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Article

“Anti-Regime Influentials” Across Platforms: A Case Study of the Free Navalny Protests in Russia

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Abstract

The full-scale invasion of Ukraine by Russia in 2022 has put the future of the Russian opposition further at stake. The new limitations towards political, internet, and press freedoms have led to a severe disintegration of the anti-regime movement in Russia, including its leaders like Alexey Navalny. Digital platforms had previously hosted anti-Kremlin narratives online and played a role in the facilitation of Russian anti-regime protests. The latest scalable anti-regime rallies to date were the Free Navalny protests, caused by the imprisonment of Navalny in 2021. Digital platforms strengthened the voice of the Russian regime critics; however, their growing visibility online caused further suppression in the country. To understand this paradox, we ask which main anti-regime communicators were influential in the protests’ discussions on Twitter, YouTube, and Facebook, and how platform features have facilitated their influence during the Free Navalny protests. We develop a multi-platform methodological workflow comprising network analysis, social media analytics, and qualitative methods to map the Russian anti-regime publics and identify its opinion leaders. We also evaluate the cultures of use of platforms and their features by various Russian anti-regime communicators seeking high visibility online. We distinguish between contextual and feature cultures of platform use that potentially aid the popularity of such actors and propose to cautiously confer the mobilisation and democratisation potential to digital platforms under growing authoritarianism.

Keywords

digital platforms; Navalny; non-systemic opposition; political influence; social media; Russia

Issue

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1. Introduction

In the 2010s, international digital platforms such as YouTube, Twitter, and Facebook served as trusted mediums for enabling the information flow between different anti-regime groups and independent media in the country. These groups were dealing with increased limitations on political, press, and internet freedoms in Russia that have curtailed their information and diminished their capacity to effectively communicate online, mobilising their supporters, and jeopardising their political influence. By the time of the full-scale invasion of Ukraine by Russia in 2022, digital platforms became targets of law enforcement bodies: Facebook was banned by a Moscow court, and access to Twitter was restricted by the Russian censorship body Roskomnadzor. To date, it is not clear who can maintain anti-regime communication in an already dictatorial Russia, just as it is not clear how international digital platforms can continue to facilitate prominent alternative political communicators in the country.

To investigate these pressing issues of Russian society, we turn to the events preceding the 2022 full-scale invasion the last most visible and mass anti-regime protests to date, the Free Navalny protests (January to

April 2021) surrounding the imprisonment of the opposition leader Alexey Navalny, where digital platforms and their features were used to highlight prominent critics of the regime. In this article, we ask:

> RQ1: Which anti-regime communicators were influential in the protests' discussions on Twitter, YouTube, and Facebook?
>
> RQ2: How did platform features and affordances facilitate their influence in such online debates?

We address both methodological and theoretical gaps in this article; first, by introducing a multi-platform methodological workflow comprising various Application Programming Interface (API) data collection techniques, social media analytics, and network analysis methods to detect the most visible anti-regime communicators across digital platforms. Secondly, we extend the knowledge on the cultures of use of various digital platforms and their features by prominent anti-regime communicators in Russia. We label such actors "anti-regime influentials," who most visibly contributed to anti-regime political debates during the Free Navalny protests in 2021.

Our findings reveal differences in the cultures of use of digital platforms by anti-regime influentials, which we explain through contextual and region-specific factors that make some platforms preferable mediums for various communicators. We also discuss the variety of platform features and affordances that made anti-regime communicators more prominent but also put them at greater risk towards Russian law enforcement bodies. Such analysis, in general, helps to better understand the role and mobilising potential of platforms in the communication of protest movements in authoritarian Russia, and their further development and deployment in future political contexts.

2. The Russian Political Regime and the Opposition

In the last decade, Russia has transitioned further down the authoritarian path from electoral authoritarianism (Golosov, 2011) towards a dictatorship (Avtoritarism my uzhe proshli, 2021). In these conditions, the Russian opposition experienced "troubled transformations": from being labelled as a "dying species" in the mid-2000s (Gel'man, 2005), through a brief rebirth period during the protests For Fair Elections in 2011 (Gel'man, 2013), to experience a further crackdown since the late 2010s (Gel'man, 2015). Aside from activists, many independent media outlets and journalists were marginalised too (e.g., the editorial of *lenta.ru* in 2014), while high-profile journalists (e.g., Yuri Dud) moved solely to platforms. These ousted actors sought alternative formats of uninterrupted communication with their audiences online since the late 2010s (Glazunova, 2022).

Despite the multiple constraints of Russia's political regime, in the 2010s, Russian opposition activists like Alexey Navalny, his colleagues and associates like Lyubov Sobol, Ilya Yashin, and others were able to form a digital resistance to the regime (Glazunova, 2022) and organise a series of anti-establishment rallies between 2017 and 2019. Notwithstanding their unsuccessful election attempts, these activists gained prominence on digital platforms, where they also recruited supporters for their political causes using practices of investigative journalism, digital activism, and populist rhetoric (Glazunova, 2022). By the 2020s, the movement itself seriously deteriorated due to—among other reasons—pressure from law enforcement bodies and active censorship towards them. The last protests organised by Navalny's movement were held in 2021 to demand the release of the imprisoned activist.

In 2020, Navalny was poisoned, evacuated to Germany for treatment, and upon his arrival to Russia (January 17, 2021) was detained at the airport, and then imprisoned (February 2, 2021). Before his arrival, Navalny and his team had published several resonant investigations on YouTube into who poisoned Navalny and Vladimir Putin's properties. The large protests in Navalny's support were held on January 23 and 31 and February 2, mobilising thousands of supporters across Russian cities. On February 14, due to severe suppression towards protesters, Navalny's associates announced a flash mob instead, "Love is stronger than fear," gathering people with lanterns and lit torches. They also launched a campaign for citizens to register on their website, Free Navalny, if they are ready to participate in protests. The organisers promised to hold protests if the number of registered participants reached 500,000. However, the database of registered protesters with their email addresses was leaked on April 2 and later was allegedly used by law enforcement bodies for raids and prosecution (Yapparova & Dmitriev, 2021). The last mass protests in Navalny's support were held on April 21.

This period, from January to April, covering Navalny's arrival to Russia and associated protests, presents a particular interest: they were the last visible protests organised by Navalny's movement. The full-scale invasion of Ukraine in February 2022 triggered multiple anti-war protests in Russia; however, they were not comparable in scale and, among other things, in the online prominence of the actors facilitated by digital platforms (which at that moment were not fully banned in the country). Before proceeding to the methodology on how to detect such actors across platforms, we discuss platform features and affordances, their role in Russian protests, as well as how they can facilitate the political influence of various communicators.

3. Affordances, Platforms, and Influentials

3.1. Platform Features and Affordances

Various features of digital platforms shape users' communication and ultimately configure how networked publics, "publics that are restricted by networked technologies," are defined (Boyd, 2011, p. 39). In social media research, this inter-relationship between technology and human agency is studied through the frame of "affordances" (Boyd, 2011, p. 39) that enable to understand "dynamics or types of communicative practices and social interactions that various features afford" (Bucher & Helmond, 2017, p. 239). On an abstract level, affordances shape people's participation and constitute dynamics and conditions set by the technologies and platforms. Boyd (2011, p. 46) distinguishes four high-level affordances:

1. Persistence: Online expressions are automatically recorded and archived.
2. Replicability: Content made out of bits can be duplicated.
3. Scalability: The potential visibility of content in networked publics is great.
4. Searchability: Content in networked publics can be accessed through search.

One of the central reasons why political communicators turn to social media is its communicative potential to reach bigger audiences and make their content as visible as possible—in what Boyd (2011) refers to as "scalability." Digital platforms can make content go viral; however, the scale and audiences are not guaranteed, as the public chooses what to amplify (Boyd, 2011). However, various platform algorithms with or without human intervention also define what can be visible or popular on the platform. Tufekci (2018), for instance, explored the role of recommendation algorithms on YouTube that amplified more radical content, while Noble (2018) investigated Google's search algorithms that enacted racism and reinforced oppressive social relationships. In the context of the Free Navalny protests, while networked publics organically determine various opinion leaders discussing the protests, specific features of the platforms helped them amplify and facilitate their political influence.

These particular features of the platforms, located within the materiality of the platform (Bucher & Helmond, 2017) and the user interface, afford multiple actions such as replying, clicking, sharing, and others, and are called "low-level affordances." Here and later, we use the term "platform features," to clearly distinguish between the communicative dynamics and conditions that technologies afford (high-level affordances, e.g., scalability) and material elements of user interface that allow different communication actions (low-level affordances, e.g., retweets). While networked publics can confer the status of opinion leaders to various communicators in particular events, such features as retweets on Twitter, reactions on Facebook, recommendation algorithms on YouTube, and others potentially contribute to and facilitate their political influence. In an authoritarian regime, such features can be a powerful alternative conducive to people's participation in politics. Before proceeding to the specifics of such dynamics between the Russian networked publics, opinion leaders, and platform technologies, we first determine what platform features can potentially contribute to the political influence of opinion leaders on platforms and enact their scalability.

