

RESEARCH NOTE

# Conditional Congressional communication: how elite speech varies across medium

Rachel Blum<sup>1\*</sup> , Lindsey Cormack<sup>2</sup> and Kelsey Shoub<sup>3</sup> 

<sup>1</sup>Carl Albert Congressional Research and Studies Center, the Department of Political Science, University of Oklahoma, Norman, Oklahoma, USA, <sup>2</sup>College of Arts and Letters, Stevens Institute of Technology, Hoboken, New Jersey, USA, and <sup>3</sup>Department of Political Science, University of South Carolina, Columbia, South Carolina, USA

\*Corresponding author. Email: [rblum@ou.edu](mailto:rblum@ou.edu)

(Received 12 April 2021; revised 20 January 2022; accepted 3 February 2022; first published online 12 September 2022)

## Abstract

Elected representatives have more means of public-facing communication at their disposal than ever before. Several studies examine how representatives use individual mediums, but we lack a baseline understanding of legislators' relative use patterns across platforms. Using a novel data set of the four most widely used forms of written, constituent-facing communication (press releases, e-newsletters, Facebook posts, and Twitter tweets) by members of the US House of Representatives in the 114th (2015–2017), 115th (2017–2019), and 116th (2019–2021) Congresses, we generate a baseline understanding of how representatives communicate across mediums. Our analyses show that institutional, legislator, and district characteristics correspond with differential use of mediums. These findings underscore why medium choice matters, clarifying how a researcher's choice of mediums might amplify the voices of certain legislators and dampen those of others. In addition, they provide guidance to other researchers on how to select the medium(s) that best correspond with different research aims.

**Keywords:** American politics; legislative politics; mass media and political communication

Elected representatives rely on public-facing communication to enhance their standing in the eyes of constituents and potential donors. Thanks to expanded public adoption of the internet and social media, legislators now have more means of written communication available to them than ever before (e.g., Cormack, 2016; Straus, 2018; Geiger, 2019). Scholars have explored the implications of expanded communication options for legislative “homestyles” both in the USA (e.g., Glassman et al., 2010; Grimmer, 2013; Grimmer et al., 2014; Hemphill et al., 2020) and beyond (e.g., Obholzer and Daniel, 2016; Scherpereel et al., 2018). Others have leveraged medium type to measure partisanship, ideology, and party brands (e.g., Barberá, 2015; Jones et al., 2018; Green et al., 2020). These studies share a common feature: they draw conclusions about Congressional communication using one or two platforms.

The field still lacks a baseline understanding of whether and how legislative communication varies across platforms. As a result, it is unclear whether findings based on one- or two-platform studies can be generalized beyond these platforms.

In this note, we offer the first multi-medium comparative analysis of legislative communication. To do so, we analyze US House members' written, public-facing communications across four platforms during three legislative sessions, the 114th, 115th, and 116th Congresses (2015–2020). Using our unique data set of the official press releases, e-newsletters, Facebook posts, and tweets on Twitter issued in this period, we show that use patterns vary across platforms

based on members' institutional status, individual characteristics, and district demographics. These findings establish a baseline understanding of cross-medium communication on the most widely adopted platforms that can inform scholars of legislative communication when selecting a medium for different areas of interest.

## 1. Factors informing communication

Previous studies link several factors with both how frequently legislators communicate with the public, and the platforms they use to do so. These explanatory mechanisms fall into three (often overlapping) categories: institutional status, individual characteristics, and constituency characteristics.<sup>1</sup>

*Institutional status* encompasses a legislator's formal and informal position within the chamber, which in turn affects access to the legislative agenda and the media. Higher-status members (e.g., party leaders, majority party members, those in the president's party) receive more media coverage, and may have less of a need for *direct communication* with constituents (Cox and McCubbins, 1993; Meinke, 2009; Cook, 2010). This does not necessarily mean that higher status members communicate less, however. Party leadership positions come both with additional resources that enhance leaders' abilities to communicate (e.g., more staff), and with additional responsibilities (e.g., maintaining and perpetuating the party's brand) that enhance leaders' mandate to communicate (Cox and McCubbins, 1993; Heberlig et al., 2006; Oleszek, 2006; Meinke, 2009; Glassman, 2012).

