (4) administer the GBCA; and (5) monitor for any adverse effects of the GCBA? Also, what are the qualifications and training of these individual(s)?

c. Describe how the renal function of subjects will be assessed prior to MRI scans and how that information will be used to exclude subjects at risk for NSF.

d. Describe the protocol for handling a severe allergic reaction to the GBCA or any other medical event/emergency during the MRI scan, including who will be responsible for which actions.

10.4 Unforeseeable risks. Are there any research procedures that may have risks that are currently unforeseeable?

Example: using a drug that hasn't been used before in this subject population.

☐ **No**
☐ **Yes** → If yes, identify the procedures.

10.5 Subjects who will be under regional or general anesthesiology. Will any research procedures occur while patients are under general or regional anesthesia, or during the 3 hours preceding general or regional anesthesia (supplied for non-research reasons)?

☐ **No**
☐ **Yes** → If yes, check all the boxes that apply.

- ☐ Administration of any drug for research purposes
- ☐ Inserting an intra-venous (central or peripheral) or intra-arterial line for research purposes
- ☐ Obtaining samples of blood, urine, bone marrow or cerebrospinal fluid for research purposes
- ☐ Obtaining a research sample from tissue or organs that would not otherwise be removed during surgery
- ☐ Administration of a radio-isotope for research purposes**
- ☐ Implantation of an experimental device
- ☐ Other manipulations or procedures performed solely for research purposes (e.g., experimental liver dialysis, experimental brain stimulation)

If any of the boxes are checked:
Provide the name and institutional affiliation of a physician anesthesiologist who is a member of the research team or who will serve as a safety consultant about the interactions between the research procedures and the general or regional anesthesia of the subject-patients. If the procedures will be performed at a UW Medicine facility or affiliate, the anesthesiologist must be a UW faculty member, and the Vice Chair of Clinical Research in the UW Department of Anesthesiology and Pain Medicine must be consulted in advance for feasibility, safety and billing.

*** If the box about radio-isotopes is checked: the study team is responsible for informing in advance all appropriate clinical personnel (e.g., nurses, technicians, anesthesiologists, surgeons) about the administration and use of the radio-isotope, to ensure that any personal safety issues (e.g., pregnancy) can be appropriately addressed. This is a condition of IRB approval.*

10.6 Data and Safety Monitoring. A Data and Safety Monitoring Plan (DSMP) is required for clinical trials (as defined by NIH). If required for this research, or if there is a DSMP for the research regardless of whether it is required, upload the DSMP to ***Zipline***. If it is embedded in another document being uploading (for example, a Study Protocol) use the text box below to name the document that has the DSMP. Alternatively, provide a description of the DSMP in the text box below. For guidance on developing a DSMP, see the ITHS webpage on Data and Safety Monitoring Plans.

10.7 Un-blinding. If this is a double-blinded or single-blinded study in which the participant and/or relevant study team members do not know the group to which the participant is assigned: describe the circumstances under which un-blinding would be necessary, and to whom the un-blinded information would be provided.

10.8 Withdrawal of participants. If applicable, describe the anticipated circumstances under which participants will be withdrawn from the research without their consent. Also, describe any procedures for orderly withdrawal of a participant, regardless of the reason, including whether it will involve partial withdrawal from procedures and any intervention but continued data collection or long-term follow-up.

10.9 Anticipated direct benefits to participants. If there are any direct research-related benefits that some or all individual participants are likely to experience from taking part in the research, describe them below:

Do not include benefits to society or others, and do not include subject payment (if any). Examples: medical benefits such as laboratory tests (if subjects receive the results); psychological resources made available to participants; training or education that is provided.

10.10 Return of individual research results.

In this section, provide your plans for the return of individual results. An "individual research result" is any information collected, generated or discovered in the course of a research study that is linked to the identity of a research participant. These may be results from screening procedures, results that are actively sought for purposes of the study, results that are discovered unintentionally, or after analysis of the collected data and/or results has been completed.

*See the **GUIDANCE Return of Individual Results** for information about results that should and should not be returned, validity of results, the Clinical Laboratory Improvement Amendment (CLIA), consent requirements and communicating results.*

a. Is it anticipated that the research will produce any individual research results that are clinically actionable?

"Clinically actionable" means that there are established therapeutic or preventive interventions or other available actions that have the potential to change the clinical course of the disease/condition, or lead to an improved health outcome.

In general, every effort should be made to offer results that are clinically actionable, valid and pose life-threatening or severe health consequences if not treated or addressed quickly. Other clinically actionable results should be offered if this can be accomplished without compromising the research.

☐ **No**
☐ **Yes** → If yes, answer the following questions (a.1-a.3).

a.1. Describe the clinically actionable results that are anticipated and explain which results, if any, could be urgent (i.e. because they pose life-threatening or severe health consequences if not treated or addressed quickly).

Examples of urgent results include very high calcium levels, highly elevated liver function test results, positive results for reportable STDs.

a.2. Explain which of these results will be offered to subjects.

a.3. Explain which results will not be offered to subjects and provide the rationale for not offering these results.

Reasons not to offer the results might include:

- *There are serious questions regarding validity or reliability*
- *Returning the results has the potential to cause bias*
- *There are insufficient resources to communicate the results effectively and appropriately*
- *Knowledge of the result could cause psychosocial harm to subjects*

b. Is there a plan for offering subjects any results that are not clinically actionable?

Examples: non-actionable genetic results, clinical tests in the normal range, experimental and/or uncertain results.

☐ **No**
☐ **Yes** → If yes, explain which results will be offered to subjects and provide the rationale for offering these results.

c. Describe the validity and reliability of any results that will be offered to subjects.

The IRB will consider evidence of validity such as studies demonstrating diagnostic, prognostic, or predictive value, use of confirmatory testing, and quality management systems.

d. Describe the process for communicating results to subjects and facilitating understanding of the results. In the description, include who will approach the participant with regard to the offer of results, who will communicate the result (if different), the circumstances, timing, and communication methods that will be used.

e. Describe any plans to share results with family members (e.g. in the event a subject becomes incapacitated or deceased).

f. Check the box to indicate that any plans for return of individual research results have been described in the consent document. If there are no plans to provide results to participants, this should be stated in the consent form.

*See the **GUIDANCE Return of Individual Results** for information about consent requirements.*

☐ **Confirmed**

10.11 Commercial products or patents. Is it possible that a commercial product or patent could result from this study?

☐ **No**
☐ **Yes** → If yes, describe whether subjects might receive any remuneration/compensation and, if yes, how the amount will be determined.

11 ECONOMIC BURDEN TO PARTICIPANTS

11.1 Financial responsibility for research-related injuries. Answer this question only if the lead researcher is not a UW student, staff member, or faculty member whose primary paid appointment is at the UW.

For each institution involved in conducting the research: Describe who will be financially responsible for research-related injuries experienced by subjects, and any limitations. Describe the process (if any) by which participants may obtain treatment/compensation.

11.2 Costs to subjects. Describe any research-related costs for which subjects and/or their health insurance may be responsible (examples might include: CT scan required for research eligibility screening; co-pays; surgical costs when a subject is randomized to a specific procedure; cost of a device; travel and parking expenses that will not be reimbursed).

12 RESOURCES

12.1 Faculty Advisor. (For researchers who are students, residents, fellows, or post-docs.) Provide the following information about the faculty advisor.

- Advisor's name
- Your relationship with your advisor (for example: graduate advisor; course instructor)
- Your plans for communication/consultation with your advisor about progress, problems, and changes.

12.2 UW Principal Investigator Qualifications. Upload a current or recent Curriculum Vitae (CV), Biosketch (as provided to federal funding agencies), or similar document to the Local Site Documents page in Zipline. The purpose of this is to address the PI's qualifications to conduct the proposed research (education, experience, training, certifications, etc.).

For help with creating a CV, see http://adai.uw.edu/grants/nsf_biosketch_template.pdf and https://education.uwmedicine.org/student-affairs/career-advising/year-4/residency-applications/curriculum-vitae/

☐ **The CV will be uploaded.**

12.3 UW Study team qualifications. Describe the qualifications and/or training for each UW study team member to fulfill their role on the study and perform study procedures. (You may be asked about non-UW study team members during the review; they should not be described here.) You may list these individuals by name, however if you list an individual by name, you will need to modify this application if that individual is replaced. Alternatively, you can describe study roles and the qualifications and training the PI or study leadership will

require for any individual who might fill that role. The IRB will use this information to assess whether risks to subjects are minimized because study activities are being conducted by properly qualified and trained individuals.

Describe: The role (or name of person), the study activities they will perform, and the qualifications or training that are relevant to performing those study activities.

Examples:

Research Study Coordinator: Obtain consent, administer surveys, blood draw. Will have previous experience coordinating clinical research and be a certified phlebotomist in WA.

Undergraduate Research Assistant: Obtain consent, perform all study procedures. Will have had coursework in research methods, complete an orientation to human subjects protections given by the department, and will receive training from the PI or the graduate student project lead on obtaining consent and debriefing subjects.

Acupuncturist: Perform acupuncture procedures and administer surveys. Must be licensed with WA State DoH and complete training in administering research surveys given by the project director, an experienced survey researcher.

Co-Investigator: Supervise MRI and CT scan procedures and data interpretation, obtain consent. MD, specialty in interventional radiology and body imaging. 5-years clinical research experience.

12.4 Study team training and communication. Describe how it will be ensured that each study team member is adequately trained and informed about the research procedures and requirements (including any changes) as well as their research-related duties and functions.

☐ **There is no study team.**

13 OTHER APPROVALS, PERMISSIONS, and REGULATORY ISSUES

13.1 Approvals and permissions. Identify any other approvals or permissions that will be obtained. For example: from a school, external site/organization, funding agency, employee union, UW Medicine clinical unit.

Do not attach the approvals and permissions unless requested by the IRB.

13.2 Financial Conflict of Interest. Does any UW member of the team have ownership or other Significant Financial Interest (SFI) with this research as defined by UW policy GIM 10?

☐ **No**

☐ **Yes** → If yes, has the Office of Research made a determination regarding this SFI as it pertains to the proposed research?

- ☐ **No** → If no, contact the Office of Research (206.616.0804, research@uw.edu) for guidance on how to obtain the determination
- ☐ **Yes** → If yes, upload the Conflict Management Plan for every UW team member who has a FCOI with respect to the research, to ***Zipline***. If it is not yet available, use the text box to describe whether the Significant Financial Interest has been disclosed

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To: Jeff Hancock[hancockj@stanford.edu]; Emma Spiro[espiro@uw.edu]; Jevin West[jevinw@uw.edu]; Renee DiResta[rdiresta@stanford.edu]
Cc: Sunny Xun Liu[sunnyxliu@stanford.edu]
From: Kate Starbird
Sent: Sun 8/28/2022 10:03:06 PM
Subject: SaTC annual report to NSF
Received: Sun 8/28/2022 10:03:08 PM

Hi folks,
I'm writing to draw your attention to the SaTC annual report document. I know a few of us have other grant proposals out and they may get held up if we don't submit this soon. It's getting close, but I think it needs one more pass from folks to fill in missing details:

https://docs.google.com/document/d/1LvWi4rsQeIJyRKXwO2bgDWGuOoDgZjHorAynhFBNhk8/edit#

Emma and Jevin, can you add content related to Yim's work and the broadening participation elements (e.g. around MisinfoDay)? And anything else that you feel is relevant!

Jeff, I think there are a few open comments with your name on it — and if you or Sunny have other content to add, please do!

Renee, if you have input in any of the sections, e.g. on findings or impact, please add that. I'm happy to edit if you're worried about fit.

If anyone has related products, please add them! (Though publications need to mention the SaTC funding.)

We'll each add our own content on the participants piece, so don't worry about moving that to the Google Doc.

Kate

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 9/29/2021 4:38:51 PM
Subject: Re: DARPA ISAT workshop pre-invite
Received: Wed 9/29/2021 4:38:52 PM

Ahmer Arif at the University of Texas — he led a lot of our work on the White Helmets and understands the "crisis sense making" lens well. But he was writing his dissertation during the election, so doesn't have a great window there. But he'd be good to speak about our "disinformation as collaborative work" paper from 2019.
ahmer@utexas.edu

He may say "no" because it's DARPA (or because he's busy).

Kate

On Sep 29, 2021, at 8:35 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Hey there! Following up on the ISAT workshop. Is there anyone else from your team you'd suggest we invite? I'm interested in getting some of the bottom-up dynamics into the conversation on Oct 4, possibly even focused on some of the crisis sensemaking or collaborative work dynamics you've published on previously.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, September 14, 2021 4:04 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: DARPA ISAT workshop pre-invite

I have this email for Bella:
isabellagc2010@gmail.com

I'll have 51 add her to his Google document when he makes that public. I asked him to sketch out the initial structure and analyses — and he's still working on that.

Kate

On Sep 14, 2021, at 9:58 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Ah! On that front – Bella would also love to help on the paper project you broached in the Slack w/Alex and I (mentioned again below). Meant to note that in Slack. Do you have her gmail?

I'll add the other UW folks to the invite list for the DARPA thing.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, September 14, 2021 12:50 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: DARPA ISAT workshop pre-invite

From our group… probably Emma (Spiro) would be best to speak re: "influencers". But she's also packed this year — serving as a Vice Dean of Research for her unit (iSchool).

Could also invite 51 has been thinking about different ways of determining "influence" through different kinds of graphing techniques. And 51 is putting together that awesome data set for a well-curated tweet sample for each distinct "incident" from the EIP tickets. He can speak now to how much of the overall

mis/disinformation (50%) can be tied to the original content some 150 accounts (on Twitter).

On Sep 14, 2021, at 8:03 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

Same group! But there are different workshops, and then there are also intersections with DARPA programs (I am still trying to understand those relationships, I am very new to this). What is the topic of the one you were invited to?

Oct 18 is still probably relevant; the first will focus on "influence" dynamics, and then the second will look at political atomization/online sects. Joe is going to join the series as well; if there are other UW people you'd suggest, incl for Oct 4, I have invitation powers :)

From: Kate Starbird <kstarbi@uw.edu>
Sent: Monday, September 13, 2021 8:34 PM
To: Renee DiResta <rdiresta@stanford.edu>
Subject: Re: DARPA ISAT workshop pre-invite

Hi Renee,

Thanks for the invite. Is this different from the DARPA ISAT group led by Nadya Bliss? I'm just realizing that I'm getting two separate inquires to talk — and am wondering what the difference is.

I can't make the October 4 day/time. Might be able to swing October 18 (but that might not be a fit for my expertise?)

Kate

On Sep 13, 2021, at 12:55 PM, Renee DiResta <rdiresta@stanford.edu> wrote:

Dear Kate,

I wanted to reach out because I'm co-leading a DARPA ISAT workshop with Bonnie Dorr and Julia Hirschberg, which is focused on understanding 'bottom-up' influence dynamics and affective polarization on social media. An invitation will be coming your way from IDA with more information, but since I admire your work in this area I wanted to reach out in advance because I hope you can join.

There will be a series of three meetings of approximately four hours (including a 30 min lunch break), about two weeks apart.

- Oct 4: 10:30-2:30 ET: Understanding the influencer
- Oct 18: 12:30-4:15 ET Factors contributing to affective group polarization
- Nov 5: 10:30-2:30 ET Strategies and Tactics for polarization mitigation

Recognizing everyone's limited time, there is no expectation of attending all

three -- but we would particularly like you to join for the first, on Oct 4, given your expertise. We have a form here where you can indicate interest in attending one or more, *and* suggest work you've done or research questions you feel are important, that I can then synthesize into a pre-read.

Please do not forward this information to others, as the event will be by invitation only, but I'm happy to take feedback and answer questions.

best,
Renee

To: Isabella Garcia-Camargo[bellagc@stanford.edu]; [redacted]@uw.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Mon 4/5/2021 4:29:18 PM
Subject: prospective student for the Vaccine project
Received: Mon 4/5/2021 4:29:20 PM
[redacted]CV-2021.pdf

Hi Bella,
I'm writing to introduce you to another UW [redacted] student who is interested in participating in the Virality project. [redacted] is cced above. I've included her resume here. Happy to help coordinate if you need me. I'm also planning to have short weekly meetings with our UW students on the SIO side ([redacted]) to make sure they're well-supported on both sides of the collaboration. Please let me know if there's anything I can help with on the UW side.

Kate

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Eden Beck[beckedenm@gmail.com]; Isabella Garcia-Camargo[bellagc@stanford.edu]; Elena Cryst[ecryst@stanford.edu]
From: Kate Starbird
Sent: Wed 2/24/2021 12:45:04 AM
Subject: Re: SAAG work for the iSchool's Center for an Informed Public
Received: Wed 2/24/2021 12:45:07 AM

A lot of the suggestions seem to be to move content from lower in the chapter up into more visible places. I've moved over some of the comments, but definitely see the Word doc for the details.

On Feb 23, 2021, at 4:12 PM, Renee DiResta <rdiresta@stanford.edu> wrote:

Adding Eden in here, and Elena as chapter lead for 1 - these seem like fairly straightforward and not complex suggestions. As far as lifting the definitions, I think we really only need to lift mis- and dis, per these comments? We could grab a little bit more of those two (they are not very long) and incorporate them in. Not necessarily to the first place they're flagged, as that is kind of the intro to the whole doc, but nearer to the second place where it comes up.

Similarly, I think we can make these language changes to avoid "intended" and some of the legally-loaded wording. As far as vetting/determining veracity, we can look through the specific areas he's flagged to see about making that more specific.

From: Kate Starbird <kstarbi@uw.edu>
Sent: Tuesday, February 23, 2021 3:59 PM
To: Renee DiResta <rdiresta@stanford.edu>
Cc: Alex Stamos <stamos@stanford.edu>
Subject: Fwd: SAAG work for the iSchool's Center for an Informed Public

Hi Renee (and Alex),
I'm forwarding this on to you… it's our lawyer's review of Ch 1 (comments in Word).
One element of the feedback is fairly straightforward… to lift the definitions into a more visible location (perhaps adding to the text of the chapter).

The other element may be more difficult. He's asking for us to add more content about how we vetted and determined if a piece of content or claim was misinformation or disinformation. That was his main piece of feedback. I can try to add his comments to the Google doc, if you'd like. Let me know if you want to discuss how we incorporate what he's looking for into the report.

Kate

Begin forwarded message:

From: "Stahl, Eric" <ericstahl@dwt.com>
Subject: RE: SAAG work for the iSchool's Center for an Informed Public
Date: February 23, 2021 at 8:51:54 AM PST
To: Kate Starbird <kstarbi@uw.edu>, "Buder, James K (ATG)" <james.buder@atg.wa.gov>

Kate, James:

Here is my legal review of Chapter 1. I have just a handful of comments, but they go to the critical issue we discussed previously: disclosing the basis for determining that something is false/misleading. I think a version of the explanation for how you checked veracity is included in the definition of "Tickets" (which is in the definitional section at the very end of the full draft). But I recommend incorporating the explanation up front, as part of the description of the methodology in the first chapter.

Also note, the Word version of this chapter had a number of editorial comments and redlines. I deleted those, so the comments and redlines in the attached are mine.

Please let me know if you have any questions. I'm continuing my review. Thanks.
Eric M. Stahl | Davis Wright Tremaine LLP

920 Fifth Avenue, Suite 3300 | Seattle, WA 98104
Tel: (206) 757-8148 | Cel: (206) 369-7476

Email: ericstahl@dwt.com | Website: www.dwt.com

Bio: www.dwt.com/lawdir/attorneys/StahlEric.cfm
Anchorage | Bellevue | Los Angeles | New York | Portland | San Francisco | Seattle | Washington, D.C.

<Attorney Review.Chapter 1 Write-Up.docx>

To: Kate Starbird[kstarbi@uw.edu]
From: Renee DiResta
Sent: Wed 8/31/2022 5:17:02 PM
Subject: Discoverability chat
Received: Wed 8/31/2022 5:17:08 PM

----(Video Conference)----
https://urldefense.com/v3/__http://Stanford.zoom.us/my/Reneediresta__;!!K-Hz7m0Vt54!hP_NN9O3PAnzy1HKejUoBxk4zCIGGeWrVuVZTIBGQFz7NTumYPHxYeApir3Vqz7ZEXgMxJolXBYj7q95hpOr$
---===---

To: Renee DiResta[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Wed 8/31/2022 6:00:44 PM
Subject: Re: Discoverability chat
Received: Wed 8/31/2022 6:00:47 PM

It's asking me for a passcode?

Kate

On Aug 31, 2022, at 10:17 AM, Renee DiResta <rdiresta@stanford.edu> wrote:

----(Video Conference)----
https://urldefense.com/v3/__http://Stanford.zoom.us/my/Reneediresta__;!!K-Hz7m0Vt54!hP_NN9O3PAnzy1HKejUoBxk4zClGGeWrVuVZTIBGQFz7NTumYPHxYeApir3Vqz7ZEXgMxJolXBYj7q95hpOr$
---===---<Mail Attachment.ics>

To: Laura Rosenberger[LRosenberger@gmfus.org]
From: Kate Starbird
Sent: Tue 6/13/2017 3:50:13 PM
Subject: Re: defending democracy against Russian assault
Received: Tue 6/13/2017 3:50:13 PM

Hello Laura,
No problem re: the change.

