

Report Summary

About

[Project Let's Talk Privacy](#) explores how the implementation of privacy and data protection policies might impact people and communities in practice. Our project title reflects our work in engaging a more diverse set of voices into conversations around privacy and data governance. How do these policies translate in practice? How might they affect us? To find out, we interviewed 41 people – including lawyers, designers, engineers, advocates, policymakers, and stewards of sensitive data (social workers, pediatricians) – about three federal draft data and privacy related bills.

Goals of the project

- Show how draft privacy policy can translate into realistic designs that people could interact with and respond to.
- Analyze and explain the impact of draft bill language and designs they inspire.
- Educate and engage the public on recent draft privacy bills and the challenges of implementing policy to practice.

Objectives

- Explore intersections of privacy policy and design through visual prototypes.
- Identify the challenges of translating policy to platform changes based on the specific background and industry skill set of the interviewees.
- Understand broader perspectives of privacy and control in technology.

Research questions

Based on the motivations outlined in the previous section, our team came together to outline our high level research questions to guide the project:

1. How do roles in various industries use and think about privacy in practice?
2. What are the strengths and challenges of various privacy bills + prototypes?
3. How do different stakeholders perceive proposed legislation aimed at modifying social media design?

Bill selection

We spoke with several privacy advocacy members, staffers in Congress, and privacy researchers about which U.S. federal privacy bills to consider that include a variety of angles of regulation. We independently conducted a review on the latest U.S. Federal public draft bills from 2018 - 2020. The sources included information from the Congressional Research Service's "[A Comparison of Privacy in the 116th Congress](#)" and the International Association of

Privacy Professionals “[US State Comprehensive Privacy Law Comparison](#).” Our team created a set of bill criteria to make our decision to choose which bills to analyze including:

1. Represent different voices in Congressional teams that have been engaged in privacy and data related legislation
2. Show a variety of different policy approaches
3. Able to be prototyped visually in some way

The [Social Media Addiction Reduction Act \(SMART Act\)](#) introduced on July 30, 2019 by Senator Josh Hawley (R-MO). This Act bans infinite scroll, autoplay, and other addictive features on social media. It also requires clear choice to consent and strengthens the powers of the U.S. Federal Trade Commission and the U.S. Health and Human Services to ban similar practices. The goal of this bill is to give people more power to monitor and control their use time on social media. **Note:** While this bill incorporated less of a “privacy” related framing and more on platform “addiction” and improving the quality time spent on platforms, we included it because it provided a different legislative approach focused on particular features (autoplay, badges, etc.) with online platforms.

The [Online Privacy Act \(OPA\)](#) was introduced November 5, 2019 by Congresswomen Anna G. Eshoo (CA-18) and Zoe Lofgren (CA-19). This Act focuses on creating individual rights (right to access, correct, or delete data), places clear obligations on companies, establishes a Digital Privacy Agency (DPA) and strengthens enforcement through state attorneys general.

The [Consumer Online Privacy Rights Act \(COPRA\)](#) introduced on November 18, 2019 by U.S. Senate Commerce Committee Ranking Member Maria Cantwell (D-WA) and fellow senior committee members Senators Brian Schatz (D-HI), Amy Klobuchar (D-MN), and Ed Markey (D-MA). This Act focuses on three major categories of efforts. First, it establishes foundational privacy rights to empower consumers. Second, it improves data security, protects sensitive personal data and supports civil rights in the digital economy. Third, the Act focuses on “real enforcement and accountability measures.”

Interviews

We conducted 41 one-on-one interviews to gather feedback, quotes, insights, and challenges based on showing our design prototypes. Interviews lasted 45-60 minutes and were conducted via phone and with accompanying prototypes that the participant was able to click through in a Google Slides document. The interviews consisted of three main parts: the summary of the bill, visual examples of some of the bill concepts, and privacy bill prototypes. Below is a sample bill summary slide and prototype that we showed to participants.

SMART Act (Social Media Addiction Reduction Technology)

- July 30, 2019
- Senator Josh Hawley (R-Mo.)