In contrast, lower-status members (e.g., minority party members, members of the presidential out-party, or more extreme members) lack influence over the legislative agenda. They also receive less "free" media attention. For these members', direct communication with the public is one of the only ways to gain the attention of constituents' and donors (Gulati, 2004; Lassen and Brown, 2011; Straus et al., 2016; Cormack, 2018; Russell, 2020).

More broadly, a legislator's party affiliation likely plays some role in cultivating communication patterns. From the Democratic Message Board to the Republican Theme Team, Congressional parties have established mechanisms for coordinating communication in a way that augments the party's brand, enhancing the ability of members of the party to rapidly and repeatedly communicate with the public (Harris, 2005; Meinke, 2014). These coordination efforts may translate into different medium use patterns between the two parties.

Other research posits a relationship between *legislators' individual characteristics* and their communication styles. For example, more senior members are less likely to adopt social media, either because of less experience with newer technologies or because their status as incumbents has not required adoption of social media in reelection campaigns (Shogan, 2010). Conversely, newer members might be more comfortable with social media, having used it recently for their campaigns. These newer members might communicate *less* than their senior counterparts on platforms with higher start-up costs, such as e-newsletters (Cook, 2010).<sup>2</sup>

Other individual characteristics, including electoral vulnerability, gender, and race, are associated with different communication strategies. Members from safe districts tend to advertise issue positions on Facebook, while members from marginal districts tend to use Facebook to address district-specific concerns (Schraufnagel et al., 2017). Research on women's communication patterns using both Twitter and e-newsletters show that women communicate more prolifically than men on these platforms—a trend that might extend to other platforms as well (Cormack, 2016; Wagner et al., 2017). Some research suggests that legislators from ethnic groups that are under-represented in Congress might communicate more using Twitter, but less using other platforms (Ardoin, 2013; Tillery, 2019).

<sup>1</sup>Beyond these, but outside of the scope of the current study, are, of course, medium or platform differences that legislators must consider.

<sup>2</sup>In the 114th Congress, the average new member took 80 days to send their first e-newsletter, with some taking longer (e.g., Alex Mooney, R-WV, took 242 days to send his first). Eight members did not set up e-newsletters in their first term.

Finally, *district-level characteristics* are known to shape a member's digital home-style (Meinke, 2009; Butler *et al.*, 2012; Grimmer, 2013).<sup>3</sup> In particular, the medium a member chooses for constituent communication is a central part of building and maintaining relationships with a member's constituency. In early stages of internet adoption, members representing higher-income districts were more likely to communicate online (Adler *et al.*, 1998). We might continue to expect greater adoption of online platforms by members who represent districts with higher median income, education levels, and population density (Lin *et al.*, 2017; Barthel *et al.*, 2019; Pew Research Center, 2021). Members representing a predominately Black constituency might favor Twitter, given that Black users make up a disproportionately large number of Twitter users (Smith, 2010; Hargittai and Litt, 2011). In contrast, members representing a predominately Latinx constituency might be less likely to communicate online due to the persistent "digital divide" between white and Latinx Americans.<sup>4</sup>

## 2. Data on public communication

We analyze a novel data set of four types of public-facing communication from official (e.g., not from campaign or personal accounts) press releases, e-newsletters, tweets, and Facebook posts issued by members of the House of Representatives during the 114th–116th Congresses (2015–2020).<sup>5</sup> These four mediums are uniquely suited to comparison for the purposes of establishing a baseline of constituent communication. First, all four feature written communication. Second, all four enjoyed nearly universal adoption in the period in question.<sup>6</sup> These two features distinguish the mediums we analyze from audiovisual platforms (e.g., Instagram, Snapchat, TikTok, YouTube), which were not as widely adopted between 2015 and 2020, and which would implicate sticky methodological issues about the comparison of written and non-written forms of communication.