Kate Starbird
Assistant Professor
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University of Washington
kstarbi@uw.edu

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Subject: RE: defending democracy against Russian assault

Great, thanks.

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Subject: Re: defending democracy against Russian assault

My phone # is 18 .

Kate Starbird
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University of Washington
kstarbi@uw.edu

On Jun 6, 2017, at 9:29 AM, Laura Rosenberger <LRosenberger@gmfus.org> wrote:

Sounds good, look forward to speaking then. What's the best number to reach you? Or you can call me at 202-683-2657.

Best,
Laura

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To: Laura Rosenberger
Subject: Re: defending democracy against Russian assault

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To: Laura Rosenberger
Subject: Re: defending democracy against Russian assault

Hello Laura,

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To: Laura Rosenberger[LRosenberger@gmfus.org]
From: Kate Starbird
Sent: Wed 6/14/2017 9:15:23 PM
Subject: Re: defending democracy against Russian assault
Received: Wed 6/14/2017 9:15:23 PM

Could you do 4:30ET? That would work really well for me. Otherwise

Kate Starbird
Assistant Professor
Human Centered Design & Engineering (HCDE)
University of Washington
kstarbi@uw.edu

On Jun 13, 2017, at 12:43 PM, Laura Rosenberger <LRosenberger@gmfus.org> wrote:

Thanks Kate, no problem and apologies again for the change. I am pretty open on the 23rd except 11-12 and 3:30-4:30 ET. Let me know what might work on your end.

Best,
Laura

From: Kate Starbird [mailto:kstarbi@uw.edu]
Sent: Tuesday, June 13, 2017 11:57 AM
To: Laura Rosenberger
Subject: Re: defending democracy against Russian assault

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From: Kate Starbird
Sent: Tue 6/13/2017 3:56:43 PM
Subject: Re: defending democracy against Russian assault
Received: Tue 6/13/2017 3:56:43 PM

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To: Laura Rosenberger
Subject: Re: defending democracy against Russian assault

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From: Kate Starbird
Sent: Tue 6/13/2017 3:51:43 PM
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Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Authors: Anonymized for peer review.

Abstract

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud that sought to undermine trust in election procedures and results. This narrative took hold among a substantial portion of the U.S. population, eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — from hyperpartisan media to political operatives to ordinary people — contributed to producing and amplifying misleading narratives, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated, "top-down" efforts, we highlight "bottom-up" dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This narrative took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for some, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021.

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon this framing, expanding the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. Additionally, while Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives that constituted this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of "influencers" in shaping and amplifying these misleading narratives — differentiating between credentialed and uncredentialed influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. That campaign took shape through the production and spread of numerous misleading claims of voter fraud that echoed through social media, hyper-partisan online news outlets, and out from cable news shows to vast audiences. Its foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast with research on disinformation during the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019), here we surface the domestic and *participatory* nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents' of those campaigns, they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-drive) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. And through

this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. Social media platforms expanded 'media' beyond a one-to-many broadcast format and facilitated an "architecture of participation" (O'Reilly, 2007). The resulting rise of the "citizen journalist" (Gillmor, 2006) destabilized the foundations of journalism, by changing who gets to serve as "gatekeepers" as well as the rules, standards, and pace of news production (Bruns, 2003). This shift towards citizen journalism catalyzed the development of new classes of media, micro-media or "media-of-one" outlets whose reporting style and structure resemble traditional news but are often produced by a single individual and their hyper-partisan cousins, i.e. small digital outlets that primarily produce or republish from elsewhere politically-partisan content (Ray, 2021). Some members of this new class of digital-first, self-defined "journalists" and "media outlets" sit between traditional journalism and activism (Wall, 2015), and have increasing influence in the public sphere.

Another type of "influencer" has emerged at the newly blurred boundaries of media, celebrity, and marketing. Located outside the gatekeeping institutions of the mass media era, these influencers seek to build large followings around a particular expertise or passion. While some work in media, many position themselves not as journalists but as ordinary people, using a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Marketing research, which was among the first disciplines to identify and characterize the "influencer", was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer" (Figure 1), to differentiate influence on the basis of follower count. Borrowing from this framework, in this research we use a similar following-based classification scheme.

Research on the social media influencer has examined not just the figure's power to market goods and services, but also to shape public opinion on culture, mobilize activists, and intervene in politics. Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might "trend" on social media, and how trends might inform subsequent media coverage (McGregor, 2020). Here we explore the unique roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

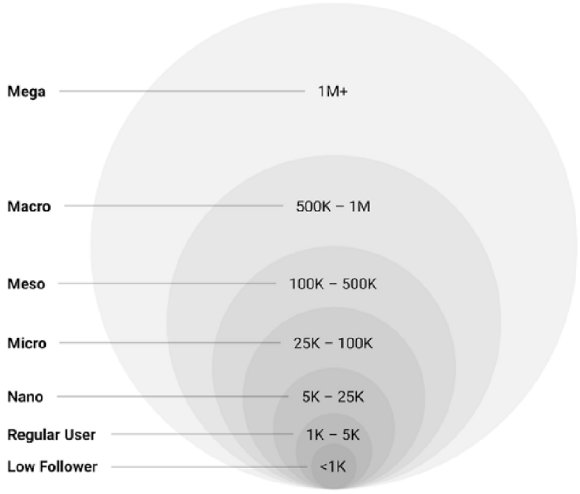

Figure 1. Audience size classification for Twitter accounts, adapted from Mediakix (2021)

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three from different periods of this campaign that are both representative of the kinds of narratives that spread, and reveal the participatory nature of this campaign:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locales, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our collectors captured tweets that contained voting-related terms (such as “vote”, “voter”, “voting”, and “ballot”), and terms related to claims of voter or election fraud, and terms related to potentially salient locations. In addition to passive collective of these known keywords, we also identified and documented new false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this cumulative dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our collection method has some limitations. During high volume events, collections on the Twitter Streaming API can incur rate limits. Using comparisons of retweet counts (comparing the number of retweets we captured to the retweet counts embedded in meta-data) we estimate that for Sonoma Ballots and MaidenGate, we likely have 90% or more of all tweets with our selected keywords; for SharpieGate, which spread on Election Day and the three subsequent days, we estimate that we captured ~70% of related tweets. Importantly, for highly retweeted tweets (which we primarily focus on here) we can recreate the original tweet from metadata in retweets. However, for SharpieGate, though we capture most of the amplification, we do lose insight into exactly who retweeted each tweet as it spread — and our overall counts for retweets and quotes are likely undercounts. It is important to note that all engagement and followers metrics for Twitter are reported as they were at the time of their posting. For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether or not they’ve been suspended, how they credentialed themselves, their tweet patterns across the Election 2020 discourse, and the role they played in seeding, shaping, and/or amplifying the narrative.

In addition to data collected directly from these platforms, we also follow links in these data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified and have less than 100K followers. We make exceptions, however, for public figures, including journalists and elected officials. Given that this work is situated on the intersection between social media influencers and politically-driven disinformation campaigns, we feel it is important to highlight the roles played by specific high-visibility accounts and pages in media and politics.

3.4 Methodology

For our analysis, we employ a grounded, interpretative approach, building upon Charmaz’s approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. Similar to the work outlined in Maddock et al. (2015), we focus on specific rumors or stories, then use visualizations and descriptive statistical analysis to identify high level patterns and anomalies and deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative

"work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerges from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). All four authors of this paper participated in the EIP. We initially began studying these cases as they were "going viral" and have continued analysis in the many months since, creating temporal and network graphs and used those graphs to guide content analysis of specific posts or accounts; closely analyzing hundreds of social media post to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights that emerge from the iterative exploration of high-level visualizations and low-level content analysis. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and other hyper-partisan media outlets. A primary actor in this campaign was then-President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged. The tweet above, posted by President Trump's official account (@realDonaldTrump) in June 2020 was one of numerous social media posts by President Trump promoting a false narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud:

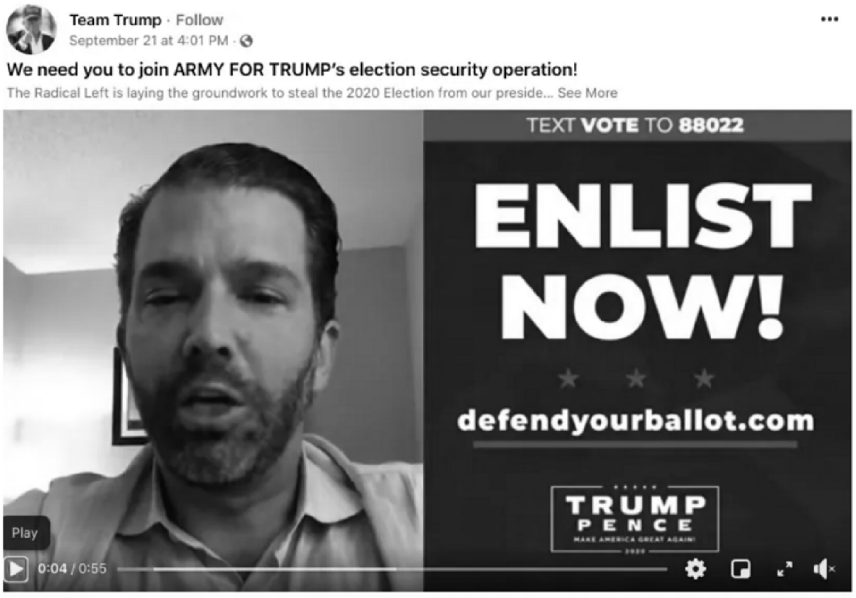

Figure 3: Facebook post from the Trump Campaign encouraging followers to "Enlist Now" to join the "Army for Trump".

The campaign provided instructions for serving as poll observers and online forms for its supporters to submit evidence of election issues. Our data reveal that, likely mobilized by the "Army for Trump" messaging and the repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters went to the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being dumped, discarded, or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, Elijah Schaffer, a self-described journalist for right wing media outlet The Blaze, concluded his exposition with the words, "Big if true."



Figure 4: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election concluded (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

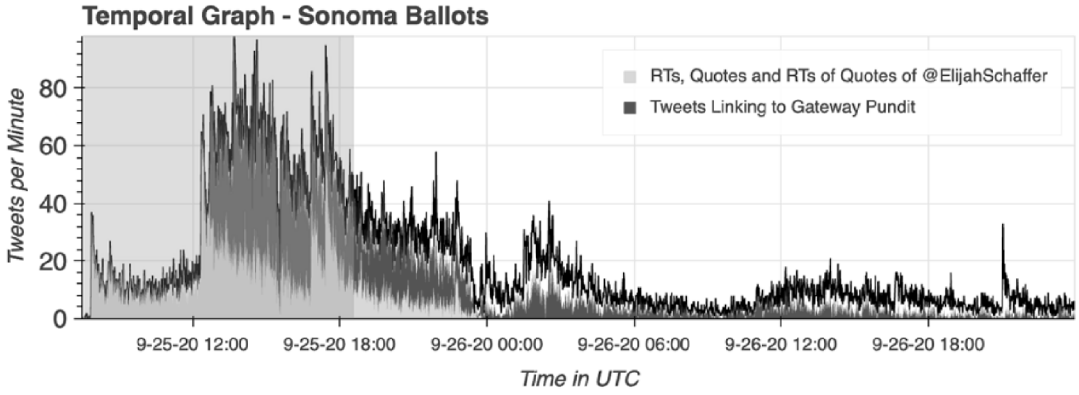

Figure 5: Temporal graph (tweets per minute) of the Sonoma Ballots story (Black). The shaded pink area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The shaded red area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified

with a “blue-check”, had 244K followers at the time of this tweet — a “meso” influencer-sized account.

Approximately five hours after Schaffer’s tweet, a right-wing news outlet posted an article and accompanying tweet featuring the same photos and claims:

@gatewaypundit (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, the Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud, through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers at the time (“meso” level) — and would grow to more than 460K followers before being suspended on January 10, 2021 (in response to the events of January 6). Gateway Pundit’s article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement, which persisted for several hours.

As Figure 5 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit’s article. These dynamics are consistent with Benkler et al’s characterization of 2020 disinformation as driven from the top-down by media and political elites (2020), but in this case the “elites” were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

However, both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a “reader,” who attributed the photograph to his father. Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer’s tweet — that they did not have enough visibility to spread the claims organically from their own account, so they contacted “influencers” to assist them. Krafft and Donovan (2020) refer to this as “trading up,” a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory audiences of hyper-partisan media collaborate in the co-creation of stories that fit existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of “mega influencer” Donald Trump Jr., one of President Trump’s sons, who retweeted Schaffer’s original tweet at 17:26 UTC, nearly 10 hours after the original tweet. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, a noted “repeat spreader” of misleading voter fraud claims (CIP et al., 2021). Trump Jr’s account often acted as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

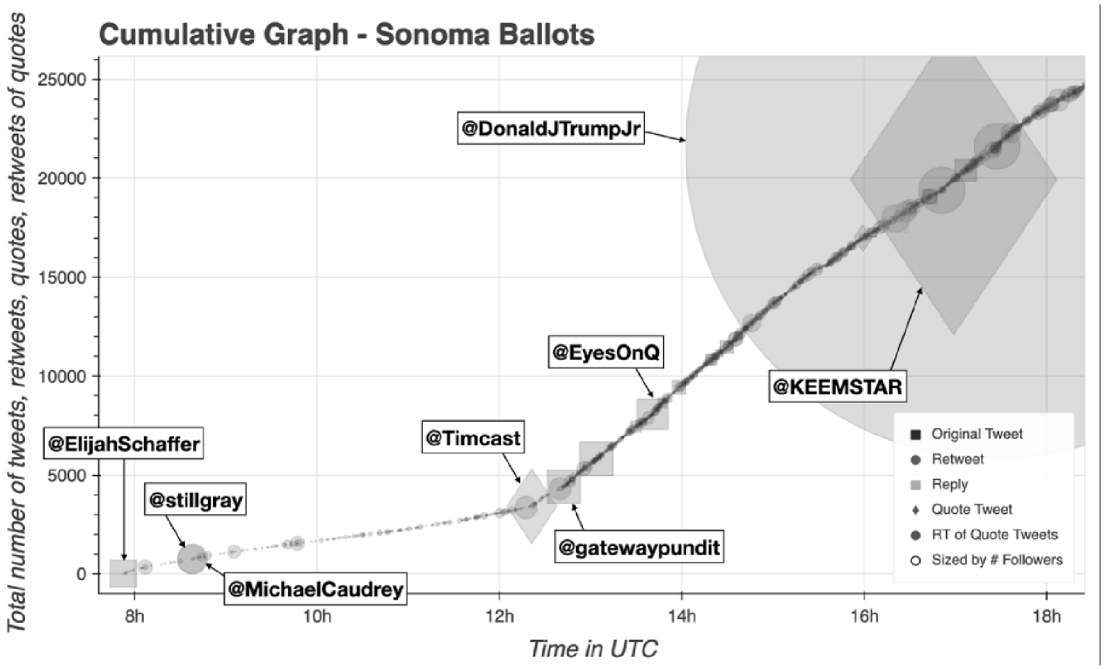

Figure 6. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 5).

Figure 6, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include @stillgray (260K followers), the verified account of Ian Miles Cheong, an influencer who rose to prominence by defending female gamers during the #GamerGate controversy but who has shifted towards more right wing stances and who maintains influence in pro-Trump discourse primarily through Twitter, and the verified account Michael Coudrey (272K followers), an entrepreneur who throughout Autumn 2020 repeatedly tweeted misleading claims and provocative assertions about election fraud.

Another account that played a role in the spread of this narrative is @Timcast (686K followers), a micro-media journalist who grew to prominence through live-streaming the Occupy protests and whose work increasingly resonates with right-wing audiences. His tweet precipitates and contributes to the surge that occurs around 12:20 UTC, which is also assisted by a tweet at 13:40 UTC from @EyesOnQ (279K followers), a now-suspended account that gained influence through tweets about the pro-Trump QAnon conspiracy theory. After @EyesOnQ's tweet we see a large number of micro-influencers (accounts with 10-250K followers) helping to sustain the spread of this narrative. @EyesOnQ and many of its retweeters have since been suspended. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded

dramatically. However, the claims persisted on the Gateway Pundit and experienced something of a second life on Facebook a few days later (though at much lower volume), only to fade out completely after that.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, is much more complex than Sonoma Ballots, integrating several related claims (some true, some false) that weaved together to form a false "voter fraud" narrative, surfacing both bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

The core assertion of SharpieGate was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this was causing ballots to be rejected (misleading; these ballots were rarely rejected) — essentially disenfranchising those voters (false, ballots rejected automatically were counted using alternative methods). Although Election Day's first Sharpie claims surfaced in Chicago, the discourse later shifted to Arizona as the narrative evolved to assert that pens were intentionally given to Trump voters as part of a strategy to deliberately disenfranchise Trump-leaning voters.

In reality, Sharpie pens were recommended for in-person voting in Arizona (Citizens Clean Elections Commission), because they dry faster than ink pens, which smear the vote-reading machines when the ballots are fed in too quickly — as happens during high-volume, Election Day voting. The ballots had been designed so that bleed-through would not affect vote-counting. Unfortunately, many Arizona voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this (admittedly somewhat abstruse) electoral process.

SharpieGate unfolded in five distinct stages, described in detail below.

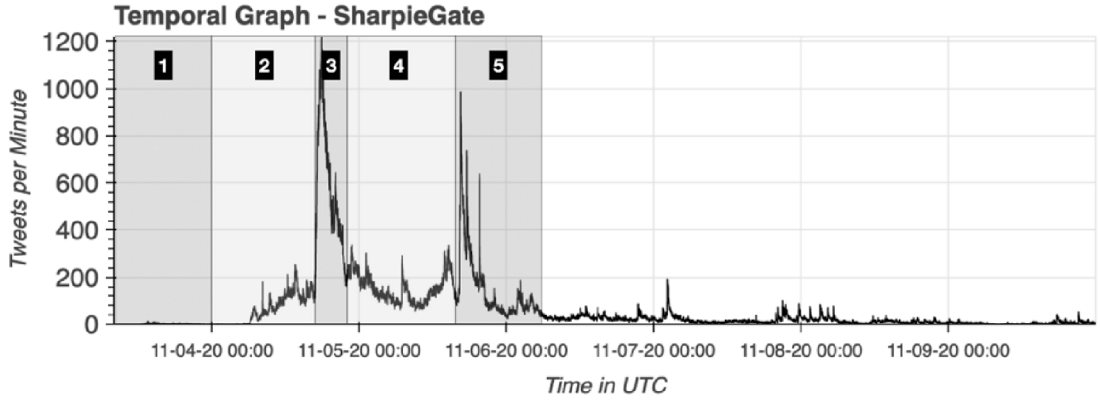

Figure 7. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development/amplification of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a Chicago voter and low-follower (77) Twitter account tweeted his concern that his precinct's ballot reader appeared to be struggling with his Sharpie-marked ballot. There is no evidence that this person was a Trump-voter. His tweet received no engagements.

Thirty minutes later, a conservative media personality in the Chicago area, @AmyJacobson (22.5K followers, a "nano" sized audience), echoed the low-follower account's concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone would grow more alarmist, quoting her original tweet and adding in all-caps that ballots were being placed in a BOX.

