

Media and Communication (ISSN: 2183–2439) 2023, Volume 11, Issue 1, Pages 125–138 https://doi.org/10.17645/mac.v11i1.6032

Article

Negotiating Care Work: Gendered Network Structures of Pandemic Care Discourses on Twitter in Germany

Miriam Siemon * and Wolfgang Reißmann

Institute for Media and Communication Studies, Freie Universität Berlin, Germany

* Corresponding author (miriam.siemon@fu-berlin.de)

Submitted: 27 July 2022 | Accepted: 21 November 2022 | Published: 28 February 2023

Abstract

Precarious conditions of care work are contested and deeply gendered issues all over the globe. The Covid-19 pandemic both intensifies the (national) care crises and makes care work more visible as a public issue. In this article, we ask for the opportunities, structural conditions, and limitations of voice and visibility in emerging publics beyond established media organizations. Applying the concept of performative publics and using social network analysis, we reconstruct and compare the constitution of publics around the two German language Twitter hashtags #systemrelevant and #CoronaEltern. In a comparative design, we ask which actor groups and what kind of genders gain visibility, and in which speaker positions women, men, and non-binary people appear. The comparison of the two case studies reveals rather different network structures and asks for more nuanced, issue-based "medium data" analyses in the linkage of gender media studies and computational methods. Whereas the public discourse on professional paid care work resembles gendered power structures, the public discourse on privatized, unpaid care work shows shifted patterns concerning female visibility. These findings are discussed critically as gendered discourse spaces of professional and privatized care work stay rather separated and thus risk reproducing traditional private/public boundaries. Furthermore, findings emphasize the importance of "invisible" relational work which keeps hashtags running. Ratios of paying attention from women to men and vice versa are unequally distributed. Females either invest more communicative effort than males or receive less attention for the equal amount of reaching out to others.

Keywords

care work; computational methods; Covid-19; gender inequalities; hashtag; media discourse; Twitter

Issue

This article is part of the issue "Global Inequalities in the Wake of Covid-19: Gender, Pandemic, and Media Gaps" edited by Margreth Lünenborg (Freie Universität Berlin), Miriam Siemon (Freie Universität Berlin), and Wolfgang Reißmann (Freie Universität Berlin).

© 2023 by the author(s); licensee Cogitatio (Lisbon, Portugal). This article is licensed under a Creative Commons Attribution 4.0 International License (CC BY).

1. Introduction

The Covid-19 pandemic drastically drew attention to existing gender imbalances, such as the rise of domestic violence or job losses worldwide, that have disproportionately affected and still affect women. One of the questions at stake is how much society values the (gendered) practice of caring: From nursing to childcare and homeschooling, issues regarding the visibility of privatized unpaid care work and professional paid care work have been at the center of feminist research for decades (we use "privatized" instead of "private" care work to emphasize the cultural determinants of private/public boundaries). Therefore, the present article focuses on gendered structures in the German Twittersphere during the pandemic, asking whether social media allowed for new and diversified forms of voice and visibility in care-related discourses. Taking up questions of representation and visibility of gender within discourses on both paid and unpaid care work, we present two case studies based on gender-focused network analysis of Twitter data. The first deals with the hashtag #systemrelevant



(systemically important) and the Covid-19 crisis as a trigger for the societal re-negotiation of who and which occupations are considered essential to keep public life running. The second case study deals with the hashtag #CoronaEltern (CoronaParents) which addresses the challenges of balancing child-related care work and professional obligations during the closure of public institutions such as kindergartens and schools. Both hashtags (indirectly) address feminist issues of societal power imbalances which hadn't been addressed sufficiently by legacy media. Through comparing the structural discourse formations, we ask if digital networked media allow for shifting power imbalances in contrast to institutionalized legacy (news) media.

2. Care Work, Female Invisibility, and Gendered Structures of (Social) Media Discourse

In gender studies as well as in social sciences and ethics more broadly, care is a crucial concept when it comes to explaining gender imbalances. It serves to describe and prescribe the responsibilities of modern welfare states, to criticize neo-liberal capitalism, or to unfold visions for democratic progress (Fraser, 2016; The Care Collective, 2020; Tronto, 2013). While "care" as a vision is introduced by feminists, moral philosophers, and activists, the reality of care work is characterized by social and structural inequalities. Within social sciences, the concept is commonly classified into paid and unpaid care work, and into formal and informal care work (Fine, 2015, p. 269).

The "care crisis" (Dowling, 2021), repeatedly discerned as a global challenge, does not stop at wealthy states like Germany. Even though gender roles became more flexible, it is continuously women who are affected by the "gender care gap" (Böckler-Stiftung, 2021; Klünder, 2017) and its social and material dependencies, not least in the context of care migration (Lutz, 2018). Care remains to be "invisible work" which is not recognized as "real" work, especially in the private realm (Hatton, 2017; Herd & Meyer, 2002). Furthermore, mothers are still tied more strongly to expectations of "caring well" as part of a socio-culturally constructed "female nature" which is still prevalent, especially in Germany (Vinken, 2001). Female emancipation, which manifests in growing professional activity, produces new challenges as older normative expectations regarding child care do not vanish. On a societal level, "caring wrongly," or "caring insufficiently," is a stigma threatening women in the first place. From an intersectional perspective, child care also reproduces inequalities in terms of socio-economic backgrounds. Modern child-centered ideals and the "intensification of parenting" (Walper & Kreyenfeld, 2022) are linked with increased financial pressure which is experienced especially by low-educated parents. Privileged, middle-class families (and women) have more resources and provide significantly more "enrichment activities" (de Moll & Betz, 2014).

Beyond that, jobs in the care work sector as a public realm suffer economic devaluation as well. Many of these jobs are characterized by precarious living and working conditions and lower incomes compared to domains that are predominantly executed by men. In 2020, the majority of all people working in the fields of geriatric nursing (83%) and hospital care (80%) in Germany are female (considered are employments which are subject to social insurance; Statista, 2021). Thus, the private–public distinction as well as the distinction between paid and unpaid work—despite all change—still lead to heavily gendered domains and inequalities.

With the pandemic, care and care work received broader attention. Care became a "buzzword of the moment" (Chatzidakis et al., 2020, p. 889). Many researchers in gender and care studies as well as public intellectuals used the Covid-19 crisis to intervene and to re-emphasize the needs of care workers (e. g., Wood & Skeggs, 2020). Villa Braslavsky (2020) highlights the Covid-19 crisis as an opportunity for society to recognize basic interdependencies and vulnerabilities, and to reflect more generally on the societal relevance of care and caring. Against this backdrop, it could be expected that discourses in both legacy (news) media and social media go hand-in-hand with increased female visibility and more balanced relations with regard to gender representation.

