MPs on Facebook: Differences between Members of Coalition and Opposition

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Social media platforms are today the main spheres in which politicians make political and personal statements, confront other public figures, and interact with the public. In the current study, the Facebook pages of all Israeli Members of Parliament (MPs) were scraped and analyzed for the entire period of the 19th Israeli parliament service (between 2013 and 2015), in order to find similarities and differences between the posting behavior and acceptance of coalition and opposition members posts. We found that popular posts published by members of coalition and opposition differ in terms of scope of publication, scope of user engagement (posts by coalition members were more engaged with), content, and format (posts by members of opposition more varied in format, more mobilizing, critical, opinionative and negative, less formal but also less personal). The implications for the character of Facebook as a key parliamentary discursive arena are discussed.

CCS Concepts: • **General and reference** → General conference proceedings; • **Social and professional topics**;

Additional Key Words and Phrases: Political communication, e-parliament, e-campaigning, social media, Facebook, big data analysis, content analysis, virality, political discourse

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1 INTRODUCTION

In recent years, social media have become a central tool for direct communication between citizens and their representatives. Due to their characteristics, these platforms hold the promise of increasing political transparency and civic involvement, bypassing traditional media gatekeeping and other organized political mechanisms [28]. For this reason, social media platforms have been excessively studied in the context of politicians and citizens engagement. However, while many recent studies focus on social media use by politicians *during election campaigns* (e.g., [12, 24, 32, 37]), fewer studies analyze its use by Israeli Members of Parliament (MPs) while the parliament is in session (e.g., [16, 18]). Furthermore, most studies use a sample of posts for the analysis, limiting the period of analysis [10, 16], or analyzing only a few social media accounts [7, 24].

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The current study examines MPs usage of Facebook by analyzing all posts published during an entire duration of the Israeli parliament (the Knesset), followed by an in-depth content analysis of the most popular posts of each MP, with the aim of classifying which content is most favorable by followers of MPs on social media, and with a focus on the differences between opposition and coalition members.

The article begins with a review of recent academic studies of MPs use of social media platforms, followed by a presentation of the study's research questions and hypotheses, method, and findings. The concluding section discusses the findings and summarizes the differences between pages of members of the coalition and members of the opposition, in terms of activity, content, and tone of posts posted by politicians on Facebook.

2 LITERATURE REVIEW

2.1 Politicians' use of Social Media

A wealth of research has studied politicians' use of social media. Examples include a comparison between the Facebook behaviors of parliamentarians from different nations [12], progressives and conservatives [37], Green and other parties [9], or usage by ruling party members in comparison with opposition members in democratic [24, 32, 36, 37] and semi-democratic or authoritarian regimes [11, 22]. Social media are used extensively during election campaigns, significantly more than during the non-election season [37]. Some noteworthy findings from previous research with respect to social media use by politicians for campaigning purposes suggest that the volume of posts increases as elections draw nearer [32]. Ruling and major parties are mentioned and related to more frequently than small or niche parties on social media [32] and are more prone to use social media [37].

While many studies on politicians' social media usage focus on Twitter, fewer studies have looked into the Facebook use of MPs, especially with respect to adoption rates of this online social platform.

There are great differences between countries with regard to MPs' adoption of Facebook as a formal platform for communication with citizens. In *Spain*, in 2011, 25% of MPs managed a Facebook profile, but only 16% maintained a public and formal profile [33]. In *Sweden* the same year, roughly 50% of MPs managed a Facebook profile, but only 47 (13%) maintained a public, formal fan page [23]. In *Germany* of 2013, 30% of MPs managed an open Facebook page/profile. A year later, in *Denmark*, no less than 170 out of 175 MPs managed a Facebook profile and also partook in a relatively high degree of engagement in political conversations with citizens on Facebook [25]. In the *US*, in 2012, nearly 90% of representatives and senators managed a Facebook account [10].

2.2 Facebook Pages of Coalition and Opposition Members

Studies found differences between members of diverse parties in their use of social media. Conservative party members are less active on the new outlets [37]. Green party members were more prone to use participatory online tools, and were also the beneficiaries of these activities [9]. Members of the Labor party and socialists post more than national/populist party members [24, 36]. In the *US*, republicans were more active than democrats [10].

