Commenting, Sharing and Tweeting News

Measuring Online News Participation

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Abstract

Social plugins for sharing news through Facebook and Twitter have become increasingly salient features on news sites. Together with the user comment feature, social plugins are the most common way for users to contribute. The wide use of multiple features has opened new areas to comprehensively study users' participatory practices. However, how do these opportunities to participate vary between the participatory spaces that news sites affiliated with local, national broadsheet and tabloid news constitute? How are these opportunities appropriated by users in terms of participatory practices such as commenting and sharing news through Facebook and Twitter? In addition, what differences are there between news sites in these respects? To answer these questions, a quantitative content analysis has been conducted on 3,444 articles from nine Swedish online newspapers. Local newspapers are more likely to allow users to comment on articles than are national newspapers. Tweeting news is appropriated only on news sites affiliated with evening tabloids and national morning newspapers. Sharing news through Facebook is 20 times more common than tweeting news or commenting. The majority of news items do not attract any user interaction.

Keywords: user-generated content, news, comments, social media, participatory journalism

Introduction

The interplay of online news, social media and users' participatory practices has become increasingly salient on news sites. Users can post article comments and share news through Facebook and Twitter. One way of studying how users are permitted to participate has been to analyze different technological features that enable users' contributions. These studies have shown that users are usually offered only a low level of influence, for example, through a comments section, where they can react to news articles. The comment feature was formerly conceived of as the most common way for users to contribute with content alongside online news (e.g., Domingo et al., 2008; Hermida & Thurman, 2008; Manosevitch, 2011). Since 2011, however, the comment function appears to be used less frequently by news providers (Karlsson, et al., 2015).

This shift, together with the increasing presence of other features for user contribution, has caused researchers to focus more on how online news is shared via various social networking applications, such as Facebook and Twitter. Together, these various online features (posting comments, sharing via networking applications) have opened

new pathways for analyzing participatory practices in news media. How do these opportunities materialize on actual online news sites? How do users actually respond to them?

Thus far, research has offered mixed answers to these questions. On the one hand, users' interactions with online news via social media have been described as a power broker phenomenon of a magnitude that can be equated to news media itself (Emmet 2009; Newman Dutton, & Blank, 2012; Green & Jenkins, 2011). On the other hand, power is a multi-faceted notion, and it should not be overlooked that user practices on online news sites are always played out within frames that are created and maintained by online news providers in their roles as producers. Extant research has illustrated various producer strategies for restricting users' participatory practices, through a range of more or less subtle ways (e.g., Almgren & Olsson, 2015; Buskqvist, 2007; Olsson & Svensson, 2012). Producers of news sites have, for instance, shown a preference for letting users participate primarily through features that direct them towards interpreting professional content rather than letting users contribute content of their own (e.g., Domingo et al. 2008; Hermida & Thurman, 2008). Procedures such as moderation and registration constitute restrictions that are more obvious. Another less obvious steering strategy is to direct users toward a certain selection of news and away from potentially provocative topics (Diakopoulous & Naaman, 2011; Pöyhtäri, 2014; Almgren & Olsson, 2015).

To grasp this phenomenon – the extent to which users are permitted to interact with online news, in what ways, and to what extent they make use of these opportunities – this article presents data from a quantitative content analysis of 3,444 online news articles in nine Swedish newspapers. The article covers various online news outlets and examines both the extent to which users are permitted to interact with online news and how users prefer to interact with news.

Presenting the Actors: News Outlets, Social Media and News Users

This study focuses on the interplay of online news, social media and user-generated content. It departs from the assumption that the interactions that take place between these actors illuminate new facets of participatory practices. The first group of actors in focus in this study consists of online news outlets. Online news appears on websites belonging to news organizations with an offline history. This study suggests that this affiliation between a news site and its offline paper edition also matters when studying “new” forms of participation. In Sweden, most newspapers are local or regional morning papers, while there are few national newspapers. The national newspapers that do exist have either emerged from morning broadsheets or have a history as evening tabloids.

