

**The Digital Covenant: Non-Centralized Platform Governance
on the Mastodon Social Network**

(Word Count: 7,959)

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THIS IS A PRE-PRINT ACCEPTED FOR PUBLICATION IN Information, Communication and Society. PLEASE CITE THE FINAL, EDITED VERSION.

Abstract

The majority of scholarship on platform governance focuses on for-profit, corporate social media with highly centralized network structures. Instead, we show how *non-centralized* platform governance functions in the Mastodon social network. Through an analysis of survey data, Github and Discourse developer discussions, Mastodon Codes of Conduct, and participant observations, we argue Mastodon's platform governance is an exemplar of the covenant, a key concept from federalist political theory. We contrast Mastodon's covenantal federalism platform governance with the contractual form used by corporate social media. We also use covenantal federalist theory to explain how Mastodon's users, administrators, and developers justify revoking or denying membership in the federation. In doing so, this study sheds new light on the innovations in platform governance that go beyond the corporate/alt-right platform dichotomy.

Keywords. Alternative social media, federalist political theory, Mastodon, platform governance, social media

Introduction

January 6, 2021: a mob comprised of the Proud Boys, QAnon believers, far-right militants, and long-time Trump supporters violently stormed the U.S. Capitol attempting to overturn the results of the 2020 presidential election (Biesecker et al., 2021). Lawmakers, journalists, and the nation tried to make sense of these seditious acts by turning their attention to online platforms, blaming a lack of platform governance for the hostile political environment. In response, Facebook, Twitter, YouTube, Instagram, and other platforms restricted or banned President Trump and other sympathetic communities (Peters, 2021), claiming ‘the risks of allowing the President to continue to use our service... are simply too great’ (Zuckerberg, 2021). Many celebrated the mass deplatforming efforts as long overdue. Others argued Trump’s deplatforming was a violation of freedom of expression rights, and many right-wing social media users flocked to ‘free-speech’ platforms, such as Parler, MeWe, Telegram, and Gab (Bond, 2021).

There is a sense, then, that as the most popular social media sites improve their governance practices, users seeking absolute free speech will migrate to the new ‘alt-tech’ sphere (Zuckerman & Rajendra-Nicolucci, 2021). However, this perspective ignores alternative social media that have innovated new approaches to platform governance and, in doing so, have refused entry to alt-right participants. In this paper, we argue the focus on platform governance as something only mainstream, corporate social media engages in—and the corollary view that alternative social media are lawless—misses these innovations. To illustrate this, we examine Mastodon, a microblogging service intended to be a Twitter alternative. We contrast Mastodon’s non-centralized system of

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platform governance with the centralized model used by Facebook, Twitter, and Reddit. In addition, we also show how this non-centralized structure aided Mastodon when the alt-right tried to join.

Overall, we show how Mastodon engages in a platform governance model of *covenantal federalism*, where small units consent to band together while abiding by a shared ethical code.

This study is based on an international survey of Mastodon users, administrators, and developers, close readings of Mastodon developer discussions, an archive of Mastodon Codes of Conduct documents, and several years of participant observation. We first discuss the current state of platform governance scholarship, followed by background on Mastodon. We then explain covenantal federalist political theory, followed by an examination of Mastodon's covenant. Such an approach will clarify an alarming case in Mastodon's history: the intrusion of the alt-right platform Gab into the Mastodon. We conclude with critiques of Mastodon's covenantal approach and calls for further research.

Platform Governance and a False Dichotomy

Seeing the consequences of unregulated content online, many platforms and lawmakers have asked a question: how should platforms be governed? Platform governance is broadly defined as the 'mechanism that structure participation in a community to facilitate cooperation and prevent abuse' (Grimmelmann, 2015). In practice, platform governance takes the form of 'screening, evaluation, categorization, approval or removal/hiding of online content according to relevant communications and publishing policies' (Flew et al., 2019, p. 40). Platform governance also includes design decisions about how people participate online (Gorwa et al., 2020). Unsurprisingly, most platform governance scholarship draws on analyses of major corporate platforms, namely Facebook (and its properties Instagram and Whatsapp) and Twitter, since these platforms are large and influential. Research interest also tends to follow significant events and people, much like how platform governance legislation and implementation get revisited after high-profile violations (Gillespie et

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al., 2020). However, the focus on popular social media has created the impression that, for all their flaws, only the large companies are struggling with platform governance issues (Gillespie et al., 2020). And when the major corporations ‘deplatform’ actors who then flee to free-speech absolutist alt-tech platforms, the impression one might get is that corporate social media is governed while the alternatives are not. Couple this with the increasingly common conflation of ‘alternative’ with ‘alt-right’ (Baroan, 2017; Hawley, 2019, p. 4; Kor-Sins, 2021) and the implication is that non-mainstream social media is a free-for-all—and hence, a haven for racists, misogynists, and trolls operating under the aegis of ‘freedom of speech’ and fleeing the strong moderation of the corporate platforms (Ray, 2021; Wilson, 2021).

This is a false dichotomy. Much as the history of alternative media includes many different approaches to being ‘alternative’ (Atton, 2002; Rodríguez et al., 2014), there are many approaches to creating and governing alternative social media (Gehl, 2017). So far, we do not have a full account of how platforms should or could be governed. Therefore, following Gillespie et al.’s (2020) call to ‘focus on content moderation as an expansive socio-technical phenomenon, one that functions in many contexts and takes many forms’ (p. 3), we focus on a particular alternative social media platform, Mastodon, theorizing how federation as a technical and social structure might provide a new model for online platform governance.¹

Mastodon and Federation

Mastodon was created in 2016 by German software developer Eugen Rochko in response to dissatisfaction with hate speech and white supremacy on Twitter (Zulli et al, 2020). Mastodon is a free and open-source software project that enables users to host independent, interest-based communities (termed ‘instances’) on their own computers. There are thousands of instances, ranging from large, general-interest servers, such as mastodon.social, to more niche-interest instances, such as ‘rich.gop for friendly political debate, bookwitty.social for “dedicated book

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lovers”...and scholar.social for academics’ (Zulli et al, 2020). This non-centralized structure, with no central node controlling the flow of information, also allows Mastodon instances to develop the rules that govern user behavior autonomously (e.g., bookwitty.social may have a specific set of rules that differ from rich.gop). Mastodon’s software enables each instance to connect with others, which allows users to engage in Twitter-like actions such as following other users, favoriting posts, and promoting content (‘boosting’ in Mastodon parlance) across the entire network. However, it does not replicate the practices of surveillance capitalism—monitoring user activity, selling personal data to advertisers, and algorithmically shaping social streams.