3.2. Influence

The political influence of anti-regime political actors online is difficult to determine, due to the ambiguous terminology in the field and various influence metrics. In academic literature, scholars refer to them as opinion leaders (Katz & Lazarsfeld, 1955), political influencers (Lewis, 2018), crowdsourced elites (Papacharissi, 2014), political influentials (Dubois & Gaffney, 2014), and other terms. The definition of opinion leaders stems from the two-step flow communication theory (Katz & Lazarsfeld, 1955) and was based on a person's ability to impact their personal ties by exerting social pressure and social support and was also determined by the degree of influence on people's influence and behaviour (Rogers, 1962, p. 354). The theory has evolved since then: Modern opinion leaders no longer rely on information from traditional media and can distribute information first-hand online (Walter & Brüggemann, 2020).

In a methodological sense, scholars tend to identify opinion leaders on various platforms differently, mostly because platforms have different features that are used to measure their influence. Papacharissi (2014, p. 46), exploring Twitter communication "elites," notes: "Elite nations, organisations, or individuals typically dominate news streams online through the logic of tweeting and retweeting," as observed in the Arab Spring movement. But another group of opinion leaders emerged comprising bloggers, activists, and intellectuals, all of whom became leaders in Twitter discussions; they were engaging with the media elite by retweeting, mentioning, and engaging in other platform features. This elite formation happened due to the "fluid and organic progressions of practices claimed by the crowd and crowdsourced" (Papacharissi, 2014, p. 47). Retweets and mentions, in this logic, are useful in defining most interactions among users, and such influence is associated with being seen as an expert in the community (Dubois & Gaffney, 2014, p. 1263).

Lewis (2018, p. 1) analysed the "alternative influence network" on YouTube, "an assortment of scholars, media pundits, and internet celebrities who use YouTube to promote a range of political positions." They build their influence by referencing and including other people in video content. Indicators of influence on YouTube are materialised through the features of views, shares, and likes. The platform famously measures influence through the number of subscriptions on the platform and rewards channels with the YouTube Creator Award and the subscriber number status (e.g., diamond, gold, silver, etc.). However, YouTube's platform architecture boosts the status of an influencer through recommendation algorithms. Algorithms recommend personalised sets of videos for users based on, among other things, YouTube's related video algorithm, user clicks, watch time, survey responses, and other user activity (Goodrow, 2021). Algorithms at various times have been met with pushback from experts: Noble notes that algorithms are far from neutral, and mathematical formulations driving automated decisions are "made by human beings" (Noble, 2018, p. 1) that define our social interactions on platforms. It is not clear to what extent YouTube recommendation algorithms are based on user personalisation and user experiences rather than automated decisions determined by Google employees. In any case, such confluence of factors, including the algorithm of the related videos and driving recommendation algorithms, highlighted the communication of particular channels during the Free Navalny protests and drove more views and subscriptions to their channels.

On Facebook, engagement, outreach, and sentiments are considered key indicators of influencers (Arora et al., 2019). They are embedded in the influencer index on social media developed by researchers from marketing studies. The features responsible for such indicators are reactions, comments, and shares; they reveal the post-level engagement on the platform with the content. Apart from visibility, Gerodimos and Justinussen (2015) have explored the participatory potential of Facebook features when users engaging with politicians' content can affect decision-making, which was found to be limiting and top-down on the platform.

We listed the most intrinsic features of the platforms that can facilitate the political influence of various communicators. Based on the literature review above but also on the limitations of APIs determining the data structure collected from each platform, we pre-determined the set of features for our three platforms to measure political influence (see Section 4). In our case, these are retweets and mentions for Twitter, recommendation algorithms and subscriptions for YouTube, and user engagement on Facebook (likes, comments, reactions, and shares). Our purpose, thus, was not to find a standardised influence indicator across platforms. Drawing from cross-platform research (Rogers, 2018), we note that platforms have different cultures of use and different features. For instance, hashtags on Twitter would not have an equal meaning or influence on Facebook. The more prosperous approach is to study a political event across platforms, based on the platform's intrinsic features, specifically the features that facilitate the political influence of the critics of the Russian regime.

3.3. The Role of Digital Platforms in Russian Protests

The communication of the regime-critical actors can be seen as an amalgamation of communicators, environments, and discursive practices, what Toepfl (2020) broadly called "authoritarian publics." The discursive practices that allow visible criticism of the leadership of the country, its policies, and other authoritarian practices distinguish Navalny's movement among others in Russia not least due to the role of digital platforms in their communication. Social media do play a role in framing Russian contentious politics (Nechai & Goncharov, 2017, p. 271). Protesters' discursive practices can rely on offline and online structures and mechanisms that offer individuals variety and diversity of modes of participation in anti-regime protests, what Lokot (2021) dubbed "augmented dissent." She highlights the cases of Euromaidan protests in Ukraine in 2013–2014 and anti-corruption protests in Russia in 2017 organised by Navalny's movement and the centrality of platform affordances that were vital in shaping power relations between citizens and the state during those protests. However, these relationships as well as the role of various platforms in it were constantly transforming since at least the protests For Fair Elections (2011–2012), where platforms famously played distinct roles in the rallies' facilitation and mobilisation of support.

Facebook helped spread anti-regime information and mobilise support for 2011–2012 demonstrations to a greater extent than Russian analogues like VK (former VKontakte) or Odnoklassniki (White & McAllister, 2014). Twitter and Facebook helped raise the audience's awareness of electoral fraud during the 2011 parliamentary election through, among other platform features, scrolling "recommended links to outside outlets as well as through friends' commentaries and discussions" (Reuter & Szakonyi, 2013, p. 33). Litvinenko points out that while social media allow the activation of horizontal and bottom-up linkages for political mobilisation, in the case of the 2011–2012 protests, digital publics searched and relied on charismatic leaders with a clear vision, while their absence impacted the "revolutionary mood" (Litvinenko, 2012, p. 186) negatively. Therefore, both vertical and horizontal communication were important for successful online mobilisation during the For Fair Elections protests.

That did not change in the later series of anti-corruption protests in 2017 organised by Navalny. Anti-government users on Twitter were found to be "much more instrumental in consolidating offline communities of politically active individuals" than pro-government users (Nechai & Goncharov, 2017, p. 279). Glazunova (2022) discusses how various platform features of YouTube such as "click," "like," and "share" were used by Alexey Navalny in his YouTube videos as a "call for action" in the 2017 protests. They acquired political meaning in an authoritarian regime and were seen as a safer and effortless form of political participation for citizens. However, law enforcement and censorship bodies in Russia have eventually increased the volume and tightened the penalties for activities on the internet and social media. By 2021, the Russian human rights project Online Freedoms Project (2021) recorded 451,518 individual interventions in internet freedom in Russia (one and a half times more than in 2020); most incidents (427,000) were associated with the prohibition of information on various grounds, as well as blocking individual pages, sites, and IP addresses.

Due to this, by the time of the late 2010s, the nature of augmented dissent in Russia became "strategic, contested, and survival-oriented" (Lokot, 2021, pp. 163–164). The Russian protesters faced growing state pressure both on protest squares and online, which has since only worsened for the Russian regime critics and reached its culmination during the full-scale invasion of Ukraine by Russia in 2022. Despite social media's potential for citizen self-organisation, without functioning anti-regime public opinion leaders, the prospects of successful online mobilisation are bleak in Russia. However, the Free Navalny protests showed how digital platforms and their affordances still highlighted prominent anti-regime communicators.

3.4. Anti-Regime Influentials

Anti-regime digital publics in Russia comprise not only activists but other political communicators too, including journalists, anonymous online groups, media outlets, comedians, bloggers, and ordinary users, who promote anti-authoritarian and anti-Kremlin agendas on digital platforms. The existence of such anti-regime publics on Twitter, for example, can be traced back to the 2011–2012 protests For Fair Elections and beyond (Dehghan & Glazunova, 2021; Kelly et al., 2012; Nechai & Goncharov, 2017; Spaiser et al., 2017). These publics are led by various opinion leaders on different platforms facilitated by their features, whom we call anti-regime influentials. In an authoritarian context, these are political communicators, who share an anti-authoritarian and anti-regime ethos (Herasimenka, 2020), spread anti-regime discourses, and possess and exercise various degrees of political influence online facilitated by digital platforms and their features. They are at high risk of facing persecution, censorship, and surveillance for their political activities but also political influence online. We avoid using the term "influencers" in this context and use the more neutral "influentials" (Dubois & Gaffney, 2014), as the term "influencers" has a commercial connotation in the literature, as put by Abidin (2015, p. 1): influencers "monetise their following by integrating 'advertorials' into their blog or social media posts," which not always are incentives for Russia's political actors.

Overall, using the case study of the Free Navalny protests that gathered large anti-regime publics, we develop a methodological workflow to map these publics on various platforms, to identify anti-regime influentials, and to get an idea of different cultures of platforms use during the major anti-regime protests in Russia. We discuss the methodology of assessment and the influence metrics in the next section.