Past media research has consistently foregrounded the fact that women as experts are underrepresented in legacy (news) media coverage and portrayed in a stereotyped way. This applies to various national contexts. While Ross et al. (2018) have made the general observation "where women do intervene in the news agenda is in their roles as wives, mothers and victims and occasionally as politicians and professionals" (p. 824), it is particularly the latter two groups that have increasingly come into focus of research. Female politicians are tied to "non-political stories and with greater emphasis on the 'personal'" (O'Neill et al., 2016, pp. 303-304). Furthermore, they are associated with a lack of leadership skills compared to male politicians (Aaldering & Van Der Pas, 2020; Ette, 2017, p. 1490). Even though other research on leading women politicians has shown that the press represents them as powerful actors as well, references to gendered patterns of the political sphere are still prevalent (Lünenborg & Maier, 2015). Furthermore, problems of gendered representation and visibility are not limited to the political sphere, but also reach into matters of public expertise. In a quantitative analysis of Finnish news journalism, Niemi and Pitkänen (2017) found that the majority of expert sources cited in the news are still comprised of men, regardless of "the progressive nature of a country" (Niemi & Pitkänen, 2017, p. 365). Different than expected, this has not changed during the pandemic (Prommer & Stüwe, 2020). General findings on sourcing women as experts in pandemicrelated issues show continued underrepresentation in legacy (news) media (Araújo et al., 2022; Jones, 2020;



Kassova et al., 2020). Macharia (2020, p. 35) reveals that less than a third of those represented as experts or commentators in Covid-19 news are female (29%), and almost half of the ones speaking out of personal experience are women (45%). This tendency applies to news websites, newspapers, radio, television, and also, at least concerning the experts, to news media tweets. A follow-up study on German TV news coverage (Prommer et al., 2021) proved that women in the health and care work sector remain underrepresented and rarely cited as an expert source as well. Compared to former analyses, there is almost no change between 2016 (28% female) and 2020 (26% female).

Whereas gender biases in legacy media seem to be uncontested, the power of digital media to challenge gendered hierarchies is discussed controversially. With the ongoing growth of social media usage, it is no surprise that scholars increasingly address the question of whether traditional power hierarchies also apply to the social media sphere. Feminist movements demonstrate how counter-publics can be raised through digital feminism which is partly described as a new (Baer, 2016; Jackson et al., 2020) or fourth wave of feminism (Munro, 2013, p. 25).

Publics using hashtags to address sexism such as #MeToo (Clark-Parsons, 2019) or the German predecessor #Aufschrei ("outcry"; Drüeke & Zobl, 2016; Maireder & Schlögl, 2014), as well as those addressing racism (Jackson & Foucault Welles, 2016), have proven their capacity to enable new forms of visibility for marginalized groups, to share experience, and to organize solidarity and resistance (Page & Arcy, 2020). In particular, practices of storytelling (Clark, 2016) are seen as a way to empower these groups to break the silence on inequality and/or violence. At the same time, marginalization for example of Black women and Women of Color takes place in feminist hashtag publics as well (Trott, 2021). Furthermore, social media platforms are owned by (white, rich) men and due to a missing sensitivity for the threats marginalized groups face they offer opportunities for male surveillance and domination strategies such as tracking and assault to control feminist activism (Megarry, 2018). Hashtags like #MeToo are hijacked (Knüpfer et al., 2020), and countered with misogyny, severe backlash, and antifeminist sentiments (Martini, 2020; Sobieraj, 2018). Strongly polarized discourse structures which simultaneously reproduce and transgress established gendered hierarchies are pretty common (Wilhelm, 2021). These specific feminist issues do not necessarily dismantle gendered discourse structures in general. It is a crucial question if the emergence of publics on care work as a subject of less controversial debate, at least compared to sexism or gender-based violence, shows altered discourse structures in social media.

Research on gendered structures of pandemic social media discourse is still rather scarce. First studies about pandemic communication on Twitter find a reproduction of gendered imbalances (Thelwall & Thelwall, 2020).

According to Shugars et al. (2021) women and men who tweet about Covid-19 get equal attention for their tweets. However, they found a visible gender bias among the actors receiving the most attention. These can be regarded as experts within social media discoursesso-called "crowdsourced elites" (Papacharissi & Oliveira, 2012). In this article, we contribute to existing research with results of social network analysis of two care-related publics based on German Twitter data. Focusing on network structures, we attempt to bridge the gap between gender media studies and computational methods. Gender media studies tend to approach social media through (critical) discourse analysis or on the basis of small sample size case studies on specific actors and their communicative action. Researchers in computational methods, on the other hand, often carry out big data studies with large-scale samples, but their findings about gender lack interpretational depth and sensitivity for gendered inequalities (Vasarhelyi & Brooke, in press). We thus present a gender-sensitive analysis and discussion of network structures.

3. Case Studies and Research Questions

The objects of study for the following network analysis are two different hashtags that gained momentum within the pandemic on the German Twittersphere: #systemrelevant (systemically important) and #CoronaEltern (CoronaParents). These case studies are part of a bigger research project on the emergence of public discourses addressing gender inequalities. Based on the practice-theoretical framework of "performative publics" (Lünenborg & Raetzsch, 2018; Lünenborg et al., 2020; Raetzsch & Lünenborg, 2020), we investigate the interplay of different groups of actors in social media publics. Therefore, we differentiate between journalistic, civic-society, scientific/educational and political actors, non-institutionalized media, and private individuals who do not have clear affiliations to bigger social groups like those mentioned. To contribute to gender media studies, we focus on the performativity of gender relations (Butler, 1993) that sensitizes the ways in which genderrelated issues are created and made (in)visible. Within this framework, the analysis of gendered network structures is set as a standard, regardless of whether the negotiated issues are explicitly feminist or not. Because different publics unfold in different manners, we compare the performance of gendered power relations on a case-specific basis and seek to trace the dynamics of gendered voice over time.

The hashtag #systemrelevant contains intense public discussion on which professions are indispensable during crises, how they are socially valued, and by whom they are executed. Starting with the data collection at the beginning of March, the hashtag gained momentum on March 10, 2020, when the first substantial policies regarding social distancing came into effect. Whereas #systemrelevant is an artificial word, offering a diversity



of potential meanings, thematic priority is on health care work in hospitals and residential care homes.

The hashtag #CoronaEltern emerged due to the challenges and difficulties of working parents, such as dealing with the (partial) inaccessibility of formal care and educational institutions as well as adopting new roles and practices such as homeschooling. The first tweet in our data corpus was posted on March 16, 2020. While the hashtag had no significant relevance in the first five weeks of the pandemic, it was set in motion by a trans-medial network of women in feminism, journalism, and politics.

The findings on network structures presented below are part of a mixed-methods design that combines social network analysis, quantitative content analysis, and ethnographic research (Reißmann et al., 2022). This article focuses on the overall structure of the discourses and the results of the social network analysis with regard to gender and temporality, as publics need to be understood as fluid and dynamic. Regarding the contribution of different actor groups, we are especially interested in how publics emerge beyond journalism and thus focus on the relational emergence of publics based on communicative interaction within and between the groups of actors mentioned above. Therefore, we ask:

RQ 1: Which societal groups of actors have the highest visibility in their contribution to the discourse?

RQ 2: (How) does the Twitter discourse on care work challenge traditional gender structures?

RQ 3: In which speaker positions do women, men, and non-binary actors appear?

4. Methods

4.1. Data Collection and Investigation Period

The network analysis is based on Twitter data comprised of the two hashtags #systemrelevant and #CoronaEltern. For the data collection, we used the package rtweet for the programming interface R (Kearney, 2019). German language tweets were collected through the Twitter API since March 2020, when Covid-19 reached Germany. For the #systemrelevant dataset, 27,776 tweets and retweets were downloaded between March and December 2020. In total, the #CoronaEltern dataset consists of 55,302 tweets and retweets from March 2020 to June 2021. The study pays attention to the dynamic development of discourse structures. Thus, the datasets were split into several time intervals following the different Covid-19 waves in Germany (Figure 1).