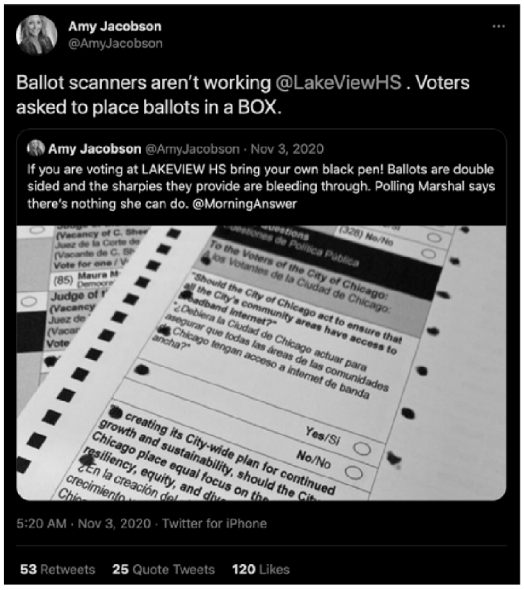

Figure 8. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets about Sharpies were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets of Jacobson became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to trade up — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day were focused around Chicago, another parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, shortly after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
shoulders. <embedded image of a ballot with Sharpie bleed-through from the
backside and a clear Trump vote on the frontside>
```

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that had become a site for aggregating right wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: an accusation of poll worker indifference to Sharpie bleed-through. The leading question of "Electioneering?" implies that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling for its audience whom the assumed target of this potential conspiracy was.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another regular user (1.7K followers) — this one with conservative and pro-Trump markers in its handle and profile description — tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim on Twitter, but received very little amplification on Twitter.

Facebook appears to have hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own to the polls. It garnered 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that voters' ballots were being "canceled" due to Sharpie pen use, including a screenshot of a vote-tracking website as evidence. The post received 70 comments, mostly on Election Day, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed in Arizona, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had set the stage for clashes within polling places, as poll workers attempted to force voters to use county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming that election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpie pen, confirmed the bleed-through, and expressed anxiety about whether their vote had counted. One user posted a link to the Trump campaign's "Defend Your Ballot" website and encouraged people to report their issues with Sharpie pens. Another user asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Joe Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive about an hour after Fox's Arizona call (Figures 7 & 9). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge around explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a:(2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time). The suspension occurred just minutes after the account was quote-tweeted by conservative activist Charlie Kirk..

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within text-based posts echoing some of its claims, then later within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first came from an unverified, low follower account replying to another tweet claiming fraud in Pennsylvania and was amplified 54 times. A second tweet with the embedded the video was posted by a micro-influencer (unverified, 56.6K followers) who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 3544 times, quoted 1765, and spread widely through retweets of those quote tweets. One of the quote tweets was from an unverified low follower account of a person in Arizona:

Tweet 2c:(2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!! <Quote tweet of the above>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author would trade up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account — by mentioning or replying to them. The tweet record indicates that the author of this highly viral quote tweet was legitimately concerned about the issue. About 12 hours later, she notes that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

As the video began to spread, another tweet from an unverified, low follower account re-embedded it, explicitly connecting the use of Sharpies to the fact that Arizona had been called for candidate Biden. That tweet received considerable attention as well, accumulating 17,898 amplifying engagements.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these originate from

unverified, low-follower accounts, and the other two with unverified micro-influencers that have since been suspended from Twitter. All but one have markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that they were, at least in part, politically motivated to share this content. Amplification during this time occurs, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @CharlieKirk11 (verified, 1.8M followers). Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (CIP et al., 2021). Between midnight and 17:00 UTC on November 4, as the SharpieGate narrative begins to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

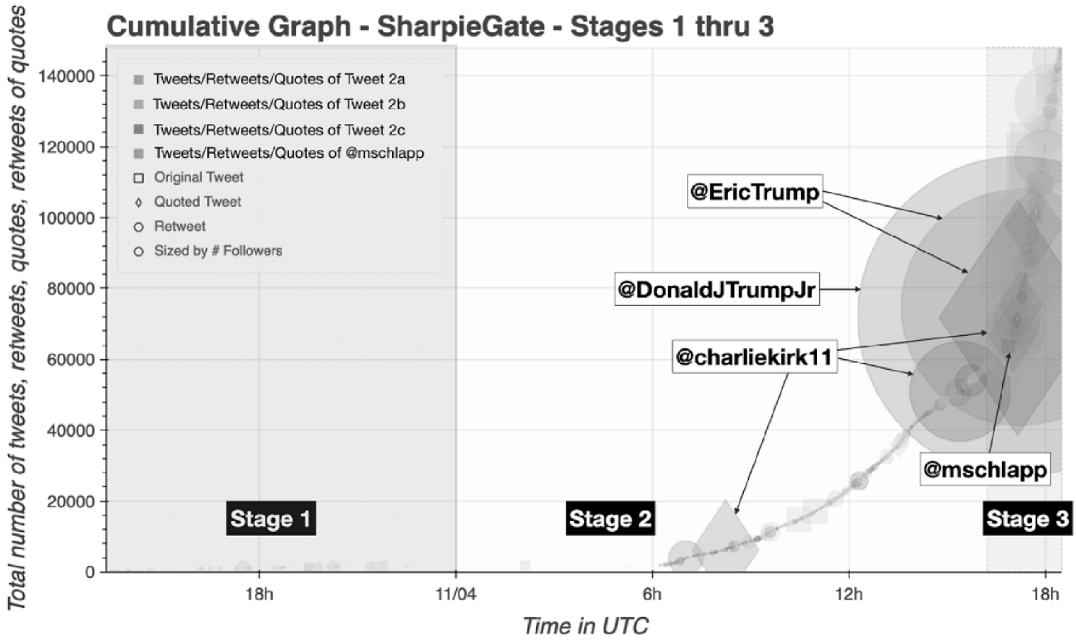

Figure 9. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored if they are tweets, retweets, or quote tweets of Tweets 2a, 2b, 2c or @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC (10am-11:30am AZ time), the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half. In that single hour, it received more amplification than in the preceding 24 hours combined. Figure 9 reveals that the surge is, in part, catalyzed by the following tweet, from conservative operative Matt Schlapp:

@mschlapp (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

Schlapp's account had 228K followers at the time. The tweet — which, unlike many of the earlier viral tweets, couched the claims about Sharpie pens in uncertainty — received 4335 retweets and was quoted 1356 times resulting in 9551 retweets. More interesting than the absolute numbers here is how Schlapp's tweet echoed through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC (1.3M followers), conservative news outlet TownHall's editor @KatiePavlich (865K followers), and President Trump's sons, @EricTrump (4.4M followers) and @DonaldJTrumpJr (6.0M followers). In this case, Schlapp served as an influencer's influencer, helping to move the developing conspiracy theory from its origins in low follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign. Interestingly, Schlapp was involved in contesting a previous election — he was in attendance during the "Brooks Brothers riot" that successfully stalled the recount effort in 2000 (Kamen, 2005).

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posts another quote tweet asking "What's going on here?", conservative author @DineshDSouza (1.8M followers), the founder of "Students for Trump" @RyanAFournier (1.1M followers), the founder of the "Walkaway" movement @BrandonStraka (640K followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. These corrective tweets were not highly retweeted (relative to the earlier tweets pushing the misleading claims), but instead accompanied a steady decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier. However, a few new threads emerged, aggregating claims of rejected ballots and making calls to action (e.g. recommendations to call lawyers, instructions for AZ voters to go to a website to check the status of their ballots).

6.5 Stage 5: Conservative Mega-Influencers Drive a Resurgence

On Twitter, we see another resurgence of the SharpieGate narrative on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a mega-influencer with 850K followers:

@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote fairy visits overnight...

Maria's tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader "election fraud" narrative. Interestingly, her post only hinted towards a conspiracy, without providing a coherent theory. The tweet began to spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the "fraud" framing and issued a call to action to the FBI and DOJ.

Bartiromo's tweet was also quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton (1.2M followers) and Trump-supporting lawyer @RudyGiuliani (883K followers); and retweeted by similar accounts including @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq (310K followers), and former GOP Speaker of the House @NewtGingrich (2.4M followers). Bartiromo's tweet generated a surge of about 25K SharpieGate tweets in one hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's (and transgender people's) prior legal names ("maiden" names). This theory emerged as a direct result of agitation by online political influencers, and it both supported and drew support from the larger meta-narrative of the stolen election.

On Twitter, the first salient mention of issues with "maiden names" in the context of voting and voter fraud concerns occurs in the following tweet:

Peoples_Pundit (2020-11-08 15:03): Just so everyone can see, here's the voter file in Philly and the query parameters. Also important to understand, we always have dirty rolls B/C the state is always behind in learning of CoAs, deaths, duplicate records, maiden names, etc.

It's simply not believable nor possible. <embedded screenshot of an online dashboard with voting statistics from Pennsylvania>.

The posting account, @Peoples_Pundit (unverified, 160K followers), belonged to a conservative micro-influencer who described himself as a "data journalist." Over the next few days, his tweet was retweeted 1431 times. Early amplifiers included Epoch Times contributor @themarketswork (118K followers) and the unverified account of Trump-supporting lawyer @SidneyPowell1 (506K followers).

@Peoples_Pundit's tweet also spread through 97 quote tweets and (and 32 retweets of those quotes). Many quote tweets added hashtags like #StoptheSteal or phrases such as "Audit the vote!", contextualizing this claim alongside other evidence of a purported stolen election. Other users attempted to draw attention from right-wing influencers, tagging pro-Trump political figures such as @RudyGiuliani and @DonaldJTrumpJr, mega-influencers like @JackPosobiec, and the President's personal account (@realDonaldTrump).

7.1 An Aspiring Influencer Makes a Call to Action

Over the next two days, low-level chatter about maiden names on Twitter persisted, including a few users who shared personal experiences about being given multiple ballots and several "friend of a friend" stories of people voting with their maiden name. The concern about maiden names consolidated into the MaidenGate conspiracy primarily through the work of one user: a person who used the pseudonym L (which we will use here). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 10 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss well-worn rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L began investigating the Epstein trial; in October, she investigated Hunter Biden. Over these months, her account gained a following, burgeoning to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including pro-Trump activist media outlet @ProjectVeritas, conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

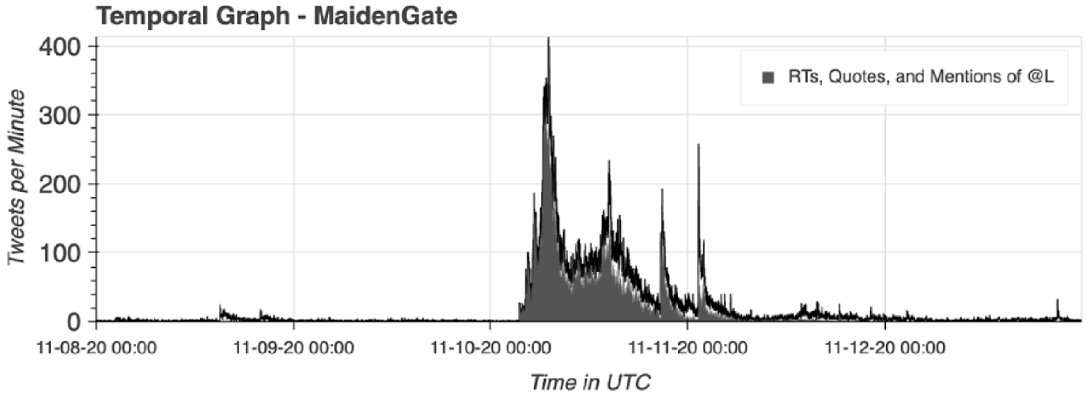

Figure 10. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in red.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claim fraud, receive about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets began to take off — with 30,000 retweets, quotes, and retweets of quotes in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of regular users and micro-level influencers. A few of these accounts attempt to trade up to more influential accounts, tagging (among others) verified right-wing mega-influencer @JackPosobiec and verified meso-influencer Ian Miles Cheong (@stillgray, 309K followers).

@L began to retweet and quote others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon, another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro-, meso-, and macro-influencers — and eventually to mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen (259K followers) retweeted @L's call to action without comment. Lauren was a host at BlazeTV, the same hyper-partisan news outlet for which @ElijahSchaffer (initiator of Sonoma Ballots) worked. Shortly thereafter, meso-influencer Ian Miles Cheong (@stillgray), who had been tagged into conversation minutes earlier, and who played a similar role as an early amplifier of Sonoma Ballots, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar (70K followers), who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's call-to-action tweets. At 6:24 UTC, conservative activist @CharlieKirk (1.9M followers), who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

The first recorded appearance of the #MaidenGate hashtag occured at 4:33 UTC, eighteen minutes after @L's initial plea to her followers for help. A low-follower account quote-tweeted @L, adding "#MaidenGate?". Subsequent users dropped the question mark. Within hours, it would be promoted by micro-, meso-, macro-, and mega-influencers; within two days, *The New York Times* would write about (and debunk) it.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K (crossing the threshold of meso-influencer) about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was "looking into @L's #MaidenGate" and attempted to solicit ten people who could "confirm that you voted under your name and that also a vote was cast under your maiden name?" He concluded by saying that he will "have L call me" — and later confirmed via tweet that they had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L's accusations around 8:00 UTC. Like other savvier influencers, he couched the claims in uncertainty while creating anticipation of something big: "We don't know the top of this. This is either a small problem, or it's a problem that will shake America to the core. We're going to find out. [...] I have no leanings. All I care about is the evidence." Alexander did note that it was not clear if the issue was systemic — and continued to press those reporting for evidence that someone had actually voted, not just that a registration existed, under their maiden names. His live broadcast got 41,000 viewers, helping to carry over the #MaidenGate claims to Alexander's growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander's team created — and later tweeted out — a Google Document to consolidate information around the ongoing "investigation." The sheet offered detailed advice for filing complaints about potential voter fraud using one's maiden name, providing links to voter registration websites in dozens of states. (On Twitter, Alexander would later offer support to people for filing affidavits to add their claims to the legal record, a tactic seen across multiple "voter fraud" conspiracy theorizing efforts at the time.) The Google document's watermark read "stopthesteal.us", providing evidence that the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the situation, and YouTube announced it would append to #MaidenGate videos an information panel stating Joe Biden had won the presidential race. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal meta-conspiracy moved onto investigating and formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — in particular around whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of the disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how some of the specific narratives within the broader disinformation campaign took shape and spread, complicates that view. In all three of these cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences. *Political influencers* both mediate and shape these efforts, acting as "opinion leaders" that frame information from elites to online audiences, and promote online audiences back to the elites in turn (Katz & Lazarsfeld, 1955). This view aligns with previous research on participatory propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here. Elites repeatedly invoked the prospect of a "rigged election" to set an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our three case studies we observe groups of low-follower accounts and uncredentialed aspirational influencers collaborating with credentialed meso- to mega-influencers to construct and propagate narratives.

In Sonoma Ballots, "journalists" at partisan media outlets launched the narrative based on photographs supplied by one of their "readers" — and all seem to have believed (or wanted to believe) that they had uncovered genuine evidence of ballot fraud. Similarly, in SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence they gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, a conspiracy theory takes form.

Mediating this bidirectional (top-down, bottom-up) information flow, we see the rise of the **political influencer**, whose liminal identity — neither elite nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds — frustrates researchers' attempts to place them within traditional models of information flow and the role of media. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contended that "opinion leaders" contextualized and represented content from mass media to audiences from whom they commanded trust. We suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, and especially at the role of audiences and influencers not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful approach to understanding these dynamics is through the lens of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (cite) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the Trump campaign's "voter fraud" theory.

Improvisation requires structure (Crossan, 1998) — at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we can see that shared understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we can see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower accounts and regular users shared their own experiences. Micro influencers amplified the experiences of others, and tried to help move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, we can see a long-time political operative performing on top of an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010),

and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, “A key characteristic of improvisation is that individuals take different leads at different times” (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

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11.0 References

Bastos, Marco, and Johan Farkas. "“Donald Trump is my President!”: The internet research agency propaganda machine." *Social Media + Society* 5, no. 3 (2019): 2056305119865466.

Benkler, Yochai, Casey Tilton, Bruce Etling, Hal Roberts, Justin Clark, Robert Faris, Jonas Kaiser, and Carolyn Schmitt. "Mail-in voter fraud: Anatomy of a disinformation campaign." *Berkman Center Research Publication* 2020-6 (2020).

Bittman, Ladislav. *The KGB and Soviet Disinformation: An Insider's View*. Pergamon-Brassey's, Washington, DC. 1985.

Bruns, Axel. "Gatewatching, not gatekeeping: Collaborative online news." *Media International Australia* 107, no. 1 (2003): 31-44.

Center for an Informed Public (CIP), Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). *The Long Fuse: Misinformation and the 2020 Election*. Stanford Digital Repository: Election Integrity Partnership. Available at: https://purl.stanford.edu/tr171zs0069

Centola, Damon. "Influencers, Backfire Effects, and the Power of the Periphery." *Personal Networks: Classic Readings and New Directions in Egocentric Analysis* (2021): 73.

Charmaz, Kathy. *Constructing Grounded Theory*. Sage, 2014.

Citizens Clean Elections Commission. "Official Information Regarding the Use of Sharpies in Maricopa County." Available at: https://www.azcleanelections.gov/election-security/sharpies

Crossan, Mary M. "Improvisation in action." *Organization Science* 9, no. 5 (1998): 593-599.

Geiger, R. Stuart, and David Ribes. "Trace ethnography: Following coordination through documentary practices." In *2011 44th Hawaii International Conference on System Sciences*, pp. 1-10. IEEE, 2011.

Gillmor, Dan. *We the media: Grassroots journalism by the people, for the people*. O'Reilly Media, Inc., 2006.

Jack, Caroline. "Lexicon of lies: Terms for problematic information." *Data & Society* 3, no. 22 (2017): 1094-1096.

Kamen, Al. "Miami 'Riot' Squad: Where Are They Now?" *Washington Post.* (January 24, 2005). Available: https://www.washingtonpost.com/archive/politics/2005/01/24/miami-riot-squad-where-are-they-now/8c5457b9-ebf5-4a4a-937a-68b07c5e6334/

Lazarfield, P., and Eliu Katz. *Personal Influence: the part played by people in the flow of mass communication*. The Free Press, 1955.

Kendra, James, and Tricia Wachtendorf. "Improvisation, creativity, and the art of emergency management." *Understanding and responding to terrorism* 19 (2007): 324-335.

Krafft, P. M., and Joan Donovan. "Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign." *Political Communication 37*, no. 2 (2020): 194-214.

Hearn, Alison, and Stephanie Schoenhoff. "From celebrity to influencer." *A companion to celebrity* (2016): 194-212.

Mack, David and Caroline Haskins. "Trump Supporters Breached The Offices Of Members Of Congress." *Buzzfeed News.* (January 6, 2021). Available at: https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, Jim, Kate Starbird, Haneen J. Al-Hassani, Daniel E. Sandoval, Mania Orand, and Robert M. Mason. "Characterizing online rumoring behavior using multi-dimensional signatures." In *Proceedings of the 18th ACM Conference on Computer Supported Cooperative Work & Social Computing*, pp. 228-241. 2015.

Marwick, Alice, and danah boyd. "To see and be seen: Celebrity practice on Twitter." *Convergence* 17, no. 2 (2011): 139-158.

McGregor, Shannon C. ""Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion." *Public Opinion Quarterly* 84, no. S1 (2020): 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, David, Giampiero EG Beroggi, and William A. Wallace. "Decision support for improvisation during emergency response operations." *International journal of emergency management* 1, no. 1 (2001): 30-38.

NPR/PBS NewsHour/Marist. National Poll: Trust in Elections, Threat to Democracy. (November 2021). Available at: https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll - trust-in-elections-threat-to-democracy-biden-approval-november-2021/

O'Reilly, Tim. "What is Web 2.0: Design Patterns and Business Models for the Next Generation of Software." *Communications & Strategies*, no. 1 (2007): 17. Available at SSRN: https://ssrn.com/abstract=1008839

Rae, Maria. "Hyperpartisan news: Rethinking the media for populist politics." *New Media & Society* 23, no. 5 (2021): 1117-1132.

Reuters. "Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots." *Reuters.* (September 29, 2020). Available: https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

Solis, Brian, and Alan Webber. "The rise of digital influence." *Altimeter Group* (2012). Available: https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, Kate, Ahmer Arif, and Tom Wilson. "Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations." Proceedings of the ACM on Human-Computer Interaction 3, no. CSCW (2019): 1-26.

Wall, Melissa. "Citizen Journalism: A retrospective on what we know, an agenda for what we don't." *Digital journalism* 3, no. 6 (2015): 797-813.

Wanless, Alicia, and Michael Berk. "Participatory propaganda: The engagement of audiences in the spread of persuasive communications." In *Proceedings of the Social Media and Social Order, Culture Conflict 2.0 Conference*. 2017.

Wootson, Cleve. "Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'" *Washington Post* (November 27, 2016). Available: https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

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To: Jeff Hancock[hancockj@stanford.edu]
Cc: Renee DiResta[rdiresta@stanford.edu]; Mike Caulfield[mica42@uw.edu]
From: Kate Starbird
Sent: Fri 10/7/2022 7:20:15 PM
Subject: Re: tropes update
Received: Fri 10/7/2022 7:20:15 PM

I'm fine with any role here for Matt. Just want the work to get out into the world!

Kate

On Oct 7, 2022, at 12:05 PM, Jeff Hancock <hancockj@stanford.edu> wrote:

Hi Mike, Renee and Kate,
I just met with Matt and we worked on the tropes paper and the coding scheme. Good progress and we have some suggestions on updating the trope codes by simplifying and aggregating into few categories, but before we go ahead on that Matt had some good questions about his involvement that I wanted to check on. Matt's preference would be to work on this as a co-author and help move the project forward at that contributing level (conceptualization, coding, writing). If that doesn't seem right to you, then he's also happy to work on this as a coding task and be supported by the SIO.

But getting him some clarity on his role would be good. What's your reaction - my personal preference would be to get him involved as a co-author.

Thanks!
Jeff

Jeff Hancock
Harry and Norman Chandler Professor of Communication
Founding Director, Stanford Social Media Lab
Stanford University

To: Alex Stamos[stamos@stanford.edu]
From: Kate Starbird
Sent: Thur 10/6/2022 8:19:59 PM
Subject: Re: Media request: Robby Mook's involvement in Election Integrity Partnership
Received: Thur 10/6/2022 8:20:00 PM

Go ahead. We probably wouldn't use libelous… but you are free to say that and it's true.

Sent from my iPhone

On Oct 6, 2022, at 1:11 PM, Alex Stamos <stamos@stanford.edu> wrote:

We gotta make a call of whether we are responding ASAP.

Alex

From: Michael Grass <megrass@uw.edu>
Date: Thursday, October 6, 2022 at 1:01 PM
To: Alex Stamos <stamos@stanford.edu>, Kate Starbird <kstarbi@uw.edu>, Ari Chasnoff <chasnoff@stanford.edu>, Renee DiResta <rdiresta@stanford.edu>, Elena Cryst <ecryst@stanford.edu>
Subject: RE: Media request: Robby Mook's involvement in Election Integrity Partnership

I like that response (short and direct), but on the UW end of things, I'll defer to Kate.

-- Michael

--
Michael Grass
Assistant Director for Communications
Center for an Informed Public
University of Washington
megrass@uw.edu
Pronouns: (he/him)
CIP News & Insights
Follow the CIP on Facebook [facebook.com], Twitter [twitter.com], and LinkedIn [linkedin.com].

From: Alex Stamos <stamos@stanford.edu>
Sent: Thursday, October 6, 2022 11:58 AM
To: Kate Starbird <kstarbi@uw.edu>; Michael Grass <megrass@uw.edu>; Ari Chasnoff <chasnoff@stanford.edu>; Renee DiResta <rdiresta@stanford.edu>; Elena Cryst <ecryst@stanford.edu>
Subject: Re: Media request: Robby Mook's involvement in Election Integrity Partnership

Here is my suggested response to Greg:

"
Mr. Piper-

Like most of what Just the News has written about EIP over the last week, your implications in this email are completely false. The Defending Digital Democracy project at Harvard was not a part of the EIP, had no role in referring, analyzing or writing about our work, and nobody at DDD (including Robby Mook) played any part in our 2020 analysis of election disinformation.

We have responded to your other false and libelous claims here:
https://www.eipartnership.net/blog/a-statement-from-the-election-integrity-partnership [eipartnership.net]

Sincerely,
Alex
“

From: Greg Piper <gpiper@justthenews.com>
Date: Thursday, October 6, 2022 at 7:49 AM
To: info@eipartnership.net <info@eipartnership.net>, Alex Stamos <stamos@stanford.edu>, uwcip@uw.edu <uwcip@uw.edu>
Subject: Media request: Robby Mook's involvement in Election Integrity Partnership

Hey folks, this is Greg Piper at Just the News in DC. I saw that the Defending Digital Democracy project at Harvard's Belfer Center, cofounded by 2016 Clinton campaign manager Robby Mook, was one of your civil society collaborators for the 2020 misinformation reporting effort.

Mook testified this summer in the criminal trial of former Clinton campaign lawyer Michael Sussmann that Clinton approved taking the allegation of a covert Trump Organization-Alfa Bank hotline to the press, even though the campaign wasn't "totally confident" in the allegation. He said it wasn't an "October surprise" even though the campaign tweeted it Oct. 31, 2016.

Given that this allegation was exposed as pretty blatant disinformation, didn't that give you pause about inviting a Mook-founded project to participate in the EIP? Wouldn't his involvement weaken the legitimacy of the EIP?

My deadline is 4 pm Eastern, thanks.

--
Greg Piper
Reporter
Just the News
gpiper@justthenews.com
240-423-3220

On Thu, Sep 29, 2022 at 8:11 PM Greg Piper <gpiper@justthenews.com> wrote:

> Hello, this is Greg Piper at Just the News in DC. There's new scrutiny on CISA and its work with the Election Integrity Partnership and I wanted to get your response.
>
> Rep. Andrew Clyde (R-Ga.), a member of the House Homeland Security Committee, told us this amounted to the federal government sanctioning and outsourcing censorship:
> *"The government knows that they cannot do it by themselves because of the First Amendment of the Constitution, which prohibits it. And then they decide to partner with another entity, a private entity. a social media platform or university.*
>
> *"And then they say, 'Hey, we're going to feed you information that we think is disinformation, or we want to be disinformation. And then you go ahead and you do the deplatforming. You label it as misinformation, or disinformation.'"*
>
> He says to expect Republicans to investigate the consortium next year if they take back Congress, and that he's drafting legislation called the Free Speech Defense Act to address censorship issues:
> *"This bill would prevent the federal government from labeling anything through a proxy entity, like a social media company, as disinformation, labeling it as misinformation or labeling it as true. And then it would also give an opportunity for those people who have been injured by it to take legal action."*
>
> Former State Department official Mike Benz, who founded the Foundation for Freedom Online and has been digging into alleged DHS censorship [foundationforfreedomonline.com], told us this was the largest federally sanctioned censorship effort he'd ever seen:
>
> *"If you trace the chronology, you find that there was actually 18 months' worth of institutional work to create this*

very apparatus that we now know played a significant role in the censorship of millions of posts for the 2020 election and has ambitious sights for 2022 and 2024.

"Amazingly, there are now so many Ministry of Truth functionaries within the Department of Homeland Security. There are so many Ministry of Truth tasks, so many Ministry of Truth points of contact, so many different Ministry of Truth policies for whether to remove something, reduce it, slap a fact checking label on it."

What's your defense of this past and ongoing collaboration with the federal government to report content for removal, throttling and labeling that the First Amendment prevents the feds from doing directly? Are you helping them circumvent the law? Renee DiResta said there were "unclear legal authorities including very real First Amendment questions" about the partnership at the Cybersecurity Summit:

https://www.youtube.com/watch?v=yNe4MJ351wU [youtube.com]

--
Greg Piper
Reporter
Just the News
gpiper@justthenews.com
240-423-3220
--
To unsubscribe from this group and stop receiving emails from it, send an email to info+unsubscribe@eipartnership.net.

Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Authors: Anonymized for peer review.

Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — from hyperpartisan media to political operatives to ordinary people — contributed to producing and amplifying misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This narrative took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for some, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021.

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing. We first expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. Additionally, while Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives that constituted this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of "influencers" in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast with research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and *participatory* nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents' of those campaigns, they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving

content from audiences to elites (and back again), and how “unwitting agents” come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including “citizen journalists” (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined “journalists” and “media outlets” sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online “influencers” operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure’s power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate’s base, what might “trend” on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the “influencer”, was intrigued by the figure’s power to shape consumer decision-making, devising metrics such as “reach, relevance, and resonance,” (Solis, 2012) and coining new terms, such as “nano-influencer” and “micro-influencer”, to differentiate influence on the basis of follower count.

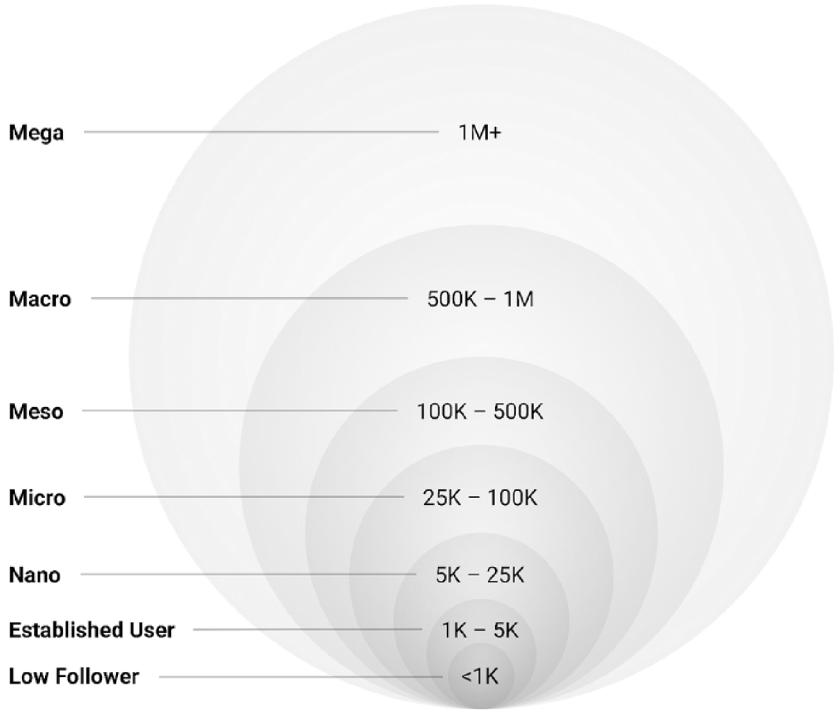

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) are representative of the kinds of narratives that spread (opportunistic amplification, collective sensemaking, and conspiracy theorizing); and (4) reveal the participatory nature of this campaign:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether or not they've been suspended, how they credentialed themselves, their tweet patterns across the Election 2020 discourse, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as

we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was then-President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting a false narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for its supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, Elijah Schaffer, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

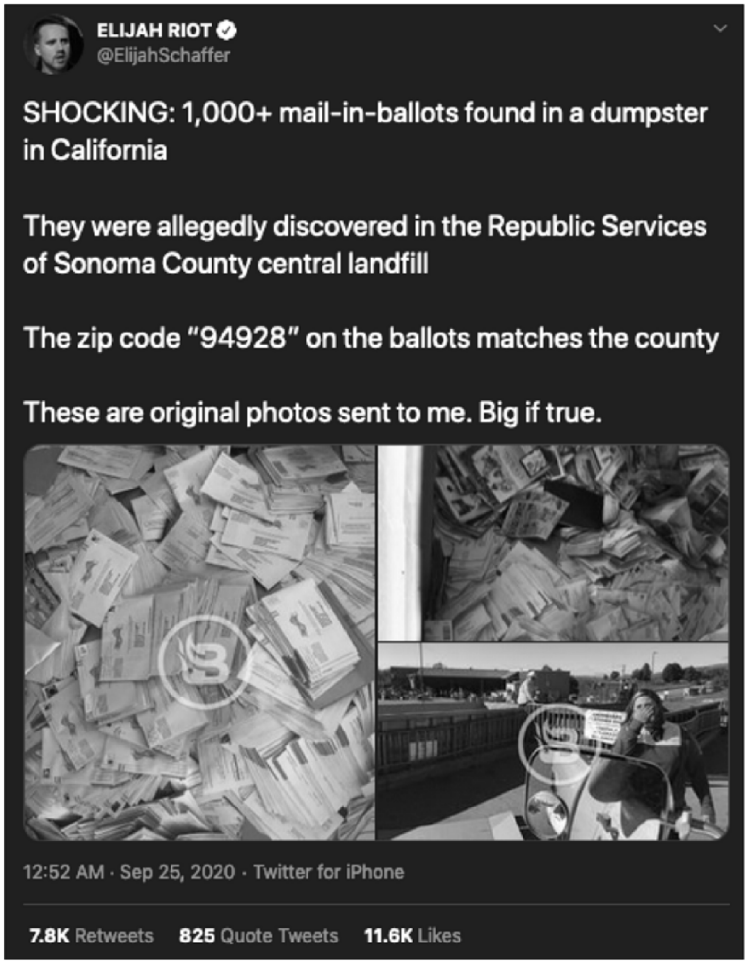

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

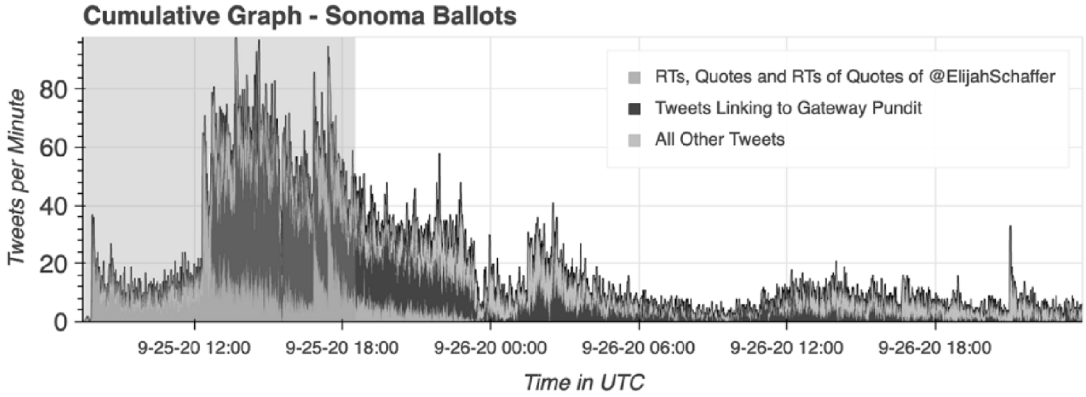

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a "blue-check", had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted "influencers" for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of "mega influencer" Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

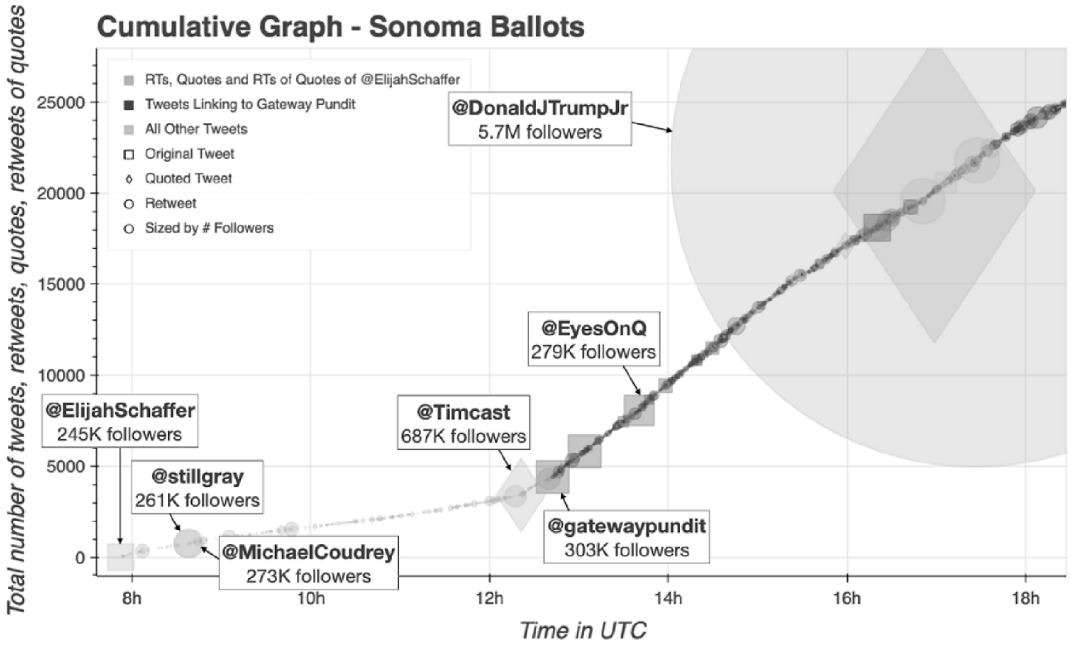

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, ballots rejected automatically were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

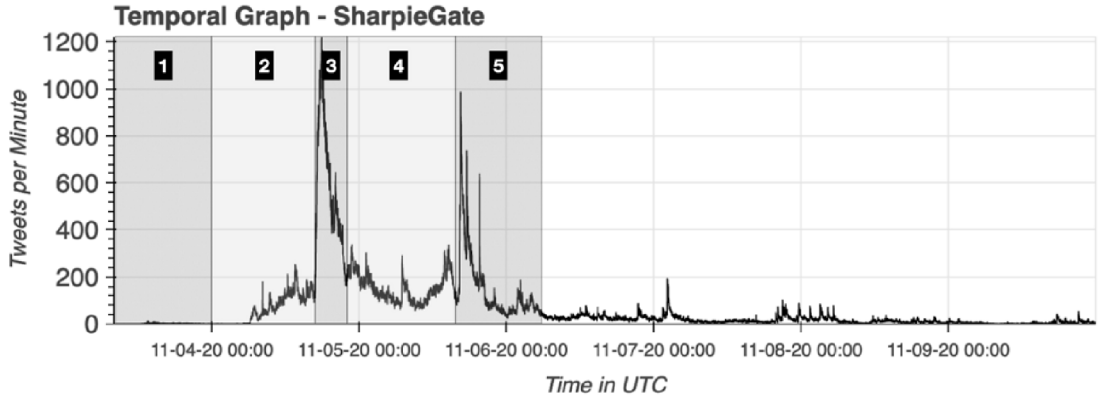

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a "nano" sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

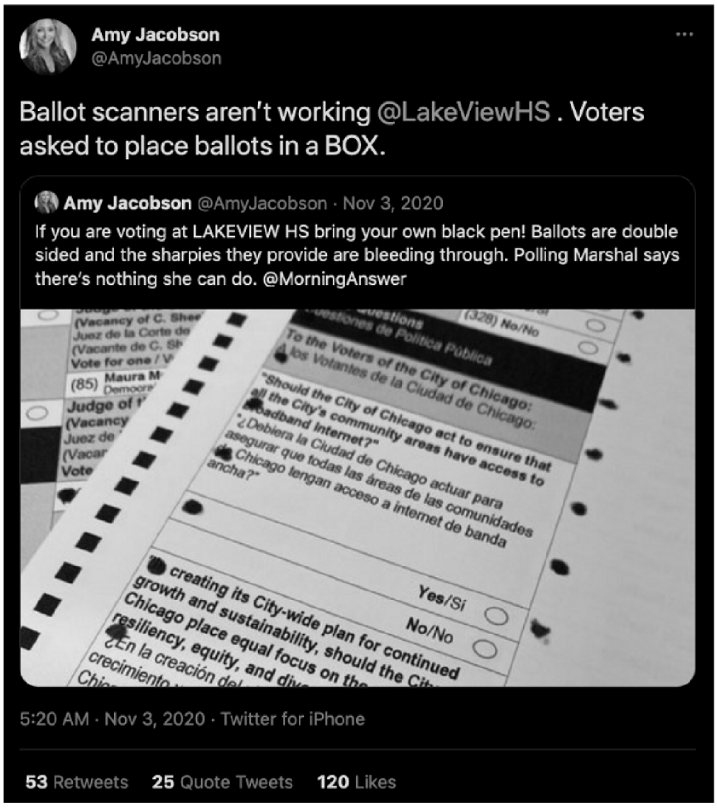

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to "trade up" — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
```

shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

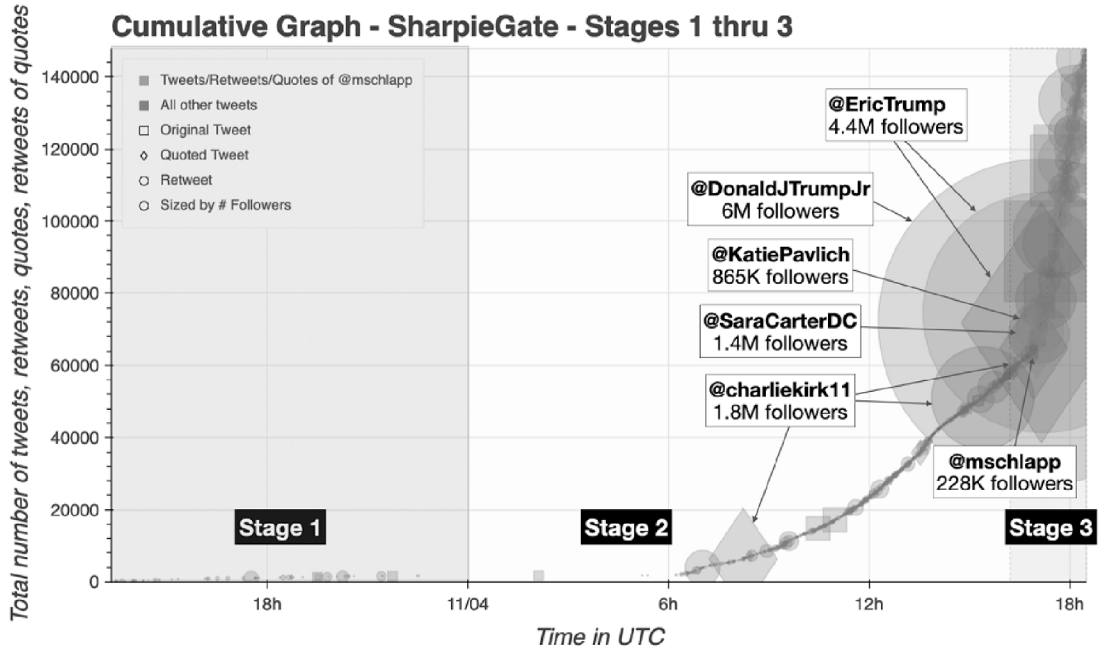

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half,receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

> **@mschlapp** (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), the founder of the “Walkaway” movement @BrandonStraka (640K followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House

@NewtGingrich. Bartiromo's tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including activist media outlet @ProjectVeritas, conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

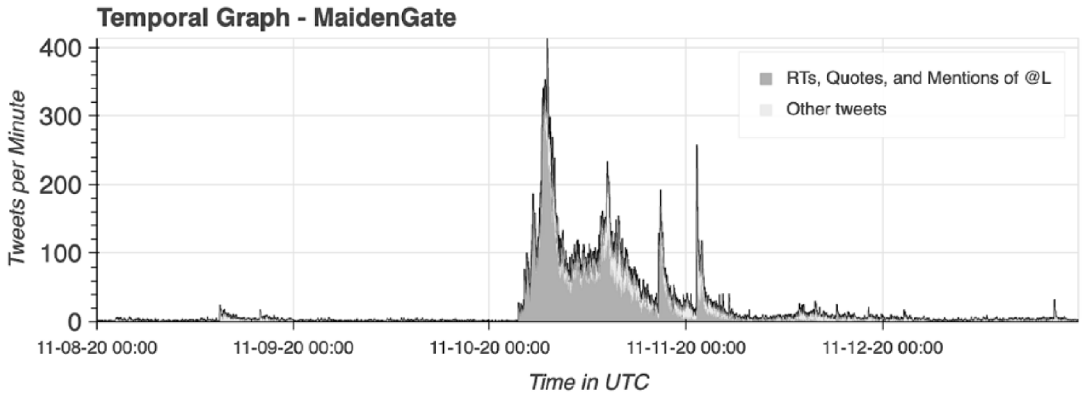

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was "looking into @L's #MaidenGate" and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