We focus our analysis on these Congresses for two reasons. First, these three sessions provide variation in which party controls the House and/or the presidency. Second, and more practically, collection of members' Facebook posts did not occur regularly until 2015. Because members' Facebook accounts and posts are typically deleted when they leave office, comprehensive collection of historical Facebook posts is not possible.

Information on the rates of use come from different sources. *Press release* and *Twitter* totals are from collections archived by ProPublica, and *e-newsletter* totals come from DCinbox (Cormack, 2017). *Facebook* counts are from two sources: rates for the 114th and 115th Congresses are from Pew Research Center (Messing *et al.*, 2017), and rates for the 116th Congress were collected by these authors using CrowdTangle. A comprehensive discussion of data collection and data set construction is provided in the online appendix.

### 2.1 Summary of variables

We summarize the average use rate for each medium across all three Congressional sessions in Table 1.<sup>7</sup> As this table shows, rates of use differ widely by medium, although most legislators

<sup>3</sup>An extensive examination of audience characteristics and home-style is beyond the scope of this research note. Here, we provide an empirical baseline to inform future research on communication home-style. Such research might focus in greater detail on audience characteristics such as: average age in the district, internet reach in district, information on news consumption, number of followers, and proportion of donations from outside of the district.

<sup>4</sup>Recent evidence suggests that this gap is beginning to narrow (Brown *et al.*, 2016).

<sup>5</sup>Our Facebook coverage does not include 2018. For our analyses we use number of communications by member in each medium per year as our unit of analysis, to mitigate the issue of this one year missingness.

<sup>6</sup>The only medium not adopted by all legislators in this period was e-newsletters. In the 114th–116th Congresses, only 28 members never sent an e-newsletter.

<sup>7</sup>Several legislators served partial terms or did not have accounts. We classified information on these members as missing.

**Table 1.** Average yearly use rates by medium and member for the 114th, 115th, and 116th congresses)

	Min.	Median	Mean	Max.	SD	Missing
Press releases	1.00	78.00	93.39	1060.00	74.39	124
E-newsletters	0.00	20.00	35.11	687.00	47.71	79
Tweets	0.00	498.00	631.07	6004.00	559.70	102
Facebook posts	4.00	388.00	452.33	3161.00	317.42	46

used each medium at least once in the period under examination. Legislators issue e-newsletters at the lowest rate, followed by press releases. In contrast, members use Twitter and Facebook more frequently. Intuitively, this makes sense: the first two are longer format mediums and cannot be edited once released, while the last two are comparatively short and can be edited or removed after posting.

Our key dependent variables are use rates of each of these four mediums. For purposes of cross-medium comparison, we standardize and normalize the rate of use per year for the four communication types. In the regression models that follow, we analyze pooled data across the three Congresses in order to capture the institutional variation that occurs during this period (e.g., changes in party control of the chamber).

We also include several independent variables to account for the factors that might influence legislators' communication choices. Variables relating to *institutional status* include: membership in the majority party, membership in the same party as the president, position in party leadership, chair of a committee or subcommittee, party membership, and ideological extremism (distance from median DW-NOMINATE score in chamber). To account for *individual factors* we account for: first-term status, seniority (years served), state legislature professionalism, gender, race, and the member's district vote proportion in their most recent election. Finally, we control for *district characteristics*, including: median income (in 100,000s), population density (logged), and indicators for majority-minority districts (Black or Latinx),<sup>8</sup> and the proportion of the population that has completed high school. Details on these variables and their distributions are given in the online appendix.

### 3. Results and implications

We assess the link between institutional, legislator, and district-level factors on average use of all four types of Congressional communication using ordinary least squares (OLS) regressions.<sup>9</sup> Data are pooled across Congressional sessions, and communication rates are standardized and normalized. As a result, a one unit change in an independent variable corresponds with a coefficient-sized shift in the standard deviation of the each medium's yearly use rate. All else equal, if the estimated coefficient associated with a given variable is 1, then the dependent variable is expected to increase by 1 standard deviation if that variable takes on a value of 1.