4.2. Network Analysis

In the first step, networks were created for each of these time intervals with Twitter accounts as nodes and their communicative relations as edges. Twitter offers several modes of communicative relationships which fulfill different functions. While retweets and quotes let information flow through a network, mentions directly address a certain actor (e.g., Boyd et al., 2010). In order to disclose the full picture of communicative ties and to determine the network structure, all retweets, quotes, replies, and mentions were considered as edges in the networks. In order to conduct the network analysis and visualize the networks, we used the open-source programs R (R Core Team, 2020) and Gephi (Bastian et al., 2009).

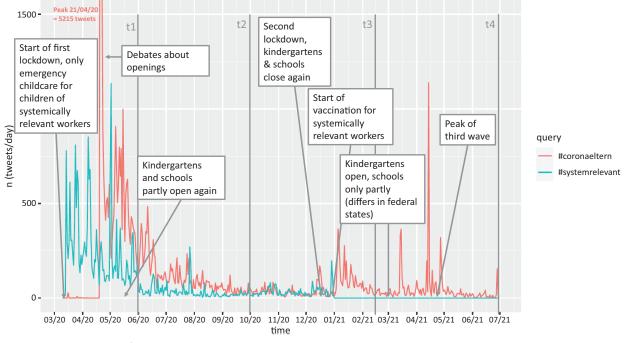


Figure 1. Tweet volume of #systemrelevant and #CoronaEltern.



4.3. Coding of Central Actors

In a second step, the results from the network analysis were combined with a standardized analysis of the central actors. Different forms of centrality give information about certain roles an actor can take within the network. Actors with a high indegree (incoming edges) get a lot of attention and are thus often called authorities. Actors with a high outdegree (outgoing edges) distribute this attention by raising their voices (Shugars et al., 2021, p. 39). Nodes that most of the shortest paths from one actor to another run through, have a high betweenness centrality. These overcome structural holes and connect different parts of the network. They are thus perceived as having the function of bridging actors (Burt, 2004). The most central actors (97% quantile) concerning indegree, outdegree, and betweenness centrality were coded manually for each of the networks. This comprised the coding of the degree of organization (individual or organizational account), the societal affiliation to a specific group of actors (journalism, politics, science, civil society, non-institutionalized media, or private individuals) as well as the actor's gender (female, male, non-binary) of all individual actors. A standardized coding of the profile owner's gender poses certain difficulties. Twitter does not allow users to choose a gender like other social media platforms such as Facebook. Thus, it is not the users that give information about their gender identity, but researchers are dependent on other profile information such as the name or the profile description. In order to conduct the gender coding while maintaining the utmost sensitivity to the self-description, we developed a multistage coding procedure. First, the coders checked if any pronouns such as "she/her," "they/them," or "he/him" were given by the profile owners themselves. Second, any other gender-specific terms such as mother, father, or gendered job titles (e.g., Pfleger, male nurse; Pflegerin, female nurse) were considered. Third, the actor's first name and fourth-and only if none of the other aspects revealed sufficient information about the actor's gender-the profile picture was taken into account. The central actors of both case studies were coded by three coders each. For both case studies a sample of 50 actors was coded by all coders to test the intercoder reliability (Holsti method). Values of reliability for #systemrelevant: degree of organization = 0.92; societal affiliation = 0.73; gender = 0.87. Values of reliability for #CoronaEltern: degree of organization = 0.91; societal affiliation = 0.76; gender = 0.87.

5. #Systemrelevant and #CoronaEltern: Reproduction or Transgression of Gendered Hierarchies?

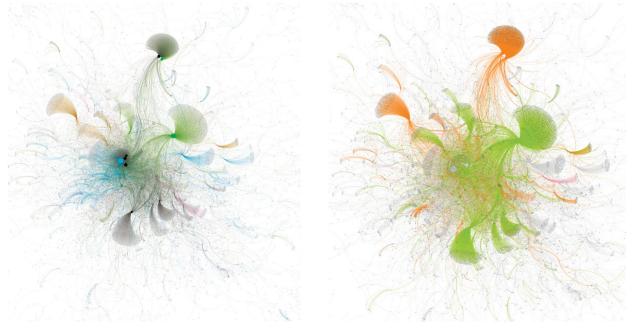
As outlined in the theoretical section, we assumed that the negotiation of care issues in social media (in contrast to legacy media), especially in times of crisis goes hand-in-hand with increased attention to the female face of care. However, the comparative analysis of the networks of the two hashtags reveals rather differing discourse structures. First, we present our findings on the network structures concerning the actor's societal affiliation and its gender, as well as the gender distribution within the different groups of actors. Second, we report on the central roles that actors take within the discourse. Third, we take a closer look at the edges and the interlinkage behavior between female, male, and non-binary accounts regarding gender homophily. Altogether, the findings allow us to understand how the gendered structure of hashtag publics is interactively constituted by its participants.

5.1. Network Structure

Most of the tweets including the hashtag #systemrelevant were posted during the first months. With time, the usage of hashtags decreased. The discourse network containing #systemrelevant tweets from March to May 2020 (t1) consists of 14,212 nodes and 30,725 edges. The second network (t2) has 3,245 nodes with 5,110 edges and the third (t3) only has 2,736 nodes with 3,893 edges. Figure 2 shows the discourse structure during the first months concerning the attention that different kinds of actors receive (node size proportional to indegree). The network visualization shows that it is not a polarized discourse but rather one where different groups of actors recognize each other. The network center is dominated by civil society activists and organizations (light blue) such as alliances of care workers, political actors (black) who receive a lot of attention by being directly addressed via mentions, and some private individuals (green) whose tweets got retweeted a lot. However, journalists (pink) do not reach a prominent position within the center of the #systemrelevant discourse on Twitter. In particular, care work activists contributed to the increase of the hashtag's prominence and used the upcoming discourse on systemic importance to reject cheap applause and point to the need for structural change (Reißmann et al., in press). Furthermore, the #systemrelevant discourse shows a visible attention gap concerning the actors' gender (Figure 2b). Male actors clearly dominate the center of the network while female and, even more noticeable, non-binary accounts stay in the periphery. However, some of the nodes receiving most of the attention are organizational accounts such as the ones from nursing activism mentioned above. Neither the formation of the different groups of actors nor the gender bias does fundamentally change with time.

Within the #CoronaEltern discourse, the highest tweet volume was found during the initial months as well. While the first network consists of 11,685 nodes with 35,861 edges, the number of actors participating decreased steadily with t2: 5,046 nodes and 17,322 edges, t3: 3,892 nodes and 8,254 edges, t4: 4,275 nodes and 6,681 edges. Compared to the previous findings, we can observe a much stronger presence of female actors





(a) actor groups

(b) gender

Figure 2. Network structure #systemrelevant by actor groups (a) and gender (b) using the Yifan Hu layout algorithm. (a): black = politics, light blue = civil society, pink = journalism, cyan = science & education, green = private individuals, orange = other, blue = non-institutionalized media, grey = not identifiable/not coded); (b): orange = female, green = male, pink = non-binary, grey = not identifiable/no individual actor/not coded. Note: Node size follows indegree.