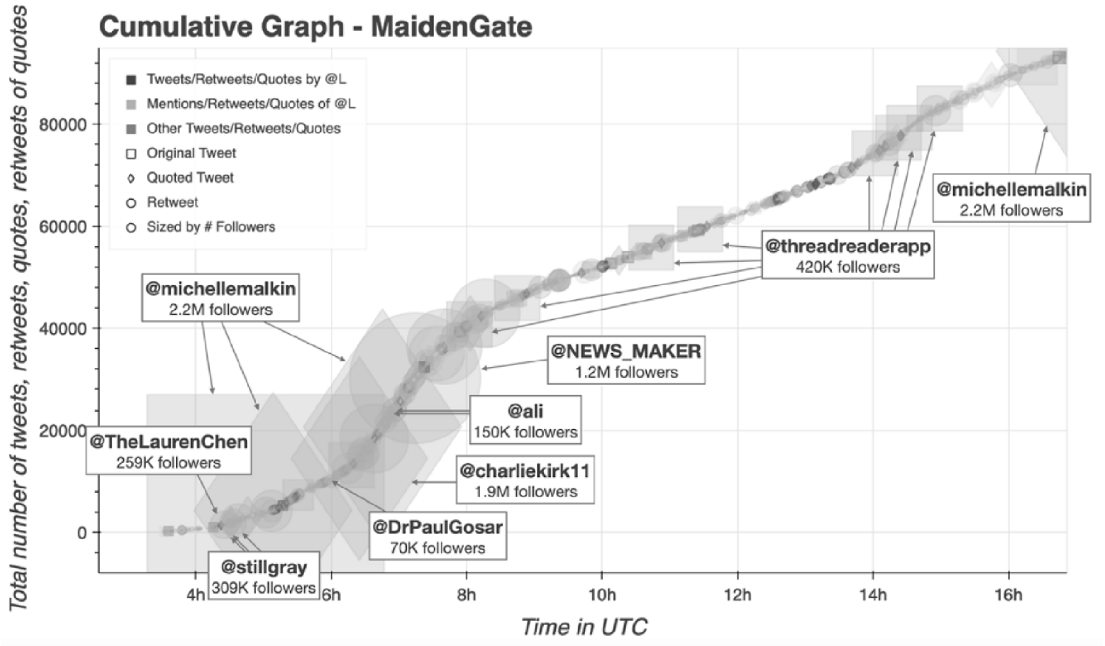

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L's accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation of something big: "We don't know the top of this. This is either a small problem, or it's a problem that will shake America to the core." His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander's growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander's team created a Google Document to consolidate information around the ongoing "investigation." The sheet offered detailed advice for filing complaints about potential voter fraud using one's maiden name, providing links to voter registration websites in dozens of states. Its watermark read "stopthesteal.us", demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly exploring whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media driven or social media driven. Instead, we find something more akin to Chadwick's conceptualization of political organizing within a hybrid media system (Chadwick, 2017) where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. *Political influencers* both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016) . This view aligns with previous research on participatory

propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence they gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro influencers amplified the experiences of others, and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, \a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

While this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

10.0 References

Bastos, M., & Farkas, J. (2019). "Donald Trump is my President!": The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. “Influencer Tiers for the Influencer Marketing Industry” *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters.* (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don’t. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: ‘I won the popular vote if you deduct the millions of people who voted illegally.’. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

Funding Acknowledgements

<anonymized for peer review>

To: Renee DiResta[rdiresta@stanford.edu]
Cc: Matt DeButts[mdebutts@stanford.edu]; isabellagc2010@gmail.com[isabellagc2010@gmail.com]
From: Kate Starbird
Sent: Tue 12/27/2022 4:45:46 PM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Tue 12/27/2022 4:45:49 PM

Hi everyone,
I'm following up on this, because I'd like to get this paper off to the journal ASAP in case they send it back wanting us to cut down the final 200 words (that we're adding for the Acknowledgements). It just needs a little attention from all of you regarding your personal bio and from Renee and Isabella regarding the Funding and Acknowledgements sections on the Stanford side.

I know folks are off this week, but it you could spare about 15 minutes to get these final elements in place, that would be awesome! (I have an avalanche that's going to hit me on January 3 … including another surgery because Matt was right that my finger didn't look right ... and I'm hoping to get this out the door before then.)

Kate

> On Dec 21, 2022, at 5:08 PM, Kate Starbird <kstarbi@uw.edu> wrote:
>
> Hi everyone,
> Happy holidays! I'm finally getting to these last revisions.
>
> I made the changes they suggested, adding a little limitations section. I've included the revision document here if you're interested. Please let me know if you think I've missed anything.
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> >
> > Matt

On Dec 3, 2022, at 2:21 PM, Kate Starbird <kstarbi@uw.edu> wrote:

Great news!
It looks like we have a little more work to do re: some minor revisions. I'll devote some time in the next few weeks and see if I can update the paper to address these final criticisms/requests. But if you all have time, take a look at their comments and send over any ideas you have regarding addressing them.

Kate

Begin forwarded message:

From: SMS Political Influencers <smspoliticalinfluencers@gmail.com>
Subject: Social Media + Society Special Issue / Decision on Manuscript ID [28]
Date: December 3, 2022 at 9:17:20 AM PST
To: Kate Starbird <kstarbi@uw.edu>, Renee DiResta <rdiresta@stanford.edu>
Cc: Martin Riedl <martin.riedl@utexas.edu>, Josephine Lukito <jlukito@utexas.edu>, Samuel Christopher Woolley <swoolley@utexas.edu>

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You have not previously corresponded with this sender.
See https://itconnect.uw.edu/guides-by-topic/email-calendaring/protecting-your-email/email-tags/ for additional information.

Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

3-December-2022
Dear Kate Starbird, Renee DiResta, Isabella Garcia-Camargo, and Matt DeButts:

We write to you in regard to manuscript ID [28] entitled "Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election" which you submitted to Social Media + Society.

We have now received the reviewer's reports, which led the team of guest editors to offer you the opportunity to publish your paper, subject to addressing minor comments and concerns raised by reviewers.

IMPORTANT INFORMATION FOR RESUBMISSIONS

When submitting your revised and final manuscript, we ask that you respond to the comments made by the reviewers in a response letter, submitted as a separate document from the manuscript. In the revised manuscript, please make sure to highlight (i.e., with color) all changes that have been made in response to reviewer feedback. To expedite the processing of the revised manuscript, please be as specific as possible in your response to the reviewers. It is also important that your response here is anonymous; no identifying author information should be included in your response.

Your revised manuscript should be submitted as soon as possible, but at the very latest, by January 14. If it is not possible for you to submit your

revision in a reasonable amount of time, we may not be able to consider your revised paper for the special issue.

We also want to remind authors that it is imperative that the revised version of your manuscript follows the author instructions of Social Media + Society, which can be found here: https://journals.sagepub.com/author-instructions/SMS.

As discussed in our previous correspondence, your revised manuscript may go up to 9,000 words. This is inclusive of references and abstract.

Once again, thank you for submitting your manuscript to Social Media + Society and we look forward to receiving your revision & final manuscript.

Best wishes,

Martin J. Riedl, Josephine Lukito, and Samuel Woolley
Guest Editors, Social Media + Society Special Issue on Political Influencers

GUEST EDITORS' COMMENTS TO AUTHOR(S):

Dear Authors,

We are happy to offer you the opportunity to publish your paper, subject to addressing the minor comments and suggestions raised by reviewers 1 and 2. We believe that the manuscript does not need to go back to the reviewers this time, and look forward to receiving your final version of the manuscript.

REVIEWERS' COMMENTS TO AUTHOR(S):

REVIEWER 1

I thank the authors for revising their manuscript based on our reviewer comments.

I think the revisions address many of the concerns raised in first round of reviews. I think the manuscript has potential to provide a valuable contribution to the field of disinformation studies through its detailed analysis.

That said, I still think the authors still need to address some key issues around the selection of cases and limitations, as I will outline in the following.

(1) Selection of cases

Both reviewer 2 and I both asked the authors to clarify how they selected the studied cases as well as what they mean by 'representative.' Unfortunately, I do not think the revised manuscript adequately addresses this, while raising new questions and problems.

In the revised manuscript, the authors present four sampling criteria: (1) cases had to be from different stages of the election cycle; (2) cases had to receive significant engagement; (3) cases had to be "representative of the kinds of narratives that spread" and (4) cases had to "reveal the participatory nature of this campaign".

In the appendix, in contrast, the authors present only three sampling criteria, the first two of which are identical to those in the manuscript. The third, however, is different: "Finally, we selected cases that our research team (the four authors here) had substantial familiarity with because we had participated in documenting these specific cases as they were

occurring.”.

This discrepancy needs to be corrected and, in my view, the authors should embrace the criteria from the appendix, while acknowledging the limitations of this approach.

The problem with the sampling criteria listed in the manuscript is that the authors do not, in my view, convincingly show how the studied cases are representative of general content during the elections. This, of course, is not a problem, if only the authors acknowledge the limitations of this (which I think they should). At the same time, the sampling criteria listed in the manuscript introduce some circular reasoning. The authors write that they deliberately sampled cases based on their ability to “reveal the participatory nature of this campaign.” Later, they then conclude the campaign is participatory (a conclusion already laid clear in the sampling criteria).
I think the best solution is to simply acknowledge that these cases were selected due to their high visibility as well as the authors’ detailed empirical engagement with the cases, while they took place (a valuable contribution in itself). Doing so, the authors should also acknowledge in the discussion section that the study cannot conclude how all parts of the #StopTheSteal disinformation campaign operated.

(2) Limitations

Connected to my first comment, I think the authors should include a paragraph on limitations to the discussion section.

(3) Further avenues of research

I also encourage the authors to briefly outline – towards the end - how future research might contribute to a better understanding of the identified participatory processes in disinformation campaigns.

Smaller comments:
• I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, “In contrast to most research” instead of “In contrast with research…”
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A final note: If the authors feel limited in terms of space, I think they should perhaps consider removing some of the quoted tweets from the analysis, as I think it would still work well without them.

REVIEWER 2

Thanks to the authors, who have obviously undertaken a major revision and condensing of their previous work. I think the shift of much of the detail to the supplementary materials basically works. And I am pretty much convinced by the authors’ responses to my previous comments.

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The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly how “participatory disinformation” occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of

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Finally, p. 12 uses the term “escalatory vector,” which sounds interesting but I don’t know what it means!

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To: Renee DiResta[rdiresta@stanford.edu]
Cc: Matt DeButts[mdebutts@stanford.edu]; isabellagc2010@gmail.com[isabellagc2010@gmail.com]
From: Kate Starbird
Sent: Thur 12/22/2022 1:08:34 AM
Subject: Re: Social Media + Society Special Issue / Decision on Manuscript ID[28]
Received: Thur 12/22/2022 1:09:09 AM
Participatory-Disinfo-Revision-Document-Final.docx
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Contact the UW-IT Service Center, help@uw.edu 206.221.5000, for assistance.

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To: O'Sullivan, Donie[donie.osullivan@warnermedia.com]
Cc: Michael Grass[megrass@uw.edu]; info@eipartnership.net[info@eipartnership.net]; rdiresta@stanford.edu[rdiresta@stanford.edu]
From: Kate Starbird
Sent: Tue 10/4/2022 2:31:39 PM
Subject: Re: CNN REQUEST
Received: Tue 10/4/2022 2:31:44 PM

We're also working on a weekly report model. That *should* start coming out next week.

Kate

On Oct 4, 2022, at 6:51 AM, O'Sullivan, Donie <donie.osullivan@warnermedia.com> wrote:

Thanks for such a prompt response. As an example, we'd be interested in seeing the background/account information that is behind yesterday's Twitter thread.https://twitter.com/EI_Partnership/status/1577008345071747073 [twitter.com]

From: Michael Grass <megrass@uw.edu>
Date: Tuesday, October 4, 2022 at 9:50 AM
To: O'Sullivan, Donie <donie.osullivan@warnermedia.com>, info@eipartnership.net<info@eipartnership.net>
Cc: rdiresta@stanford.edu <rdiresta@stanford.edu>, Kate Starbird <kstarbi@uw.edu>
Subject: RE: CNN REQUEST

EXTERNAL SENDER: Caution opening links or attachments

Donie –

Good morning from Seattle. We have you on our distribution list. Stay tuned for more this week.

Short answers: Anything we publish, we'll be tweeting out via @EI_Partnership. (There may be some things that we're only tweeting out, like yesterday's thread.) But we will be publishing a variety of analysis and research backgrounders. More to come.

As for on-the-record research briefings, stay tuned.

If you have other questions, feel free to reach out. Happy to jump on a call.

-- Michael

--
Michael Grass
Assistant Director for Communications
Center for an Informed Public
University of Washington
megrass@uw.edu
Pronouns: (he/him)

CIP News & Insights
Follow the CIP on Facebook, Twitter, and LinkedIn.

From: O'Sullivan, Donie <donie.osullivan@warnermedia.com>
Sent: Tuesday, October 4, 2022 6:27 AM

To: info@eipartnership.net
Cc: rdiresta@stanford.edu; Kate Starbird <kstarbi@uw.edu>
Subject: CNN REQUEST

Hi folks,

Donie here from CNN.

How will you guys be communicating your findings/tips? Will there be briefing/background briefing docs?

Please add me to any appropriate email list.

Best,
Donie
--
To unsubscribe from this group and stop receiving emails from it, send an email toinfo+unsubscribe@eipartnership.net.

Title: Influence and Improvisation: Participatory Disinformation during the 2020 U.S. Election

Kate Starbird, University of Washington, HCDE and Center for an Informed Public
Renée DiResta, Stanford University, Internet Observatory
Isabella Garcia-Camargo, Stanford University
Matt Marshall DeButts, Stanford University

Abstract

The 2020 U.S. election was accompanied by an effort to spread a false meta-narrative of widespread voter fraud. This meta-narrative took hold among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating the events of January 6, 2021. We examine this effort as a domestic and participatory disinformation campaign in which a variety of influencers — including hyperpartisan media and political operatives — worked alongside ordinary people to produce and amplify misleading claims, often unwittingly. To better understand the nature of participatory disinformation, we examine three cases of misleading claims of voter fraud, applying an interpretive, mixed method approach to the analysis of social media data. Contrary to a prevailing view of such campaigns as coordinated and/or elite-driven efforts, this work reveals a more hybrid form, demonstrating both top-down and bottom-up dynamics that are more akin to cultivation and improvisation.

1.0 Introduction

The 2020 U.S. election was accompanied by a sustained effort to construct and propagate a false meta-narrative of widespread voter fraud. This meta-narrative, an amalgamation of many distinct narratives featuring claims of fraud, took root among a substantial portion of the U.S. population, undermining trust in election procedures and results, and eventually motivating a violent political protest — for many, an attempt to prevent certification of what they believed to be fraudulent election results — at the U.S. Capitol on January 6, 2021 (U.S. House, 2022).

Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a “disinformation campaign” (Benkler et al., 2020). Our research builds upon this framing. We expand the window of analysis from mail-in ballots to include broader efforts to sow doubt in the election — leading up to the election, on election day, and afterwards. While Benkler and colleagues highlighted the role that elites and mass media played in perpetrating this campaign, our work seeks to uncover the interplay between elites and their online audiences in seeding, producing, and spreading the misleading narratives comprising this campaign.

Contrasting with descriptions of disinformation that emerged from 2016, which focused on coordinated and foreign dimensions, we conceptualize the disinformation campaign to discredit the 2020 election as a domestic and participatory one. In this paper, we explore both its top-

down and bottom-up dynamics, and the roles that different kinds of influencers — from long-time conservative political operatives, to self-described "journalists" at hyper-partisan media outlets, to social media all-stars, to members of the Trump campaign — played in its spread.

Focusing on three misleading "voter fraud" narratives, we employ a mixed-method approach to the analysis of social media data, leveraging a primary data collection (Twitter) and following traces out to other social media platforms. Throughout our analysis, we focus on the role of influencers in shaping and amplifying these misleading narratives — differentiating between verified and unverified influencers with different audience sizes, and describing their activities during pivotal moments in each narrative's production and spread.

2.0 Background and Related Work

2.1 The Disinformation Campaign to Delegitimize the 2020 U.S. Election

In October 2021, a national survey (NPR et al., 2021) showed that 75% of U.S. Republicans believed former President Trump's claims that voter fraud had compromised the integrity of the 2020 U.S. presidential election. Researchers (Benkler et al., 2020; CIP et al., 2021) have argued that those views were influenced by a *disinformation campaign* — an intentional effort to spread misleading content for strategic gain — that sought to sow doubt in election procedures and results. The campaign's foundations were laid as far back as 2016, when then President-Elect Donald Trump claimed that "millions of people who voted illegally" had caused him to lose the popular vote (Wootson, 2016). In 2020, President Trump and allies renewed the campaign preemptively, alleging early in the race that massive fraud *would* once again occur and, after Election Day, insisting that the fraud *had* occurred. The exact nature of that fraud remained vague throughout: it manifested as hundreds of false and misleading narratives, from claims that machines were changing votes from Trump to Biden, to assertions that large numbers of dead people had voted (CIP et al., 2021). In contrast to most research on disinformation around the 2016 U.S. election that highlighted foreign involvement and inauthentic coordination (e.g. Bastos and Farkas, 2019; Lukito, 2020), here we surface the domestic and participatory nature of the disinformation campaign to sow distrust in the 2020 U.S. election.

2.2. Online Disinformation as Participatory

Disinformation can be defined as false or misleading content, intentionally seeded and/or spread, for a specific purpose — often for political gain (Jack, 2017; Starbird et al., 2019). Disinformation often works not just through a single piece of content or a single narrative, but as a campaign. Bittman, a former practitioner, explains that though disinformation campaigns are typically set in motion by witting actors or 'agents', they often incorporate the work of 'unwitting agents' who may not fully recognize the role they play (1985). Building from that understanding, Rid highlights how disinformation campaigns can leverage and become integrated into otherwise organic political activism (Rid, 2020). Recent work has additionally highlighted the *participatory* nature of modern propaganda (Wanless and Berk, 2017; Asmolov, 2019), and conceptualized online disinformation as taking place through collaborations between witting agents and unwitting crowds (Starbird et al., 2019).

In this paper, we seek to unpack those participatory dynamics — both the top-down (elite-driven) dynamics stressed by Benkler et al. (2020) and others, and the bottom-up (collaborative) dynamics noted by Starbird et al. (2019), as well as the interplay between them. Through this work, we aim to better understand the roles of political and media elites in setting the frames and spreading messages to their vast audiences, the role of various influencers in moving content from audiences to elites (and back again), and how "unwitting agents" come to participate in these efforts.

2.3 From Citizen Reporters to Social Media Influencers

Digital and social media have drastically changed news production and information dissemination. As greater numbers of citizens receive and produce information online, new classes of media have emerged, including "citizen journalists" (Gillmor, 2006) and hyper-partisan digital news sites (Rae, 2021). Many members of this new class of highly online, self-defined journalists and media outlets sit between traditional journalism and activism (Wall, 2015) and command increasing influence in the public sphere.

Online influencers operate within the expanded media horizon created by these digital disruptions, amidst the blurred boundaries of media, celebrity, and marketing. Many position themselves not as journalists but as ordinary people, employing a first-person, low-production communication style meant to convey authenticity, relatability, and shared membership in a common identity (Marwick and Boyd, 2011; Hearn and Schoenhoff, 2016). Research on the social media influencer has examined the figure's power to sell products, shape public opinion on culture, mobilize activists, and intervene in politics (Goodwin et al., 2020). Political campaigns, for example, have sought to coordinate campaign messaging with influencers, working with them to identify what resonates with the candidate's base, what might trend on social media, and how trends might inform subsequent media coverage (McGregor, 2020).

Marketing research, which was among the first disciplines to identify and characterize the influencer, was intrigued by the figure's power to shape consumer decision-making, devising metrics such as "reach, relevance, and resonance," (Solis, 2012) and coining new terms, such as "nano-influencer" and "micro-influencer", to differentiate influence on the basis of follower count.

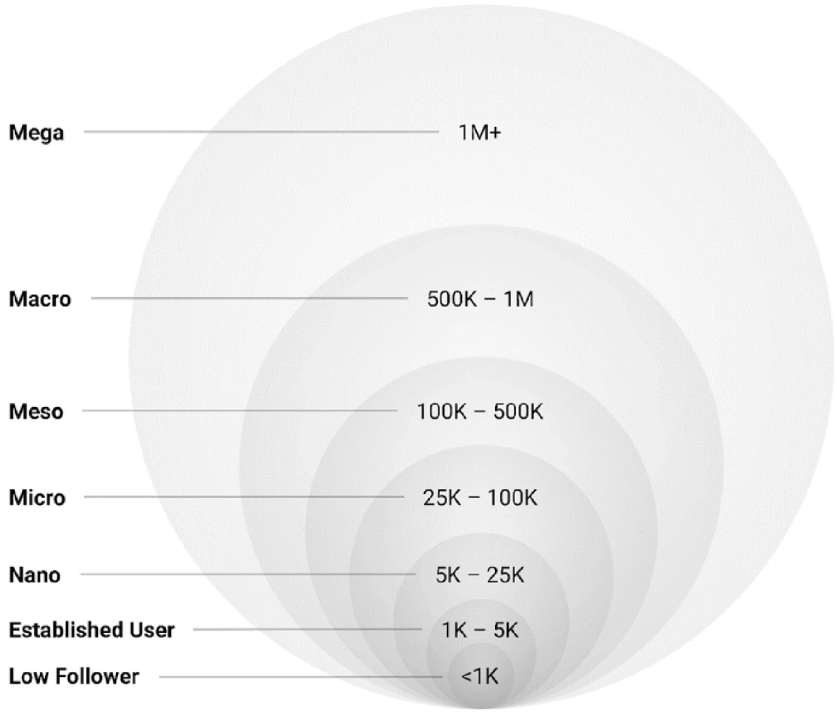

Figure 1. Audience size classification, design adapted from (Mediakix, 2019).