We present the regression results as a coefficient plot, with dashed vertical lines indicating zero, points indicating coefficient estimates, and light gray bars indicating the 95 percent confidence interval (Figure 1). For the full regression table, see the online appendix.

Three broad patterns emerge in these results: (1) variables with similar use rates across mediums, (2) variables with statistically significant influence on two or fewer mediums, and (3) variables with use rates that differ in both sign and significance across two or more mediums.

<sup>8</sup>We performed robustness checks using the proportion of Black and Latinx constituents per district. See the online appendix.

<sup>9</sup>As shown in the online appendix, results are robust to alternative specifications, including: predicting raw counts (rather than averages) using OLS, negative binomial, and Poisson models.

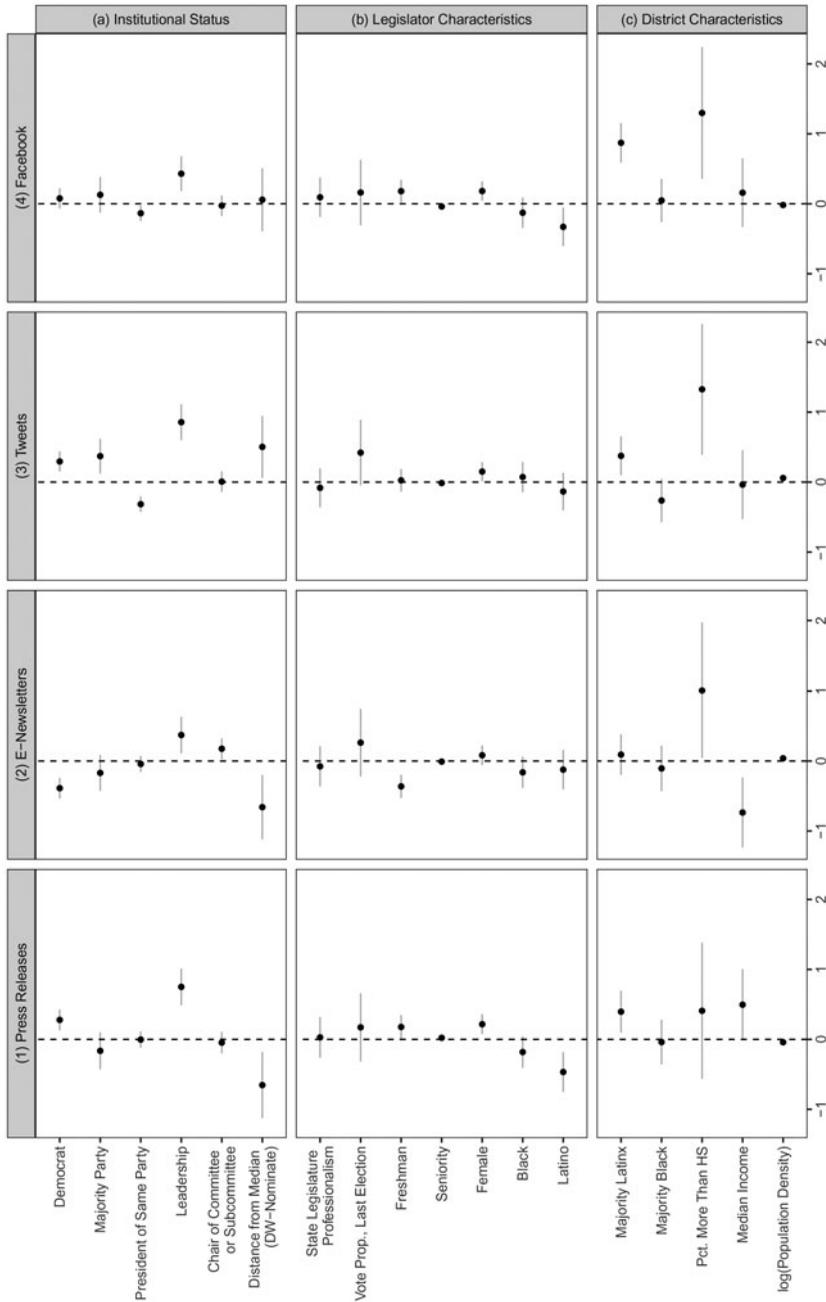


Figure 1. Coefficient plot for each of the four OLS regressions.

First, a number of variables are related to every, or almost every, medium in the same manner. *Leaders* (of both parties) communicate more than other legislators, which is in line with research stressing access to greater resources and responsibilities for those in higher positions. Beyond that: (1) *women legislators* communicate more on average than their male counterparts (aside from e-newsletters); (2) those representing *majority Latinx districts* communicate more on average

(aside from e-newsletters); and (3) as the *proportion of the district that has more than a high school degree* increases, so too does the amount communications on all mediums except press releases. Additionally, there are a number of variables that exhibit a null relationship across all four regressions. These variables include: state legislative professionalism, vote proportion received in the last election, whether the legislator is Black, and whether the majority of the district is Black. These relatively stable relationships across medium contribute to our better understanding of how members communicate, and suggest situations in which research could obtain similar results regardless of the medium.

Second, we note several variables that correspond with significantly different use rates for two or fewer mediums. Three variables relate to significantly different use rates for only one medium: (1) *Members of the majority party* use Twitter more; (2) *committee or subcommittee chairs* send more e-newsletters; and (3) members representing *higher median income districts* send fewer e-newsletters. Additionally, two variables correspond with significantly different use rates in the same direction for two mediums. Members of the *president's party* use both Twitter and Facebook at lower rates, and *Latinx* members utilize both press releases and Facebook at lower rates than other members of Congress. Researchers interested in the relationship between these variables and Congressional communication should take care to distinguish between medium-specific impacts and general communication styles.