This non-centralized structure is referred to as ‘federation.’ A federated network is a special type of network topology where ‘each resource provider maintains local autonomy, and the ability to set policy for use of its own resources’ while allowing members to connect across the network (Berman et al., 2014, p. 17). A classic example is email: so long as an email server adheres to the protocols (e.g., SMTP), a user can send an email from one server to another user on another (e.g., protonmail.com can communicate with gmail.com). Each email service can have its own terms of use.

Our interest is in *federated platform governance* and the political aspects of this network structure. We argue that Mastodon’s federated structure exemplifies how platform governance can allow for individual expression while creating a collective commitment to an ethical code.² But, how? We answer this by first illuminating covenantal federalism, a theoretical framework drawn from political and ethical theory. Then, we turn to our survey and textual data to reveal how Mastodon federated platform governance implements federated liberty.

Covenantal Federalism

Covenantal federalism is a subset of federalist political theory (Burgess, 2012), developed over the career of political theorist Daniel Elazar (1982, 2007). The basic elements include a

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covenant created by groups of people who all agree to abide by and be governed under ethical principles. Covenantal federalism is not simply an aggregation of individuals, but rather a network of small groups (e.g., neighborhoods, families or clans, or provinces) who band together (Baker, 1993, p. 39).

Covenantal federalism has several key features. An important one is *non-centralization*. In a non-centralized structure, ‘power is diffused. Centralizing or concentrating power in a federalist system risks breaking the structure and spirit of the constitution. It negates the whole telos of federalism’ (Moots, 2009, p. 400). Non-centralization allows smaller units to ‘bind themselves to new unions or unities but always with a goal of preserving their own respective integrities’ (Moots, 2009, p. 391). The strength of a federation is not in the center but in the network as a whole (Moots, 2009; see also Young, 2000). Note that this is *not* decentralization. Decentralization implies a preexisting center from which power devolved—and back to which power could be recentralized at a future point. Non-centralization is the purposeful distribution of power across the units of a federation; this distribution is seen as valuable for its own sake.

Another key feature is the consent of participants, often glossed as ‘*the consent of the governed*.’ In his analysis of Spinoza’s political theory, Elazar argues that covenantal federalism requires ‘continuing consent by establishing the principles and providing the ways and means to translate them into practice through popular consent’ (Elazar, 1995, p. 10). Drawing on the federalist theory of Johannes Althusius and the practice of the Haudenosaunee Confederacy, Kyle Scott also stresses the essential role of consent in federalism: ‘In addition to demanding that a federal system require consent to remain legitimate, for a federal system to remain federal—which means prevent it from becoming too centralized—consent by the constituent members is necessary’ (Scott, 2012, p. 605; also see Young, 2000). Consent is one of the more controversial terms in the federalist lexicon. At issue is how consent is granted, as well as the units that consent. In Hobbes’s

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contract theory, for example, the atomic unit is the individual, but in covenantal theory, the unit might be something like a family, clan, town, or province (Baker, 1993; also see the discussion of Proudhon's theory in Abbing, 2021). In the former case, the debate rages as to whether current individuals share the consent that their forebears presumably gave—or, whether a human is recognized as a political actor capable of consent in the first place (Mills, 1999; Pateman, 1988). In the latter, continuing consent is a bit easier to observe because it is easier to query larger units (Scott, 2012). For our purposes in considering Mastodon, we can infer that individual and instance-level consent happening constantly, since members and instances can leave the federation much more easily than, say, an American can leave the United States.

If members consent to participate in a covenantal federation, then they enjoy *federal liberty*, 'the liberty to do that which is right and proper by the terms of a particular covenant, thereby providing a basis for resolving the problem of balancing liberty and authority with which every society must grapple' (Elazar, 2007, p. 2). In a system of federal liberty,

every proper polity is established by a pact among its constituents which is covenantal insofar as it rests upon a shared moral sensibility and understanding and is legitimate insofar as it embodies the fundamental principles of human liberty and equality (Elazar, 1982, p. 4).

This is freedom 'within the bounds of community and moral responsibility' (Moots, 2009, p. 396). Sub-units of a large federation, for example, can adopt contextually-sensitive laws as they see fit – so long as those laws comport with a more general and moral 'common law' (Baker, 1993, p. 37; Scott, 2012: 601). Individuals can pursue their goals so long as they do not violate the ethical covenant they have consented to. This is 'liberty established by agreement'—and of course, its contours depend upon the agreement made (Elazar, 1982, p. 4).

Overall, political covenanting serves 'three important functions': it provides 'a form of

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political conceptualization and mode of political expression; a source of political ideology; and a factor shaping political culture, institutions, and behavior...A covenant is therefore more than an institution or legal formulation. It becomes a political and social worldview' (Moots, 2009, p. 395). As we will show, this is decidedly the case with Mastodon.

Covenants versus Contracts

Before we turn to Mastodon, we should address a key distinction, one that has a direct bearing on our argument: the difference between a covenant and a contract, particularly because covenantal federalism is related to the social contract theory of Locke and Hobbes. Multiple scholars have worked to tease out distinctions between terms like 'covenant' and 'contract' (e.g., Lutz, 1980; Ostrom, 1980), and these distinctions will help us clarify different forms of platform governance. For them, while 'covenant' is a public, consensual agreement among a people to abide by an ethical code (with, or without, a divine witness), a 'contract' is more properly understood as a highly specified and limited legal agreement between two private entities.³ Covenants tend to be shorter because many of the obligations are not explicitly specified, much as ethical choices are not predetermined but depend heavily on the context (especially the context of a unit of the federation). Contracts, on the other hand, are increasingly lengthy documents because their terms and clauses must be exactly spelled out to eradicate loopholes (Lutz, 1980, p. 118). In this sense, the contracts of Lockean or Hobbesian contract theory are more akin to covenants than highly specified legal documents.