- Bans infinite scroll, autoplay, and other addictive features on social media**
 - Infinite scroll, autoplay, and "achievements" such as "Snapstreak" exploit the science of addiction to make it difficult to leave a social media platform
 - Exceptions include music playlists, social media predominantly designed to stream music, and "achievement" badges that substantially increase access to new services or functionality
 - Social media platforms would have to include natural stopping points
- Requires choice parity for consent**
 - Companies would no longer be allowed to manipulate people into consenting by making it difficult to decline consent
 - Companies would have to design "accept" and "decline" boxes using the same formats, fonts, and sizes
- Gives the FTC and HHS authority to ban other similar practices**
 - Rules would expire after 3 years unless ratified by Congress
- Gives users power to monitor and control their use time on social media**
 - Social media companies must provide an in-app tool that enables users to track the time they spend on social media across all devices and allows users to impose caps on the amount of time they spend

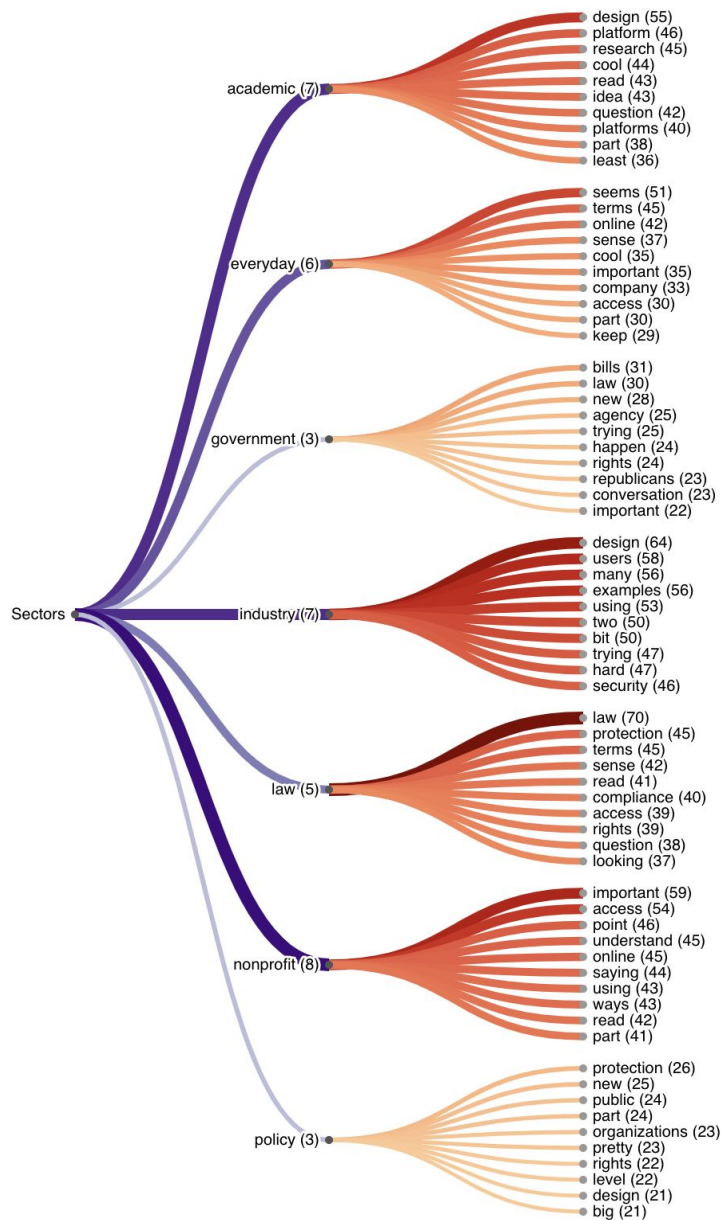
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Screen dims increasingly as timer leads to 0

6

Text analysis from interviews

The following visualization highlights the 10 most mentioned words per sector from our interviews, with the top 50 commonly used words removed. It highlights terms used within specific sectors that are not necessarily common throughout all sectors. These words may have particular meaning with a sector and/or highlight aspects that particular sectors care about in regards to privacy and policy. For example, "users" is frequently used within the industry sector indicating the impact on the individual is top of mind. This is not unique to only the industry sector. With policy and law, the word "protection" is common while in government "rights" is often used. The implication is that many sectors are thinking of people who use the technology in some capacity. They use different terminology to highlight what they are working on (design, rights, protections) on behalf of those who both benefit and are harmed by using data-collecting technology.