4. Methods

4.1. Platforms

We chose international tech giants like YouTube, Twitter, and Facebook for the analysis as they were previously shown as alternative and trusted forums for anti-regime communication in the 2010s. Russian domestic platforms like VK and Odnoklassniki are known for assisting surveillance and censorship of anti-regime communication. There are no trustworthy reports on the audiences of social media platforms in Russia. International sources estimate that in February 2021, there were 99 million social media users in Russia, 67.8% of the total population (Datareportal, 2021). In 2021, Russian VK remained the most popular platform (73% of users), YouTube came in second (68%), Facebook was used by 37% of users, and Twitter by 14% (Buchholz, 2021).

4.2. Data Collection

We collected different types of publicly available data from three platforms. Table 1 presents the data-gathering tools and APIs deployed for each platform. The terms "Navalny," "Free Navalny" (a slogan and name for protests), and "protests" in the Russian language were used as the search queries for the period from January 1 to April 30, 2021, when four major demonstrations were held. We aimed to collect data using these broad terms connected to the protests and then filtered anti-regime influentials using quantitative and qualitative methods for each platform (see further Sections 2.2, 2.3, and 2.4). We used multiple analysis techniques to first map the anti-regime public and then identify the anti-regime influentials on each social media platform (Twitter, YouTube, and Facebook) depending on the nature of the data. Figure 1 depicts the overall method we followed. For each platform, we used different methods such as social media analytics and network analysis, followed by a qualitative analysis of the top 25 influentials per each platform discussing the Free Navalny protests. Due to the different sizes of the datasets, we used a purposive sampling of the first (top) 25 accounts, pages, groups, profiles, or channels per each platform that share similar traits or specific characteristics (homogenous sampling), e.g., known critics of the regime that are communicating in the Russian digital public spheres. However, we also made a note of influential actors that appeared in the networks and datasets along with anti-regime communicators.

4.3. Twitter

Following Dubois and Gaffney (2014), to identify anti-regime influentials on Twitter, we first constructed both retweet and mention networks using the statistical programming language R. We visualised the retweet and mention networks using the network analysis software

Table 1. Data collection tools.

Platforms	Keywords (translated to English)	Period	Application Programming Interface	Tools	Data type (publicly available)	No. of data points
Twitter	Navalny; Free Navalny; protests	January 1 2021–April 30 2021	Twitter API	TweetQuery; Twitter Academic API	Tweeting activity data	3,494,461 unique tweets
YouTube			YouTube API	YouTube Data Tools (Rieder, 2015)	List of video descriptions and statistics retrieved by a search query	4,683 videos
Facebook			CrowdTangle API	CrowdTangle	Facebook posting activity data	339,184 Facebook posts

Gephi (Bastian et al., 2009) and ForceAtlas2 graphic layout algorithm (Jacomy et al., 2014). We focussed on retweets and @-mentions networks that allowed us to measure the most interaction within the network (Dubois & Gaffney, 2014). The retweets allow users "to generate content with pass-along value," while the mentions allow users "to engage others in a conversation" (Cha & Gummadi, 2010, p. 12). As we were interested in seeing if there were distinct anti-regime communities within these networks, we then applied the Louvain modularity detection algorithm (Blondel et al., 2008) provided by Gephi. After identifying the anti-regime cluster(s) of the retweet and mention networks, we chose the top 25 anti-regime influentials and ranked by the highest weighted in-degree metric (a standard measure of assessing the popularity and/or influence on the platform; Dubois & Gaffney, 2014), in the network followed by a qualitative analysis of these accounts.

4.4. YouTube

To identify influentials on YouTube, we used the video network tool YouTube Data Tools (Rieder, 2015) to collect the data and construct a channel network. We collected 4,683 videos via the Video List Module which forms a list of video infos and statistics based on search queries (Rieder, 2015). We then chose the top-viewed 50 videos from the list to construct a network of related channels for these videos by the platform. The algorithm of related videos is a "building block" for YouTube's recommendation algorithm (Davidson et al., 2010). Through YouTube Data Tools, we obtained a network file that comprises a network of relations between channels by inputting the same search queries (see Table 1). We then visualised the network using Gephi and the ForceAtlas2 algorithm (Jacomy et al., 2014). As the network did not show distinctive polarised communities, we manually chose the top 25 YouTube anti-regime channels with the highest weighted in-degree in the network connected with anti-regime actors in Russia and qualitatively analysed them. For these YouTube channels in our network, we compiled the YouTube Creator Award status based on the subscriber count (YouTube Creators, n.d.). Such gradation looks as follows: silver (100,000); gold (1,000,000); diamond (10,000,000); red diamond (100,000,000).

4.5. Facebook

As we were limited to analysing only Facebook public spaces (pages, groups, and public profiles), we leveraged

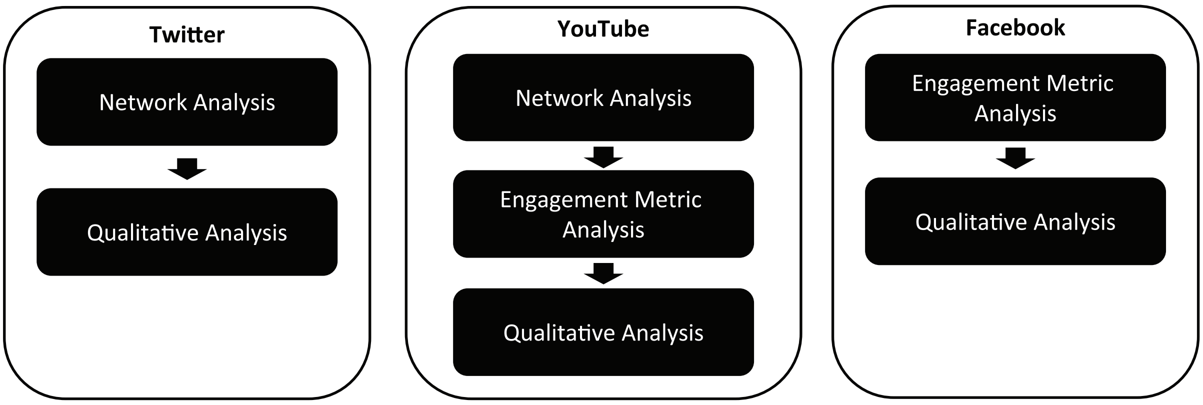

Figure 1. Influentials' identification method.

an engagement metric analysis to identify Facebook anti-regime influentials. We first removed the duplicate posts in our dataset, and then for each Facebook account (i.e., page, group, and profile). In this section, we employed social media analytics to compute the engagement with the Facebook public space, using the standard formula for Facebook studies (Figure 2). Along with the total engagement metric, we leveraged a qualitative analysis to identify the top 25 anti-regime influentials on Facebook from a complete list of actors.

4.6. Qualitative Analysis

Applying our expert knowledge of Russian politics, we then analysed and categorised Russian anti-regime influentials for each platform. Apart from individuals, we included critical media outlets, anonymous political discussion groups, and humoristic accounts, as they also possess political influence online and are part of the suppression processes inside the country. Satiric accounts and comedians are also providers of political information.

We note here the fluidity of the different statuses of anti-regime influentials. To be able to survive in a rigid autocratic environment, such actors "try on" several political communication roles (journalist, politician, blogger, or activist; Glazunova, 2022). A good example here is Navalny himself, who was an activist, ran for political office, produced journalistic investigations on YouTube, and is an active blogger (Glazunova, 2022). There is also the fluidity in their relation to Russia's political system. Non-systemic opposition leaders on some occasions were elected or appointed at different times (e.g., Ilya Yashin was a chairman of the Council of Deputies of the Krasnoselsky Municipal District in Moscow). Being part of the political system, they regularly criticised the establishment, and on these grounds were ousted from politics. Some journalists were working for mainstream media and then moved to the platforms (e.g., Yury Dud'). One radio station, the Echo of Moscow, is an exceptional case here: it was funded by state oil and gas company Gazprom; however, the outlet moderately criticised major state policies and gave voice to the opposition (e.g., Alexey Navalny was a frequent guest of the radio station, while a known critic of the Russian regime like writer Dmitry Bykov was a regular host on Echo). In this sense, the Echo of Moscow was more liberal than independent (as of 2022, the outlet was shut down by Gazprom Media). Online media outlet *Meduza* has its headquarters in Latvia, due to previous suppression of its editorial in Russia. Due to these factors, the following categorisation of the influentials in Supplementary File (Appendix 1) remains largely broad, however, it considers the specificities of the Russian political context.

Finally, we acknowledge the controversy of political stances and allegiances of some of the actors over time (e.g., anti-regime publicist and journalist Aleksandr Nevzorov was an official representative of Vladimir Putin during the 2012 presidential election). We include actors that are known for critical stances of the Russian regime; however, we do not evaluate the evolution or controversy of their political views.

4.7. Limitations

The focus on pro-Navalny protests potentially limits our results to anti-regime actors connected, discussing, or sympathising with Navalny. They might not include other actors who did not speak on the topic of Navalny's protests (in the analysis, we captured the criticism of Navalny by the former Yabloko party leader Grigory Yavlinskii on Facebook, see Section 5.3). We analysed only a total of 75 popular accounts and not all the publics. We did not analyse private messaging apps Telegram and WhatsApp as current privacy restrictions, technological limitations, and ethical concerns make reliable and meaningful data collection near impossible.