Newspapers' varying pre-history makes them different from one another. They differ both in terms of size and dispersion of the intended audience as well as the paper edition's circulation. Importantly, morning newspapers are usually also associated with broadsheet characteristics, such as hard news (public affairs), whereas evening tabloids more often are associated with soft, sensational news. Local newspapers tend to offer their readers news that has emerged close to the newspaper's place of publication. In other words, these different news outlets offer users the ability to interact with news in various ways, which is potentially important for the ways in which their participatory practices become shaped online. We refer to the ways in which news producers structure users' opportunities to participate as participatory space.

The second group of actors featured in this study is usually referred to as social media, i.e., online applications for user participation. While not synonymous with Web 2.0, social media uses the functionality of Web 2.0 as a prerequisite for enabling user contributions (Kaplan & Haenlein, 2010). One form of social media is social network(ing) sites – online spaces where individuals can construct profiles for a selected audience in a network (Boyd & Ellison, 2008). The social media strategy of Facebook, for instance, is to increase the connections between social media and other realms (Gerlitz & Helmond, 2013; van Dijck, 2013). The ambition and outcome of such a strategy relates to other actors – both news sites and online news users. In Sweden, Facebook, a social networking site where members mutually chose each other as friends, has acquired a significant impact, while Twitter, a micro blogging application where users can chose to follow other members, has not had the same breakthrough (Boyd & Ellison, 2008; Findahl & Davidsson, 2015; Kaplan & Haenlein, 2010). In 2015, 20 per cent of Swedish Internet users used Twitter, while 70 per cent used Facebook.

The third group of actors in this study consists of users who do – or do not – take part in participatory practices on various news sites. Users are of crucial interest to both other actors (news sites and social media) as they depend on the attention and engagement of users in order for their business models to work. Recent features that allow users to share news through social media are referred to as “social plug-ins” (Gerlitz & Helmond, 2011). The professional process within news organizations of allowing selected news content to enter Facebook pages and Twitter accounts is referred to as *seeding* (Newman, 2011), which depends on both editorial perceptions of what constitutes appealing news and automatic seeding based on currently trending terms. In this study, we are mainly concerned with the extent to which news articles have been equipped with social plug-ins or features on a news site’s brand home page for posting comments or sharing news through Facebook and Twitter as well as the extent of user interaction with these features.

Produced Spaces and Users with Preferences

The major research focus on professional news producers and news sites so far has been on how users are invited to participate via different technological features. These features (e.g., invitations to submit material, comments or polls) represent a variation in terms of what influence users are given (or not) when engaging in participatory practices (e.g., Domingo et al., 2008; Hermida & Thurman, 2008; Singer et al., 2011). The current research has indicated that news media professionals have been rather restrictive and are hesitant to allow users to participate. Users have a more positive approach to comments than professionals (Bergström & Wadbring, 2015). Recently, however, some scholars have spotted indices of slightly more welcoming professional attitudes toward user participation (Hermida, 2010; Lee, Lewis, & Powers, 2014).

However, considering their preference for restrictive policies, it is not very surprising that as new features for user participation are being developed, those features granting users less influence over content production on news sites seem to be preferred by producers. As one consequence, previous research has spotted a clear preference among professionals for integrating social media sharing as a participatory feature (Himmelboim, & McCreary, 2012; Singer, 2014).

User comments are a different story in this context. Commenting is different from sharing news on social media in that users post comments onto a brand website itself, potentially reaching other users of the news site. Commenting is usually restricted through user registration and message moderation (cf. Pöyhtäri, 2014; Singer et al. 2011). Moreover, users are often steered towards commenting on lighter news content, such as sports and entertainment (Almgren & Olsson, 2015).