Mastodon's Governance as Covenant Federalism: A Case Study

Drawing on Moots's (2009, p. 395) observation that federalism is at once a mode of expression, a political ideology, and an *implementation*, here we show how Mastodon's governance illustrates and implements covenantal federalism. To do so, we first discuss our case study method and the data used in this study. Using survey responses, developer discussion posts, and participant

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observations, we then discuss how Mastodon developers, administrators, and users practice *non-centralization*, *consent*, and *federal liberty*, contrasting their covenantal governance with the contractual governance of corporate platforms. We then explain how Mastodon's commitment to covenantal federalism allowed them to resist the intrusion of their network by Gab, a far-right extremist network.

Method

Mastodon was chosen as the object of analysis due to its size and influence in the 'Fediverse.' Mastodon is the largest and most widely discussed alternative social networking platform, boasting approximately four million users and four thousand instances (<https://fediverse.party>; La Cava et al., 2021). While Mastodon is the largest part of the Fediverse, there are other federated social media systems, such as Pixelfed (an alternative to Instagram) and PeerTube (an alternative to YouTube). For clarity's sake, rather than attempt to analyze all Fediverse systems, we focus on Mastodon to better understand the opportunities for alternative platform governance writ large (see Meyer, 2021).

As mentioned, Mastodon mostly resembles Twitter in that users can post short status updates (toot), follow other users, and repost content (boost). Mastodon is also similar to Reddit in that users join topical communities and curate content. However, whereas Reddit runs on a centralized server with administrators who govern the entire site, Mastodon instances remain independent of one another, enabling more localized control. Reddit's system of subreddits is relatively decentralized, but it is not *non-centralized*, as Mastodon is.

Our data come from several sources. We conducted an open-ended Qualtrics survey distributed to Mastodon developers, administrators, and users. Using a targeted approach, the survey was fielded between February 2 and March 3, 2021. In total, 38 users, 11 administrators, and 4 developers completed the survey. Participants were asked to identify their primary role on Mastodon

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—developer, administrator, and user—at which point the survey branched into role-specific questions. Participants were asked about their length of time on Mastodon, the rules of their instance, how the rules were developed, perspectives on moderation/being moderated, freedom of expression, federating with problematic instances, and content controls.

Due to the lower number of developer responses, we supplemented the survey data with close readings of public developer discussions happening on the project’s Github and Discourse pages. This provided 30 discussion threads, dating from 2016 to mid-2020. We also drew on an archive of Mastodon Codes of Conduct available at the Social Media Alternatives Project (www.socialmediaalternatives.org). Finally, we draw on years of participant observation.

Analysis

Non-Centralization

Non-centralization and power diffusion are key to covenantal federalism. It is also important to federated social media, such as Mastodon. Non-centralization is often touted as a means to create a resilient network with no central points of failure. As one of our survey respondents noted, ‘Mastodon provides some sort of censorship-resistance in the sense that anyone can run their own instance, thus not being subject to one central authority.’ The capacity of the network to escape central points of failure extends to the underlying software, which is free and open-source (FOSS) and can be ‘forked.’ This means a copy of the code can be taken and modified in new ways without prior permission from the original creators.

Non-centralization also allows users to migrate from one instance to another as they choose. This is a feature that was called for very early in Mastodon’s development history (hach-que, 2016) and it was quickly adopted (DJSundog, 2017). In terms of non-centralization, what account migration allows is for users to easily move from one instance to another. A user’s account, therefore, becomes instance-independent but federation-dependent.

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All of the above are implementation details—quite literally, how will the software architecture be implemented to ensure non-centralization? However, there is more to it than mere implementation. One of the great critiques of corporate social media offered by advocates of Mastodon is that the corporate centralization model is not only a technical weakness but a political one because it locates power in a center (e.g., in a CEO). Non-centralization is thus also a political ideology of Mastodon, a major distinguishing feature.

Consent

Non-centralization and consent are directly related; through non-centralization, Mastodon users consent or withdraw their consent to be governed. Consent happens at the network level by all members agreeing to abide by Mastodon's general ethos. At the local level, users consent to specific instance rules and grant administrators access to/control over their data (e.g., pictures, status updates, meta-data about connections to others). However, non-centralization allows users to migrate their data from instance to instance, effectively withdrawing and transferring consent at the individual level.

At the network level, consenting to be a part of the Mastodon federation means agreeing to abide by a broader ethical covenant. Part of the cultural practice of Mastodon is the use of Codes of Conduct, which set expectations for how members will comport themselves while using the software. Emerging as it did in the mid-2010s, the choice of Mastodon developers to emphasize and recommend Codes of Conduct is understandable: as Christina Dunbar-Hester documents, such Codes were championed by diversity advocates who were pushing back against harassment and exclusion in the tech community (Dunbar-Hester, 2019, pp. 62–69).

The collection of Codes of Conduct available via the Social Media Alternatives Project and our participant observation reveals that the Codes commonly prohibit the following activities: Excessive advertising; Uncurated news bots posting from third-party news sources; Untagged

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pornography and sexually explicit content; Untagged gore and extremely graphic violence; Racism or advocacy of racism; Sexism or advocacy of sexism; Discrimination against gender and sexual minorities, or advocacy thereof; Xenophobic and/or violent nationalism; Sexual depictions of children; Content illegal in Germany and/or France, such as holocaust denial or Nazi symbolism; Conduct promoting the ideology of National Socialism; Stalking and ‘doxxing.’ Would-be members of instances are asked to review the particular Code of Conduct before joining. Moreover, some of our survey respondents reported that their instances crafted their Code collectively. ‘We circulated drafts in our discord server and carried on sometimes heated debate.’