Here, we adapt a classification scheme derived from the world of marketing (Figure 1) to scaffold the exploration of the roles of different types of social media influencers, from individuals that sit on the boundaries of journalism, to emergent political activists, to micro-celebrities that build their audiences online, to more established political operatives who carry their real-world visibility over to social media.

3.0 Data and Methods

3.1 Three Case Studies

The disinformation campaign to discredit the 2020 U.S. Election took shape through hundreds of false or misleading claims of election fraud. We selected three cases that: (1) emerged from different periods of this campaign, (2) received significant participation (>25,000 tweets); (3) our research team were familiar with because we documented them in depth as they were occurring:

- **Case 1: Sonoma Ballots.** A claim from September 2020 alleging that over 1000 mail-in ballots had been found in a dumpster in Sonoma, California.
- **Case 2: SharpieGate.** A claim from Election Day 2020 alleging that felt-tip pens were bleeding through ballots and invalidating them. Versions of the claim appeared in multiple locations, but achieved greatest traction in Arizona, where the framing expanded to assert that Trump supporters had been specifically targeted.
- **Case 3: Maidengate.** A claim from November 9, 2020, alleging that 'political predators' had committed voter fraud by casting inauthentic votes using voters' maiden names.

Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.

3.2 Data

To understand how these stories spread, we look to the digital record — i.e. data generated through the use of social media and other digital platforms. We center our analysis on Twitter, but follow traces in that data over to other platforms.

Our primary dataset consists of over 1B tweets, gathered contemporaneously from August 2020 to January 2021 using the Twitter Streaming API. Our initial collectors captured tweets that contained voting-related terms (such as "vote", "voter", "voting", and "ballot"), terms related to claims of voter or election fraud, and terms related to potentially salient locations. We also identified emergent false and misleading stories in real-time, occasionally adding conspiracy-specific terms (like #SharpieGate) to the collectors. From this broad dataset, we then curated a dataset specific to each case study — using keyword-based search strings to create a comprehensive, low-noise sample of related tweets.

Our data collections did experience rate limiting from the Twitter Streaming API on election day, which impacted data coverage, especially, for the SharpieGate case (~30% tweets lost). However, we were able to use retweets to recreate the original content and understand the spread of highly retweeted content (our primary focus here).

For accounts that shaped the spread of narrative, we categorized each according to their audience size (see Figure 1), as well as their verified status, whether they've been suspended, how they credentialed themselves, and the role they played in seeding, shaping, and/or amplifying the narrative. In addition to data collected directly from Twitter, we also follow links in the data to content on other platforms, including other social media platforms (e.g. YouTube, Parler, Facebook), external websites, and a Google document relevant to Case 3.

3.3. Note on Anonymization

To protect the identities of users who may not understand that their online activities can be seen as part of the public record, we anonymize accounts (and content from accounts) that are unverified, have less than 100K followers, and are not public figures.

3.4 Methodology

We employ a grounded, interpretative approach, building upon Charmaz's approach for constructing grounded theory (2014) to integrate both qualitative and quantitative methods as we build understandings of complex social phenomena. This approach, described in detail in Starbird et al. (2019), draws upon methods from crisis informatics (Palen and Anderson, 2012) and has previously been applied to studies of online rumors (e.g. Maddock et al., 2015). Here, we focus on specific rumors or stories, using visualizations and descriptive statistical analysis to identify high level patterns and anomalies and then applying deep qualitative analysis to understand what those patterns and anomalies mean. We also borrow here from the trace ethnography approach outlined by Geiger and Ribes (2011), following the collaborative "work" of creating and spreading these misleading narratives across different platforms — from Twitter and Parler to Facebook and Google Docs.

This research emerged from data uncovered through the Election Integrity Partnership (EIP), a coalition of research entities who worked during the 2020 election to detect, analyze, and respond to election-related misinformation in real time (CIP, 2021). We initially began studying these cases as they were "going viral". Later, we created temporal and network graphs, using those graphs to guide qualitative analysis of specific posts or accounts; closely analyzing hundreds of social media posts to identify "influential" posts and accounts as well as broader patterns and themes; and producing extensive memos synthesizing insights. The cases presented here attempt to distill the richness of those analyses into coherent accounts that both provide context for understanding how each narrative took shape and spread, and allow us to explore the role of influencers and the collaborative dynamics within each case.

For more detail about our selection of case studies, how we identified tweets related to each case study, our criteria for anonymizing accounts, and limitations of our methods, please see Appendix A.

4.0 Background: Establishing Expectations of Voter Fraud

Benkler et al. (2020) described how the effort to undermine trust in the mail-in voting process was driven by elites and spread through mass media outlets, including Fox News and hyper-partisan media outlets. A primary actor in this campaign was President Trump, who repeatedly used his social media accounts and public speaking opportunities to spread false, misleading, and unsubstantiated claims of voter fraud.



Figure 2: Tweet posted by President Trump claiming the 2020 election would be rigged.

The tweet above, posted by President Trump's official account in June 2020, was one of numerous social media posts by @realDonaldTrump promoting the false meta-narrative of massive voter fraud. These messages resonated with Trump's followers, setting, for some, a false expectation of election fraud.

Though initially focused on mail-in voting, the effort to sow doubt in the election evolved to include other allegations of electoral malfeasance. As election day approached, the Trump campaign encouraged its followers to join the "Army for Trump" and collect evidence of fraud, providing instructions for serving as poll observers and online forms for supporters to submit evidence of election issues. Our data suggest that, likely mobilized by the "Army for Trump" messaging and repeated claims of voter fraud from pro-Trump political and media elites, many Trump supporters arrived at the polls (and went online) actively searching for evidence to support the election fraud narrative.

5.0 Case 1: Sonoma Ballots

In the weeks leading up to the election, several stories of mail-in ballots being discarded or destroyed went viral. Some were based on genuine instances of ballot misplacement or improper disposal, although their potential impact on the election was exaggerated. Others were based on willful misinterpretations or misleading framings of standard election administrative processes, opportunistically amplified for political gain. The Sonoma Ballots case belonged to the latter category.

The Sonoma Ballots rumor, which first emerged in the tweet below, featured photos of election materials discovered in a dumpster in Sonoma, California, claiming that these "ballots" demonstrated the vulnerability of mail-in voting in the 2020 election. The tweet's author, a self-described journalist for right-wing media outlet The Blaze, concluded his exposition with the words, "Big if true."

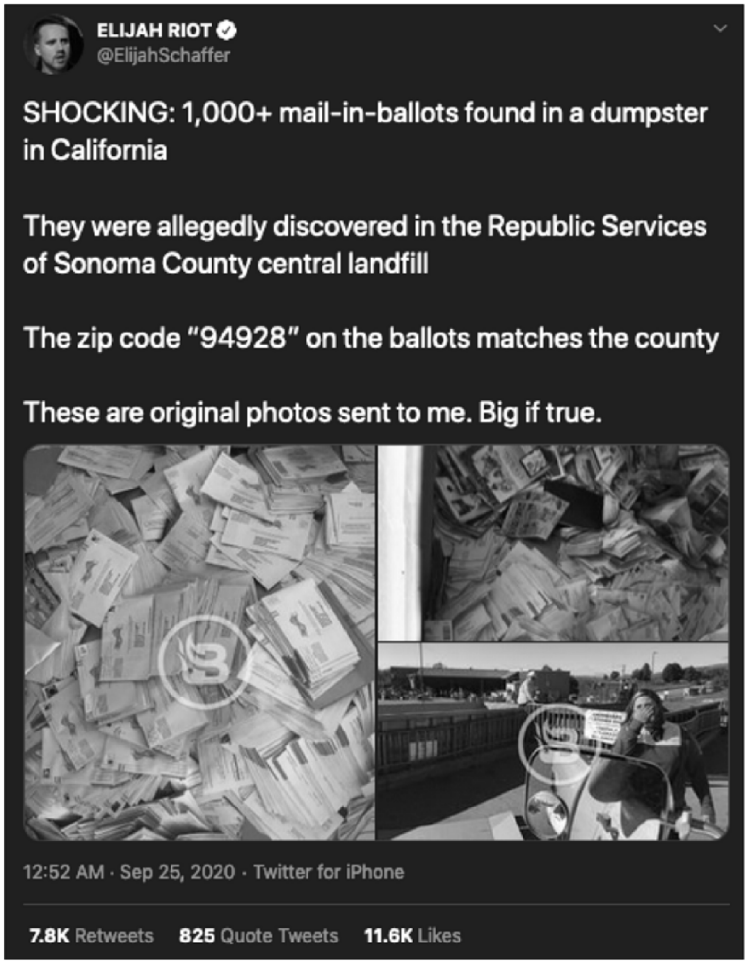

Figure 3: First tweet claiming that ballots had been found in a dumpster in Sonoma CA, posted by @ElijahSchaffer on September 25, 2020 at 12:52am Pacific (7:52am UTC).

It wasn't true. The photo depicted ballot envelopes received and processed during the 2018 election, which were being discarded according to guidelines, 22 months after that election (Reuters, 2020). But lack of veracity did not stop the misleading claim from spreading widely — 45,000 tweets in the span of about 36 hours.

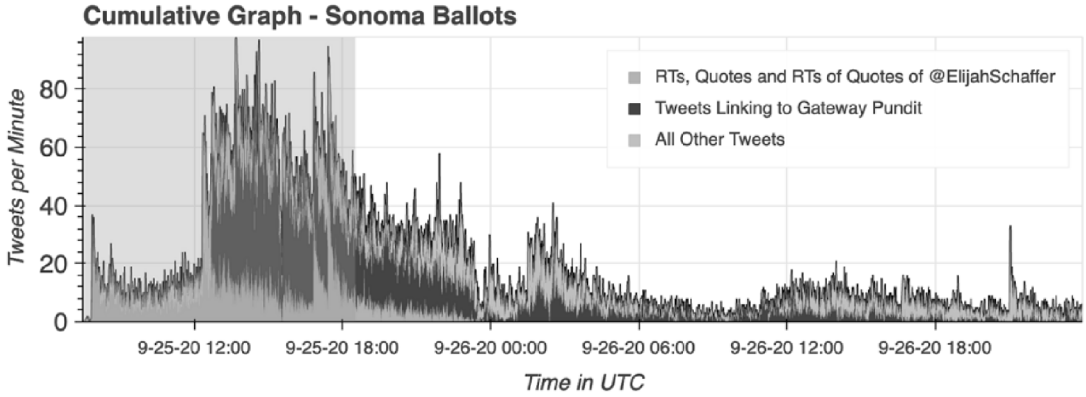

Figure 4: Temporal graph of the Sonoma Ballots story (black line). The salmon area consists of retweets and quote tweets of @ElijahSchaffer's original tweet. The purple area consists of tweets linking to the Gateway Pundit's article.

Initially, the story spread almost exclusively through retweets and quote tweets (and retweets of quote tweets) of @ElijahSchaffer's original tweet. Schaffer's account, which Twitter had verified with a blue-check, had 245K followers at the time of this tweet — a "meso" influencer-sized account.

Approximately five hours after Schaffer's tweet, the Gateway Pundit posted an article and accompanying tweet featuring the same photos and claims:

> **@gatewaypundit** (2020-09-25 12:42:15): EXCLUSIVE: California Man Finds THOUSANDS of Unopened Ballots in Garbage Dumpster -- Workers Quickly Try to Cover Them Up -- PHOTOS via @gatewaypundit https://t.co/bZgb0KYllQ

The Gateway Pundit is a hyper-partisan, right-wing, online micro-media outlet. In advance of and following the 2020 election, Gateway Pundit repeatedly pushed false and misleading narratives of voter fraud through both its social media accounts and its website (CIP et al., 2021). Its verified Twitter account had 302K followers ("meso" level) on September 25 and would grow to ~460K followers before being suspended on January 10, 2021. Gateway Pundit's article and tweet about the Sonoma Ballots contributed to a rapid surge in engagement with the narrative, which persisted for several hours.

As Figure 4 shows, the vast majority of tweets (75%) about this narrative were either retweets/quote tweets of Elijah Schaffer or contained links to the Gateway Pundit's article. These dynamics are consistent with Benkler et al's characterization of disinformation as driven by media and political elites from the top-down (2020), but in this case the "elites" were mid-sized influencers from hyper-partisan media outlets using a digital-first approach.

Both Schaffer and the Gateway Pundit note that the photos had been sent to them by a source, which the Gateway Pundit refers to as a "reader." Though we do not know the identity of this source, we assume — from the absence of public evidence of these claims prior to Schaffer's tweet — that the source did not have enough visibility to spread the claims organically from his or her own account, and thus contacted influencers for assistance. Krafft and Donovan (2020) refer to this dynamic as "trading up," a technique for moving content from low-visibility accounts on the periphery to higher visibility accounts. This example demonstrates how participatory

audiences of hyper-partisan media collaborate in the co-creation of stories that buttress existing frames and narratives.

Eventually the Sonoma Ballots narrative would reach the account of mega influencer Donald Trump Jr., President Trump's son, who retweeted Schaffer's original tweet about 10 hours after it was first posted. The verified account of @DonaldJTrumpJr, which had over 5.6M followers at the time, was a noted "repeat spreader" of misleading voter fraud claims (Kennedy et al., 2022), often acting as an accelerant rather than a catalyst, amplifying and sustaining an already-viral claim.

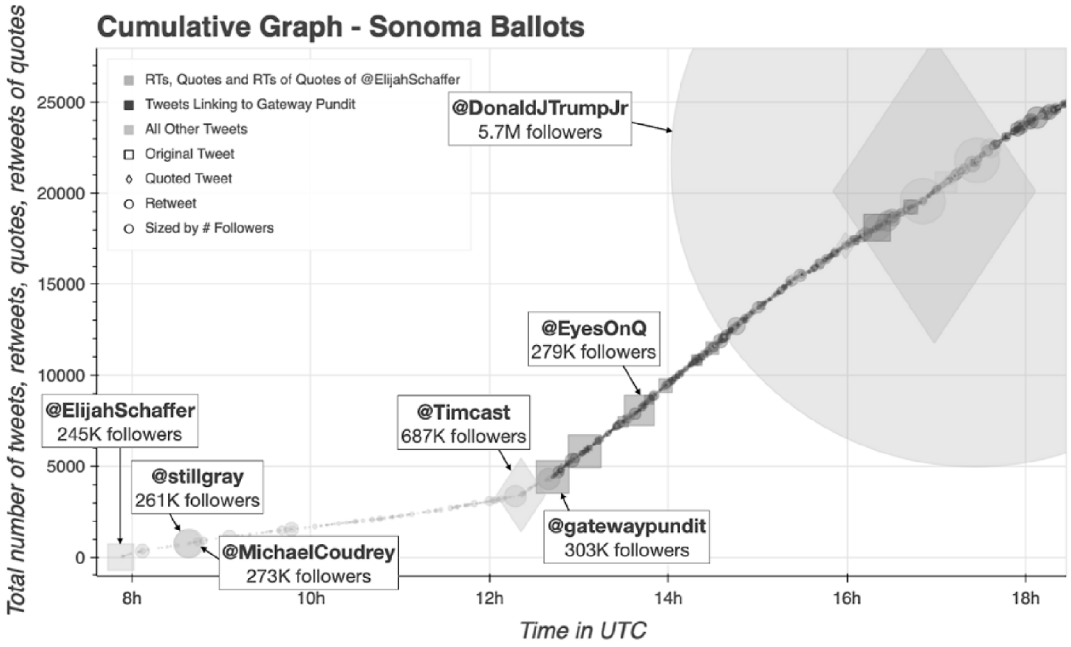

Figure 5. Cumulative graph of Sonoma Ballots tweets. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>10,000 followers) are plotted, sized by follower count. The view is focused on the first 10 hours of propagation (aligned with the grey box in Figure 4).

Figure 5, a graph that shows both the cumulative spread of the narrative and the position of specific tweets within that spread, reveals a progression from micro- to meso- and eventually to mega-influencers. Early amplifiers include the verified accounts of pro-Trump influencer Ian Miles Cheong (@stillgray) and entrepreneur Michael Coudrey. Both figures repeatedly tweeted misleading claims about election fraud.

Another notable account is @Timcast, a micro-media journalist whose work has found increasing traction with right-wing audiences. His tweet precipitated a surge around 12:20 UTC. That surge was also assisted by @EyesOnQ, a now-suspended account that gained influence through tweets about the QAnon conspiracy theory. After @EyesOnQ's tweet, a large number of micro-influencers (accounts with 10-250K followers) helped to sustain the spread of this narrative. Strikingly, 32% of all Sonoma Ballots tweets, including six of the top-10 most-

retweeted tweets, were posted by now-suspended accounts. Suspensions are especially concentrated among the micro-influencers group. Both trends persisted across our case studies.

The Sonoma Ballots controversy occurred primarily on Twitter. After an official correction by Sonoma County and enforcement action by Twitter, engagement with the rumor faded dramatically. However, claims persisted on the Gateway Pundit and experienced a brief second life on Facebook a few days later.

6.0 Case 2: SharpieGate

Our second case study, SharpieGate, encompasses several claims that were woven together to form a false "voter fraud" narrative, exhibiting bottom-up and top-down dynamics, and demonstrating the roles of several different kinds of influencers.

SharpieGate's core assertion was that Sharpie pens given to in-person voters on Election Day were bleeding through ballots (true) and that this bleed-through was causing ballots to be rejected (misleading; these ballots were rarely rejected), thus disenfranchising those voters (false, rejected ballots were counted using alternative methods). According to officials (Citizens Clean Elections Commission), Sharpie pens were recommended for in-person voting in certain locations (including Arizona), because they dry faster than ink pens, which can smear vote-reading devices. Unfortunately, many voters — and others who joined the online chorus of voices about this case — may have genuinely misunderstood this electoral process.

SharpieGate unfolded in five distinct stages.

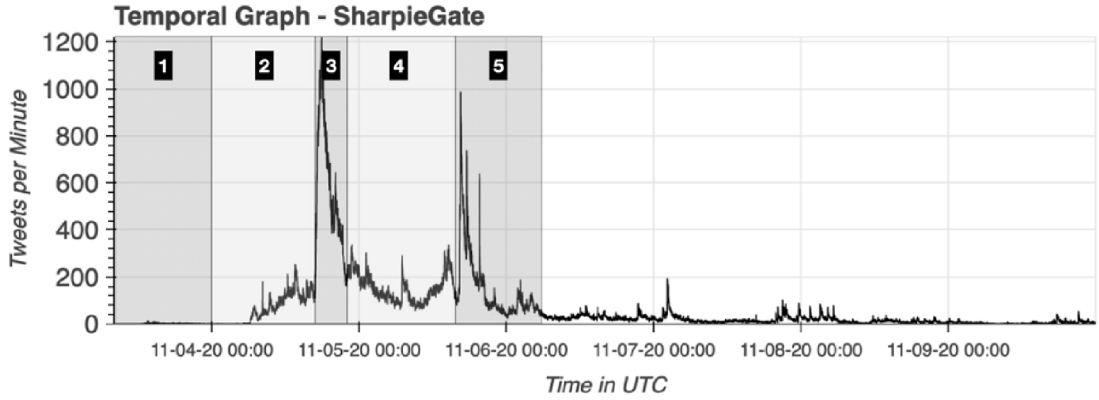

Figure 6. Temporal graph of tweets related to SharpieGate. Shaded areas indicate the five stages: 1) collective sensemaking; 2) development of the voter fraud narrative; 3) viral spread through macro/mega influencers; 4) correction by mainstream media; 5) resurgence among partisan media with connection to the broader election fraud meta-narrative.

6.1 Stage 1: Sensemaking and Motivated Amplification

On Election Day, the earliest wave of voter concerns about Sharpies occurred in Chicago. At 6:31am local time, a low-follower Chicago voter of indeterminate political affiliation tweeted

concern that his precinct's ballot reader struggled with his Sharpie-marked ballot. His tweet received no engagements.

Thirty minutes later, a conservative media personality in Chicago, @AmyJacobson (22.5K followers, a nano-sized audience), echoed concern about Sharpies and encouraged voters to bring their own pens. Later in the day, Jacobson's tone grew more alarmist, quoting her original tweet and adding that ballots were being placed in a BOX.