Finally, and perhaps most importantly, there are some variables that see opposing, statistically significant relationships across multiple mediums. Three of these variables are associated with substantively large differences in medium use: (1) *Democratic* members are more likely to communicate via both press releases and Twitter, but less likely to send e-newsletters; (2) more *ideologically extreme* members are more likely to use Twitter, but less likely to use both press releases and e-newsletters; and (3) *first-term* members are more likely to communicate using both press releases and Facebook, but are less likely to send e-newsletters. Two additional variables, seniority and district population density, show opposing relationships that are substantively smaller. More *senior* members are slightly more likely to issue press releases and slightly less likely to use Facebook, and members in *more populated districts* are slightly more likely to use both e-newsletters and Twitter, but are slightly less likely to issue press releases. These findings suggest that researchers should take the greatest care in medium choice when examining these variables, as their results will differ substantially based on which medium they analyze.

#### 4. Discussion and conclusion

These cross-medium analyses provide a baseline understanding of how differently situated legislators communicate with the public. Our findings indicate that medium choice matters, as who uses what—and how often—systematically varies across mediums. For example, a researcher turning to e-newsletters may come to different, opposing conclusions concerning use patterns for Democrats and Republicans or the engagement style of ideological extremists than someone turning to Twitter for data.

These implications do not mean that researchers should avoid using certain platforms in their analysis or that they must use *all* platforms in each study. Rather, we provide a framework within which to justify medium choice, and an indication for how studies may (or may not) be biased in their estimates and conclusions.

In general, our results illustrate important links between institutional status, legislator and district characteristics and platform use. Some of these relationships (or lack thereof) seem stable across mediums. For example, party leadership is related to greater communication across all mediums.