Users' preferences for participating vary depending on demographics, both concerning the ways in which they choose to participate (share, tweet, and/or comment) and in terms of their interest in news content. Seeding news on Facebook is connected to entertainment, while news shared through Twitter tends to have a more serious, hard news character (Newman 2011; Bastos 2014). Moreover, users avoid sports-related items and economic news (Bastos 2014; Purcell, Rainie, Mitchell, Rosenstiel, & Olmstead 2010). Not only do users who post comments tend to ignore lightweight news, but they also show strong preferences for posting comments on news events characterized by changes in the local community, politics, and welfare issues. It seems as if news receiving public comment on news sites tend to be less consensual than news shared through personal connections, such as sending links to news through email (Boczkowski & Mitchelstein, 2012).

Twitter seems to have a clear elite orientation regarding both how users and news media make use of it (Engesser & Humprecht, 2014). Urban young adults (18-29) and politically engaged people (Bastos, 2014) tend to tweet news. Moreover, political impact through Twitter seems to have a heavy national bias, which is a disadvantage for local issues and local candidates (Park et al., 2013).

Users who tweet news and post comments on news items are somewhat older than users who share news through Facebook (Newman & Levy, 2014). Users who share news through Facebook are slightly more likely to be female (Glynn, Hugu & Hoffman 2011). The main reason for using Facebook is the social drive to interact with friends (Costera Meijer & Kormelink, 2015). The presence of personal networks in social media seems to have a restraining effect on news discussions; users tend to prefer to have such discussions in more anonymous settings (Costera Meijer & Kormelink, 2015, p. 674). The content shared on Facebook primarily relates to entertainment, whereas commenting and tweeting primarily concerns checking news. Users who post comments on news sites are generally more often male than female, well educated, interested in politics and technology, and middle-aged rather than young (e.g., Bergström, 2008; Newman & Levy, 2014). This also coincides with what is known about news users in general (e.g., Olmstead, Mitchell & Rosenstiel, 2011). To conclude, users may interact with news content in multiple ways. Users' practices in terms of commenting and passing along media content are connected to their preferences, i.e., what they "fancy" and "care about" (Green & Jenkins, 2011; Tenenboim & Cohen, 2015). The acts of commenting on and/or sharing media content indicate that users – for one reason or another – find it interesting enough to comment on and/or share. When doing so, users choose a specific channel for sharing that they deem appropriate (Green & Jenkins, 2011, p.113-114). Throughout this article, the ways in which users comment on news articles and share news articles through Facebook and Twitter across news content and news sites are referred to as *participatory practices*.

Connecting the Actors: News Sites, Social Media and Users

This study brings together previously separate strands of research into a coherent approach that connects producers and users. First, it attends to how producers structure participatory space by employing technological features for user participation. Second, it also examines what users' preferences for participatory practices actually look like.

Our effort to integrate what have previously been treated as separate paths in research on users' participatory practices draws on Peter Dahlgren's notion of civic culture (Dahlgren, 2009). In Dahlgren's view, understanding participatory practices in general and mediated participation in particular calls for an integrated perspective of how various cultural aspects – knowledge, values, skills, identities, practices, spaces – cooperate to foster, or obstruct, participation. More specifically, this article attends to the interplay of two of these aspects, i.e., space and practices. The notion of space here is used to refer to how users' opportunities to participate are framed by how producers structure spaces for participation. To what extent are news articles designed to permit (or withhold) user interactions on the news sites (by permitting or prohibiting users to participate through commenting and/or sharing news)? Or, to put it differently, to what extent do news articles constitute a space for user participation? The notion of practices, in this context, refers to how users appropriate the opportunities to participate, i.e., how they comment and share news through Facebook and Twitter.

The concepts of spaces and practices help constitute an analytical framework that stresses the connection between specific producers and their users. For instance, one news producer can have a connection to its audience through Facebook that is different from another news producer's connection to its audience through Facebook. Furthermore, one news producer can have one type of connection with its users through a feature such as Twitter, and another type of connection to its users through user comments.