5. Findings

Using the suggested methodological workflow, we identified the anti-establishment influentials discussing the Free Navalny protests on three platforms (RQ1).

5.1. Twitter

The Twitter dataset is the largest dataset among the three platforms (3.5 million unique tweets). Figure 3 demonstrates general posting activity on Twitter during the Free Navalny protests. The peaks of the activity are associated with major demonstrations in support of Navalny (on January 23, and February 2, less so on January 31 and April 21). The discussions subsequently deteriorated since March due to the protests' leaders being imprisoned or arrested, their web resources banned, and the media outlets recognised as "foreign agents" amongst other measures. Another factor contributing here is a move by Roskomnadzor which limited the speed of access to Twitter due to the platform's non-compliance with the requirements of the Russian legislation from March 10, 2021; this largely affected the mobilisation potential and information sharing about protests with international audiences.

$$\text{Total Engagement} = \frac{\text{reactions} + \text{comments} + \text{shares}}{\text{Number of posts}}$$

$$\text{Reactions} = \text{like} + \text{angry} + \text{care} + \text{love} + \text{haha} + \text{wow} + \text{sad} + \text{thankful}$$

Figure 2. Formula for total engagement with Facebook posts. Source: Arora et al. (2019).

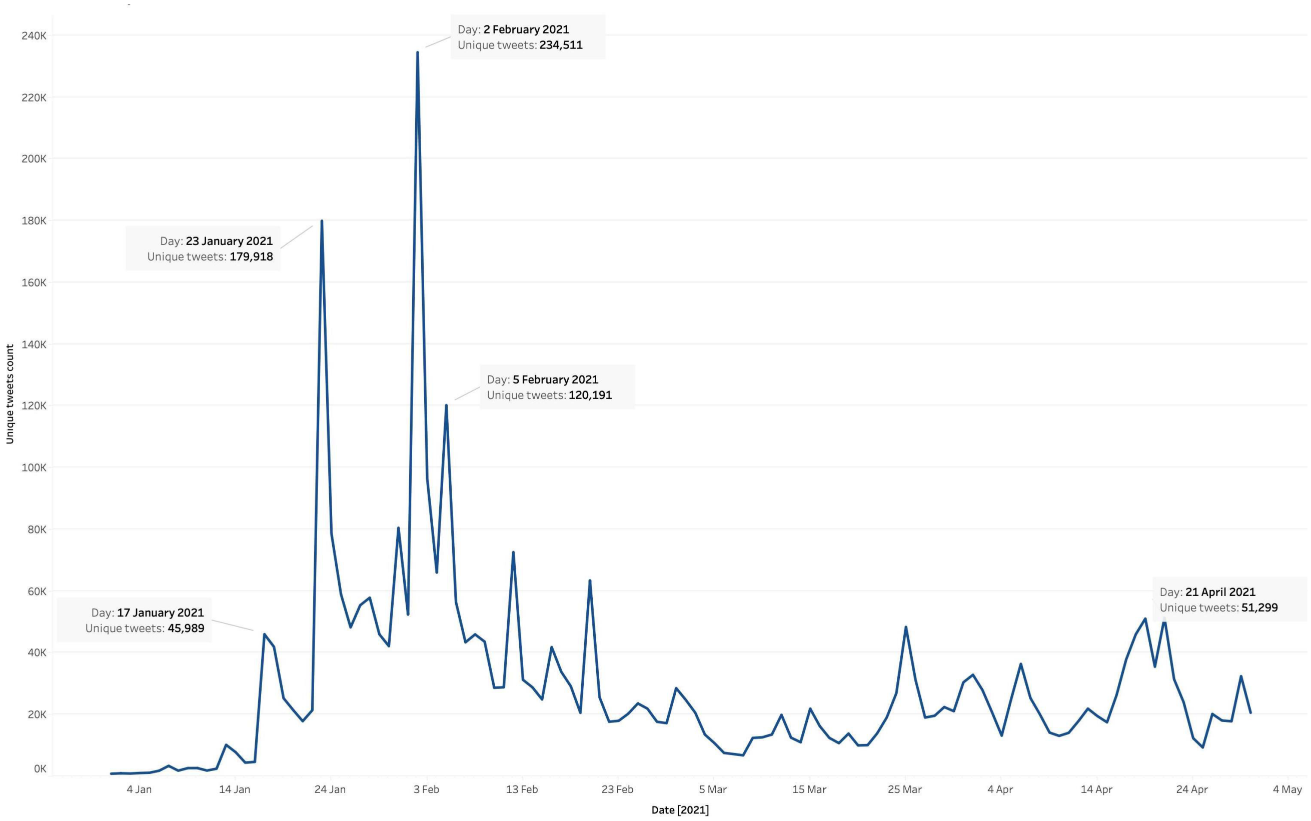

Figure 3. Twitter activity January–April, 2021 (3,454,294 unique tweets).

We further analysed the retweet and mention networks in R and Gephi (Figures 4 and 5) to filter anti-regime online crowds. The networks showed the established polarisation of pro-Kremlin and anti-Kremlin clusters of users (Dehghan & Glazunova, 2021; Kelly et al., 2012; Spaiser et al., 2017); we label them pro-regime and anti-regime clusters, respectively. At the core of the anti-regime clusters are the users led by the non-systemic opposition and critical news media. Through retweets, they are joined by a small cluster of users led by feminist and LGBTQIA+ activists and users from Ukraine involved in the transnational discussion of the topic. Feminist, urban, and LGBTQIA+ activists had a significantly lower weighted in-degree score in the networks, sometimes 17 times less than top-ranked accounts; therefore, they were not explored in this article. In mentions, such sub-clusters mostly repeat but were somehow enlarged by Russian urban activists and other international users. In this article, we are interested in the anti-regime influentials that were at the core of the protests' discussions inside Russia. We did not find pro-regime actors within top accounts of anti-regime clusters (they were mostly concentrated in the pro-regime cluster and therefore excluded). Supplementary File (Appendix 2) depicts the top 25 influentials detected through the mentions and retweets networks sorted by highest weighted in-degree.

Twenty-two out of 25 influentials can be found both among the most retweeted and mentioned accounts. These are accounts of the opposition activists (8 out of 25) that were at the forefront of the Navalny movement: Alexey Navalny, Lyubov Sobol, Mariya Pevchikh, Kira Yarmysh, Leonid Volkov, Ivan Zhdanov, Ruslan Shaveddinov, and Ilya Yashin. Despite Navalny's imprisonment, his social media accounts remain active and are maintained by his team. Some of these individuals were also operating from abroad (e.g., Ivan Zhdanov), and some were present or helped to organise the protests and were arrested during protests (e.g., Yarmysh, Sobol).

There were nine critical media outlets (out of 25) such as TV Rain, *The Insider*, Echo of Moscow, Radio Svoboda, Mediazona, *Meduza*, Navalny LIVE, and OVD-info. DW in Russian and MBKH media appeared only amongst the most retweeted accounts. Media outlets like Radio Svoboda, *Meduza*, BBC Russian, and DW in Russian are foreign media outlets for Russian-speaking audiences; the rest are critical domestic media outlets (e.g., TV Rain) and activists' media. The exception here is the Echo of Moscow, a state-sponsored media outlet.

A satirical anti-government account, @prof_preobr (named after Professor Preobrazhensky from Mikhail Bulgakov's novel), and one blogger among the most mentioned accounts, Rustem Adagamov, known for his LiveJournal blogging under the nickname *drugoi* (in English: "Other"), were in the list too. Other influentials were accounts of Navalny's team, the Open Russia movement, created by previously imprisoned businessman in exile Mikhail Khodorkovsky, an anonymous