Codes do vary across Mastodon instances. But, as a whole, the Mastodon network tends to prohibit the activities described above. As one survey respondent noted in discussing their home instance, ‘...these rules were developed from generally accepted code of conduct templates and then guided by existing local laws.’ Another noted their instance’s Code included ‘things that are common sense to people wanting to foster a peaceful and inclusive instance.’ This echoes the observation made by covenantal political theorists about the relationship between local laws and the ‘common law’ of the federation as a whole (e.g., Baker, 1993, p. 37; Young, 2000). Instance codes are local, but are related to the common law of Mastodon, which can be seen at the project development level, which is governed by a Code of Conduct, as well (Mastodon/Mastodon, 2016/2021). The ‘common law’ of Mastodon can be seen in the ‘flagship instance,’ the original Mastodon instance found at mastodon.social, which influenced the shape and practices of many Mastodon instances; it is now a common norm for Mastodon instances to include a Code of Conduct, just as the initial flagship instance did.

Our survey respondents repeatedly noted the importance of the Codes. As one respondent put it, ‘Codes of Conduct are incredibly important to let people know your values...They certainly contribute to a sense of comfort and shared understanding.’ In our survey, administrators of

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instances—upon whom the full burden of content moderation typically falls—often report that when users consent to the Code, moderation is relatively painless. ‘In general, I don’t have to moderate my users,’ reports one administrator. ‘The instance is small and they follow the rules. In the end my goal is for my instance to be a good citizen of the fediverse.’ Judging from the use of Codes and the insistence upon rules, the Mastodon covenant draws on a deontological ethical theory where respect for others—including marginalized others who do not often enjoy respect on the Internet—is a precondition to socializing with them (Ess, 2020, p. 225).

Still, at the individual level, the implementation of account migration, where users can migrate from instance to instance, allows users to effectively withdraw consent from one instance of Mastodon and grant consent to another by moving data to it (e.g., pictures, posts). Developers, administrators, and users of Mastodon discuss this relationship in terms of ‘trust.’ We see this relationship between trust and consent in the Github issue discussing account migration (hach-que, 2016) where participants asked: How much should you trust your instance? Your admin? Should you assume an instance will go away, and thus you should regularly back up your account or self-host? Or, should administrators pledge to keep your data safe? Here, the ability to withdraw one’s data from an instance—and the corollary of joining an instance and producing data through it—indicate how non-centralization can foster trust and consent. That is, if I believe the data I create are important, then I must select an instance that will maintain the integrity of the data. If I suspect the instance will not do so, I should be able to withdraw my data—and hence withdraw my consent to be a part of the instance. And yet, if the data are portable to another instance, I am capable of maintaining my consent in the federation *as a whole*. I can maintain a presence in the federation even as I shift from instance to instance.

Moreover, individual consent places an obligation on any Mastodon instance administrator who wants to grow their instance userbase: they must pledge to protect user data. They may signal

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their ability to do so through technical discussions about the quality and reliability of their servers (e.g., Mastodon | Social.Targaryen.House | About Text · The Social Media Alternatives Project, n.d.). Or, they may do so by signing the Mastodon Server Covenant, which requires that instance administrators follow a data backup schedule and commit to giving users a 30-day notice if the instance will be shut down (Mastodon Server Covenant, n.d.). Either way, just as users must consent to abide by an instance's code of conduct, so must an administrator foster trust to avoid users withdrawing their consent to be governed and transferring it to another instance whose administrator might be a better steward of their participation and data. And, these conversations about trust occur at the developer level, which signals active engagement with the principles of covenantal federalism.

Federal Liberty

If the moral theory implied in Mastodon is arguably a deontological one that prohibits behaviors that undermine human dignity and respect, what behaviors are encouraged? This is social media, after all. What about posting? Sharing? Communicating and socializing? Consistent with covenantal federalism, Mastodon members enjoy freedom of expression and can even contribute to Mastodon development if they abide by the covenant. In doing so, Mastodon members experience greater socio-technical 'freedoms' than those on corporate platforms.

Because Mastodon critically reverse engineered Twitter, the activities one would expect to be able to do in Twitter are available (Gehl, 2015). Mastodon users do these things, but consonant with the concept of federal liberty, they do so within the bounds of the ethical covenant. Mastodon users enjoy freedom of expression but within the standards set by the codes of conduct. As one survey respondent puts it, 'I think freedom of expression is pretty much allowed as each user desires it; but there are some guard rails to make sure that [civility] is commonly defined.' Another responded that 'As long as it doesn't break the Code of Conduct, [it's] allowed.' Another: 'You're

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free to express yourself so long as you don't do so at other people's detriment.' And another, an instance administrator, echoed the federalist concept of respecting smaller unit integrity, stating 'It's not my place to make decisions for my users, unless actively preventing harm or complying with legal obligations.'

When there are disputes—for example, when one user accuses another of violating a code of conduct—administrators have a variety of tools they can use. In 'edge cases,' where a user is perceived to have simply misunderstood the code, administrators report they communicate and negotiate more acceptable behaviors. In cases where users violate the code altogether, administrators can block them or remove them from the instance (Zulli et al, 2020). In addition, users who do not agree with instance administrators can migrate from one instance to another. However, as noted above, the administrators responding to our survey note that moderation has been relatively painless. They report this is because the users themselves watch for Code violations: 'in my experience, users normally reply to posts they consider inappropriate and tell the poster to stop. If it is only annoying for themselves, they block or mute.'

But, as Zulli et al (2020) note, Mastodon affords more than just socializing within the bounds of the covenant. As free and open-source software, Mastodon also affords involvement in the actual development, implementation, uses, and governance of the federation. A new user could, over time, gain the skills to become an administrator, running and moderating their own instance. Over time, that administrator could learn enough about the codebase to contribute to development. Zulli et al (2020) call this a 'sociotechnical system'—a rethinking of social media sociality that includes shaping the underlying infrastructure. Again, however, these contributions must operate within the bounds of the covenant. As one developer said in our survey, 'Anyone is welcome to contribute [to Mastodon development] provided they abide by the code of conduct [i.e., the Mastodon developer covenant].'

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In sum, as Elazar notes, covenantal federalism is an attempt to balance authority and liberty (Elazar, 2007, p. 2). The tension between Codes of Conduct and social media activity is always going to be present. As a survey respondent noted, this tension is very apparent in Mastodon. ‘Without any such rules I think things would spiral out of control...but all rules impose their own political views on the userbase and there is no way to be perfect.’ But, in balancing authority and liberty, Mastodon affords both social and technical opportunities, more so than on corporate platforms.