Facebook pages can be useful for any parliament member regardless of whether they belong to the coalition or opposition. Both populations can gain from their activity in social media. On the one hand, members of the opposition can gain exposure and recognition which they typically lack. For case in point, Vissers and Stolle's [37] work found that members from the opposition are often more active on social media. Members from the opposition also have more extensive first-degree networks, and they post more frequently [16, 24]. This is arguably because the mainstream media tends to systematically have a preference of covering the work of ministers and coalition MPs, leaving less room for coverage of opposition MPs' work [21, 35]. As a rule of thumb, the media direct less attention to opposition MPs' agendas, and find the content that they produce to characteristically be less newsworthy [35]. Essentially, their Facebook pages can thus be useful for them to compensate for the media depravation that they typically experience [24].

On the contrary, members of the coalition have much more access to the national mainstream media. They typically have a more central role in legislative processes and sometimes also have ministerial positions (as ministers or vice ministers), especially in the parliamentary political systems, as in Israel. Facebook pages can be additional outlets for such MPs to publicize their activities [18]. Moreover, since they are in positions of power, they can attract queries, even from users that do not support them, addressing themes that they are responsible for in their ministerial positions.

While criticism is expected from opposition parties, maybe even especially on social media, at times of national crisis and emergency, oppositional parties and movements are expected to “rally around the flag” and silence or decrease criticism temporarily [3, 4, 17]. Even criticism from unaffiliated citizens is frowned upon during emergency periods: During the Israeli military operation “Protective Edge” in Gaza, Israeli social media users who expressed criticism toward the government or the Israeli Defense Force (IDF) had experienced harassments and threats [31] and were unfriended by Facebook “friends” with opposite political views [15]. And if ordinary citizens are expected to silence any sort of criticism during times of emergency, representatives are presumably all the more obliged to stand by and support the government and its actions, until the crisis passes.

2.3 Format and Content of MPs’ Posts

The most common format of politicians’ posts is usually text-only status updates [24, 25]. Web-links or photos tend to be a second preferred post format, and only a handful of politicians’ posts include videos [24, 33]. However, a number of studies suggest that rich media is significantly more engaging. Images are the most popular post format-dominating, the most liked, most commented on, and most shared political posts [29]. In general, images and videos tend to attract higher levels of engagement than mere text-based statuses [14, 30].

Despite social media’s potential to become discursive spaces for unmediated direct conversations between representatives and citizens, in reality it is quite rare for politicians to engage in conversations with their followers [33]. Rather, politicians use their social media pages first and foremost for dissemination of political agenda and expressing their positions on political matters [2, 6, 10, 33]. While all MPs tend to post political positions, Ross, Fountaine, and Comrie [24] found that members of the governing party posted more about their party’s manifesto, while members of the opposition posted more personal political texts.

Social media are also often regarded as mobilization tools, spheres of citizen participation, and activism. Critics of social media activism stress the superficiality of this kind of participation and its limited influence on real-life politics [35]. Proponents of online political participation perceive it as a natural development of traditional political functions, which encourages the participation of various demographics, and especially young people, better than any other medium [38]. And indeed, citizen mobilization is certainly one of the external affordances of politicians in social media use [6]; however, in practice mobilization is not as frequent as may be expected in politicians’ posts [24].

Politicians use their social media pages to report on their participation in official parliamentary activities (21% of congressmen posts, according to Glassman et al. [10]), but also to post personal stories and information (a practice termed as “controlled authenticity” by Frame and Brachotte [7]), which aims at increasing the sense of trust between representatives and followers [13]. This practice is not very common in politicians’ posts, ranging from about 8% [10] to around 12% [25] of MPs’ posts. Ross et al. [24] note that personal posts are more prevalent among opposition members’ posts.

In addition to format and content, politicians’ posts vary in tone, emotionality, and level of negativity or positivity of the message. Studies in media consumption point to a preference of media consumers for negative news [26]. The psychological base for this phenomenon is the human negativity bias, according to which individuals weight negative information more highly than positive information in their assessment of others, or devote more cognitive energy to thinking about bad in comparison to good things [8]. Similarly, with respect to political news, media consumers are arguably more aroused by, and pay more attention to, negative stories than positive

stories [27]. In practice, emotive words are rare in politicians' posts and positivity levels increase at the expense of negative sentiment when federal elections draw near and at holiday times. In general, politicians' posts are more positive than negative [2].