(orange) in the network center of the #CoronaEltern discourse (Figure 3b). Even though the number of actors coded as non-binary is very small in this sample (n = 2), one of them is also present among the actors with a higher indegree in the network center. Contrary to the #systemrelevant network, (female) journalists (pink) play a central role in the #CoronaEltern discourse, addressing challenges parents face during the pandemic. Moreover,

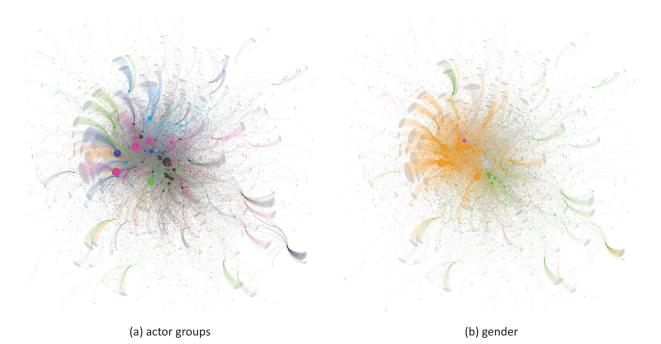


Figure 3. Network structure #CoronaEltern by actor groups (a) and gender (b) using the Yifan Hu layout algorithm. (a): black = politics, light blue = civil society, pink = journalism, cyan = science & education, green = private individuals, orange = other, blue = non-institutionalized media, grey = not identifiable/not coded; (b): orange = female, green = male, pink = non-binary, grey = not identifiable/no individual actor/not coded. Note: Node size follows indegree.



within the #CoronaEltern network, non-institutionalized media such as bloggers or podcasters play a stronger role than in #systemrelevant. An established feminist blogger community addressing the struggles of care work became an active part of the Twitter debate in the #CoronaEltern hashtag (Figure 3a).

The male dominance among the most central actors of the #systemrelevant network applies to almost all societal fields. Figure 4 shows the gender distribution within different groups of actors for all coded nodes (including the most central nodes following indegree, outdegree, and betweenness centrality for all of the three-time intervals). 415 out of 814 individual actors are men while only 299 are women. Even among medical and care workers, professions which are strongly dominated by women, men are more prominent among the actors dominating the discourse. Only a few non-binary actors (n = 16) are part of our sample, who appear as private individuals or scientists. In contrast, the #CoronaEltern discourse network is primarily enacted by female actors. Out of 916 individuals, 291 are male and 509 are female. The female dominance applies to most of the actor groups. This discourse initiated by some female journalists is mainly driven by these on Twitter as well. Only among politicians, we find slightly more male actors (Figure 5).

5.2. Roles of Agency

The male dominance of the #systemrelevant discourse does not only apply to most of the groups of actors but

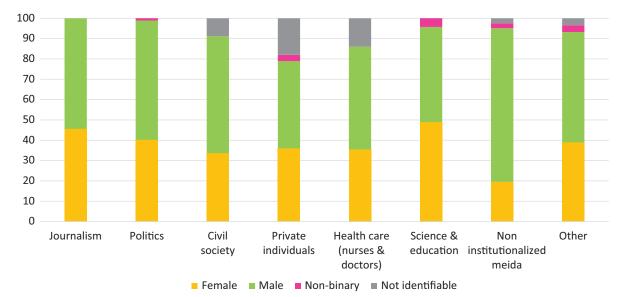


Figure 4. Gender distribution among actor groups #systemrelevant. Note: In %, *n* = 814 individual actors out of 1283 actors coded.

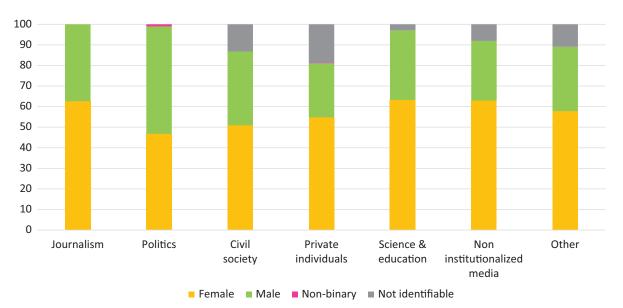


Figure 5. Gender distribution among actor groups #CoronaEltern. Note: In %, *n* = 916 individual actors out of 1152 actors coded.



also to the different roles that actors take within the networks. Men are more prominent among the actors having the most central functions in the networks: They appear more often as "authorities" receiving a lot of attention, as "nodes with a loud voice" who have a strong connecting activity and distribute attention, as well as "bridging actors" connecting different parts of the networks. This tendency stays stable throughout time and for the three different roles with men even increasing their importance as authorities and bridging actors (see Figure 6). However, concerning the roles of actors in the #CoronaEltern discourse, we can find more women in central positions than men. In this case, more women receive a lot of attention, raising their voice and functioning as bridging actors. This trend does not change throughout time in this case as well.

5.3. Linking Patterns

Taking a closer look at the edges, we get further information on how this distribution of attention and voice shape the gendered network structure. In the #systemrelevant discourse, 45% of all outgoing connections within the first time interval originate from men and 38% from women (see Figure 7). Women and men thus have an almost similar share of the attention distribution within the network. However, there were more men among the central actors which shows that women do a relatively more interactional effort. Regarding the inlinks,

a different picture is drawn. Men receive the majority of inlinks (69%) and thus get more attention compared to the attention they spend. Networks are often organized by homophile linking patterns such as political attitudes or social demographic aspects (McPherson et al., 2001). Due to this network mechanism, one could expect that men link more to men while women address other women more often. Our results show that men do link much more to other men than to women. Nevertheless. we do not see a clear gender homophily here. Women are a bit more balanced in their linking behavior but link to men more often as well, thus shifting attention towards them. These findings stay relatively stable throughout time as well, the male dominance in regard to received attention even slightly intensifies compared to the start of the discourse.

While the linking behavior in the #systemrelevant discourse shows men receiving most of the attention from other men as well as from women, the #CoronaEltern networks paint a different picture. Here, women receive more attention from other women as well as from men. Interestingly enough, the male attention paid to female actors even increases with time. The #CoronaEltern discourse is very much led by female actors, who are responsible for most of the incoming as well as the outgoing edges and thus take central roles within the networks. #CoronaEltern is an example of a hashtag public in which female journalists and bloggers as well as feminist media outlets and civil society actors amplify their voices by

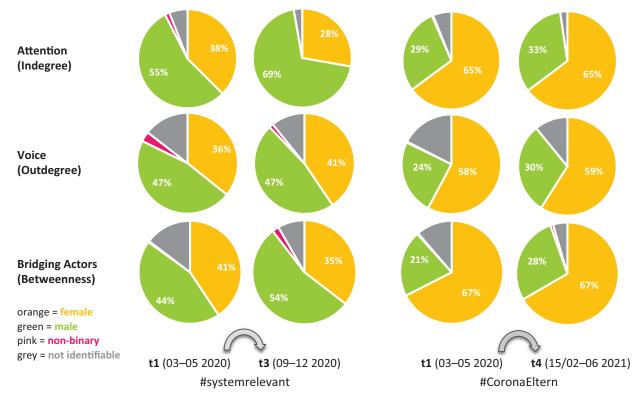


Figure 6. Gendered roles of agency #systemrelevant and #CoronaEltern. Notes: Indegree #sysrel: n = 200 (t1), n = 36 (t3), #CorElt: n = 245 (t1), n = 85 (t4); Outdegree #sysrel: n = 344 (t1), n = 74 (t3), #CorElt: n = 315 (t1), n = 156 (t4); Betweenness #sysrel: n = 273 (t1), n = 48 (t3), #CorElt: n = 283 (t1), n = 111 (t4).