Recommendations for policymakers

1. Build on existing policymaking resources and processes. For all of the recommendations below, we encourage the approach of not reinventing the wheel, where possible. Processes currently exist for people to provide feedback to Congress at the federal level. For legislation, Americans can call or write to their Representative or Senator directly. Legislators also often reach out to stakeholders for feedback, but we urge increased cross collaboration and more proactive ways to reach out to communities to better understand how to effectively communicate policy to design and development.

Example: There are many existing efforts to bridge the divide between technology practice and policy. Congressional teams are hiring staffers with strong technical expertise and institutions and organizations are facilitating some of these conversations: [TechCongress](#), [The Aspen Tech Policy Hub](#), [AAAS Fellows](#), [Code for America](#), [Mozilla Fellowships](#), [New America's Public Interest Technology team](#), and many more. Congressional committees, the Congressional Research Service or the Office of Technology Assessment (if revived) may be well positioned to house staff to prototype policies.

2. Talk to stakeholders who may experience the harm first-hand and integrate their perspectives into the policymaking process. This requires gathering insights directly from individuals and/or data stewards who understand and/or have some level of lived-experience with marginalized or vulnerable communities who may be most adversely impacted by policy. In policymaking, there is a current lack of engaging individuals in policymaking today. The voice of the consumer is often heard second or third hand from reports or through advocacy organizations.

Example: Gather insights directly from individuals and/or data stewards (pediatricians, social workers, librarians) who understand and/or have some level of lived-experience with marginalized or vulnerable communities who may be most adversely impacted by policy. Rather than ask for solutions, understand the nature of their work with regard to data privacy and how policies have impacted people. They can provide concrete use cases where policies have and continue to negatively impact their communities. Policymakers and industry practitioners could also “create easy channels for advocacy and [human] rights groups to provide feedback and publicly respond to such feedback,” explains Sage Cheng, Design Lead at Access Now.

3. Continue to collaborate directly with individuals and privacy minded experts in advocacy organizations, industry, academia, and government throughout your iterative policy drafting process. This includes looping in existing contacts and branching out to different perspectives along the way.

Example: Policymakers should solicit help from industry practitioners and community advocates in designing and testing policies with low fidelity versions of prototypes —

when relevant and possible. This may allow testing policies in small, low-risk, time-boxed environments that relate to the bill's intended audience. From our research, these experts can help provide knowledge of use cases that span a variety of sectors and also point to frameworks, studies, and stories of trial and error to help advance policy work.

To assist with 2 & 3: We have created a Policy Prototyping Guide that provides a roadmap for the roles needed and the step-by-step process that policymakers can follow to pilot among their own teams and set bill drafting priorities. This guide is meant to be a framework that can be modified. Alterations in the policy research, prototyping, and drafting process may allow for better alignment of policy needs with actual outcomes.

4. Recognize the need for precision and evidence: major findings from our interviews related to the three privacy law proposals highlight a strong desire to link policy action to research and evidence.

Example: First, policymakers need to articulate the specific problems and associated harms they are trying to solve. Second, it should be clear from both the bill language and public discussion that policymakers have consulted with the research investigating the outcomes of certain restrictions or modifications to ensure that the regulations that they are attempting to create are viable. Speeches, press releases, and, more importantly, committee hearings can be better tools to highlight the research to help create the case for more viable policy recommendations.

Alterations in the policy research, prototyping, and drafting process may allow for better alignment of policy needs with actual outcomes.