In addition, we highlight relationships that differ across mediums. These include the role of party, majority party status, and ideological extremism, which are often the focus of scholars studying communication, elections, policy, and polarization. As research continues on how

legislators communicate with the public, leveraging public communication to measure party brand and ideology, and develop a better understanding of when and why elite rhetoric shapes public opinion and behavior, this study provides insights on the conditional nature of medium use.

What we offer here is an empirical baseline of how members use four of the most widely adopted, written forms of constituent communication. This is an essential first step in deepening our understanding of legislative communication, and one that we hope will inspire studies that draw out the theoretical implications of these findings, examine the relationship between medium and home-styles, delve into the content and priorities expressed on these mediums, and expand this comparison to include audiovisual mediums as representational styles continue to evolve.

**Supplementary material.** The supplementary material for this article can be found at <https://doi.org/10.1017/psrm.2022.28>. To obtain replication material for this article, please visit <https://doi.org/10.7910/DVN/XRZ1UJ>.

## References

- Adler ES, Gent CE and Overmeyer CB (1998) The home style homepage: legislator use of the World Wide Web for constituency contact. *Legislative Studies Quarterly* **23**, 585–595.
- Ardoin PJ (2013) Why don't you tweet?: the Congressional Black Caucus social media gap. *Race, Gender and Class* **2013**, 130–140.
- Barberá P (2015) Birds of the same feather tweet together: Bayesian ideal point estimation using Twitter data. *Political Analysis* **23**, 76–91.
- Barthel M, Grieco E and Shearer E (2019) Those with Lower Levels of Education are Less Likely to Use Social Media. Pew Research Center, <https://www.journalism.org/2019/08/14/older-americans-black-adults-and-americanswith-less-education-more-interested-in-local-news/>.
- Brown A, Lopez G and Lopez MH (2016) Digital Divide Narrows for Latinos as More Spanish Speakers and Immigrants Go Online. Pew Research Center, <https://www.pewresearch.org/hispanic/2016/07/20/digital-divide-narrowsfor-latinos-as-more-spanish-speakers-and-immigrants-go-online/>.
- Butler DM, Karpowitz CF and Pope JC (2012) A field experiment on legislators home styles: service versus policy. *The Journal of Politics* **74**, 474–486.
- Cook T (2010) *Making Laws and Making News: Media Strategies in the US House of Representatives*. Washington, DC: Brookings Institution Press.
- Cormack L (2016) Extremity in Congress: communications versus votes. *Legislative Studies Quarterly* **41**, 575–603.
- Cormack L (2017) DCinbox—capturing every Congressional constituent e-newsletter from 2009 onwards. *The Legislative Scholar* **2**, 27–34.
- Cormack L (2018) *Congress and US Veterans: From the GI Bill to the VA Crisis*. New York, NY: Praeger.
- Cox G and McCubbins M (1993) *Legislative Leviathan: Parties and committees in the US House of Representatives*. Berkeley, CA: University of California Press.
- Geiger AW (2019) Key Findings about the Online News Landscape in America. Pew Research Center Fact Tank, <https://www.pewresearch.org/fact-tank/2019/09/11/keyfindings-about-the-online-news-landscape-in-america/>.
- Glassman M (2012) Congressional Leadership: A Resource Perspective. In Jacob R. Straus (Ed.), *Party and Procedure in the United States Congress*, 15–31, Chapter 2. Rowman/Littlefield. Please provide publisher location in Glassman (2012).
- Glassman ME, Straus JE and Shogan CJ (2010) Social Networking and Constituent Communication: Member Use of Twitter during a Two-Month Period in the 111th Congress. Congressional Research Service.
- Green J, Edgerton J, Naftel D, Shoub K and Cranmer SJ (2020) Elusive consensus: polarization in elite communication on the COVID-19 pandemic. *Science Advances* **6**, eabc2717.
- Grimmer J (2013) *Representational Style in Congress: What Legislators Say and Why it Matters*. New York, NY: Cambridge University Press.
- Grimmer J, Westwood SJ and Messing S (2014) *The Impression of Influence: Legislator Communication, Representation, and Democratic Accountability*. Princeton, NJ, Princeton University Press.
- Gulati GJ (2004) Members of Congress and presentation of self on the World Wide Web. *Harvard International Journal of Press/Politics* **9**, 22–40.
- Hargittai E and Litt E (2011) The tweet smell of celebrity success: explaining variation on Twitter adoption among a diverse group of young adults. *PS: Political Science and Politics* **13**, 824–842.
- Harris DB (2005) Orchestrating party talk: a party-based view of one-minute speeches in the House of Representatives. *Legislative Studies Quarterly* **30**, 127–141.