Our analytical approach positions the varying connections between producers' ways of structuring space and users' participatory practices at the very center of the analysis. Hence, it offers a new way of studying mediated participation in online news. In addition, the approach comprises contextual variations such as national, local, broadsheet, and tabloid news, as well as how users make use of UGC-features, such as commenting and sharing through Facebook and Twitter in different ways. The approach described illustrates the rationale behind our development of the comparative measurement used in the study, the ONP-index.

Formulating the Problem

Drawing on the concepts of space and practices, this study offers a way to study connections between online news media and their users. The article makes use of 3,444 news articles from nine Swedish news sites to answer the questions posed below. How do the connections between online news sites and their users vary depending on...

- a) different participatory features: user comments, sharing news through Facebook or tweeting news?
- b) whether the affiliated paper edition focuses on national or local content (i.e., is it national, e.g., a big city press, or local, e.g., a rural area press)?
- c) whether the affiliated paper edition has tabloid or broadsheet characteristics (i.e., is it published as a morning paper or an evening paper)?

Methods

The method applied is quantitative content analysis of ($N=3,444$) news articles published on nine Swedish news sites, collected between February 15 and March 9, 2014. Each news article can be equipped with different features for user interaction (comments, sharing news through Facebook or tweeting news), with attached counters showing the number of user interactions.

Three variables discern whether the news article has been equipped with a feature (user comments, Facebook, and Twitter). Three variables identify the number of user interactions (user comments, shares through Facebook and tweeted news). Because the multiple ways in which users can interact with news articles are the focus, the news articles constitute the analytical units. A number of identification variables of news articles have also been used. The material was collected on dates and times randomized beforehand. Articles on news sites were screen-recorded as video files with their adjacent information such as comment sections and counters for sharing news. All articles more recent than three days were used if they passed a news genre criterion (for instance: editorial columns, j-blogs and sponsored/collaborative articles are not included). The material was later systemized (articles as analysis units separated as video clips) with software for conducting qualitative analysis of video. The procedure enabled a hardcopy version of the material allowing backtracking and subsequent additions of variables.

The online news sites were selected using four criteria: variation in circulation of the paper edition, statistics for online visits (from high to low), the incorporation of UGC-features (comment sections and social plugins for sharing news through Facebook and Twitter), and the variation of the news outlets (national big city press, i.e., affiliated with morning broadsheet or evening tabloid, as well as rural area press (local).

To compare online news with different characteristics, descriptive statistics such as frequency and means are only discussed initially, and then another measurement is used that was developed specifically for this study, which is referred to as the online news participatory index (ONP-Index). This measurement works by plotting each online news site as a dot with two coordinates in a scatter gram. The x-axis measures the extent to which users are permitted to interact with news articles (as a percentage of the total number of articles). The y-axis measures the number of online user interactions divided by available news articles (mean) divided by the circulation of the paper edition of the affiliated news site (see figures 1, 2 and 3).

Results

The results section first presents aggregated results across all news sites concerning the extent to which users participate through comments, Facebook shares and tweets. Second, this section presents the following information separately for each news site: the extent (as a percentage of the total number of articles) to which user interactions are permitted, (i.e., to post comments, to share news through Facebook and to tweet news) and the extent (mean and frequencies) to which users comment and share news through Facebook and Twitter. Thereafter, the results are presented through the online news participatory index (ONP-Index), which allows for comparisons between news

Table 1. *Selection of News Sites (place of publication, circulation, site statistics and UGC-features)*