5. Implement human-centered practices in the policy design process.

- a. **Broaden engagement with industry practitioners.** Policymakers should solicit help from industry practitioners and community advocates in designing and testing policies with low fidelity versions of prototypes — when relevant and possible. Summarize the bill as shareable summaries, or a one-pager—similar to a press release—and aim the messaging to industry practitioners as well as build partnerships with advocacy organizations. Doing this would force policymakers to think about practitioners as they are drafting language that may have implications on technical processes. **Note:** Condensing policy text into a “one-pager” means that nuance and details will be left out and could create unintended complications. In this case, it would be helpful to create a set of guidelines or processes for text approval in order to reduce the risk of oversimplification across policy teams.
- b. **Visualize policies to prototypes, when possible.** Work with practitioners and build capacity to design & test policies with low fidelity prototypes. Design user interfaces showing how policy may impact products and services and test with stakeholders to get

feedback. Showing key stakeholders draft bill text for comprehension is one helpful aspect, but being able to present a visual that highlights certain bill features may invoke different insights that may be helpful to reflect when drafting policy. Direct feedback about what may and may not work may produce better bill-related text.

- c. **Explore how to test policy and prototyping processes on a larger scale.** Partner with academic institutions and other organizations for beta testing to see if it is possible to test the policies in small, low-risk, time-boxed environments such as a neighborhood instead of an entire state. This “pilot” should relate to the bill’s intended audience in a way that best fits the existing structures of the team.
- d. **Continuously integrate feedback.** Collaborate with privacy-minded experts in advocacy organizations, industry, and academia throughout policy development. **See recommendation 2 & 3.**

6. Language recommendations: We recommend to consider the language and text related feedback we received upon testing 3 draft bill policies:

- a. **Strike a balance of granularity in policy language.** When policymakers use general language, such as “Duty of Loyalty” or the “Right to Impermanence,” include examples in the legislative history and common use cases of what this may mean or look like in practice when possible. This is helpful to better understand more obscure topics without anchoring policymakers to information that is too specific.
- b. **Avoid being overly specific.** If too granular, the specificity in bill language can be seen as arbitrary. For example, the SMART Act suggested that platforms “[display] a conspicuous pop-up to an individual not less than once every 30 minutes.” Respondents asked about power (“Who made the decision?”), about the rationale (“Why 30 minutes?”), and about the origin of the 30 minutes (“Where did the research from this come from?”).
- c. **Future proof language.** Definitions of key terms are incredibly helpful, but some terms, if defined, may quickly become outdated due to evolving technologies. For example, one policymaker we spoke with commented favorably on a term like “sensitive data,” which is difficult to define. A decade ago, people may not have considered geolocation data sensitive because it was not as pervasive and easily aggregated with other data points from platforms as it is now. This issue is further exacerbated in that many of the bills focus on one major aspect of data collection and privacy, usually the social, and neglect environmental data collection. Bill language should avoid being overly specific. Language matters. Policymakers must balance granularity in policy language, including examples in legislative history and common use cases of what key definitions may mean or look like in practice when possible.

Recommendations for design practitioners

1. Recognize that individuals want to be empowered to control what can be done with data, while not overburdening or diminishing the platform experience.

“Platforms are constantly changing, and I feel like if you were to limit infinite scroll that it would create some new sort of populating device. So I think it makes more sense to create rights on the side of the user engagement.” - A Let’s Talk Privacy project interviewee

2. Consider both the individual and community impacts when oscillating individual control between passive and active.

Participants had more positive reactions to design proposals, which gave them controls and choices about their information. For example, participants liked being able to delete their data. However, when the design was more passive, participants presented negative reactions. For instance, respondents did not appreciate the concept of having a timer on a webpage to control how much time they are spending online. They found passive designs to be “restrictive.” The design features that received the most positive feedback from participants were the ones which provided participants with information about their data (informative features) and gave them choices to control their personal information (active features).

3. Explore people’s contexts and intuition about how organizations collect, use, and share personal information.

Some individuals may want to invest all personal data in one platform to easily track and manage information. There is also an assumption that if one platform has some information (emails, messages), they know everything anyway.