< cogitatio

	Non-binary	Female	Male	Not identifiable	Share of outlinks	
Non-binary	0%	27%	71%	2%	2%	
Female	1%	35%	60%	4%	38%	Househouse louge the
Male	1%	21%	76%	2%	45%	#systemrelevant t1 n = 2588 edges*
Not identifiable	0%	24%	68%	8%	16%	
Share of inlinks	1%	27%	69%	4%	100%	
	Non-binary	Female	Male	Not identifiable	Share of outlinks))
Non-binary	0%	0%	0%	0%	0%	//
Female	2%	33%	64%	2%	42%	#systemrelevant t3
Male	0%	14%	86%	0%	52%	n = 152 edges*
Not identifiable	0%	11%	11%	78%	6%	
Share of inlinks	1%	22%	72%	5%	100%	
	Non-binary	Female	Male	Not identifiable	Share of outlinks	
Non-binary	14%	57%	29%	0%	0%	
Non-binary Female	14% 1%	57%	29%	0% 4%	0%	
						#CoronaEltern t1 n = 6706 edges*
Female	1%	73%	22%	4%	60%	
Female Male	1% 1%	73%	22% 41%	4% 4%	60% 18%	
Female Male Not identifiable	1% 1% 1%	73% 53% 60%	22% 41% 32%	4% 4% 8%	60% 18% 21%	
Female Male Not identifiable	1% 1% 1% 1%	73% 53% 60% 67%	22% 41% 32% 27%	4% 4% 8% 16%	60% 18% 21% 100%	
Female Male Not identifiable Share of inlinks	1% 1% 1% 1% Non-binary	73% 53% 60% 67% Female	22% 41% 32% 27% Male	4% 4% 8% 16% Not identifiable	60% 18% 21% 100% Share of outlinks	n = 6706 edges*
Female Male Not identifiable Share of inlinks Non-binary	1% 1% 1% 1% Non-binary 0%	73% 53% 60% 67% Female 100%	22% 41% 32% 27% Male 0%	4% 4% 8% 16% Not identifiable 0%	60% 18% 21% 100% Share of outlinks 0%	
Female Male Not identifiable Share of inlinks Non-binary Female	1% 1% 1% 1% Non-binary 0% 0%	73% 53% 60% 67% Female 100% 74%	22% 41% 32% 27% Male 0% 23%	4% 4% 8% 16% Not identifiable 0% 3%	60% 18% 21% 100% Share of outlinks 0% 60%	n = 6706 edges* #CoronaEltern t4

Figure 7. Gendered distribution of in- and outlinks #systemrelevant and #CoronaEltern. Notes: * = Edges between individual actors. Orange = female; green = male. For example, in #systemrelevant t1: 38% of all outlinks are sent by women and 45% by men while men receive 69% of all inlinks and women only 27%; 35% of links sent by women address other women while 60% address men.

retweeting each other's tweets and frequently addressing political actors via mentions to gain attention for their concerns.

6. Discussion

The Covid-19 pandemic partially inverses the care process, and—at least temporarily—the societal hierarchy of professions. Suddenly, caregivers—for a long time placed at the "bottom of society"—find themselves in the spotlight, and while continuing their care work for others, their well-being becomes the focus of public attention. From a feminist perspective and due to the gendered structures of care work, we asked if this new "care boom" would lead to a more genderbalanced structure of public discourse. The literature review impressively demonstrates the ongoing dominance of male experts quoted in legacy (news) media. Though expertise in the profession is mostly female, journalism and institutionalized media rely on male expertise from natural science, medicine, and even nursing. As social media has already proved its ability to draw more attention towards gender issues in the past, we assumed a more diverse discourse structure on Twitter. Rather than focusing on explicitly feminist hashtags, we chose hashtags covering gender-related issues, that were semantically open. Due to this choice, we were able to reconstruct gendered speaker positions in thematically less-biased discourse environments. Our research was led by three research questions:

RQ 1: Which societal groups of actors have the highest visibility in their contribution to the discourse?

With regard to the actor groups constituting the two different care discourses, we find considerable differences. The #systemrelevant discourse is dominated by civil society actors and private individuals fighting for better working conditions and frequently addressing political actors to gain institutional attention for their concerns.



The visibility of paid and formalized care work in hospitals and care homes can be attributed to the communicative success of "nursing activism" (Florell, 2021; Reißmann et al., in press). The #CoronaEltern discourse is, to a greater extent, initiated and led by female journalists and feminists. Social media here offer opportunities for hybrid public articulation where journalists expand their professional role and share their own experiences of struggling with the simultaneity of home office and child care. Using their outreach, women organize collective action by interacting strategically with feminist civil society organizations as well as private individuals and politicians alike.

RQ 2: (How) does the Twitter discourse on care work challenge traditional gender structures?

The comparison of the two hashtag publics reveals rather different gendered discourse structures. #system relevant discloses a traditional structure of who plays a central role within the network. Although women do most of the care work, it is men who are heard when talking about it. Among the central actors, men are the most prominent. They clearly dominate the discourse center while women appear more in the network periphery, and non-binary people are even close to invisible. While this is less surprising for groups of actors such as journalists and politicians who are traditionally considered to be the ones with high impact in public discourse, our findings show that this is true for all groups of actors, except for scientists. Thus, even among civil society activists, private individuals, and nurses, the most central individual actors are men. Further own qualitative inquiries reveal female engagement behind organizational accounts and in collective initiatives (Reißmann et al., in press). However, the participation through corporate and collective accounts reaffirms male dominance on the level of network structure.

#CoronaEltern is special in different regards. Like in the first case study, all genders ("parents") are addressed equally. However, women here are much more central. The majority of coded individual actors are female. Obviously, the "private" struggle of female everyday life during the pandemic becomes political within this hashtag. Women dominate almost all groups of actors. Other than in the #systemrelevant case most of the central journalists, civil society activists, and private individuals are female. Only among political actors, men are still slightly more prominent. This result is hardly a coincidence. While both men and women are affected by the "breakdown" of institutionalized child-care services and educational institutions, it is women who not only do more care work but who also struggle with the paradoxes of emancipation (Böckler-Stiftung, 2021; Hövermann, 2021): Due to ongoing societal expectations of "caring well" as a female skill or even nature (Vinken, 2001), women seem to be affected in different and more intensive ways; and compared to men, they

are those who actively make their daily struggle a public issue.

A second feature of #CoronaEltern is the high visibility of female journalists. This is due to the nature of its very initiation. In the beginning, the hashtag was promoted by a feminist magazine and its editor-in-chief. Their personal affectedness might be a strong driving force for their public engagement in the discourse of female journalists. It is primarily (white) middle-class women who use their status as established and networked public figures to draw attention to the extraordinary burden and everyday challenges and to open up a discursive channel to share common experiences. This goes in line with the findings mentioned above that feminist Twitter activism is structured in an excluding way as well. Twitter is known as an elitist medium that does not represent society. Thus, it is no surprise that middle-class women with existing communicative power are more visible and allegedly act as spokespersons for the burdens of (all) women. At the same time, it would be desirable to further investigate differing experiences of the pandemic on the level of socio-economic background and the effect it has on raising voices on social media. Middle-class families suddenly found themselves in precarious situations, which low-income parents-on a structural level-were already used to in other regards.

RQ 3: In which speaker positions do women, men, and non-binary people appear?