News site	Place of publication	Circulation of the paper edition	Visiting statistics for the news site, category	Features for user-generated content
www.aftonbladet.se (Aftonbladet)	Stockholm, big city, evening tabloid	250,300	Largest	1, 2, 3
www.expressen.se (Expressen)	Stockholm, big city, evening tabloid	217,400	Largest	1, 2, 3
www.svd.se (Svenska Dagbladet)	Stockholm, big city, morning paper	174,400	Largest	1, 2, 3
www.dn.se (Dagens Nyheter)	Stockholm, big city, morning paper	270,700	Largest	1, 2, 3
www.na.se (Nerikes Allehanda)	Örebro, rural area, morning paper	52,700	Largest	1
www.vk.se (Västerbottens-Kuriren)	Umeå, rural area, morning paper	32,400	Largest	1, 2, 3
www.nt.se (Norrköpings Tidningar)	Norrköping, rural area, morning paper	39,500	Large	1, 2, 3
www.arbetarbladet.se (Arbetarbladet)	Gävle, rural area, morning paper	20,800	Medium	1, 2
www.laholmstidning.se (Laholms Tidning)	Laholm, rural area, morning paper	2,600	Smaller	1, 2, 3

Note: The table rows describe the online news sites included in the study; the place of publication for the paper edition; whether the newspaper is categorized as a big city or rural area press; and whether the newspaper is a morning paper or evening tabloid. The table also shows the circulation of the paper edition, the online visiting statistics for the online news site, and the features for user-generated content present on the news site at the time the material was collected (from February 15 to March 9, 2014). Features for user-generated content: 1=post-ing comment adjacent to a news article, 2=sharing the news article through Facebook, and 3=sharing the news article through Twitter.

Sources: For the place of publication: Sundin, S. (2011), circulation figures: Sundin, 2013). *Den svenska mediemarknaden*. Göteborg: Nordicom. For the categorization of online visiting statistics: Hedman, U. (2009). *Läsarmedverkan: Lönande logiskt arbete*. Arbetsrapport nr 56. Göteborg: Göteborgs Universitet.

sites, concerning the degree to which news sites open their content for user participation as well as the extent to which users actually participate, controlled for (divided by) the circulation of the paper edition.

Aggregated Results of the News Sites

This section describes with means the extent to which users post comments and share news through Facebook and Twitter on available news articles. At most, the results could be described as modest: user comments ($M=3.65$), and sharing news through Twitter ($M=3.03$). Sharing news through Facebook is a substantially more common practice ($M=62.12$). It is, in other words, approximately 20 times more common for users to share news through Facebook than to tweet or post user comments. Users ignore (do not interact with) most news articles: concerning user comments and Twitter sharing, 63 per cent of all of the news is ignored; concerning Facebook sharing, 56 per cent is ignored.

Table 2. *User Interactions; Comments and News Shared through Facebook and Twitter, frequencies and means, circulation of the paper edition and news items permitting user interactions*

News site	User interactions, frequencies and means for news articles with each feature for user-generated content, respectively								
	Article comments			Sharing news through Facebook			Sharing news through Twitter		
	<i>f</i> com- ments	<i>f</i> news articles	<i>M</i>	<i>f</i> news shared through Face- book	<i>f</i> news articles	<i>M</i>	<i>f</i> news shared through Twitter	<i>f</i> news articles	<i>M</i>
Morning papers, big city									
Dagens Nyheter (www.dn.se)	449	124	3.6	19,127	271	70.6	1653	328	5.0
Svenska Dagbla- det (www.svd.se)	554	147	3.8	12,443	332	37.5	935	331	2.8
Evening tabloid, big city									
Aftonbladet (www. aftonbladet.se)	2815	217	13.0	60,460	393	153.8	3229	393	8.2
Expressen (www. expressen.se)	---	---	---	76,084	327	232.7	2049	399	5.1
Morning papers, rural area									
Arbetsbladets (www.arbetsbla- det.se)	522	371	1.4	7331	355	20.7	---	---	---
Laholms Tidning (www.laholmstid- ning.se)	0	64	0.0	3	204	0.0	0	187	0.0
Nerikes Allehanda (www.na.se)	883	148	6.0	---	---	---	---	---	---
Norrköpings Tidningar (www. nt.se)	275	416	0.7	237	789	0.3	113	787	0.1
Västerbottens-Ku- riren (www.vk.se)	408	130	3.1	3213	210	15.3	0	210	0.0