Contractual Corporate Social Media Governance

With the exception of the technical distinction—corporate social media is centralized and Mastodon is not—all of the above may sound like a description of standard social media practices. After all, whether we call it a ‘Code of Conduct’ or ‘Terms of Service,’ what makes Mastodon different from, say, Twitter? There are two differences. First, while the relationship among Mastodon developers, administrators, and users is covenantal, the agreement between a corporate social media user and a corporate social media platform is *contractual* in the sense of a highly specified legal agreement between two entities. Second, as we will show, Mastodon has been far more active in blocking alt-right users than corporate social media has been.

In terms of our first point—corporate social media is contractual—a simple test is based on the length of documents. If we compare Mastodon instance Codes of Conduct with the length of a corporate social media Terms of Service agreement, we see a major difference: Terms of Service agreements are much longer. They are also much more specific. Facebook’s terms of service document weighs in at roughly 4,000 words. Twitter’s is roughly 5,000, and Reddit’s is roughly 7,000. And, these are just the word counts of Terms of Service agreements—the corporations also have privacy policies, cookie policies, and sundry other contracts for users to agree to. Contrast this with Mastodon instance Codes of Conduct, typically found on About pages. One of the longer ones

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we have seen is for the Instance Icosahedron, a general topic instance

(<https://icosahedron.website/about/more>). It weighs in at about 1000 words.

Beyond word counts, what is different? Whereas a Mastodon Code of Conduct may contain a set of simple rules—Icosahedron's includes 'Be friendly,' 'Spam is not allowed,' and 'Fascism is incompatible with a free exchange of ideas'—a corporate site's terms include highly granular clauses governing intellectual property rights, branding, descriptions of how user data will be sold to third parties, and limitations of liability. These clauses reflect the corporate social media practice of surveillance capitalism: monitoring and analyzing user activities in order to sell the resulting data—a system Mastodon does not participate in. Mastodon instances include links to the code base—an implicit invitation to contribute to its development. The contractual corporations include clauses prohibiting 'reverse engineering.' Mastodon Codes of Conduct typically discuss how the instance is governed, usually through negotiation with users who might run afoul of the Code. Corporate social media, however, typically specify disputes be resolved via arbitration or in court in a site the corporation chooses—and definitely not via class-action lawsuit or government injunction. In a sense, the corporate, contractual approach is to immediately invoke the court system, highlighting how reliant corporate platform governance is on legal infrastructure. As noted above, the covenantal approach relies more on good-faith negotiations between users and instance administrators.

Moreover, an ironic—or perhaps intended—outcome of lengthy legal documents is users do not read them (Gehl and Friz, 2016). In contrast, the short documents used by Mastodon instance administrators are decidedly more user friendly. Again, this supports the observation that Mastodon's covenant is enrolling users as fuller participants, rather than as mere consumers of a service.

These distinctions show the difference between a contractual form of platform governance versus a covenantal form. The overall outcome of the contract approach is a relationship between an

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individual consumer and a large corporate entity: you may use our services, but only on these terms. Beyond your choice to use our services or not, you have no say in how the platform is governed. In contrast, the covenantal federalist approach appears more akin to how citizenship functions in democratic states.

What about Gab and the Alt-Right?

So far, we have shown how Mastodon users, administrators, and developers participate in a covenantal federalist platform governance structure. However, we must address what is arguably the greatest blemish on Mastodon's record: Gab.com. Gab—a far-right extremist network dedicated to 'free speech, individual liberty and the free flow of information online,'—runs on the Mastodon codebase. Despite Mastodon's non-centralization enabling Gab, we argue that Mastodon's handling of this extremist network demonstrates the platform's commitment to covenantal federalism and ethical platform governance.

Gab joined Mastodon in July 2019, and quickly claimed to have amassed over 1 million users. Entering into the federation in such a loud way led commentators to argue it was the 'biggest node' in the Mastodon federation and thus evidence of the triumph of free speech over 'cancel culture' (Rankovic, 2019a). Judging from the journalism of the time, it appeared Gab took over the Mastodon federation seemingly overnight (Makuch, 2019)—a repudiation, it appears, of the covenantal federalist approach to platform governance we examine here. Moreover, Gab (and subsequent alt-right social media, such as Parler or Truth) has been depicted as a haven for those who have been 'de-platformed' from corporate social media.

If an alt-right platform—one at best delighting in trolling, harassment, and misogyny, and at worst implicated in events such as racially motivated murders and the January 6 insurrection—can simply dominate a federation by joining it, bringing with it castaways from corporate social media, how can we claim that Mastodon embodies covenantal federalism? How can we suggest that

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Mastodon's governance involves important ethical values by which developers, administrators, and users willingly abide?

To answer these questions, we point to the reaction of the covenantal federation to Gab's intrusion. Even amid Gab's ostensible domination of the federation, there was already the resistance we would expect from covenantal federalists who are concerned with respect for others.

Commenting in the *VICE* story, Mastodon's leadership noted 'while we respect the right to free speech, we believe that human dignity is inviolable above all else' (Makuch, 2019). Mastodon's leadership also released a statement denouncing Gab, stating:

Mastodon is completely opposed to Gab's project and philosophy, which seeks to monetize and platform racist content while hiding behind the banner of free speech.

Mastodon remains committed to standing up against hate speech (Eleanor, 2019).

This was not an empty condemnation. In keeping with Mastodon's covenantal approach to federation, the statement continues:

Our *new server covenant* means we only list servers on joinmastodon.org that are committed to active moderation against racism, sexism and transphobia. The Mastodon community does not approve of their attempt to hijack our infrastructure and has already taken steps to isolate Gab and keep hate speech off the fediverse (Eleanor, 2019, our emphasis.).