As shown, the direct visibility of men and women as speakers differs enormously between #systemrelevant and #CoronaEltern. Gendered patterns of spending attention do not necessarily equate with gendered patterns of receiving attention. In line with previous research, #systemrelevant reproduces gendered imbalances in terms of visibility. It is predominantly men who gain attention and whose voice is reinforced by other participants' practices of retweeting, quoting, replying, and mentioning. #CoronaEltern paints a different picture with women being the ones getting most of the attention. Thus, a very different structure of genderspecific speaker positions emerges when comparing the discourses dealing with the question of professional paid care work, and privatized unpaid care work. While the former is dominated by highly visible men, the latter is primarily driven by female actors.

Non-binary actors were coded as well, but do not appear very often in our sample. Nevertheless, their role should not be neglected through a narrow focus on men and women. They partly do appear as central nodes in the network either as the attention receiving, attention distribution, or bridging actors.

In both case studies, women are essential as those who keep the discourse vivid and running by paying attention and addressing others. While women and men have a similar share of outgoing connections in the #systemrelevant case (but with fewer women among the



central actors), women account for more of the connection activity in the #CoronaEltern discourse. In #system relevant, women receive less attention than male participants while paying an almost equal amount of attention towards others. This gendered imbalance between communicative investment and received public attention is striking in the discourse addressing professional paid care work as a public matter with a high societal impact on everybody's life. This pattern of women doing more of the communicative work compared to the attention they receive goes along with older findings about communicative behavior between men and women in conversations. Pamela Fishman (1983, p. 99) calls this often unacknowledged but expected effort to take up the subject introduced by a (male) counterpart and ask questions the "shitwork" women do.

The relational work of spending attention, addressing others, and producing connections in the discursive network is an indispensable performative action to keep the discourse running. We interpret this communicative activity as a digital form of "invisible work" (Hatton, 2017) which is essential for the continuity and the "loudness" of discourse in social media. It would be too simple to regard the relational activities as a prolongation of domestic work, as the classic domain of invisible female work and feminist critique. It is not "digi-housekeeping" (Whiting & Symon, 2020) that women perform here. However, it is worth deepening our understanding on such background activities and to compare the gendered characteristics of these forms of "caring" for the public for different cases and discourses. Whereas #CoronaEltern anchors in the private realm or transgresses the borders of the private and the public through arranging the requirements of working life with unpaid care work, #systemrelevant anchors exclusively in the public realm and the domain of paid work. It is striking that relational activities and communicative success (attention) are unequally distributed. In #CoronaEltern, women as well as men pay more attention to other women, thus acknowledging female expertise when the focus is on privatized care work. At first glance, the network structure opposes traditional gendered hierarchies of attention and visibility. At the same time, women's share of outlinks (relating to other accounts in one form or another) is as big as those of men in #systemrelevant, but three times higher in #CoronaEltern. Obviously, the negotiated topics influence the discourse structure. The discourse on privatized, unpaid care work mobilized women in the first place, while men are rather passive in terms of relational work. The clash between professional and private responsibilities, especially of middle-class workers, gained public momentum as a feminist discourse. Our findings lead to an ambivalent picture of female visibility. We see more progressive gender relations and women being much more visible when it comes to privatized, unpaid care work. However, female visibility is achieved "only" within the discourse field which is connotated to rather traditional female domains (e.g., household, childcare, homeschooling, unpaid work).

7. Conclusion

Through the Covid-19 pandemic, care work gained visibility as an essential and indispensable part of sociality. Life as human beings is not possible without the ability and capacity to care for others and to be cared for. Having been the focus of feminist research for decades, the dominant female character of care work, privatized and unpaid as well as professional and often under precarious working conditions, has stayed resistant against changes. In the pandemic, its gendered character as well as its economically pressuring conditions become a serious challenge. Against the background of heavily gendered patterns of representation and expertise in institutionalized legacy (news) media before and during the pandemic, we analyzed the Twitter hashtags #systemrelevant and #CoronaEltern as discourse spaces that potentially show altered hierarchies of visibilities.

From a feminist perspective, it is already noteworthy that privatized unpaid care work and professional paid care work are negotiated in rather separated discourse spaces. The results show a reproduction of gendered hegemonic patterns as well as shifting relations. In comparison, our two case studies reveal guite different discourse structures, both with regard to the roles in which women contribute to the emergence of these publics and the active participation of journalists. This general finding may ask for more nuanced, issue-based "medium data" analyses rather than doing non-specific "big data" analyses. Furthermore, the knowledge of overall network structures needs to be linked with a thorough analysis of contents and with knowledge of contributing significant actors, which is also a limitation of the results presented here. On the level of a tweet and/or other social media content, gender relationsas issues of communication—can turn out guite differently. Actor-focused social network structures give evidence of who speaks, who receives attention, and who relates to whom, but not of what is expressed and discussed. Thus, our project aims to further connect the structural insights with a detailed analysis of the participating actors and their tweeting practices.

Overall, it is of high relevance for digital feminist media studies to do more computational analysis, and to compare more issue publics where the gendered power hierarchies seem to be challenged—in order to better understand under which conditions discursive interventions can be successful, how bridges between different societal parts can emerge, and how new alliances can be formed.

Acknowledgments

This article was enabled by the funding of German Science Foundation/Deutsche Forschungsgesellschaft



(DFG), project number 418375831. We would like to thank Moe Kinoshita for her contribution to the literature review.

Conflict of Interests

The authors declare no conflict of interests.

References

- Aaldering, L., & Van Der Pas, D. J. (2020). Political leadership in the media: Gender bias in leader stereotypes during campaign and routine times. *British Journal* of Political Science, 50(3), 911–931. https://doi.org/ 10.1017/S0007123417000795
- Araújo, R., Lopes, F., Magalhães, O., & Cerqueira, C. (2022). Muted voices: The underrepresentation of women in Covid-19 news in Portugal. *Social Sciences*, *11*(5), Article 210. https://doi.org/10.3390/ socsci11050210
- Baer, H. (2016). Redoing feminism: Digital activism, body politics, and neoliberalism. *Feminist Media Studies*, 16(1), 17–34. https://doi.org/10.1080/14680777. 2015.1093070
- Bastian, M., Heymann, S., & Jacomy, M. (2009). Gephi: An open source software for explorating and manipulating networks. *Proceedings of the Third International ICWSM Conference on Web and Social Media*, 3(1), 361–362. https://doi.org/10.1609/icwsm.v3i1. 13937
- Böckler-Stiftung. (2021). Frauen in der Coronakrise stärker belastet [Women are more burdened during the corona crisis] (Report 1/2021). Böckler IMPULS.
- Boyd, D., Golder, S., & Lotan, G. (2010). Tweet, tweet, retweet: Conversational aspects of retweeting on Twitter. 2010 43rd Hawaii International Conference on System Sciences, 2010, 1–10. https://doi.org/ 10.1109/HICSS.2010.412
- Burt, R. S. (2004). Structural holes and good ideas. American Journal of Sociology, 110(2), 349–399. https:// doi.org/10.1086/421787
- Butler, J. (1993). Bodies that matter. On the discursive limits of "sex." Routledge.
- Chatzidakis, A., Hakim, J., Littler, J., Rottenberg, C., & Segal, L. (2020). From carewashing to radical care: The discursive explosions of care during Covid-19. *Feminist Media Studies, 20*(6), 889–895. https://doi. org/10.1080/14680777.2020.1781435
- Clark, R. (2016). "Hope in a hashtag": The discursive activism of #WhyIStayed. *Feminist Media Studies*, *16*(5), 788–804. https://doi.org/10.1080/14680777. 2016.1138235
- Clark-Parsons, R. (2019). "I see you, I believe you, I stand with you": #MeToo and the performance of networked feminist visibility. *Feminist Media Studies*, 21(3), 362–380. https://doi.org/10.1080/14680777. 2019.1628797