Note: The data in the table illustrate the results from the quantitative content analysis, using the news articles as analysis units. The variables measure whether the feature for posting article comments is available adjacent to the news article (0=No, 1=Yes) and the number of article comments posted adjacent to the news article (ratio). In addition, the data show whether the feature for sharing news through Facebook is available adjacent to the news article (0=No, 1=Yes) and the number of times the news article has been shared through Facebook (ratio). Moreover, the data also show whether the feature for sharing news through Twitter is available adjacent to the news article (0=No, 1=Yes) and the number of times the news article has been shared through Twitter. In addition, they include a number of variables facilitating identification and backtracking of the analysis unit, such as dates, headlines and the news site the article was published on. The news articles constituting the material generating the data in the table were collected from February 15 to March 9, 2014.

Descriptive Statistics of News Sites

The share of news articles that users are permitted to comment on varies extensively. Most news sites permit comments on 40 to 60 per cent of their articles: Expressen 0 per cent, Laholms Tidning 26 per cent, Dagens Nyheter 38 per cent, Svenska Dagbladet 38 per cent, Nerikes Allehanda 45 per cent, Norrköpings Tidningar 53 per cent, Aftonbladet 55 per cent, Västerbottens-Kuriren 61 per cent and Arbetarbladet 100 per cent (figure 1, the x-axis). The outliers are Expressen, permitting user comments only on very few blog columns (which are not included depending on genre issues) and Arbetarbladet, which, conversely, permits users to post comments on all news. Users are permitted to share news through Facebook and Twitter to a much greater extent than to comment. Between 77 and 100 per cent of the news articles can be shared through Facebook or Twitter (figures 2 and 3, the x-axis). The restrictions on user comments are far greater than the restrictions on sharing news through social media.

The frequencies show that sharing news through Facebook is the most common way for users to interact with news. This is especially true regarding online news sites affiliated with evening papers (www.aftonbladet.se and www.expressen.se) but also regarding the big city press (www.dn.se and www.svd.se) compared to news sites affiliated with rural area press (table 2). However, when comparing the news sites, the figures above need to be connected with both the extent to which users are permitted to interact with news articles and the differences in the circulation of the paper editions.

The Comparative Presentation of the Results (ONP-Index)

The measure used provides two coordinates. Each dot represents an online news site. The x-axis displays the degree to which a specific feature (in figure 1, the user comment feature) permits users to interact with news articles. The y-axis displays users' use of the participatory feature while controlling for differences in circulation of the paper newspaper. This is calculated by dividing the frequency of user interaction by the frequency of available news articles on each site. This ratio is then divided by the circulation figure of the actual site's paper edition. When plotted together, these coordinates (X and Y) display how news sites differ regarding the extent to which they make their content available to their users as well as how the users' participatory practices differ across news sites. The further to the right (for each dot representing a news site) in the chart area, the more news articles users are permitted to interact with. The more users who interact with the feature, the closer it is to the top position in the chart area. The light gray data points represent big city press news sites (squares for broadsheets, circles for tabloids), and the dark gray data points represent rural area press news sites. The results are presented in the same order as the three research questions: first, the user comment feature (figure 1); second, sharing news through Facebook (figure 2); and third, tweeting news (figure 3).

Figure 1. *The ONP-Index Applied to the User Comment Feature Adjacent to News Articles*

Note: Each data point represents a news site, illustrated by the ONP-Index. The x-axis displays the extent to which news items have the user comment feature. The users' participatory practices are illustrated on the y-axis that displays the mean of user comments per open article, divided by the circulation (circulation figures from Sundin, 2013). The light gray data points represent national big city press (squares for broadsheets, circles for tabloids), and the dark gray data points represent local rural area press. Three local news sites have the most engaged comment-generating users (the dark gray data points on top).