[Joinmastodon.org](https://joinmastodon.org) is a primary portal for people seeking to join the Mastodon federation. It guides a potential Mastodon user through options, such as servers with specific themes or regional foci and ranging in size from dozens to hundreds of thousands of registered members. To be listed on joinmastodon.org, an instance must agree to the 'server covenant,' which includes requirements such as 'active moderation against racism, sexism, homophobia and transphobia' as well as technical standards for data retention (Mastodon Server Covenant, n.d.).

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The existence of such a covenant is nothing without action on the part of federation members. And act they did: when the first author asked a Mastodon instance admin about Gab during a panel at the 2020 Hackers on Planet Earth (HOPE) conference, the admin explained,

They [Gab] are off on their own little island and hardly anybody actually communicates with them. They showed up, everybody was pretty well prepared to close them [out] as soon as they did...Almost every server on the fediverse implemented moderation features to lock Gab out (The Gibson et al., 2020).

The survey respondents confirmed this. One administrator reported that ‘We block a lot of instances. Any instance that tolerates hate speech from their own users is blocked.’ Another noted, ‘We are intolerant of intolerance.’ Gab’s servers—quickly recognized as fostering hate speech and intolerance—were quickly blocked by the covenantal federation.

The reaction to the mass blocking of Gab led to more inaccurate news coverage, this time accusing Mastodon of ‘censoring’ Gab, much as corporate social media has been accused of censoring the alt-right. Writing in an alt-right news site called *Reclaim the Net*, Didi Rankovich argued that Mastodon’s blocking of Gab violated Mastodon’s own stated purpose of producing a non-centralized social media system and hence was censorship (Rankovic, 2019b). Here, Rankovic commits two errors. First, they misread the very history of Mastodon, which was started specifically to develop an alternative system that would actively deny access to trolls, misogynists, transphobes, and white supremacists—whether they appear on Twitter or on an installation of Mastodon’s codebase. Second, since Mastodon’s code is free and open-source, anyone is welcome to use it. They just cannot expect the rest of the Mastodon installations to federate with them.

In sum, while Gab may be running on Mastodon code, most of the Mastodon instances simply prevented their servers from federating with Gab’s. Arguments about ‘censorship’ or Gab ‘taking over Mastodon’ fall utterly flat in the face of a covenantal understanding of federal liberty,

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where free speech operates within a consensual respect for human dignity supported across a non-centralized network. Installations of Mastodon that allow hate speech—which invokes and perpetuates the brutal history of violence and oppression of racial, ethnic, sexual, and ability minorities—remain blocked by the covenantal federalists.

Compare this to Facebook, especially in the run-up to the January 6, 2021 attacks. As the whistleblower Frances Haugen has revealed, efforts to remove alt-right operatives from Facebook stalled immediately after the 2020 U.S. presidential election (Dvoskin et al., 2021). While Trump was deplatformed, Trumpists' intent on overturning the election were not. While Mastodon blocked the alt-right immediately—well before the insurrection attempt—Facebook appears to have done so only when it was convenient—*after* the election and hence after selling ad space to the Trump campaign.

Conclusion

Our analysis of Mastodon's use of covenantal federalism expands scholarship on platform governance. We argue a simple juxtaposition of corporate, contractual governance versus a putative 'Wild West' of alt-right alt-tech misses the rich variety of approaches to ethical platform governance, including the one seen in the Mastodon federation.

However, we are mindful of critiques of the central political theory we are invoking. Covenantal federalist theory is a form of contract theory. Thus, criticisms of contract theory prompt us to ask: who is *excluded* in the covenantal federalist approach to platform governance? In Charles W. Mills' (1999) critique of contract theory, he argues white supremacists were able to envision a social contract that enrolled rational, white men precisely because of a prior racial contract where rational, white men agreed to exclude black and brown people. Mills was influenced by Carol Patemen's *The Sexual Contract* (1988), which argued social contract theory excluded women on similar grounds.

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So, who is excluded in the Mastodon covenantal federalist imaginary? An immediate answer might be ‘members of the alt-right and other fascists,’ but that is too simple. Instead, we would suggest the Mastodon federation’s exclusion is about *techno-elitism*. The single biggest barrier to entry to the Mastodon federation can be found in the question: ‘How do I sign up?’ The answer, unfortunately, is complicated: join an instance. Which leads to the question: ‘What’s an instance?’ It’s a specific installation of Mastodon. ‘Which one should I join?’ It depends on a lot of things: interests, geography, whether the instance is accepting members, the code of conduct. The conversation is a long one, and often ends in frustration—‘I’ll just stick to Twitter, thanks.’

Mastodon’s non-centralized structure means there is no centralized location to join. Moreover, its non-centralized topology is much more complicated to explain to a new user than a centralized model, where one simply signs up via twitter.com or reddit.com. As James Carey and John Quirk note, information technologists’ vision of de- or non-centralization often does not account for the required knowledge needed to fully utilize them (Carey & Quirk, 1989, p. 194). The mere fact of non-centralizing information is not the same as the tacit and explicit knowledge needed to operate the system. Mastodon thus remains a niche system for free and open-source software enthusiasts and other more technically-minded internet users, and this has brought about the exclusion of the vast majority.

Beyond a criticism about who’s excluded, another criticism of Mastodon is there is no guarantee its covenantal federation will prevail against intrusions such as Gab. Because Mastodon relies on the FOSS model, where anyone can take and run the code, it is not hard to imagine that another federation comprised of alt-right users could emerge. There is no required link between the code and Codes of Conduct beyond a cultural norm. As one survey respondent noted, ‘The people running those instances are free to run their place how they feel, and the larger community is free to choose whether to associate with those instances or not.’ In fact, as of this writing, former President

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Donald Trump just announced his own social media platform, Truth, which is running on a version of Mastodon (Robertson, 2021). Because FOSS includes no prohibition against unjust uses, an ardent critic of the free and open-source model, Coraline Ehmke has argued for an ‘Ethical Source’ approach based on a license that not only requires the code to be open to others, but also that those who use the code obey ethical principles, such as respect for human rights (Ehmke, 2000).