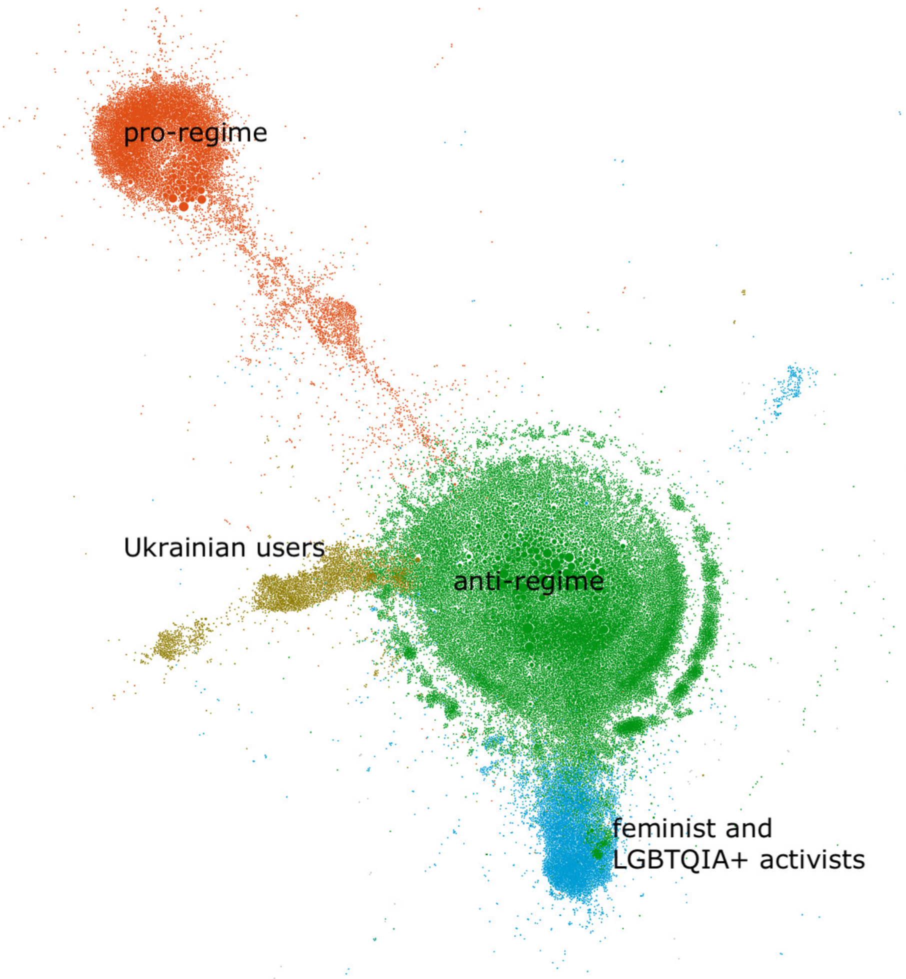

Figure 4. Twitter retweets network. Notes 73,300 nodes; filtered by out-degree >2.

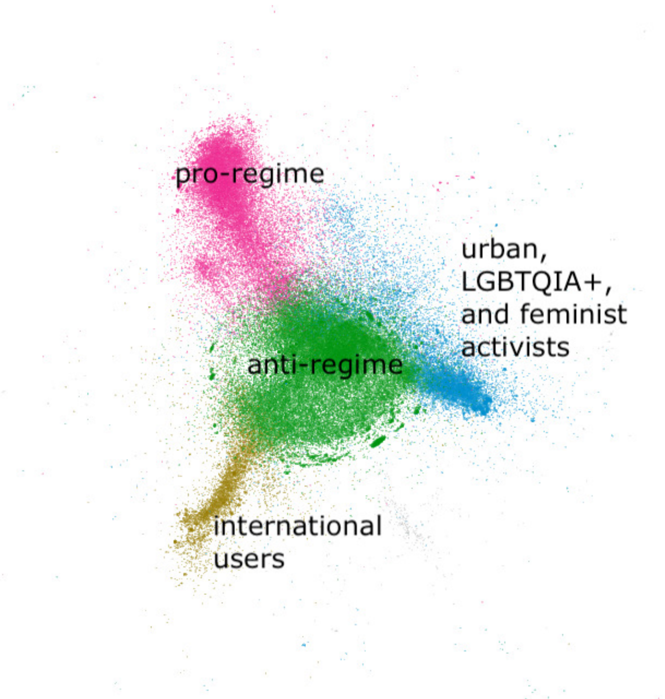

Figure 5. Twitter mentions network. Notes: 100,358 nodes; filtered by out-degree >2.

account discussing politics, and the account of an ordinary user, unnamed in the article for ethical reasons.

Overall, Twitter's anti-regime influentials are represented by traditional opinion leaders who are "most likely to send out first-hand and/or reliable information and have a professional reputation" about the protests (Dubois & Gaffney, 2014, p. 1270). Satiric, blogger, and ordinary user accounts were present in the list too which points to the organic nature of their influential status assigned by the online crowds (Papacharissi, 2014).

5.2. YouTube

YouTube's dataset was the smallest in the sample (4,683 videos). YouTube activity during the protests is shown in Figure 6. As per Twitter, the peaks represent the dates of the major Free Navalny demonstrations. YouTube activity also declined in March; however, unlike Twitter, the largest peak of activity was documented on April 21, with 140 videos posted on the topic—the day of the last large protest in a series.

We constructed a network of related channels for the 50 most viewed videos using Gephi (see Figure 7) and excluded three pro-government (domestic television channels Rossiya 24, Rossiya 1, and Russia's state-sponsored media outlet for foreign audiences, RT in Russian) and three irrelevant channels from the list. Interestingly enough, in 2022, YouTube banned all those pro-government news channels due to Russia's full-scale invasion of Ukraine. We ranked the top 25 anti-regime channels from the network by weighted in-degree in the network and matched their YouTube status based on the number of subscribers at the time of data collection. The results are in Supplementary File (Appendix 3). Eighteen out of the 25 top YouTube channels, potentially most recommended by the platform, were the channels with the gold status; the remaining seven were with the silver status.

There are fewer opposition activists and politicians (two) prominent on YouTube compared to Twitter. Only Navalny and Yashin appeared here, while other activists were ranked below the top 25. YouTube influentials were mostly represented by critical news media and journalists (16 out of 25). Some of the critical media outlets already appeared on Twitter (TV Rain, DW in Russian, Navalny LIVE, Echo of Moscow, Radio Svoboda, and MBKH media), while some were distinctive for YouTube (Current Time, RusNews, and *RBK*), but the personal channels of journalists (6 out of 16) are the most relevant as they have recently become very popular in Russia.

Glazunova (2022) describes how the new generation of journalists-YouTubers emerged as a popular trend in Russian journalism. Often disgraced in mainstream media, journalists used YouTube to perform high-quality journalism, supported by the revenue offered by the platform. These are channels in our list like VDud' by Yuri Dud, Beware Sobchak by Ksenia Sobchak, And to Talk*?* by Irina Shikhman, Editorial by Aleksey Pivovarov, and Varlamov by Ilya Varlamov. These journalists possibly reported on the movement before or during this time. The combination of the popularity of the genre on Russian YouTube, as well as YouTube's algorithms, most likely pointed to already popular channels and videos.

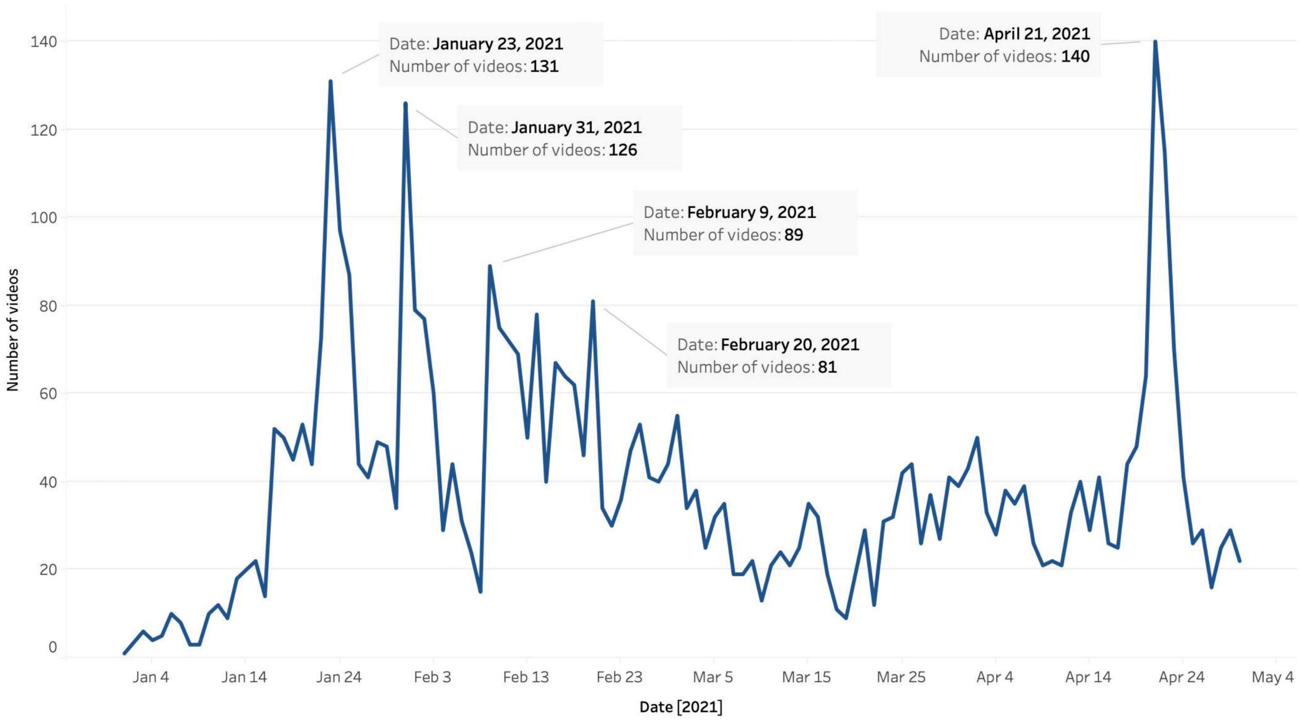

Figure 6. YouTube activity January–April, 2021 (4,683 videos).

