

Journaling Privacy Harms

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Abstract—In this research proposal, I present journaling about privacy harms as a potential mechanism for transforming people’s attitudes and feelings over their privacy. I outline plans for a diary study asking people to engage in a daily guided browsing activity and record their feelings about personalized content on Instagram. Using this diary study instrument as a cultural probe, I explore how engaging in active documentation and labeling of privacy-harming experiences might motivate people to reflect on their agency over their privacy.

1. Introduction

People feel powerless and resigned over their privacy. However, although the violations people experience may seem ubiquitous or overwhelming, the individual effects of the violations are difficult to observe, so people cannot devote the time, effort, and resources to addressing them all. As recent work has described [1], [2], the term “slow violence” refers to incremental and accretive events that may be near invisible to people when they are initially experienced, but inflict significant harms when aggregated over long periods of time and across populations.

Rob Nixon, the originator of the term, suggested one antidote to slow violence: “to devise arresting stories, images, and symbols adequate to the pervasive but elusive violence of delayed effects” [3]. Human geography scholar Thom Davies has also posited “slow observation” as a direct counter to slow violence: those who live with the sustained brutality of slow violence can, over time, slowly make their own observations and construct their own deeper understandings of the violence [4]. In between these two concepts, in prior work I recommended integrating the collection and collation of people’s observations and narratives of privacy harm into their day-to-day lives [5]. In this way, we can more formally scaffold how people already go about building their understandings of privacy harm. Just as smartwatches and fitness trackers enable users to be actively engaged in their understandings of their physical health, while granting them the ability to communicate with their doctors with high-level concrete data, we might imagine that taking regular measurements of privacy harms can empower people to speak more definitively about their experiences with professional privacy advocates and policy experts.

While past work in usable privacy and security has employed diary study methods as a way to collect empir-

ical data about user S&P behaviors and feelings [6], how the methods themselves might affect those users not been extensively studied within S&P research. In particular, the demand effects of diary study methods—i.e., the tendency for study participants to over-observe events due to study participation—have often been cited as a limitation of the method [7]. In this proposed work, however, these effects are a desirable outcome. Following this logic, I plan to explore how journaling about privacy concerns surfaced by browsing on Instagram can lead to user retrospection and introspection about privacy [8], [9]. In doing so, I hope to help people develop richer folk theories of change and resistance, against the slow violence of institutional privacy harms.

2. Methodology

I will conduct a three-week diary study of 30 to 50 participants using dScout, a commonly used tool for conducting such studies. (This sample size may change depending on saturation). The questionnaires used throughout the study will feature design fiction and roleplaying elements. Before the launch of the study period, participants will be asked to imagine that there is an employee at Instagram who can see all of their activity on Instagram and influence what they see on their feed. Then, they will be asked to write a short backstory for the employee, providing a grounding character for participants’ mental models of algorithmic personalization.

During the main study period, at least four times a week, participants will complete a diary entry consisting of two parts. In the first part, participants will be asked to go through a five-minute browsing session on Instagram and record any privacy-concerning experiences from the sessions by submitting screenshots of posts they see. Specifically, they will keep the following statements in mind when taking screenshots:

- You feel like the employee was reading your mind when they put this post on your feed.
- You feel like the employee is actively watching you interact with Instagram.
- You don’t remember telling Instagram about some of the things the post refers to.
- You remember telling Instagram about the things in the post, but didn’t expect it to see it again.

These statements are inspired by Ryan Calo’s categories for defining the “boundaries of privacy harm”: subjective (i.e., the perception of unwanted observation) and objective (i.e., the unanticipated or forced use of information about a person against that person) [10].

After uploading their screenshots, in the second part of the diary entry, participants will be asked to speculate about how or why the employee “decided” to show them those particular posts. Specifically, they’ll be asked to write a brief message addressed to the employee about how they feel about being shown a particular post. They’ll be asked to consider details about how the employee decided to show the post(s)—including any data about the participant that the employee collected or used—and also how the participant thinks the employee reacted to them seeing this post. At any given point in the study, participants will be able to view the screenshots they have uploaded in the past.

Afterwards, in a post-study questionnaire, participants will be asked to re-read on the original backstory they wrote for the Instagram employee and all of the diary entry messages they wrote. They will also be shown all of the screenshots they have collected over the study period. Given this, they will be asked to reflect on how their views on (and relationship with) the employee has changed over time.

3. Evaluation

I use the deployment of the diary study as a cultural probe [11] to better envision how people’s relationships with privacy harms from Instagram change over time. In other words, the evaluation of participants’ diary entries is not necessarily whether journaling “works” to change people’s behaviors or attitudes, since demand effects of the method are already expected and likely. Additionally, there are no existing mechanisms for people to document, reason about, and interrogate their privacy issues repeatedly over time—echoing arguments from [12]—so the effects of journaling are also not clearly measurable for privacy. Rather, I hope to answer the following research questions:

- RQ1** How do users make sense of self-collected privacy harm data?
- RQ2** How does self-collection of privacy harm data influence how users engage with their mental models of algorithmic personalization?

4. Additional Topics of Consideration

- How does the format of the diary entry questionnaire influence the depth of self-reflection?
- What level of onboarding about technical terminology and concepts is necessary for “effective” or “successful” journaling?
- What are the potential negative effects of journaling about privacy harms?
- Past work has shown that presenting people with additional transparency about the personalized inferences made about them can cause privacy alarm and

awareness [13], and lead to additional speculation and critique [14]. How might these effects differ when users are the ones collecting the data?

- What does journaling about privacy harms look like at scale? What collective narratives might arise?
- What opportunities are available for incorporating principles of wellness or flourishing [15] in journaling about privacy harms?

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