- de Moll, F., & Betz, T. (2014). Inequality in pre-school education and care in Germany: An analysis by social class and immigrant status. *International Studies in Sociology of Education*, 24(3), 237–271. https://doi. org/10.1080/09620214.2014.932086
- Dowling, E. (2021). *The care crisis: What caused it and how can we end it?* Verso Books.
- Drüeke, R., & Zobl, E. (2016). Online feminist protest against sexism: The German-language hashtag #aufschrei. *Feminist Media Studies*, *16*(1), 35–54. https://doi.org/10.1080/14680777.2015.1093071
- Ette, M. (2017). Where are the women? Evaluating visibility of Nigerian female politicians in news media space. *Gender, Place & Culture, 24*(10), 1480–1497. https://doi.org/10.1080/0966369X.2017.1387104
- Fine, M. (2015). Cultures of care. In J. Twigg & M. Wendy (Eds.), *Routledge handbook of cultural gerontology* (pp. 269–276). Routledge.
- Fishman, P. M. (1983). Interaction: The work women do. In B. Thorne, C. Kramarae, & N. Henley (Eds.), *Language, gender, and society* (pp. 89–102). Newbury House.
- Florell, M. C. (2021). Concept analysis of nursing activism. Nursing Forum, 56(1), 134–140. https://doi.org/ 10.1111/nuf.12502
- Fraser, N. (2016). Contradictions of capitalism and care. New Left Review, 100, 99–117. https://newleft review.org/issues/ii100/articles/nancy-frasercontradictions-of-capital-and-care
- Hatton, E. (2017). Mechanisms of invisibility: Rethinking the concept of invisible work. *Work, Employment and Society*, *31*(2), 1–16.
- Herd, P., & Meyer, M. H. (2002). Care work: Invisible civic engagement. *Gender & Society*, *16*(5), 665–688. https://doi.org/10.1177/089124302236991
- Hövermann, A. (2021). Belastungswahrnehmung in der Corona-Pandemie: Erkenntnisse aus vier Wellen der HBS-Erwerbspersonenbefragung 2020/21 [Perception of stress during the corona pandemic: Findings from four waves of the HBS employee survey 2020/21] (Research Report, No. 50). Hans-Böckler-Stiftung Wirtschafts- und Sozialwissenschaftliches Institut. http://hdl.handle.net/10419/231352
- Jackson, S. J., Bailey, M., & Foucault Welles, B. (2020). #HashtagActivism: Networks of race and gender justice. MIT Press. https://doi.org/10.7551/mitpress/ 10858.001.0001
- Jackson, S., & Foucault Welles, B. (2016). #Ferguson is everywhere: Initiators in emerging counterpublic networks. *Information, Communication & Society*, 19(3), 397–418. https://doi.org/10.1080/1369118X. 2015.1106571
- Jones, L. (2020). *Women's representation and voice in media coverage of the coronavirus crisis*. The Global Institute for Women's Leadership.
- Kassova, L., Addy, R., Cogan, C., & Todorov, P. (2020). The missing perspectives of women in COVID-19 news. The Bill & Melinda Gates Foundation. https://



www.iwmf.org/wp-content/uploads/2020/09/2020. 09.23-The-Missing-Perspectives-of-Women-in-COVID-19-News.pdf

- Kearney, M. W. (2019). rtweet: Collecting and analyzing Twitter data. *The Journal of Open Software*, 4(49), Article 1829. https://doi.org/10.21105/joss.01829
- Klünder, N. (2017). Differenzierte Ermittlung des Gender Care Gap auf Basis der repräsentativen Zeitverwendungsdaten 2012/13 [Differentiated determination of the gender care gap based on representative time use data] (Working Paper). Institut für Sozialarbeit und Sozialpädagogik e.V. https://doi.org/10.25595/ 1368
- Knüpfer, C., Hoffmann, M., & Voskresenskii, V. (2020). Hijacking MeToo: Transnational dynamics and networked frame contestation on the far right in the case of the '120 decibels' campaign. *Information, Communication & Society*, 25(7), 1010–1028. https://doi. org/10.1080/1369118X.2020.1822904
- Lünenborg, M., & Maier, T. (2015). 'Power politician' or 'fighting bureaucrat': Gender and power in German political coverage. *Media Culture & Society*, 37(2), 180–196. https://doi.org/10.1177/0163443714557 979
- Lünenborg, M., & Raetzsch, C. (2018). From public sphere to performative publics: Developing media practice as an analytic model. In S. Foellmer, M. Lünenborg, & C. Raetzsch (Eds.), *Media practices, social movements, and performativity: Transdisciplinary approaches* (pp. 13–35). Routledge.
- Lünenborg, M., Raetzsch, C., Reißmann, W., & Siemon, M. (2020). Media Practice in performativen Öffentlichkeiten: Für eine praxistheoretische Positionierung der Journalismusforschung [Media practice in performative publics. Toward a practice theory approach in journalism studies]. In J. Schützeneder, K. Meier, N. Springer, & Deutsche Gesellschaft Für Publizistik—Und Kommunikationswissenschaft e.V. (Eds.), Neujustierung der Journalistik/Journalismusforschung in der digitalen Gesellschaft: Proceedings zur Jahrestagung der Fachgruppe Journalistik/ Journalismusforschung der Deutschen Gesellschaft für Publizistik—und Kommunikationswissenschaft 2019 [Readjustment of journalism/journalism studies in the digital society] (pp. 34-51). Deutsche Gesellschaft für Publizistik-und Kommunikationse.V. https://www.ssoar.info/ssoar/ wissenschaft handle/document/70817
- Lutz, H. (2018). Care migration: The connectivity between care chains, care circulation and transnational social inequality. *Current Sociology Monograph*, *66*(4), 577–589. http://journals.sagepub. com/doi/full/10.1177/0011392118765213
- Macharia, S. (Ed.). (2020). Who makes the news? 6th Global Media Monitoring Project. WACC. https:// whomakesthenews.org/wp-content/uploads/2021/ 07/GMMP2020.ENG_.FINAL20210713.pdf

Maireder, A., & Schlögl, S. (2014). 24 Hours of an #out-

cry: The networked publics of a socio-political debate. *European Journal of Communication, 29*(6), 687–702. https://doi.org/10.1177/0267323114545710