Two accounts belong to Ukrainian journalist Dmitry Gordon, who has invited Russian opposition personas to his YouTube show. Another group of influentials on YouTube comprises Russian comedians and standuppers such as Ilya Sobolev and Danila Poperechny, or the satiric channel 55x55 with multi-million followers. Their content contained anti-regime sentiments, or it is possible that viewers who watch oppositional content also watch these channels on Russian YouTube as a part of the recommendation algorithm. There were two bloggers on the list: the former journalist and lawyer Mark Feigin, and an ordinary user not mentioned here for ethical reasons.

Driven by related-video algorithms and user behaviour on the platform, we saw that journalists-YouTubers and media outlets are dominant in the anti-regime discussions on YouTube. This confirms YouTube's status as an alternative news medium "that alters the truth claims of news and the professional hegemony of news making" (Sumiala & Tikka, 2013, p. 318). YouTube potentially recommended already popular channels with hundreds of thousands of subscriptions, which points either to the characteristics of the algorithms or the users' habits when they watch the most popular channels and videos. We also note that YouTube algorithms possibly promoted pro-government news for anti-regime videos too.

5.3. Facebook

The Facebook dataset is medium-sized (339,184 posts). Facebook activity during the protests repeats the activity of Twitter and YouTube (Figure 8). The activity spikes coincide with major protests and the day of Navalny's

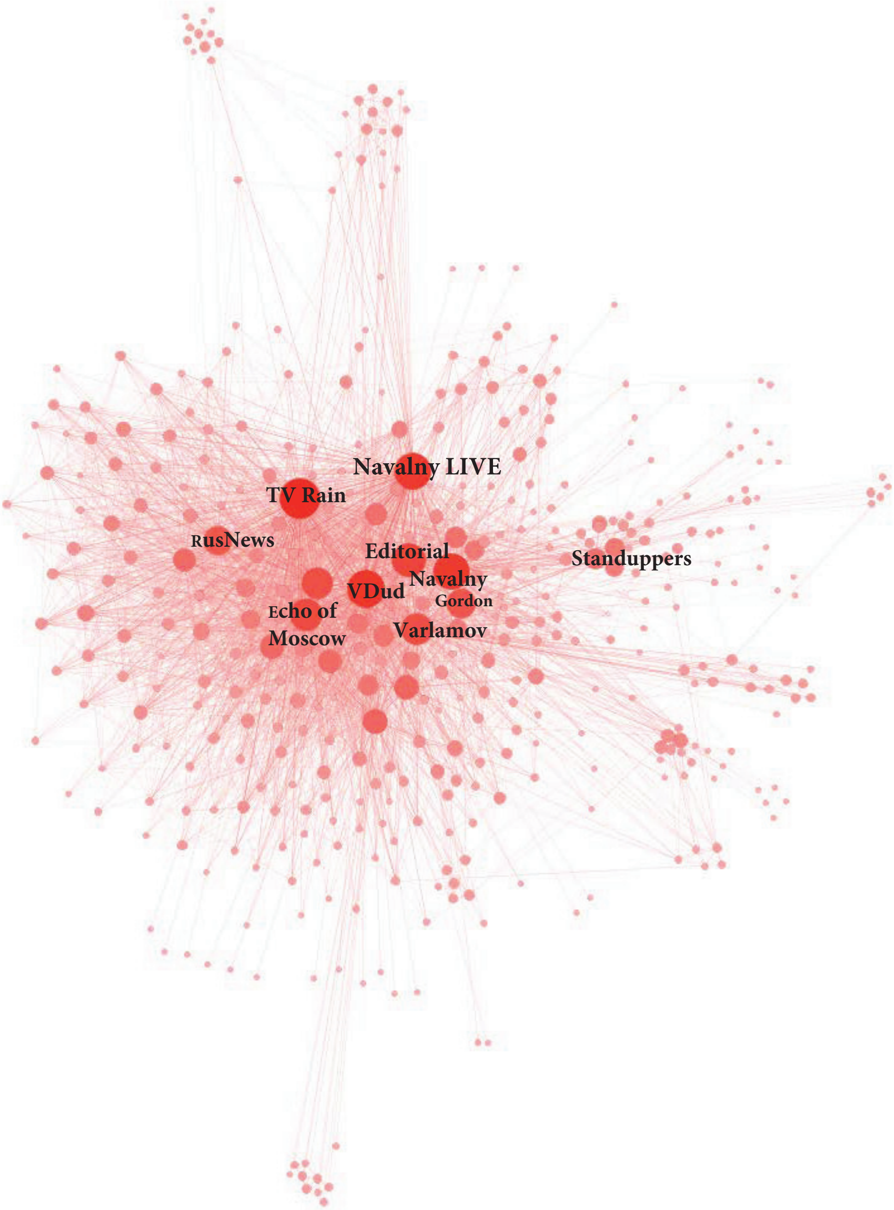

Figure 7. YouTube network of related channels during pro-Navalny protests. Notes: Number of nodes = 429; number of edges = 4,614.

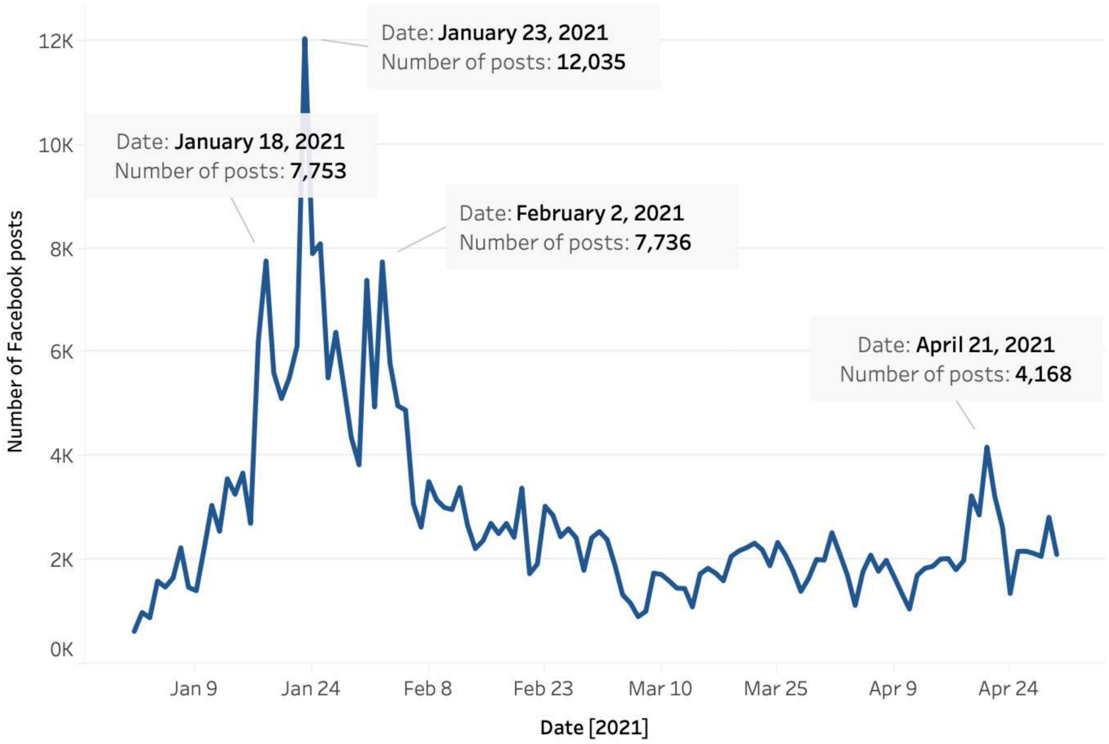

Figure 8. Facebook activity during January–April, 2021 (339,184 unique Facebook posts).

imprisonment (February 2). The decay of the discussions is observed starting from mid-February with a small spike during the last protest of April 21, which points to the similar trajectories of the information flows about protests on three platforms. We calculated the total engagement with Facebook posts. Twenty-five accounts were then manually selected from the ranked list with the highest engagement based on the authors' knowledge of Russian politics. Due to a different methodology applied to Facebook, we were unable to computationally establish the polarisation of anti-regime and pro-regime groups, pages, and public profiles. Therefore, we manually assessed the top accounts with the highest average engagement to filter foreign accounts, unrelated accounts, and pro-regime accounts. In total, we excluded 131 accounts; the majority of them were Ukrainian accounts (also Armenian, Georgian, Bulgarian, Latvian, and others). There were several pro-government accounts: a pro-government journalist from Channel 1, Irada Zeinalova, and an account of News of Channel 1. The results are in Supplementary File (Appendix 4). Most spaces were Facebook pages (17) and verified public Facebook profiles (eight), which points to cultures of user engagement with Facebook spaces. The influentials were known opposition leaders (13 out of 25) who were not directly involved in Navalny's movement.