Still, our interest in this paper is to highlight new methods of platform governance that go beyond the corporate/alt-right dichotomy. Scholars of platform governance would be well advised to look beyond the corporate model at more ethical approaches, such as that of Mastodon. Scholars should also consider how other federated platforms, such as Pixelfed and PeerTube, cohere to or deviate from Mastodon’s platform governance approach. Such comparative analysis will usefully overcome the limitations of a single case study methodological approach and provide additional models for platform governance. For now, this analysis makes a strong case that Mastodon’s covenantal federalism is a major achievement in platform governance, associating free software, non-centralization, consensual codes of conduct, and federal liberty into a viable and growing social network.

References

- Abbing, R. R. (2021). *From political federations to federations in computing (and back again?)*. Unpublished Dissertation in Progress, Mälmo University.
<https://roelra.pubpub.org/pub/j3j1z35v/draft>
- Atton, C. (2002). *Alternative media*. SAGE.
- Baker, J. W. (1993). The covenantal basis for the development of Swiss political federalism: 1291–1848. *Publius: The Journal of Federalism*, 23(2), 19–42.
<https://doi.org/10.1093/oxfordjournals.pubjof.a038067>
- Barojan, D. (2017, month day). Alt-right and alt-social media. *Medium*.
<https://medium.com/dfrlab/alt-right-and-alt-social-media-4fa23eb2fbd1>
- Berman, M., Chase, J. S., Landweber, L., Nakao, A., Ott, M., Raychaudhuri, D., Ricci, R., & Seskar, I. (2014). GENI: A federated testbed for innovative network experiments. *Computer Networks*, 61, 5–23. <https://doi.org/10.1016/j.bjp.2013.12.037>
- Biesecker, M., Kunzelman, M., Flaccus, G., & Mustian, J. (2021, April 20). Who were they? Records reveal Trump fans who stormed Capitol. *AP NEWS*. <https://apnews.com/article/us-capitol-siege-trump-supporters-8edfd3bb994568b7cdcd2243ad769101>
- Bond, S. (2021, January 25). Alternative social media platforms become popular among some Trump supporters. *NPR*. <https://www.npr.org/2021/01/25/960465875/alternative-social-media-platforms-become-popular-among-some-trump-supporters>
- Burgess, M. (2012). *In search of the federal spirit*. Oxford University Press.
- Carey, J. W., & Quirk, J. J. (1989). The history of the future. In J.W. Carey (Ed.), *Communication as culture: Essays on media and society* (pp. 173–200). Routledge.
- DJSundog. (2017, May 29). Migratory Accounts—Core development / Features. *Mastodon Meta Discussion Board*. <https://discourse.joinmastodon.org/t/migratory-accounts/268>

Digital Covenant on Mastodon

Dunbar-Hester, C. (2019). *Hacking diversity*. Princeton University Press.

<https://press.princeton.edu/books/paperback/9780691192888/hacking-diversity>

Dwoskin, E., Newmyer, T., & Mahtani, S. (2021, October 25). The case against Mark Zuckerberg:

Insiders say Facebook's CEO chose growth over safety. *The Washington Post*.

<https://www.washingtonpost.com/technology/2021/10/25/mark-zuckerberg-facebook-whistleblower/>

Ehmke, C. A. (2020, February 3). *The rising ethical storm in open source – Coraline Ada Ehmke –*

CopyleftConf 2020. <http://archive.org/details/copyleftconf2020-ehmke>

Elazar, D. J. (1982). Confederation and federal liberty. *Publius: The Journal of Federalism*, 1–14.

Elazar, D. J. (1995). Spinoza and the Bible. *Jewish Political Studies Review*, 7(1–2), 5–19.

Elazar, D. J. (2007). Covenant. In *Encyclopedia of politics and religion* (2nd ed., pp. 217–221). CQ

Press. <https://doi.org/10.4135/9781483300535>

Eleanor. (2019, June 4). Statement on Gab's fork of Mastodon. *Official Mastodon Blog*.

<http://blog.joinmastodon.org/2019/07/statement-on-gabs-fork-of-mastodon/>

Ess, C. (2020). *Digital media ethics* (Third edition). Polity.

Flew, T., Martin, F., & Suzor, N. (2019). Internet regulation as media policy: Rethinking the

question of digital communication platform governance. *Journal of Digital Media & Policy*, 10(1), 33–50. https://doi.org/10.1386/jdmp.10.1.33_1

Friz, A., & Gehl, R. W. (2016). Pinning the feminine user: Gender scripts in Pinterest's sign-up

interface. *Media, Culture & Society*, 38(5), 686–703.

<https://doi.org/10.1177/0163443715620925>

Gehl, R. W. (2015). Building a Better Twitter: A Study of the Twitter Alternatives GNU social,

Quitter, rstat.us, and Twister. *The Fibreculture Journal*, 26, 60–86.

<https://doi.org/10.15307/fcj.26.190.2015>

Gehl, R. W. (2017). Alternative Social Media. In J. Burgess, A. E. Marwick, & T. Poell (Eds.), *The*

SAGE handbook of social media (pp. 330–352).

Gillespie, T., Aufderheide, P., Carmi, E., Gerrard, Y., Gorwa, R., Matamoros-Fernández, A.,