- Heberlig E, Hetherington M and Larson B** (2006) The price of leadership: campaign money and the polarization of Congressional parties. *The Journal of Politics* **68**, 992–1005.
- Hemphill L, Russell A and MSchöpke-Gonzalez A** (2020) What drives US Congressional members policy attention on Twitter. *Politics and the Internet* **13**, 233–256.
- Jones KL, Noorbaloochi S, Jost JT, Bonneau R, Nagler J and Tucker JA** (2018) Liberal and conservative values: what we can learn from Congressional tweets. *Political Psychology* **39**, 423–443.
- Lassen DS and Brown AR** (2011) Twitter: the electoral connection?. *Social Science Computer Review* **29**, 419–436.
- Lin Y-R, Kennedy R and Lazer D** (2017) The geography of money and politics: population density, social networks, and political contributions. *Research and Politics* **4**, 742015.
- Meinke SR** (2009) Presentation of partisanship: constituency connections and partisan Congressional activity. *Social Science Quarterly* **90**, 854–867.
- Meinke SR** (2014) The changing roles of house party leadership organizations: the House Republican Policy Committee. *Congress and the Presidency* **41**, 190–222.
- Messing S, Kessel P, Van and Hughes AG** (2017) Sharing the News in a Polarized Congress Partisan and Ideological Divides Shape which News Outlets Legislators Share Links to on Facebook. Pew Research Center.
- Obholzer L and Daniel WT** (2016) An online electoral connection? How electoral systems condition representatives' social media use. *European Union Politics* **17**, 387–407.
- Oleszek WJ** (2006) The role of the House Minority leader: an overview. *Congressional Research Service, the Library of Congress* **41**, 190–222.
- Pew Research Center** (2021) Social Media Fact Sheet. Pew Research Center, <https://www.pewresearch.org/internet/fact-sheet/social-media/>.
- Russell A** (2020) Minority opposition and asymmetric parties? Senators partisan rhetoric on Twitter. *Political Research Quarterly* **74**, 615–627.
- Scherpereel JA, Wohlgenuth J and Lievens A** (2018) Does Institutional Setting Affect Legislators Use of Twitter?. *Policy and Internet* **10**, 43–60.
- Schraufnagel S, Li Q and Schuster A** (2017) District partisan homogeneity, communications, and the electoral motive: an analysis of the Facebook posts of members of the US House of Representatives. *Social Networking* **6**, 1–16.
- Shogan CJ** (2010) Blackberries, tweets, and YouTube: technology and the future of communicating with Congress. *PS: Political Science and Politics* **43**, 231–233.
- Smith B** (2010) Socially distributing public relations: Twitter, Haiti, and interactivity in social media. *Public Relations Review* **36**, 329–335.
- Straus JR** (2018) Social Media Adoption by Members of Congress: Trends and Congressional Considerations. Congressional Research Service, R45337.
- Straus JR, Williams RT, Shogan CJ and Glassman ME** (2016) Congressional social media communications: evaluating senate Twitter usage. *Online Information Review* **40**, 643–659.
- Tillery AB** (2019) Tweeting Racial Representation: How the Congressional Black Caucus used Twitter in the 113th Congress. Politics, Groups, and Identities.
- Wagner KM, Gainous J and Holman MR** (2017) I am woman, hear me tweet! Gender differences in Twitter use among Congressional candidates. *Journal of Women, Politics and Policy* **38**, 430–455.