Three types of connections between users and news sites are illustrated through the user comment feature (figure 1). First, a number of news sites permit users to comment on approximately half of the news items. Some of these sites also have high levels of user participation (Nerikes Allehanda, www.na.se and Västerbottens-Kuriren, www.vk.se). These are sites affiliated with local newspapers and have, by Swedish measures, comparatively large circulations. Seemingly, these news sites have something in common that makes users participate to a somewhat unexpected degree.

Second, some sites permit user comments on a minor share of the news articles and receive very few user comments (Laholms Tidning, www.laholmstidning.se, Dagens Nyheter, www.dn.se). Interestingly, these two sites could hardly be more different in any other sense. Dagens Nyheter is the big city morning paper, while Laholms Tidning is the smallest and most rural of the rural dailies. This suggests that when users refuse to comment on news, it might relate to (a) the news site needing to have reached a certain size in distribution for users to care to engage and (b) national news having a deterring effect on comments compared to local news.

Third, one news site permits users to comment on all news (Arbetarbladet, www.arbetarbladet.se). The users of Arbetarbladet participate at a high level compared to national news sites but to a lower extent than the users of Nerikes Allehanda and Västerbottens-Kuriren, although these latter news sites offer participation to a much lesser extent. This result suggests that simply allowing users to extensively post comments on news does not solely explain why they choose to do so. Other factors related to how users are invited to participate need to be considered as well.

Figure 2. *The ONP-Index Applied to the Sharing News through Facebook Feature Adjacent to News Articles*

Note: Each data point represents a news site, illustrated by the ONP-Index. The x-axis displays the extent to which news items have the feature allowing users to share on Facebook. The users' participatory practices are illustrated on the y-axis, which displays the mean of the times articles were shared on Facebook across articles with the feature, divided by the circulation (circulation figures from Sundin, 2013). The light gray data points represent national big city press (squares for broadsheets, circles for tabloids), and the dark gray data points represent local rural area press. The users are permitted to share almost all news articles on Facebook, >82 per cent.

In figure 2, the ONP-Index is applied to sharing news through Facebook, a practice permitted extensively across all news sites: 82-100 per cent of the news articles can be shared on Facebook. Whether the news site is local or national does not seem to matter for how users share news through Facebook, nor does whether the affiliated newspaper is a morning paper or a tabloid evening paper.

In figure 3, the ONP-Index is applied to tweeted news, showing both similarities and differences compared to sharing news through Facebook. Users are permitted to tweet almost all news articles (77-100 per cent). However, there are differences between how users tweet news compared to posting comments and sharing news through Facebook, depending on whether the news site is affiliated with a big city newspaper or a rural area paper. National news sites have users who tweet to a comparatively high extent. The two evening papers (Aftonbladet and Expressen) take the top positions, while news sites affiliated with rural area press gather at the bottom. Overall, the analysis shows that various features for UGC enable different types of connections between users and producers.

Figure 3. The ONP-Index Applied to the Tweeting News Feature Adjacent to News Articles

Note: Each data point represents a news site, illustrated by the ONP-Index. The x-axis displays the extent to which news items have the feature allowing users to share on Twitter. The users' participatory practices are illustrated on the y-axis, which displays the mean of the times articles were shared on Twitter across articles with the feature, divided by the circulation (circulation figures from Sundin, 2013). The light gray data points represent national big city press (squares for broadsheets and circles for tabloids), and the dark gray data points represent local rural area press. Tweeting users tweet articles on sites affiliated with big city newspapers, and especially with tabloids.