- Martini, F. (2020). Wer ist #MeToo? Eine netzwerkanalytische Untersuchung (anti-)feministischen Protests auf Twitter [Who is #MeToo? A network analysis of (anti-)feminist protest on Twitter]. *Medien & Kommunikationswissenschaft, 68*(3), 255–272. https://doi. org/10.5771/1615-634X-2020-3-255
- McPherson, M., Smith-Lovin, L., & Cook, J. M. (2001). Birds of a feather: Homophily in social networks. *Annual Review of Sociology*, *27*, 415–444. https:// doi.org/10.1146/annurev.soc.27.1.415
- Megarry, J. (2018). Under the watchful eyes of men: Theorising the implications of male surveillance practices for feminist activism on social media. *Feminist Media Studies, 18(6),* 1070–1085. https://doi.org/ 10.1080/14680777.2017.1387584
- Munro, E. (2013). Feminism: A fourth wave? *Political Insight, 4*(2), 22–25. https://doi.org/10.1111/2041-9066.12021
- Niemi, M. K., & Pitkänen, V. (2017). Gendered use of experts in the media: Analysis of the gender gap in Finnish news journalism. *Public Understanding* of Science, 26(3), 355–368. https://doi.org/10.1177/ 0963662515621470
- O'Neill, D., Savigny, H., & Cann, V. (2016). Women politicians in the UK press: Not seen and not heard? *Feminist Media Studies*, 16(2), 293–307. https://doi.org/ 10.1080/14680777.2015.1092458
- Page, A., & Arcy, J. (2020). #MeToo and the politics of collective healing: Emotional connection as contestation. *Communication, Culture and Critique*, *13*(3), 333–348. https://doi.org/10.1093/ccc/tcz032
- Papacharissi, Z., & Oliveira, M. F. (2012). Affective news and networked publics: The rhythms of news storytelling on #Egypt. *Journal of Communication*, *62*, 266–282. https://doi.org/10.1016/j.socnet.2011.03. 001
- Prommer, E., & Stüwe, J. (2020). Geschlechterverteilung in der Corona-Berichterstattung im deutschen Fernsehen [Gender distribution of Corona news coverage on German television]. MaLisa Stiftung. https:// malisastiftung.org/wp-content/uploads/Studie_ MaLisa_Geschlechterverteilung_in_der_Corona_ Berichterstattung.pdf
- Prommer, E., Stüwe, J., & Wegner, J. (2021). Sichtbarkeit und Vielfalt. Fortschrittsstudie zur audiovisuellen Diversität [Visibility and diversity. Progress study on audiovisual diversity]. MaLisa Stiftung. https://malisastiftung.org/wp-content/uploads/ SICHTBARKEIT_UND_VIELFALT_Prommer_Stuewe_ Wegner_2021.pdf
- Raetzsch, C., & Lünenborg, M. (2020). Anchoring practices for public connection: Media practice and its challenges for journalism studies. *International Journal of Communication*, *14*, 2868–2886.
- R Core Team. (2020). The R project for statistical comput-



ing. R Foundation for Statistical Computing. http:// www.r-project.org/index.html

- Reißmann, W., Siemon, M., Lünenborg, M., & Raetzsch, C. (2022). Praxisprofile als mixed-methods Ansatz zur Analyse performativer Öffentlichkeiten: Vorschlag für eine relationale Journalismusforschung [Practice profiles as mixed methods approach to analyze performative publics: A concept for relational journalism studies]. *Studies in Communication Sciences*, 22(1), 69–88. https://doi.org/10.24434/ j.scoms.2022.01.3057
- Reißmann, W., Siemon, M., Lünenborg, M., & Raetzsch, C. (in press). Making (female) health care work matter: The performative publics of #systemrelevant during the COVID-19 pandemic in Germany. *MedieKultur*.
- Ross, K., Boyle, K., Carter, C., & Ging, D. (2018). Women, Men and News. *Journalism Studies*, *19*(6), 824–845. https://doi.org/10.1080/1461670X.2016.1222884
- Shugars, S., Gitomer, A., McCabe, S., Gallagher, R. J., Joseph, K., Grinberg, N., Doroshenko, L., Foucault Welles, B., & Lazer, D. (2021). Pandemics, protests, and publics: Demographic activity and engagement on twitter in 2020. Journal of Quantitative Description: Digital Media, 1, 1–68. https://doi.org/ 10.51685/jqd.2021.002
- Sobieraj, S. (2018). Bitch, slut, skank, cunt: Patterned resistance to women's visibility in digital publics. *Information, Communication & Society, 21*(11), 1700–1714. https://doi.org/10.1080/1369118X. 2017.1348535
- Statista. (2021). Verteilung sozialversicherungspflichtig Beschäftigter in der Pflege in Deutschland nach Pflegeart und Geschlecht im Jahr 2020 [Distribution of employees subject to social insurance contributions in care in Germany by type of care and gender in 2020]. Statista. https://de.statista.com/statistik/ daten/studie/1029877/umfrage/verteilung-vonpflegekraefte-in-deutschland-nach-pflegeart-undgeschlecht

The Care Collective. (2020). The care manifesto: The pol-

About the Authors



Miriam Siemon (she/her) studied communication and political sciences in Erfurt, Berlin, and Brussels and is now a doctoral researcher at the Institute of Media and Communication Studies at Freie Universität Berlin. Her research focusses on gendered network structures on social media platforms and the challenges of using computational methods for the field of gender media studies. Currently, she is part of the DFG-funded research project Journalism Challenged: Understanding Performative Publics through Media Practice. Twitter: @MiriamSiemon.



Wolfgang Reißmann (he/him) studied communication and media studies, history, and philosophy at the University of Leipzig and the Universidade Católica Portuguesa in Lisbon. In 2013, he received his doctorate from the University of Erfurt with a work on visual mediatization. From 2016–2020 he has been a postdoctoral researcher within the DFG-funded CRC Media of Cooperation at the University of Siegen. Currently, he is a member of the DFG-funded research project Performative Publics at FU Berlin.

itics of interdependence. Verso.

- Thelwall, M., & Thelwall, S. (2020). Covid-19 tweeting in English: Gender differences. *El Profesional de la Información*, 29(3), 1–7. https://doi.org/10.3145/epi. 2020.may.01
- Tronto, J. (2013). *Caring democracy. Markets, equality, and justice*. New York University Press.
- Trott, V. (2021). Networked feminism: Counterpublics and the intersectional issues of #MeToo. *Feminist Media Studies, 21*(7), 1125–1142. https://doi.org/ 10.1080/14680777.2020.1718176
- Vasarhelyi, O., & Brooke, S. (in press). Computing gender. In T. Yasseri, (Ed.), Handbook of computational social science. Edward Elgar. https://doi.org/10.31235/osf. io/admcs
- Villa Braslavsky, P.-I. (2020). Corona-Krise meets Care-Krise—Ist das systemrelevant [Corona crisis meets care crisis—What is essential]? *Leviathan*, 48(3), 433–450. https://doi.org/10.5771/0340-0425-2020-3-433
- Vinken, B. (2001). *Die deutsche Mutter. Der lange Schatten eines Mythos* [The German mother. The long shadow of a myth]. Piper.
- Walper, S., & Kreyenfeld, M. (2022). The intensification of parenting in Germany: The role of socioeconomic background and family form. *Social Sciences*, 11(3), 134. https://doi.org/10.3390/socsci11030134
- Whiting, R., & Symon, G. (2020). Digi-housekeeping: The invisible work of flexibility. Work, Employment and Society, 34(6), 1079–1096. https://doi.org/10.1177/ 0950017020916192
- Wilhelm, C. (2021). Gendered (in)visibility in digital media contexts. *Studies in Communication Sciences*, 21(1), 99–113. https://doi.org/10.24434/j.scoms. 2021.01.007
- Wood, H., & Skeggs, B. (2020). Clap for carers? From care gratitude to care justice. *European Journal of Cultural Studies*, 23(4), 641–647. https://doi/10.1177/ 1367549420928362