Apart from Navalny's colleagues (Evgeny Roizman, Ilya Yashin, and Lyubov Sobol), Grigory Yavlinsky, for example, was also on the list. The founder of the liberal Yabloko party, Yavlinsky criticised Putin but also Navalny at the time, labelling him as a "national populist" (Yavlinsky.ru, 2021). Lev Schlosberg, another Yabloko deputy of the Pskov regional parliament (2011–2015) deprived of the mandate, signed an open address to Putin and expressed concern over a threat to Navalny's life at the time. Another anti-regime activist on the list is Mikhail Khodorkovsky, a former political prisoner figuring in the Yukos case in the early 2000s (Dixon & Day, 2010). Other activists were the leaders of the 2011–2012 protests. First in the ranking is writer Boris Akunin (real name: Grigory Chkhartishvili), who regularly expresses his disagreement with Putin's politics. Tatyana Lazareva, a Russian TV host, took part in the 2011 protests; together with Alexey Navalny, Dmitry Bykov, Ilya Yashin, Boris Akunin, and journalist Leonid Parfyonov, they gave speeches at the 2011 protests. Most of these leaders were elected to the then-formed Russian Opposition Coordination Council aimed at coordinating dissent in the country, which dissolved after a year. Facebook was one of the primary forums for communication during the protests in 2011 (White & McAllister, 2014), and has continued to be a platform for the anti-regime critique by the same actors.

There were seven accounts with satirical content. Humoristic content tends to attract more engagement with posts on the platform in general. The account of the pseudo-politician Vitaly Nalivkin consists of video sketches about resonant political events in Russia. In February 2021, the creators released a parody on Navalny's YouTube investigation of Putin's palace featuring Nalivkin, dubbed *Nalivkin's Palace*, which gathered more than a million views and was posted on Facebook too. Five critical and opinion journalists were prominent on Facebook including Alexander Nevzorov, Mikhail Zygar, Leonid Parfyonov, Andrei Loshak, and Arkady Babchenko, as well as the Current Time outlet, and an account of a non-for-profit organisation.

6. Discussion and Conclusion

Our mixed-methods workflow allowed us to map anti-regime publics on three platforms that were discussing the Free Navalny protests and identify anti-regime influentials facilitated by digital platforms. In addition to the self-organisation of digital publics that is enabled by digital platforms in Russia, the top-down communication of anti-regime influentials is equally vital for successful online mobilisation and the organisation of anti-regime rallies. Our analysis showed that in most of the cases (75 total), platforms with their features aided the scalability (Boyd, 2011) of already popular anti-regime communicators in Russian politics. These were at the core: the heads of Navalny's movement (Twitter), the 2011 protests leaders (Facebook), Yabloko politicians (Facebook), critical domestic media outlets and journalists (all platforms), satiric and humoristic accounts (all platforms), and to a lesser extent bloggers and ordinary users. There can be a variety of reasons impacting their high visibility on each platform, including the demographics of audiences on these platforms and the communication strategies of anti-regime influentials. While we did not explore the causality and impact of the factors that aid the visibility of anti-regime influentials, we did observe the cultures of use of digital platforms by the prominent Russian regime critics on two levels: a contextual level and a platform features level.

On the contextual level, we saw the confluence of general platform specifics that make them preferable forums for various groups of political communicators seeking scalability and region-specific (Russia-specific) characteristics. Twitter generally is known as a platform for traditional opinion leaders such as journalists, politicians, and media outlets, joined by the "crowd-sourced" elites (Papacharissi, 2014) comprising activists, bloggers, intellectuals, and ordinary users. Given the long-established political polarisation between anti-regime and pro-regime groups of the Russian-speaking Twitter (Dehghan & Glazunova, 2021; Kelly et al., 2012; Spaiser et al., 2017), it was unsurprising to find the major leaders of Navalny's movement and critical news media dominating the discussion of the protests. The former tried to mobilise their supporters for rallies, political campaigns, and flash mobs using Twitter. Less prominent groups of LGBTQIA+, urban, feminist activists found should be explored in future research. In 2022, when most of the anti-regime influentials were suppressed by the regime, the feminist movement in Russia stepped up as major anti-war advocates, enabling horizontal linkages to mobilise supporters and employing feminist aesthetics (Bredikhina, 2023).

YouTube, generally known as a global alternative news medium, has become a trusted forum for independent media outlets and journalists in Russia. Relative resistance of YouTube to Russian law-enforcement bodies' censorship (Glazunova, 2022) attracted a lot of independent journalists and media outlets to the platform, a development that was confirmed by our findings. Lastly, Facebook is previously known to have a positive impact on citizen protests worldwide (Fergusson & Molina, 2020), though, on the negative side, there were no effects found on regime change, democratisation, or governance. In Russia, Facebook helped anti-regime communicators and protest leaders to facilitate the protests and spread anti-regime information in 2011–2012 (Reuter & Szakonyi, 2013; White & McAllister, 2014) and maintained their popularity throughout the years. However, it is safe to assume that it has not attracted a new generation of activists and related user engagement on the platform since. The large proportion of humour and satiric accounts found among anti-regime influentials brings the role of humour in authoritarian regimes to the fore. Its potential as a digital resistance tactic in Russia should be explored further.

The platform features embedded in the platforms' infrastructures revealed how the networked publics were shaped during the protests and whom they made more visible than others (RQ2). There were only two influentials that appeared on all three platforms: Alexey Navalny and Ilya Yashin. Both Navalny and Yashin were previously found to be effective online communicators who employ digital technologies of the platforms to the fullest (Glazunova, 2022). Russian anti-regime publics continue to rely on top-down communication from charismatic leaders (Litvinenko, 2012). We saw how different platform features aid in the visibility of different groups of actors criticising the Russian regime. However, YouTube algorithms potentially boosted the influence of known pro-regime news channels before their total ban on the platform in 2022.

The scalability (Boyd, 2011) of these actors enabled by the above-mentioned platform features (and beyond) acquires a different meaning in the conditions of authoritarian Russia. To rephrase Boyd (2011, p. 46), "The potential visibility of content in networked publics is great" on platforms for anti-regime influentials in Russia but—threatening their existence. In most cases, the growing political influence and mobilising potential of anti-regime influentials is a reason for their further suppression by the regime. For years the Russian regime could not respond appropriately to the fast-growing, networked, and horizontal structure of connections between regime critics; they preferred to stifle them with a top-down and hierarchical approach targeting anti-regime influentials (Glazunova, 2022). Digital media play a double-edged sword in these processes.

Since 2021 most of the revealed anti-regime influentials have been suppressed in Russia—a process intensified during the full-scale invasion of Ukraine in 2022. Most of the movement's leaders at the time of writing were imprisoned like Navalny and Yashin, detained for short terms (e.g., Roizman), or fled the country (e.g., Sobol). Many anti-regime media outlets were branded as "foreign agents," meaning they receive foreign financing or are under foreign influence (e.g., Mediazona) or are liquidated (e.g., Echo of Moscow). The authors of Nalivkin sketches were charged with hooliganism in 2021. The "augmented dissent" (Lokot, 2021), partly facilitated by platform features and affordances, goes hand in hand with suppression in Russia. Apart from physical repressions of the opposition, the censorship arsenal has also transformed and become advanced: Lately, Russia uses the automated system Oculus to identify and remove anti-regime posts online. The growing prominence of anti-regime influentials has not gone unnoticed; it is constantly monitored and actioned by the regime. Therefore, digital platforms with their features should be cautiously conferred an optimistic mobilising and democratic potential in authoritarian regimes like Russia. The physical absence of prominent leaders (both online and on squares) targeted by law enforcement (Litvinenko, 2012) has indeed limited the mobilising capacity of the opposition movement. This could be seen even from the decline in the volume of communication since Navalny's imprisonment (February 2, 2021) on all three platforms. Later, several Russian anti-war protests in 2022–2023 lacked effective coordination and vocal opinion leaders and gathered fewer people than the Free Navalny protests.

However, such snapshot analysis and suggested methodological workflow can help to evaluate the state of the anti-regime communication flow and its opinion leaders across platforms and over time, inform on cultures of their use in Russia, and potentially be adapted to other authoritarian contexts with regional specifics, platforms, and their features. The long-term benefit of such an approach can be the identification of targeted groups of political minorities online struggling with authoritarianism across the world and the elaboration of viable communication strategies for them by various stakeholders, including digital platforms.

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Conflict of Interests

The authors declare no conflict of interests.

Supplementary Files

Supplementary material for this article (four files) is available online in the format provided by the author (unedited).

References

Abidin, C. (2015). Communicative intimacies: Influencers and perceived interconnectedness. *Ada: A Journal of Gender, New Media, and Technology*, 8, 1–16.

Arora, A., Bansal, S., Kandpal, C., Aswani, R., & Dwivedi, Y. (2019). Measuring social media influencer index—Insights from Facebook, Twitter and Instagram. *Journal of Retailing and Consumer Services*, *49*, 86–101. http://doi.org/10.1016/j.jretconser.2019.03.012

Avtoritarism my uzhe prozhli. Eto diktatura. [We passed authoritarianism already. This is a dictatorship now]. (2021, May 5). *Meduza*. https://meduza.io/feature/2021/05/05/avtoritarizm-my-uzhe-proshli-eto-diktatura

Bastian, M., Heymann, S., & Jacomy, M. (2009). Gephi: An open source software for exploring and manipulating networks. *Proceedings of the Third International ICWSM Conference*, *3*(1), 361–362.