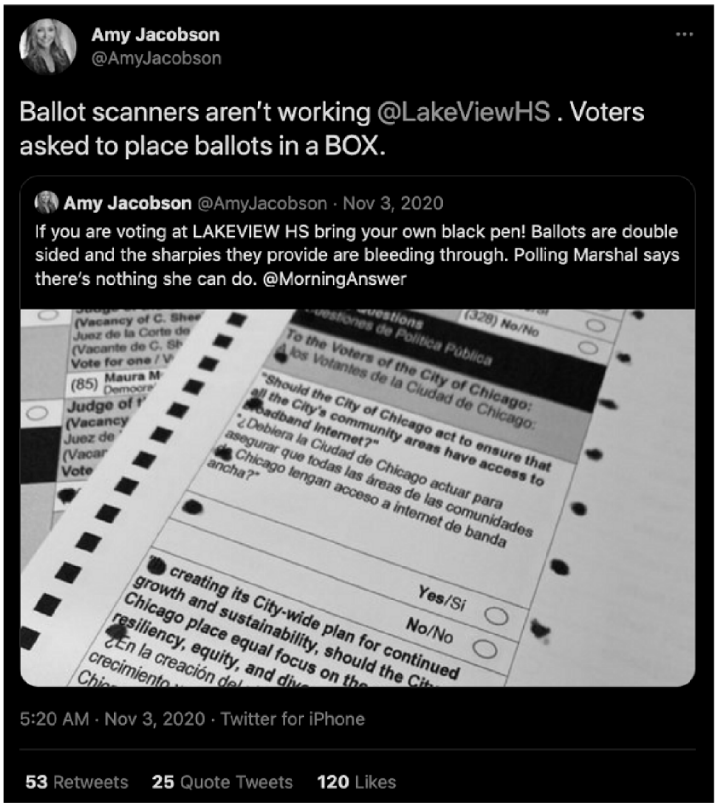

Figure 7. Jacobson's two tweets about Sharpies bleeding through ballots in Chicago.

Jacobson's tweets were highly retweeted and quoted (578 amplifying engagements), constituting 46% of all Sharpie-related tweets on Election Day. Quote tweets became an escalatory vector. Several users explicitly framed Jacobson's tweet as evidence of voter suppression or voter fraud. Others attempted to trade up — calling attention to large-following, pro-Trump accounts by mentioning their handles alongside claims about Sharpies and fraud.

Though most tweets about Sharpies on Election Day focused on Chicago, a parallel conversation was emerging in Arizona. The first tweet to connect Arizona and Sharpies was posted at 14:17 UTC (7:17am AZ time, minutes after the polls opened) by an account with ~3K followers:

```
Electioneering? Our policing location provided sharpies to mark our ballots,
which bled through. It didn't affect the back side, BUT there were plenty of
stray marks. Several of us complained, the poll workers shrugged their
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shoulders. <embedded image of a ballot with bleed-through from the backside and a Trump vote on the frontside>

The tweet was posted as a reply to a highly-retweeted (>8.5K) thread, initiated by a columnist at partisan outlet Newsmax, that became a site for aggregating right-wing claims about Election Day issues. The AZ reply tweet shared a similar narrative to Jacobson's: accusing poll workers of indifference to Sharpie bleed-through. The leading question of "Electioneering?" implied that Sharpies may have intentionally disenfranchised voters. The embedded image contains a clearly marked Trump vote, signaling to its audience the assumed target of this potential conspiracy.

This first tweet about Sharpies in Arizona saw limited engagement (19 retweets). Less than ten minutes later, another established account (1.7K followers) tweeted out a warning, seemingly motivated by legitimate concern, to voters to bring their own pens. That tweet got more traction, with 140 amplifying engagements. Overall, however, the numbers remained small — those two tweets constituted most of the Arizona-related spread of Sharpie claims on Twitter on Election Day. Throughout the day, @MaricopaVote (the official account of the Maricopa County election department) and several local, meso-sized traditional media outlets in both Arizona and Chicago attempted to fact-check the claim, but received very little amplification on Twitter.

Facebook hosted parallel conversations about Sharpies around the same time. At 15:15 UTC (8:15am AZ time), a Republican party official posted an image encouraging voters in Maricopa county to bring their own pens to the polls, receiving 39 engagements and 10 shares. At 21:50 UTC (2:50pm AZ time), a Republican candidate for office in Maricopa county incorrectly asserted that ballots were being "canceled" due to Sharpie pen use. The post received 70 comments, though the conversation was localized — primarily people from Arizona sharing their own experiences with a tone of concern and/or anger.

6.2 Stage 2: Development and Growth of the Voter Fraud Narrative

As the polls closed, conversation around Sharpies simmered. Online warnings to voters to bring their own pens had led to clashes within polling places as poll workers attempted to distribute county-provided Sharpie pens. At 3:52 UTC on November 4 (8:53pm AZ on November 3), a right-wing political activist in Arizona posted a Facebook video featuring a woman claiming election officials were forcing people to use Sharpie pens and causing invalidated votes, tying the woman's claims to a larger conspiracy against Trump voters. The video has accumulated over 4M views and 27,000 engagements on Facebook. Though we cannot determine when those views and engagements occurred, the post received over 100 comments in the subsequent 24 hours, including many from people in AZ who voted with Sharpies and expressed anxiety about whether their vote had counted. One asked the original poster to make the video shareable — which he did at 4:01 UTC (9:01pm AZ time).

About an hour after the Facebook video was posted, at 5:20 UTC (10:20pm AZ time), Fox News declared Biden the winner of Arizona. The conversation around Sharpies on Twitter, which had gone silent after the polls closed, began to revive shortly thereafter (Figures 6 and 8). Between 06:00 and 17:00 UTC, the tweet rate increased steadily and the narrative began to converge upon explicit accusations of voter fraud.

The first prominent tweet in this surge made an explicit claim connecting Sharpies to Democrat-driven voter fraud in Arizona:

Tweet 2a: (2020-11-04 06:14) Poll workers in Maricopa County AZ were handing out sharpie markers knowing full damn well that the machines register ONLY ink ballots. FRAUD IN ARIZONA. Dems are so desperate

The account that posted this tweet, an unverified micro-influencer with 41.5K followers, was operated by a conservative activist. The tweet received 1932 amplifying engagements — gaining momentum through retweets and quotes from pro-Trump, #MAGA, and QAnon networks — and was still accelerating when Twitter suspended the account at 08:15 UTC (1:15am AZ time).

The election night Facebook video reached Twitter around the same time as Tweet 2a, initially within textual posts echoing its claims, then within (674) tweets linking to the video on Facebook. Eventually users embedded the video directly into tweets. The first highly-retweeted tweet with the embedded the video was posted by an unverified micro-influencer who has since been suspended from Twitter:

Tweet 2b: (2020-11-04 06:43) They gave Trump voters sharpies and now their votes are being invalidated! WTF! <embedded video>

That tweet was retweeted 18,268 amplifying engagements. One quote tweet was from an unverified low follower account of a person in Arizona:

Tweet 2c: (2020-11-04 06:50) AZ Breaking news. Voters were intentionally given Sharpie pens for their ballots so it would cancel their votes in Gilbert and Queen Creek. @PressSec As I've said 100s of times, AZ has a massive voter fraud problem every single election. SOMEBODY LISTEN PLEASE!!!!
<Quote tweet of 2b>

This tweet was retweeted 8941 times and quoted 1461 times. Over the next few hours, the tweet's author traded up on the claim, attempting to reach more influential accounts — including @kelliwardaz (Kelly Ward, chair of the Arizona Republican Party), @PressSec (then Press Secretary Kayleigh McEnany), and a now-suspended high-follower QAnon account. The tweet record suggests the author of this highly viral quote tweet was legitimately concerned about the issue. Hours later, she noted that she deleted her previous tweets after reading a correction from a local news website quoting the Maricopa County elections department.

Altogether, retweets and quotes of just five tweets constitute half of the growth in the SharpieGate narrative that takes place in Stage 2. Interestingly, three of these tweets originated from unverified, low-follower accounts, while the other two originated with unverified micro-influencers that have since been suspended from Twitter. All but one of the tweets' authors had markers in their profile indicating support for conservative politics generally or President Trump specifically, suggesting that the authors were, at least in part, politically motivated to share this content. Amplification during this time occurred, primarily, through Trump-supporting accounts with nano-, micro-, and a few macro-sized audiences — including some verified accounts. Of particular note is the role of mega influencer @charliekirk11. Kirk is the founder and president of Turning Point USA, a conservative political organization and a "repeat spreader" of false and misleading claims of election fraud in 2020 (Kennedy et al., 2022). Between midnight and 17:00

UTC on November 4, as the SharpieGate narrative began to gain steam, Kirk posted two SharpieGate related tweets — a quote tweet of Tweet 2a and a retweet of Tweet 2c.

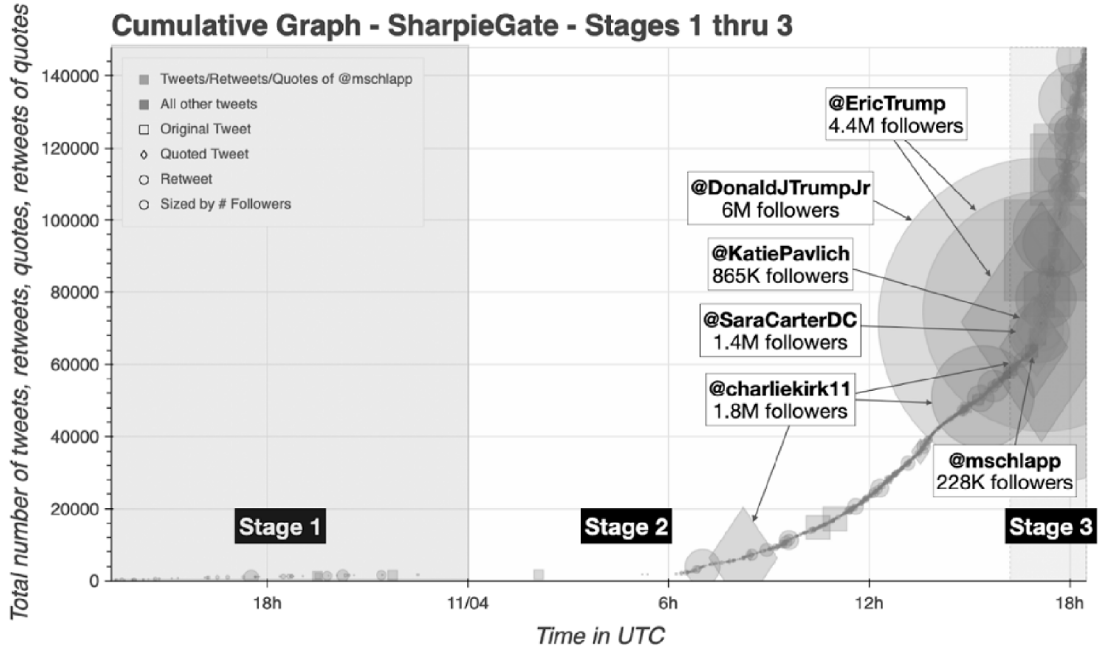

Figure 8. Cumulative graph of Stages 1-3 of SharpieGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored red if they are tweets, retweets, or quote tweets of @mschlapp.

6.3 Stage 3: Mass Amplification by Conservative/Pro-Trump Infuencers

On the day after the election, between 17:00 and 18:30 UTC, the #SharpieGate narrative began to "go viral" on Twitter — moving through a series of accounts with meso-, macro- and mega-sized audiences and garnering more than 80K tweets in an hour and a half, receiving more amplification during that interval than in the preceding 24 hours combined. Figure 8 reveals that the surge was, in part, catalyzed by the following tweet from conservative operative Matt Schlapp:

@mschlapp (2020-11-04 16:51) AZ update: apparently the use of sharpie pens in gop precincts is causing ballots to be invalidated. Could be huge numbers of mostly Trump supporters. More to come

The tweet — which couched the claims about Sharpie pens in uncertainty — received 15,242 amplifying engagements, echoing through the accounts of macro- and mega-influencers and media accounts including Fox News contributor @SaraCarterDC, conservative news outlet TownHall's editor @KatiePavlich, and President Trump's sons, @EricTrump and @DonaldJTrumpJr. Schlapp served as an influencer's influencer, helping to move the

developing conspiracy theory from its origins in lower follower accounts into the awareness of massive influencers in hyper-partisan media and within the Trump campaign.

Other accounts with highly quoted and retweeted tweets at this time include Charlie Kirk who posted another quote tweet asking “What’s going on here?”, conservative author @DineshDSouza (1.8M followers) who similarly asked “What’s this I’m hearing about Sharpies?”, the founder of “Students for Trump” @RyanAFournier (1.1M followers), and Arizona GOP congressman @DrPaulGosar (49K followers).

6.4 Stage 4: Fact-checking by Mass Media Accounts

At the end of State 3 and through the beginning of Stage 4, a series of attempted fact-checks of the SharpieGate narrative emerge — first by mega-sized accounts such as anti-Trump political pundit @gtconway3d, BlackLivesMatter activist @deray, and left/center-left media outlets @thedailybeast, @BuzzfeedNews, and @ViceNews, and subsequently by mass media outlets with mega-sized audiences such as @ABC, @HuffPost, and @WashingtonPost. Following common patterns in online rumoring (e.g. Maddock et al., 2015), these corrective tweets were not highly retweeted (relative to those pushing the misleading claims), but instead accompanied a decrease in engagement around the narrative.

However, persistent chatter remained headed into the second day following the election — mostly retweets of viral tweets posted earlier.

6.5 Stage 5: Conservative Macro- and Mega-Influencers Drive a Resurgence

On Twitter, another resurgence of SharpieGate occurred on November 5 at 16:20 UTC, precipitated by this tweet from Fox News host Maria Bartiromo, a macro-influencer with 850K followers:

```
@MariaBartiromo (2020-11-05 16:20):
-4am dump/Wisconsin 65,000 votes 100% for Biden
-4am dump/Michigan 138,499 votes 100% 4Biden
-AZ poll workers forcing voters to use sharpies thereby invalidated ballots
-Trump leading in GA, NC, PA, WI, MI & they stop counting" before the vote
fairy visits overnight...
```

Maria’s tweet pulled together four different claims about voting irregularities into a single post, situating the SharpieGate claims within the broader “election fraud” narrative. Interestingly, her post hinted towards conspiracy without providing a coherent theory. The tweet spread widely immediately, but accelerated about ten minutes later when it was quote-tweeted by @EricTrump, who explicitly articulated the “fraud” framing and issued a call to action to the FBI and DOJ.

Bartiromo’s tweet was quoted by several other verified, high-follower accounts in the conservative and pro-Trump media sphere, including conservative activist and president of Judicial Watch @TomFitton and Trump-supporting lawyer @RudyGiuliani; and retweeted by @DonaldJTrumpJr, Trump lawyer @JennaEllisEsq, and former GOP Speaker of the House @NewtGingrich. Bartiromo’s tweet generated a surge of ~25K SharpieGate tweets in its first hour and eventually received 67K amplifying engagements.

In subsequent days, #SharpieGate faded and merged into other controversies, evolving into one among many substantiating claims for the #StopTheSteal movement's meta-narrative of a stolen election. The pattern of its bottom-up emergence, elite propagation, and unheralded decline would repeat itself in new theories to come — including MaidenGate (CIP et al., 2021).

7.0 Case 3: MaidenGate

The MaidenGate conspiracy asserted that fraudulent Biden votes were cast in swing states using women's prior legal ("maiden") names. This theory, which supported the larger meta-narrative of the stolen election, emerged as a direct result of agitation by online political influencers — and especially the work of one particular user (L, a pseudonym). The majority (70%) of all tweets about MaidenGate were retweets, quote tweets, or mentions of @L (see Figure 9 below). At the time, L was an aspiring political micro-influencer (unverified, 86K followers).

The digital record indicates that L had been active across several platforms, successfully working to gain followers for months prior to the election. At the beginning of the COVID-19 pandemic, @L had only 345 Twitter followers. She styled herself a "data analyst" and authored a political blog. Her earliest articles discuss rumors about the origins of the coronavirus, including conspiracy theories about Bill Gates' alleged involvement. Over the summer, @L focused on the Epstein trial; in October 2020, she investigated Hunter Biden. During this time, her account grew to the level of micro-influencer.

Between November 4-10, @L posted hundreds of tweets highlighting perceived issues with the election and promoting the meta-narrative of voter fraud. Many were retweets of conservative and pro-Trump influencers, including several who have appeared in this paper's earlier case studies, including @TomFitton, @stillgray, @JackPosobiec, and @DonaldJTrumpJr — along with others including conservative mega-influencer @michellemalkin, and multiple retweets of @realDonaldTrump. Her original tweets (131) received some engagement (7730 retweets) during this time — but none from verified meso, macro or mega influencers (>100,000 followers).

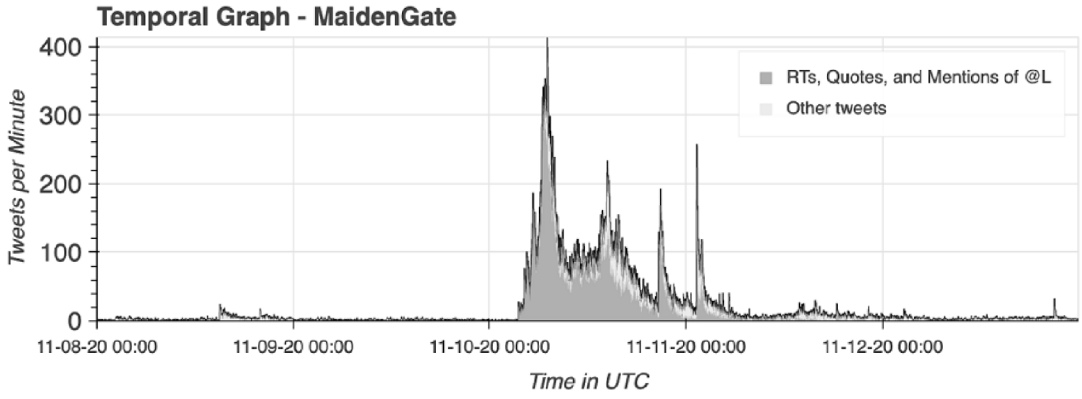

Figure 9. Temporal graph of #MaidenGate. Total tweets per minute in black. Tweets per minute retweeting, quoting, or mentioning @L shaded in tan.

On November 10, @L posted a flurry of tweets that ignited the MaidenGate conspiracy theory:

Tweet L1: (2020-11-10 03:30): My mom literally got her vote stolen in Michigan (they moved) and she JUST NOW THOUGHT TO TELL ME ABOUT IT. FRAUD! VOTER FRAUD AND I CAN PROVE IT BITCHES.

Tweet L2: (2020-11-10 03:36): All I can say while I'm getting this together…IF your parents lived in a different state and IF there was a legal name change that happened before they moved, CHECK THEIR VOTER STATUS. Her legal name changed as they moved. MOTHERFUCKERS

The tweets, which explicitly claimed fraud, received about 600 amplifications over the next 45 minutes. Meanwhile, @L posted a steady stream of tweets related to this and other election concerns, including a reply to mega-influencer and political pundit @michellemalkin (2.2M followers). Next, @L followed with a call to action:

Tweet L3: (2020-11-10 04:15): Okay. Here's what I need you to do. If you are registered to vote and have had a legal name change, check the states you have been registered to vote in under your old name and check the registration and vote status. This is so super important.

Engagements with @L's tweets accelerated rapidly, generating 30,000 amplifying engagements in the subsequent hour. Within ten minutes, @L's tweet was retweeted and quote-tweeted by a series of established accounts and micro-level influencers. A few of these accounts attempted to trade up to more influential accounts, tagging (among others) @stillgray and verified right-wing mega-influencer @JackPosobiec.

@L began to retweet and quote-tweet others who replied to her tweets claiming that they or someone they know encountered additional registrations in their name. Soon another micro-influencer (unverified, now suspended) began to collaborate with her, amplifying replies with similar stories. This collaborative work of collecting and amplifying other similar stories continued throughout the MaidenGate discourse.

Less than an hour after her first tweet and minutes after her call to action, @L's claims started to gain traction among micro- to macro-influencers — and eventually mega-influencers. At 4:24 UTC, meso-influencer @TheLaurenChen, host at hyper-partisan BlazeTV, retweeted @L's call to action. Shortly thereafter, meso-influencer @stillgray, who had been tagged into conversation minutes earlier, posted a series of quotes and retweets of @L. At 5:02 UTC, mega-influencer @michellemalkin, who @L had tried to interact directly with earlier, posted the first of two quotes and two mention tweets promoting @L and her work. GOP congressman @DrPaulGosar, who had helped amplify #SharpieGate and whose follower count had grown considerably through his #StopTheSteal tweeting, quote-tweeted one of @L's calls to action. At 6:24 UTC, conservative activist @charliekirk11, who had also helped amplify #SharpieGate, joined the echo of voices with his signature "just asking questions" style, quoting @L. At this point, L's tweet — and the #MaidenGate conspiracy theory — was going viral. Eventually it spread through more than 140K tweets.

As @L promoted her investigation on Twitter, her follower count grew — from 86K at the time of her first tweet to 114K about 13 hours later. As @L and her claims gained visibility, conservative activist and meso-influencer (150K followers) Ali Alexander, a founder of the Stop the Steal

movement, joined @L in her efforts. At 6:53 UTC, he tweeted that he was “looking into @L's #MaidenGate” and later confirmed via tweet that he and @L had spoken. At this point, #MaidenGate became connected to the emergent #StoptheSteal movement — both through the collaborative, but not necessarily coordinated, public sharing of related content; and through concerted organizing and shared infrastructure between influencers associated with both.

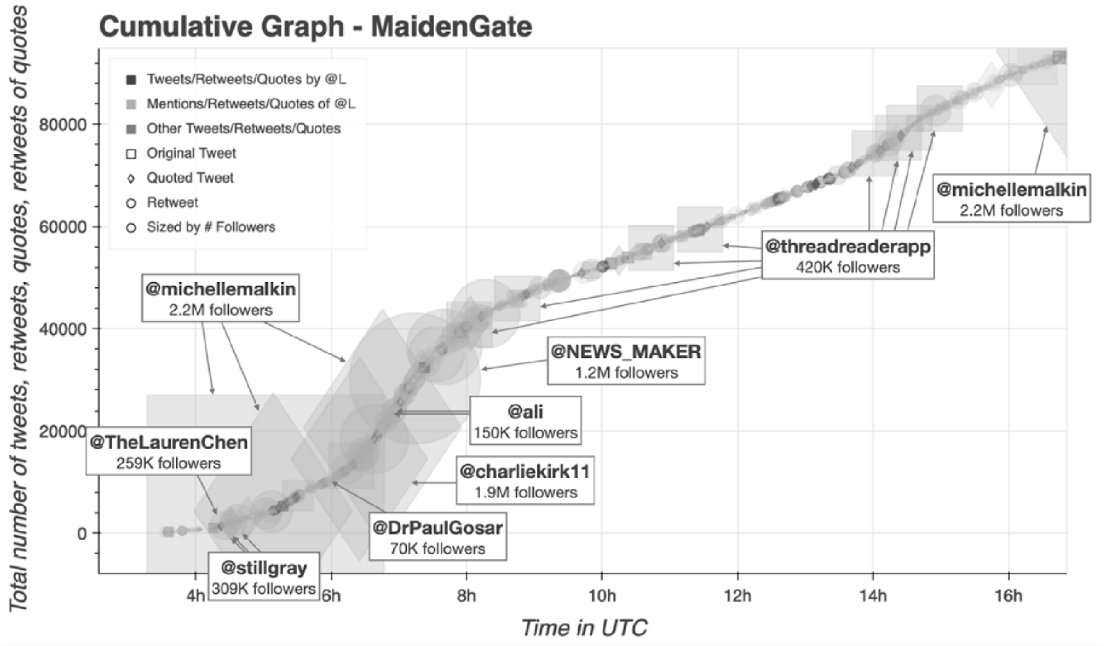

Figure 10. Cumulative graph of the initial development of MaidenGate. The Y-axis represents the total number of tweets. The X-axis is time. Individual tweets of influencers (>20,000 followers) are plotted, sized by follower count. Tweets are colored purple if posted by @L and tan if they are mentions, retweets, or quote tweets of @L.

7.2 Building a Conspiracy Theory across Platforms

As the #MaidenGate conspiracy theory developed, proponents turned to other platforms — including Parler, YouTube, Facebook, Periscope, and Google Docs — to amplify and collaborate. Alexander hosted a Periscope livestream of @L’s accusations. Like other savvy influencers, he couched the claims in uncertainty while building anticipation: “We don’t know the top of this. This is either a small problem, or it’s a problem that will shake America to the core.” His broadcast got 41,000 viewers, helping to carry the #MaidenGate claims over to Alexander’s growing audience of political activists tuning into his #StopTheSteal livestreams.

Shortly afterwards, Alexander’s team created a Google Document to consolidate information around the ongoing “investigation.” The sheet offered detailed advice for filing complaints about potential voter fraud using one’s maiden name, providing links to voter registration websites in dozens of states. Its watermark read “stopthesteal.us”, demonstrating how the #MaidenGate conspiracy was able to tap into broader #StopTheSteal infrastructure formed over the preceding days. It was shared on Twitter, Parler, and Facebook.

No evidence emerged to substantiate @L's core accusations — that someone had cast a vote in her mother's maiden name or that there was a systematic effort to conduct voter fraud through maiden names. By evening November 10th UTC, Twitter announced it was monitoring the narrative and YouTube appended an information panel to #MaidenGate videos. After gaining nearly 30,000 followers (32% growth in thirteen hours), @L was suspended by Twitter. Within a few days, the #StopTheSteal movement moved onto formulating other theories based on other "evidence." #MaidenGate faded into the background.

8.0 Discussion: The Dynamics of Participatory Disinformation

We set out to explore questions about the dynamics of online disinformation — particularly whether disinformation around the 2020 U.S. Election was primarily top-down (moving from elites to their audiences) or bottom-up (moving from audiences to elites). Previous work by Benkler and colleagues (2020) suggests that top-down dynamics, primarily from mass media on the political right, drove the spread of disinformation targeting the mail-in balloting process. Our work, which looks to the social media record to understand how specific narratives within the broader campaign developed and spread, complicates that view. In all three cases presented here, we can see both top-down and bottom-up dynamics, underscoring that disinformation around the 2020 election was *participatory* and took shape as collaborative efforts between political elites, hyper-partisan media, social media influencers, and online audiences.

These findings challenge the framing of disinformation campaigns as either top-down or bottom-up, mass media-driven or social media-driven. Instead, we find something more akin to Chadwick's (2017) conceptualization of political organizing within a hybrid media system where political frames take shape and spread through elite-activist newsmaking "assemblages" across traditional and social media. Political influencers both mediate and shape these efforts, acting as "opinion leaders" (Katz & Lazarsfeld, 1955) that frame information from elites to online audiences, and promote online audiences back to the elites in a "multi-step flow" process incorporating conversation starters, active engagers, influencers, network builders, and "information bridges" (Feng, 2016). This view aligns with previous research on participatory propaganda (Wanless and Berk, 2017) and the collaborative nature of online disinformation (Starbird et al., 2019) — and provides insight into how "unwitting agents" (Bittman, 1985) become not just amplifiers but also producers of strategic narratives within disinformation campaigns.

In addition, we suggest that *improvisation* might be a useful framework for understanding the joint construction of conspiracy theories in the 2020 election. Neither uncoordinated nor scripted, improvisation requires shared purpose — in this case, expectations set by elites that the election was fraudulent and that evidence for that fraud can therefore be identified — but also spontaneity and adaptation.

8.1 Top-down and Bottom-Up: Setting and Fulfilling Expectations of Voter Fraud

There is no doubt that "elites" in media and politics helped seed all three of the narratives explored here — a **top-down** dynamic. Elites repeatedly invoked the prospect of a "rigged

election," setting an expectation of voter fraud among pro-Trump audiences, then synthesized evidence that emerged from the online audiences who rose up to fulfill that expectation. However, to enact those narratives, **bottom-up** participation was required: conspiracy theorizing is a collaborative endeavor, and in each of our case studies we observe groups of low-follower accounts and unverified aspirational influencers collaborating with verified meso- to mega-influencers and "media-of-one" micro-outlets to construct and propagate narratives.

In Sonoma Ballots, journalists at partisan media outlets launched the narrative based on photographs supplied by one of their readers, and all seemingly believed that they had uncovered genuine evidence of ballot fraud. In SharpieGate, after encouraging voters to visit the polls to uncover voter fraud (top-down), the Trump campaign helped to elevate (bottom-up) the particularized conspiracy theory generated from the evidence gathered. In MaidenGate, Trump supporters looking for evidence to contest the election seized upon scattered reports that some voters remained registered under previous names in other states, and — with the help of the #StopTheSteal campaign's mobilizing infrastructure — assembled those reports into a theory of voter fraud. In each case, elites established expectations that non-elites endeavored to corroborate; when non-elites uncovered new "evidence" or wove together a new theory, elites moved quickly to amplify it. In this back-and-forth motion of evidence-gathering and consolidation of that evidence, conspiracy theories took form.

Mediating this bidirectional (top-down, bottom-up) information flow, is the **political influencer**, a figure of liminal identity — neither traditionally "elite" nor pedestrian, capable of influencing online crowds precisely because they disclaim the elite markers that would differentiate them from those crowds. While no model can completely capture the influencer's role, the "two-step flow" theory provides a productive lens (Katz & Lazarsfeld, 1955). That theory contends that "opinion leaders" contextualize and represent content from mass media to audiences from whom they command trust. Building upon Feng (2016), we suggest that, in the omnidirectional information flows of the social media age, influencers perform a similar mediating role: they both transmit mass media information to audiences who trust them for their authenticity, and redirect "evidence" from those audiences back to the elites whose influence they aspire to recreate. By taking claims from the periphery of a network and moving them into the center, increasing awareness first within their community, and then, via pick-ups from other influencers, they facilitate the spread of a message across communities toward mass awareness (Centola, 2021).

8.2 Improvisation and Infrastructure in Participatory Disinformation

As we look deeper into this collaborative production, especially at the role of audiences and influencers in not just amplifying but producing misleading narratives for participatory disinformation campaigns, one useful lens is that of improvisation. An improvisation can be thought of as a performance by a group of individuals around a shared goal (Crossan, 1998). Researchers have studied improvisation in a wide range of contexts, for example among jazz performers (Crossan et al., 1996) and disaster responders (Mendonca et al., 2001, Kendra and Wachtendorf, 2007). Here, we conceptualize participatory disinformation as improvisation, through three performances that took shape around the shared goal of providing evidence to fit the "voter fraud" theory.

Improvisation requires structure (Crossan, 1998), at minimum a shared understanding of a loose set of "rules" that guides actions. Across the three performances, we see that shared

understanding grow and those rules become more clear — i.e. identify potential issues with voting, gather evidence to support a view of that issue as systematic and part of a larger "voter fraud" conspiracy, draw attention from influencers who can amplify the concern to broad audiences, organize people with evidence to file affidavits, repeat. With MaidenGate, we see the performance tap into the existing infrastructure of the #StopTheSteal movement — building on top of the networks of participants and the patterns for assembling information to fit a developing conspiracy theory.

Across the cases, different sized influencers took on different roles. Low-follower and established accounts shared their own experiences. Micro-influencers amplified the experiences of others and helped move content up the chain. Meso- and macro- accounts provided the frames through which that evidence would be interpreted and assembled; many, including credentialed influencers, used well-worn rhetorical patterns such as "Big, if true" to reputationally hedge while amplifying. Mega accounts, often credentialed with visible platform-issued badges, amplified the content to vast audiences.

In the case of Matt Schlapp, a long-time political operative performed an old script — galvanizing outrage to attempt to contest an election that went against his party. But new roles can also develop through the course of a performance (Medler & Magerko, 2010), and we see that here, for example with @L assuming the role of organizer for MaidenGate claims. As Crossan writes, "A key characteristic of improvisation is that individuals take different leads at different times" (1998, p 596), and this can contribute to the sense of shared ownership for the performance, and a stronger sense of belonging to the group. Beyond the reputational gains accrued as followers through the course of their participation, that sense of belonging may be an essential part of the feedback loop that motivates and sustains participatory disinformation.

Though this view of disinformation as participatory and improvisational, and especially its reliance upon the participation of "unwitting" audiences of motivated-but-sincere believers, underscores the challenge for social media companies and regulators of mitigating harmful disinformation (e.g. while protecting commitments to free speech), it also suggests a potential pathway forward in addressing the activities of micro- to mega-influencers, including credentialed (platform-verified) users, who repeatedly play a role in motivating, guiding, and amplifying those audiences.

8.3 Limitations

This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.

9.0 Conclusion

This paper provides insight into the top-down and bottom-up dynamics of the participatory disinformation campaign to undermine trust in the 2020 election — a campaign characterized less by coordination than by cultivation and improvisation. Elites in politics and partisan media (including the President himself) pushed a meta-narrative of systematic voter fraud and set the

expectations of voter fraud for their audiences. With help from an array of influencers — from hyper-partisan journalists and media outlets, activists, political operatives, and members of the Trump campaign — those audiences assembled the evidence, sometimes through misinterpretations of their own experiences, to produce the false and misleading narratives that sustained this campaign. These findings contribute to a more nuanced understanding of how participatory disinformation campaigns take shape through the collaborative work of online crowds and political operatives.

10.0 Acknowledgements

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11.0 Funding Acknowledgements

Anonymized for review.

12.0 References

Bastos, M., & Farkas, J. (2019). “Donald Trump is my President!”: The internet research agency propaganda machine. *Social Media + Society*, 5(3), 2056305119865466.

Benkler, Y., Tilton C., Etling B., Roberts H., Clark J., Faris R., Kaiser J., and Schmitt C. (2020). Mail-in voter fraud: Anatomy of a disinformation campaign. Berkman Center Research Publication, (2020-6).

Bittman, L. (1985). *The KGB and Soviet disinformation: An Insider's View*. Washington: Pergamon-Brassey's.

Center for an Informed Public, Digital Forensic Research Lab, Graphika, & Stanford Internet Observatory (2021). The Long Fuse: Misinformation and the 2020 Election. *Stanford Digital Repository: Election Integrity Partnership*. V1.3.0. https://purl.stanford.edu/tr171zs0069

Centola, D. (2021). Influencers, Backfire Effects, and the Power of the Periphery. *Personal Networks: Classic Readings and New Directions in Egocentric Analysis*, *51*, 73.

Chadwick, A. (2017). *The hybrid media system: Politics and power*. Oxford University Press.

Charmaz, K. (2014). *Constructing grounded theory*. Sage.

Citizen Clean Elections Commission. *Official Information Regarding the Use of Sharpies in Maricopa County.* AZ Clean Elections. https://www.azcleanelections.gov/election-security/sharpies

Crossan, M. M., White, R. E., Lane, H. W., & Klus, L. (1996). The improvising organization: Where planning meets opportunity. *Organizational dynamics*, *24*(4), 20-36.

Crossan, M. M. (1998). Improvisation in action. *Organization Science*, *9*(5), 593-599.

Geiger, R. S., & Ribes, D. (2011, January). Trace ethnography: Following coordination through documentary practices. In *2011 44th Hawaii International Conference on System Sciences* (pp. 1-10). IEEE.

Feng, Y. (2016). Are you connected? Evaluating information cascades in online discussion about the# RaceTogether campaign. *Computers in human behavior*, *54*, 43-53.

Gillmor, D. (2006). *We the media: Grassroots journalism by the people, for the people*. " O'Reilly Media, Inc.".

Goodwin, A., Joseff, K., & Woolley, S. C. (2020). Social media influencers and the 2020 US election: Paying 'regular people' for digital campaign communication. *Center for Media Engagement*.

Jack, C. (2017). Lexicon of lies: Terms for problematic information. *Data & Society*, *3*(22), 1094-1096.

Katz, E., & Paul, F. (1955). Lazarsfeld, Personal Influence. *The Part Played by People in the Flow of Mass Communication". New York*.

Lukito, J. (2020). Coordinating a multi-platform disinformation campaign: Internet Research Agency activity on three US social media platforms, 2015 to 2017. *Political Communication*, *37*(2), 238-255.

Kendra, J., & Wachtendorf, T. (2007). Improvisation, creativity, and the art of emergency management. *Understanding and responding to terrorism*, 19, 324-335.

Kennedy, I., Wack, M., Beers, A., Schafer, J. S., Garcia-Camargo, I., Spiro, E. S., & Starbird, K. (2022). Repeat Spreaders and Election Delegitimization: A Comprehensive Dataset of Misinformation Tweets from the 2020 US Election. *Journal of Quantitative Description: Digital Media*, *2*.

Krafft, P. M., & Donovan, J. (2020). Disinformation by design: The use of evidence collages and platform filtering in a media manipulation campaign. *Political Communication*, *37*(2), 194-214.

Hearn, A., & Schoenhoff, S. (2016). From celebrity to influencer. *A companion to celebrity*. 194-212.

Mack, D., & Haskins, C. (2021, January 6). *Trump Supporters Breached The Offices Of Members Of Congress."* Buzzfeed News. https://www.buzzfeednews.com/article/davidmack/trump-supporters-congress-offices

Maddock, J., Starbird, K., Al-Hassani, H. J., Sandoval, D. E., Orand, M., & Mason, R. M. (2015, February). Characterizing online rumoring behavior using multi-dimensional signatures. In *Proceedings of the 18th ACM conference on computer supported cooperative work & social computing* (pp. 228-241).

Marwick, A., & Boyd, D. (2011). To see and be seen: Celebrity practice on Twitter. *Convergence*, *17*(2), 139-158.

McGregor, S. C. (2020). "Taking the temperature of the room" how political campaigns use social media to understand and represent public opinion. *Public Opinion Quarterly*, *84*(S1), 236-256.

Mediakix. "Influencer Tiers for the Influencer Marketing Industry" *Mediakix*. (October 29, 2019). Available at: https://web.archive.org/web/20220326031117/https://mediakix.com/influencer-marketing-resources/influencer-tiers/

Mendonca, D., Beroggi, G. E., & Wallace, W. A. (2001). Decision support for improvisation during emergency response operations. *International journal of emergency management*, *1*(1), 30-38.

NPR/PBS News Hour/Marist. (2021, November 1). National Poll: Trust in Elections, Threat to Democracy. https://maristpoll.marist.edu/polls/npr-pbs-newshour-marist-national-poll -trust-in-elections-threat-to-democracy-biden-approval-november-2021/

Palen, L., & Anderson, K. M. (2016). Crisis informatics—New data for extraordinary times. *Science*, *353*(6296), 224-225.

Rae, M. (2021). Hyperpartisan news: Rethinking the media for populist politics. *New Media & Society*, *23*(5), 1117-1132.

Reuters. (2020, September 29). Fact check: Photos of electoral mail disposed in California show empty envelopes from 2018, not 2020 mail-in-ballots. *Reuters.* (September 29, 2020). https://www.reuters.com/article/uk-factcheck-ballots-disposed/fact-check-photos-of-electoral-mail-disposed-in-california-show-empty-envelopes-from-2018-not-2020-mail-in-ballots-idUSKBN26K2LM

U.S. House. (2022, December). Select Committee to Investigate the January 6th Attack on the United States Capitol. *Final Report*. Available: https://january6th.house.gov/sites/democrats.january6th.house.gov/files/Report_FinalReport_Jan6SelectCommittee.pdf

Solis, B., & Webber, A. (2012). The rise of digital influence. *Altimeter Group* (2012). https://www.slideshare.net/Altimeter/the-rise-of-digital-influence

Starbird, K., Arif, A., & Wilson, T. (2019). Disinformation as collaborative work: Surfacing the participatory nature of strategic information operations. *Proceedings of the ACM on Human-Computer Interaction*, *3*(CSCW), 1-26.

Wall, M. (2015). Citizen Journalism: A retrospective on what we know, an agenda for what we don't. *Digital journalism*, *3*(6), 797-813.

Wanless, A., & Berk, M. (2017). Participatory propaganda: The engagement of audiences in the spread of persuasive communications. *David Herbert and Stefan Fisher-Høyrem (Eds.)*, 111.

Wootson, C. (2016, November 27). Donald Trump: 'I won the popular vote if you deduct the millions of people who voted illegally.'. *Washington Post*. https://www.washingtonpost.com/news/the-fix/wp/2016/11/27/donald-trump-i-won-the-popular-vote-if-you-deduct-the-millions-of-people-who-voted-illegally/

Revision Document
We thank reviewers, again, for their critiques and suggestions for improvement.

Below, we've documented our final changes to response to reviewer recommendations.

R1/R2: Revise our explanation for "why these examples" to align with the appendix and move away from representativeness.	Adjusted the three selection criteria in the Methods in the paper to align with the Appendix. Removed the sentence on representativeness. Added the following (below the case descriptions): Though not necessarily representative of all narratives, these three cases demonstrate different kinds of narratives (opportunistic amplification, collective sensemaking, and conspiracy theorizing) and reveal the participatory dynamics within this campaign.
R1/R2: Add a limitations section.	Added a limitations section: This work has several limitations. First, though the participatory disinformation campaign we analyze here spanned multiple platforms, our research relies heavily on a single platform, Twitter, and likely overlooks significant activity in other spaces. In addition, though the cases selected here are illustrative of different kinds of narratives that spread as part of this campaign and demonstrate its participatory dynamics, they may not be representative of the entire campaign.
R1: I still think the authors need to acknowledge that not all disinformation research on the 2016 elections focused on foreign interference (see e.g. Benkler et al., 2018). The easiest solution is perhaps simply to write, on page 2, "In contrast to most research" instead of "In contrast with research…"	Updated per recommendation.
R1: On page 1, the authors write: "Prior to the election, Benkler and colleagues referred to the effort to delegitimize the mail-in voting process as a "disinformation campaign" (Benkler et al., 2020). Our research builds upon and subtly challenges this framing." To me, this sounds like the authors will challenge the notion that this was a disinformation campaign. Accordingly, I encourage them to slightly revise this.	Revised to: "Our research builds upon this framing."
R2: The first is that I do feel we could still get more contribution on the theoretical side. The cases the authors present do convey very clearly	R2 had solid suggestions for additional content in the Discussion, but we are unable

how “participatory disinformation” occurred. But I wonder if the Discussion could do just a little bit more to pull it together. Maybe like a table of patterns that make up the “participatory disinformation” phenomenon.	to make those additions due to word limits. We will save that for future work.