Digital Covenant on Mastodon

- Roberts, S. T., Sinnreich, A., & Myers West, S. (2020). Expanding the debate about content moderation: Scholarly research agendas for the coming policy debates. *Internet Policy Review*, 9(4). <https://doi.org/10.14763/2020.4.1512>
- Gorwa, R., Binns, R., & Katzenbach, C. (2020). Algorithmic content moderation: Technical and political challenges in the automation of platform governance. *Big Data & Society*, 7(1), 205395171989794. <https://doi.org/10.1177/2053951719897945>
- Grimmelmann, J. (2015). The Virtues of Moderation. *Yale Journal of Law and Technology*, 17(1). <https://digitalcommons.law.yale.edu/yjolt/vol17/iss1/2>
- hach-que. (2016, November 22). *Support account migration · Issue #177 · tootsuite/mastodon*. GitHub. <https://github.com/tootsuite/mastodon/issues/177>
- Hawley, G. (2019). *The alt-right: What everyone needs to know*. Oxford University Press.
- Kor-Sins, R. (2021). The alt-right digital migration: A heterogeneous engineering approach to social media platform branding. *New Media & Society*. <https://doi.org/10.1177/14614448211038810>
- Lutz, D. S. (1980). From covenant to constitution in American political thought. *Publius*, 10(4), 101–133. <https://doi.org/10.2307/3329746>
- Makuch, B. (2019, July 11). The Nazi-Free alternative to Twitter is now home to the biggest far right social network. *Vice*. https://www.vice.com/en_ca/article/mb8y3x/the-nazi-free-alternative-to-twitter-is-now-home-to-the-biggest-far-right-social-network
- Mastodon | social.targaryen.house | About text · The Social Media Alternatives Project (n.d.). <https://www.socialmediaalternatives.org/archive/items/show/364>
- Mastodon Server Covenant. (n.d.) <https://joinmastodon.org/covenant>.
- Mastodon/mastodon. (2021). [Ruby]. *Mastodon*. https://github.com/mastodon/mastodon/blob/5ba46952af87e42a64962a34f7ec43bc710bdcaf/CODE_OF_CONDUCT.md (Original work published 2016).
- Meyer, C. B. (2001). A case in case study methodology. *Field methods*, 13(4), 329-352. <https://doi.org/10.1177/1525822X0101300402>

Digital Covenant on Mastodon

Mills, C. W. (1999). *The racial contract*. Cornell University Press.

Moots, G. A. (2009). The covenant tradition of federalism: The pioneering studies of Daniel J.

Elazar. In A. Ward & L. Ward (Eds.), *The Ashgate research companion to federalism* (pp. 391–412). Ashgate.

Moving or leaving accounts—Mastodon documentation. (n.d.).

<http://docs.joinmastodon.org/user/moving/>.

Ostrom, V. (1980). Hobbes, covenant, and constitution. *Publius: The Journal of Federalism*, 10(4),

83–100. <https://doi.org/10.1093/oxfordjournals.pubjof.a037335>

Pateman, C. (1988). *The sexual contract*. Stanford University Press.

Peters, C. (2021, January 10). Every online platform that has cracked down on Trump. *Vox*.

<https://www.vox.com/2021/1/10/22223356/every-platform-that-banned-trump-twitter-facebook-snapchat-twitch>

Rankovic, D. (2019a, July 5). Gab becomes the largest Mastodon node, bringing the largest user

contribution to the fediverse. *Reclaim The Net*. <https://reclaimthenet.org/gab-biggest-mastadon-node/>

Rankovic, D. (2019b, July 6). Mastodon attempts to censor free speech social network Gab by

blocking its domain. *Reclaim The Net*. <https://reclaimthenet.org/mastodon-blocks-gab/>

Ray, S. (2021, April 14). The far-right is flocking to these alternative social media apps—not all of

them are thrilled. *Forbes*. <https://www.forbes.com/sites/siladityaray/2021/01/14/the-far-right-is-flocking-to-these-alternate-social-media-apps---not-all-of-them-are-thrilled/?sh=dae5d1855a44>

Riley, P. (1979). Federalism in Kant's political philosophy. *Publius*, 9(4), 43–64.

<https://doi.org/10.2307/3329867>

Robertson, A. (2021, October 22). Trump's social network has 30 days to stop breaking the rules of

its software license. *The Verge*. <https://www.theverge.com/2021/10/22/22740354/trump-truth-social-network-spac-mastodon-license-software-freedom-conservancy>

Rodríguez, C., Ferron, B., & Shamas, K. (2014). Four challenges in the field of alternative, radical

Digital Covenant on Mastodon

- and citizens' media research. *Media, Culture & Society*, 36(2), 150–166.
<https://doi.org/10.1177/0163443714523877>
- Scott, K. A. (2012). Macrolevel consent: A defense of federalism. *Publius: The Journal of Federalism*, 42(4), 592–612. <https://doi.org/10.1093/publius/pjr050>
- The_Gibson, The Doctor, Strauser, K., R¥, & Rhodes, A. (2020, July 29). *Saving hacking from the zaibatsus: A memoir*. Hackers on Planet Earth, Online.
- Wilson, J. (2021, January 13). Rightwingers flock to alt-tech networks as mainstream sites ban Trump. *The Guardian*. <https://www.theguardian.com/us-news/2021/jan/13/social-media-trump-ban-alt-tech-far-right>
- Young, I. M. (2000). Hybrid democracy: Iroquois federalism and the postcolonial project. In Ivison, D et al (eds.), *Political theory and the rights of indigenous peoples* (pp. 237-258). Cambridge University Press.
- Zuckerberg, M. (2021). The shocking events of the last 24 hours clearly demonstrate that President Donald Trump intends to use his remaining time. *Facebook Blog*.
<https://www.facebook.com/zuck/posts/10112681480907401>
- Zuckerman, E., & Rajendra-Nicolucci, C. (2021, January 11). Deplatforming our way to the alt-tech ecosystem. *Knight First Amendment Institute*.
<https://knightcolumbia.org/content/deplatforming-our-way-to-the-alt-tech-ecosystem>
- Zulli, D., Liu, M., & Gehl, R. (2020). Rethinking the “social” in “social media”: Insights into topology, abstraction, and scale on the Mastodon social network: *New Media & Society*.
<https://doi.org/10.1177/1461444820912533>

Notes

¹ In proposing Mastodon as a model for platform governance, we do not suggest that alternative platforms are immune to governance issues. We discuss how Mastodon addressed the use of their open-source code by a far-right extremist network on page 18.

² Mastodon is but one platform in the ‘Fediverse.’ Other federated networks including Pixelfed, Misskey, Bookwurm, and Funkwhale. All of these share a protocol, ActivityPub, meaning that a Pixelfed user can be followed by a Bookwurm user, and so on.

³ These same scholars also distinguish between ‘covenant’ and ‘compact,’ arguing that the latter is a more secular version of a covenant that does not rely on an appeal to a transcendental deity while still invoking a shared set of ethical values—what Iris Marion Young (2000) might call a ‘thin set of global values.’ For simplicity’s sake, we will use ‘covenant’ throughout this document, since we draw heavily on Elazar’s thinking, and Elazar himself was tracing the secularization of covenantal federalism in his work.