Blondel, V. D., Guillaume, J. L., Lambiotte, R., & Lefebvre, E. (2008). Fast unfolding of communities in large networks. *Journal of Statistical Mechanics: Theory and Experiment*, *2008*(10), Article P10008. https://iopscience.iop.org/article/10.1088/1742-5468/2008/10/P10008

Boyd, D. (2011). Social network sites as networked publics: Affordances, dynamics, and implications. In Z. Papacharissi (Ed.), *A networked self: Identity, community, and culture on social network sites* (pp. 39–58). Routledge.

Bredikhina, M. (2023). On feminist aesthetics and anti-propaganda in Russia. *Arts*, *Multidisciplinary Digital Publishing Institute*, *12*(1), Article 6. https://www.mdpi.com/2076-0752/12/1/6

Bucher, T., & Helmond, A. (2017). The affordances of social media platforms. In J. Burgess, T. Poell, & A. Marwick (Eds.), The *SAGE handbook of social media* (pp. 233–253). SAGE.

Buchholz, K. (2021). *Russia's most popular social media networks*. Statista. https://www.statista.com/chart/26988/most-popular-social-media-in-russia

Cha, M., & Gummadi, K. P. (2010). Measuring user influence in Twitter: The million follower fallacy. *Proceedings of the International AAAI Conference on Web and Social Media*, *4*(1), 10–17.

Datareportal. (2021). *Digital 2021: The Russian Federation*. https://datareportal.com/reports/digital-2021-russian-federation?rq=russia

Davidson, J., Liebald, B., Liu, J., Nandy, P., Van Vleet, T., Gargi, U., & Sampath, D. (2010). The YouTube video recommendation system. In J. Davidson, B. Liebald,

J. Liu, P. Nandy, T. Van Vleet, U. Gargi, S. Gupta, Y. He, M. Lambert, B. Livingstone, & D. Sampath (Eds.), *Proceedings of the fourth ACM conference on recommender systems* (pp. 293–296). ACM. https://doi.org/10.1145/1864708.1864770

Dehghan, E., & Glazunova, S. (2021). "Fake news" discourses: An exploration of Russian and Persian tweets. *Journal of Language and Politics*, *20*(5), 741–760. https://doi.org/10.1075/jlp. 21032.deh

Dixon, S., & Day, M. (2010). The rise and fall of Yukos: A case study of success and failure in an unstable institutional environment. *Journal of Change Management*, *10*(3), 275–292.

Dubois, E., & Gaffney, D. (2014). The multiple facets of influence: Identifying political influentials and opinion leaders on Twitter. *American Behavioral Scientist*, *58*(10), 1260–1277. https://doi.org/10.1177/0002764214527088

Fergusson, L., & Molina, C. (2020). *Facebook causes protests* (Documento CEDE No. 41). SSRN. https://ssrn.com/abstract=3553514

Gel'man, V. (2005). Political opposition in Russia: A dying species? *Post-Soviet Affairs*, *21*(3), 226–246. https://doi.org/10.2747/1060-586X.21.3.226

Gel'man, V. (2013). Cracks in the wall: Challenges to electoral authoritarianism in Russia. *Problems of Post-Communism*, *60*(2), 3–10. https://doi.org/10.2753/PPC1075-8216600201

Gel'man, V. (2015). Political opposition in Russia: A troubled transformation. *Europe-Asia Studies*, *67*(2), 177–191. https://doi.org/10.1080/09668136.2014.1001577

Gerodimos, R., & Justinussen, J. (2015). Obama's 2012 Facebook campaign: Political communication in the age of the like button. *Journal of Information Technology & Politics*, *12*(2), 113–132. https://doi.org/10.1080/19331681.2014.982266

Glazunova, S. (2022). *Digital activism in Russia: The communication tactics of political outsiders*. Springer.

Golosov, G. V. (2011). The regional roots of electoral authoritarianism in Russia. *Europe-Asia Studies*, *63*(4), 623–639. https://www.jstor.org/stable/27975569

Goodrow, C. (2021, September 15). On YouTube's recommendation system. *YouTube Official Blog*. https://blog.youtube/inside-youtube/on-youtubes-recommendation-system

Herasimenka, A. (2020). *Adjusting democracy assistance to the age of digital dissidents* (No. 15). German Marshall Fund of the United States. https://www.jstor.org/stable/resrep26756

Jacomy, M., Venturini, T., Heymann, S., & Bastian, M. (2014). ForceAtlas2, a continuous graph layout algorithm for handy network visualization designed for the Gephi software. *PLoS ONE*, *9*(6), Article e98679.

Katz, E., & Lazarsfeld, P. F. (1955). *Personal influence: The part played by people in the flow of mass communications*. Transaction Publishers.

Kelly, J., Barash, V., Alexanyan, K., Etling, B., Faris, R., Gasser, U., & Palfrey, J. (2012). *Mapping Russian Twitter* (No. 2012-3). Berkman Center Research Publication. http://cyber.law.harvard.edu/publications/2012/mappingrussiantwitter

Lewis, R. (2018). *Alternative influence: Broadcasting the reactionary right on YouTube*. Data & Society. https://datasociety.net/library/alternative-influence

Litvinenko, A. (2012). Role of social media in political mobilization in Russia. In P. Parycek & N. Edelmann (Eds.), *CeDEM 12 Conference for E-Democracy and Open Government* (pp. 181–188). Austrian Institute of Technology; Bundesrechenzentrum.

Litvinenko, A. (2021). YouTube as alternative television in Russia: Political videos during the presidential election campaign 2018. *Social Media + Society*, *7*(1), 1–9. https://doi.org/10.1177/2056305120984455

Lokot, T. (2021). *Beyond the protest square: Digital media and augmented dissent*. Rowman & Littlefield.

Nechai, V., & Goncharov, D. (2017). Russian anti-corruption protests: How Russian Twitter sees it? In D. Alexandrov, A. Boukhanovsky, A. Chugunov, Y. Kabanov, & O. Koltsova (Eds.), *DTGS 2017: Digital transformation and global society* (Vol 745, pp. 270–281). Springer. https://doi.org/10.1007/978-3-319-69784-0_23

Noble, S. U. (2018). *Algorithms of oppression*. New York University Press.

Online Freedoms Project. (2021). Svoboda interneta 2021: Tsarstvo tsenzury. [The freedom of internet: The kingdom of censorship].

Papacharissi, Z. (2014). *Affective publics: Sentiment, technology, and politics*. Oxford University Press. https://doi.org/10.1093/acprof:oso/9780199999736.001.0001

Reuter, O. J., & Szakonyi, D. (2013). Online social media and political awareness in authoritarian regimes. *British Journal of Political Science*, *45*(1), 29–51. https://doi.org/10.1017/S0007123413000203

Rieder, B. (2015). YouTube data tools [Computer Software]. https://tools.digitalmethods.net/netvizz/youtube

Rogers, E. M. (1962). *Diffusion of innovations* (4th ed.). The Free Press.

Rogers, R. (2018). Digital methods for cross-platform analysis. In J. Burgess, A. Marwick, & T. Poell (Eds.), *The SAGE handbook of social media* (pp. 91–108). SAGE. https://doi.org/10.4135/9781473984066.n6

Spaiser, V., Chadefaux, T., Donnay, K., Russmann, F., & Helbing, D. (2017). Communication power struggles on social media: A case study of the 2011–12 Russian protests. *Journal of Information Technology & Politics*, *14*(2), 132–153.

Sumiala, J. M., & Tikka, M. (2013). Broadcast yourself-global news! A netnography of the "flotilla" news on YouTube. *Communication, Culture & Critique*, *6*(2), 318–335. https://doi.org/10.1111/cccr.12008

Toepfl, F. (2020). Comparing authoritarian publics: The benefits and risks of three types of publics for autocrats. *Communication Theory*, *30*(2), 105–125. https://doi.org/10.1093/ct/qtz015

Tufekci, Z. (2018, March 10). YouTube, the great radicalizer. *The New York Times*. https://www.nytimes.com/2018/03/10/opinion/sunday/youtube-politics-radical.html

Walter, S., & Brüggemann, M. (2020). Opportunity makes opinion leaders: Analyzing the role of first-hand information in opinion leadership in social media networks. *Information, Communication & Society*, *23*(2), 267–287. https://doi.org/10.1080/1369118X.2018.1500622

White, S., & McAllister, I. (2014). Did Russia (nearly) have a Facebook revolution in 2011? Social media's challenge to authoritarianism. *Politics*, *34*(1), 72–84. https://doi.org/10.1111/1467-9256.12037

Yapparova, L., & Dmitriev, D. (2021, May 19). Your name is on some FSB officers' list. https://meduza.io/en/feature/2021/05/19/your-name-is-on-some-fsb-officer-s-list

Yavlinsky.ru. (2021). Bez putinizma i populisma [Without "putinism" and populism]. https://www.yavlinsky.ru/article/bez-putinizma-i-populizma

YouTube Creators. (n.d.). *Let's celebrate your hard work*. https://www.youtube.com/creators/how-things-work/get-involved/awards

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