“Rather than give my data to like a bunch of companies out there, I just like to use everything by Google because I know they already have everything from my phone, camera, smart speaker, photos, drive, etc. I’m just going to put it in one basket and hope to God like that one company is not going to turn evil.” - A Let’s Talk Privacy project interviewee

4. Develop shared vocabulary and patterns across industries. Designers within organizations should also work with other industry personnel, those in advocacy, and policymakers to develop a common vocabulary, useful for understanding and explicating data governance and information privacy.

Example: [The U.S. Web Design System](#) created a “shared design vocabulary” for web design. This resource is an open source repository for any government agency (aimed at

the federal level) to build accessible, mobile-friendly government websites. This includes components, design tokens, utilities and page templates).

On individuals who or are impacted by these systems

We decline to offer recommendations to users (and non-users) beyond contacting their representatives, in recognition of the power asymmetries between individuals and platforms, governments, and other organizations. It cannot be incumbent upon individuals to protect themselves from technologies deployed upon them, particularly when they are increasingly required to use several forms of technology to navigate work, entertainment, healthcare, banking, and other parts of everyday life.

Future design & research opportunities

There were many topics that we did not have time to investigate within the scope of this research. This includes but is not limited to the following:

1. Human perception, intuition and comfort with various privacy bill concepts: What do these actually mean in practice for the applications and services they use?

Data portability: "I think data portability is a really important element, like your friend graph and your contact graph. If we're going to have movement out of Facebook and Twitter toward decentralized privacy [and] enabling networks, [...] that stuff is really important as a form of anti-competitive, so soft power." - A Let's Talk Privacy project interviewee

2. Data deletion: When people request to be removed from mailing lists or to delete accounts, how do they actually confirm their data is deleted? In what capacity? What risks may still apply? Is it possible to still delete data if the app has used predictive technologies using your previous data?

"They've still got all the stuff they learned about you already. Which isn't data, right? These are sort of predictive features that let them make predictions about [people], [...] they may have forgotten some very specific things about me, but they still know a shit ton about me." - A Let's Talk Privacy project interviewee

3. Shared data and notions of ownership vs. human rights: Especially in the context of photos, comments, or posts in social media platforms, where do we draw the line with who owns what data? Is a property framework relevant? If not, what is more fitting?

"It's not even clear to me anyone writing legislation has thought about the question of like, what should happen when my friend uploads a picture to Facebook to me, and who gets to choose if that gets deleted? [...] There is going to be some weird unintended behaviors." - A Let's Talk Privacy project interviewee

4. Testing the policy and prototyping process on a larger scale: We conducted a very small investigation by taking draft policies, creating wireframes, and testing them with end users, policymakers, researchers and practitioners. We recognize there are many constraints when designing and building policies including but not limited to: time, resources, existing habits and structures, and “buy-in” from many political stakeholders. In general, we believe it would be helpful to do this process alongside policy making teams in some capacity. The research gathered from the interviews could be a direct line of feedback back to the policy staffers so they are able to integrate and modify the text. In addition, there is an opportunity to test the policies in a small, closed environment before rolling out the policies nationwide.

Next steps

We will distribute this report, recommendations one-pager, prototyping guide, and website to academics, government employees, industry practitioners, lawyers, nonprofit and advocacy, and policymakers who would find value in these insights in some capacity. This research can be improved in many ways, and we aim to continuously improve our frameworks and protocol with feedback. We, therefore, ask the following questions:

- When and how might this toolkit be most effective? How does it fall short? How can we improve it?
- What existing human-centered policymaking efforts can we collaborate and partner with to strengthen the outcomes for this work?
- How might a process like this be better institutionalized in policymaking environments?
- How can we make this process more useful for community groups and civil society organizations?

The full report, report summary, recommendations one-pager, and policy prototyping guide can be downloaded here: <https://letstalkprivacy.media.mit.edu/research/>

Website: <https://letstalkprivacy.media.mit.edu/>

Please reach out if you have questions or would like to chat further about any of the findings in this report. We can be reached at letstalkprivacy@media.mit.edu.