Conclusions

In this study, the notions of space and practices (Dahlgren 2009) have been used to connect (1) how producers structure space in terms of how users are permitted to participate through various features, with (2) how users exert participatory practices on news sites. When reviewing the results with extant research as a backdrop, three specifically interesting aspects appear, which might be useful for forthcoming studies of mediated participation. The first aspect concerns how producers (structuring space) and users (performing practices) appear to value (1) *spatiality* (from the proximal to the distant). The second (2) aspect concerns the type of *sociality* that each technological feature for interacting with news enables for the user: mutual (i.e., Facebook), unidirectional (i.e., Twitter) and public (i.e., comment on news sites). The third aspect (3) concerns the *mode* of interaction, whether it tends to be consensual or conflictual.

The connections between news sites (represented by producers' way of structuring *space*) and users (representing *practices* through the ways users act) diverge and coincide, seemingly depending on both what news site and what feature for UGC is considered. The most engaged users in terms of posting comments are found among users of local (proximal) news sites, when controlling for differences in the newspapers' circulation size (through the ONP-Index). This suggests that proximity is a strong driver for commenting on public news sites.

According to our results, the practice of sharing news through Facebook is an overwhelmingly dominant user practice compared to commenting on news sites or tweeting

news. Mutual social settings, such as Facebook, seem to be more appealing to the users compared to communicating outside of the personal network, although sharing news is not what users primarily associate with Facebook (cf. Costera Meijer & Kormelink, 2015). Nevertheless, this is the case with regard to the practice of news sharing.

Users' engagement in participatory practices by tweeting news works differently from both commenting and sharing news through Facebook. The practice of tweeting news is unidirectional in the sense that the user tweeting does not control the viewer. Tweeting news is a non-existent practice on the local news sites studied. News is most often tweeted on (distant) news sites affiliated with evening and national morning papers. Tweeting news is very clearly a big city phenomenon, and it has also been suggested in previous research that tweeted news has more of a national character than a local character (Park, et al., 2013).

Local news sites have a proximity to their users. They allow their users to comment on a larger share of the news articles than national (more distant) news sites do. User comments have been described as an especially conflict-ridden form of UGC. Comments are also public in the sense that all users of the website are potential viewers. One interpretation of the result is that producers of national (distant) news sites perceive comments as more problematic than producers of local (proximal) news sites do. Among the national news sites, those affiliated with broadsheets apply almost identical restrictions to comments, whereas the tabloids diverge.

User practices connected to sharing news through social media appear to be more distant from the legacy brand than comments. The practices of sharing news through Facebook and Twitter are permitted to a much greater extent than posting user comments on all news sites. Hence, different features seem to be perceived as conceptually different things among producers. One interpretation is that sharing news through social media is perceived as a safer or more beneficial user practice than commenting. Otherwise, it is difficult to explain why this constructed (distant) connection with users, mediated through the interfaces of social media, seems so appealing for producers. Regardless of the news sites' dependence on social media platforms, social media (i.e., Facebook and Twitter) must be described as having been very successful in their interplay with news sites because almost all news articles are made to permit users to share. Occasionally producers' and users' preferences for technological features coincide (i.e., Facebook), while at other times, their preferences diverge (i.e., Twitter and comments). This suggests something about the potential and limitations of the mediated participation in online news. The approach in this study cannot say anything about the specific news articles that users interact with, or the meaning that users and producers ascribe to their practices. What the study and the ONP-index do is suggest that spaces and practices on news sites are shaped by an interplay between *spatiality*, *mode of communication*, and the *type of sociality* that the technological feature promotes. Mediated participation does not take place just because technological features are present because each feature for participation intertwines with how users' and producers' relate to spatiality, mode of communication and type of sociality. These factors are also, arguably, key instances to attend to when studying other settings for mediated participation. The ONP-index can serve as one methodological tool, operationalizing the connections between how news producers structure participatory spaces and how users appropriate them in terms of participatory practices. Hence, the index is also a contribution to further analyses into

the realms of civic culture (Dahlgren, 2009). It places specific stress on the importance of understanding how and under what circumstances the design of online news spaces helps (or does not help) cultivate participatory practices among users.

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