2.4 Israeli Politicians on Social Media

Israel is a promising site of research on online politics. According to a 2017 report, the number of Israeli Internet users at the end of 2016 was between 5.9 and 6.4 million, who are 71–80% of the Israeli population [20]. At the beginning of 2016, Facebook had some 4.9 million users (60% of the population). Its mobile application was the third most popular application in Israel (83%), after YouTube (87%) and WhatsApp (84%) [20]. A 2011 comScore [5] study declared Israel as the worldwide leader for the most time spent on social network sites. In October 2011, Israelis spent an average of 11.1 hours a month on social media, almost twice the global average of 5.7 monthly user hours. In addition, Israel is ranked 15th in the World Economic Forum's Networked Readiness Index of 2013 [1]. Not only the public but also MPs have a strong presence on Facebook. In 2010, the Director General of the Israeli parliament (the Knesset) advised all MPs to open a Facebook page [19]. At the time of data collection for the current study, 106 MPs out of 120 (87.5%) had active, formal, public Facebook pages.

3 STUDY AIMS AND CONTRIBUTION

The current study examines MPs' usage of Facebook, by analyzing all posts published during an entire duration of the Israeli parliament (the Knesset), followed by an in-depth content analysis of the most popular posts of each MP, with the aim of classifying what content is most favorable by followers of MPs on social media, and with a focus on the differences between opposition and coalition members. This study, to the best of our knowledge, is the first to use digital methods to analyze the entire scope of politicians' activity throughout the entire parliamentary term. Such an exhausting examination of MPs Facebook activity can promote a wider understanding of the scope and type of MPs social media activity, while a focus on each MP's most-liked sample of posts can reveal which content specifically is actually read, engaged with, and preferred by users following MPs social media messages, out of a sea of political communication between citizens and their representatives.

4 RESEARCH QUESTIONS

The study examines the similarities and differences in Facebook usage between opposition and coalition party members. The research questions include inquiries of scope, engagement, and content of posts published by coalition parliament members with comparison to members of the opposition.

RQ1: What is the scope of publication by opposition and coalition party members?

H1: In line with Larsson and Kalsnes [16] and Ross et al. [24], we expect to find that opposition members are more active on Facebook than members of the coalition. However, given that members of the coalition are more influential in national politics, and some of whom hold ministerial positions, we expect users to be more active on the Facebook pages of coalition members than on pages of members of the opposition, in terms of posting and engagement with posts by coalition party members.

RQ2: Are there differences in the *format* of posts by opposition and coalition party members?

H2: Given the higher engagement rates that rich media attracts [14, 29, 30], with social media serving as a platform specifically for members of the opposition to communicate messages directly to the public [11, 17, 22, 24], we may expect opposition members to be more oriented to engaging users and therefore more diverse in post format, embedding more rich content in their posts.

RQ3: Are there differences in user's preferences of the *content* of posts published by opposition and coalition party members?

H3a: Based on the notion that social media serve as main platforms of communication with the public for members of the opposition [11, 17, 22, 24], with more limited opportunities to make public political statements on

national, mainstream media compared to members of the coalition, we expect to find that users prefer opposition members' posts to include expressions of opinions more than posts by members of the coalition.

H3b: As the opposition may be more oriented toward mobilizing citizens to participate and influence current events, due to opposition parties' limited resources and influence on decision-making processes from within the system, we expect to find that users prefer *mobilization attempts* in opposition members' posts more than in coalition members' posts. However, following Ross et al. [24], we expect to find relatively low percentages of mobilization texts in general.

H3c: Deriving from the view of the opposition's role in criticizing the ruling party's actions, we expect to see a greater degree of *criticism* in popular opposition members' posts [24, 36]. Based on previous research which described social media users' harsh reactions to criticism during times of national crisis [15, 31], we expect to see a much lesser degree of criticism, and of general opinion stating [3, 4], during emergency periods, and especially so among the popular posts—posts which were more favorable by users.

H3d: Following Ross et al. [24], we expect to find that *personal posts* are more prevalent among opposition members' most popular posts; however, personal posts in general may not be very common in either coalition or opposition posts, based on previous research findings [10, 25].

RQ4: How do leading posts published by members of opposition parties differ in tone and sentiment from those published by members of coalition parties?

H4a: We expect to find that leading posts by members of opposition parties tend to be less *formal* in tone, given that members of the opposition do not hold ministerial positions, post (presumably) more critical and adversary content, and are less confined by position and coalition discipline, in practice and in the eyes of their followers.

H4b: In accordance with the expectation of a greater degree of criticism in opposition posts, and in light of the notion of news consumers' negativity bias [26, 27] we also expect opposition members' popular posts to be *more negative and less positive* than popular posts published by members of the coalition. In general, though, posts may be more positive than negative when it comes to coalition members' popular posts [2].

RQ5: What are the prominent terms in the texts of posts published on politicians' pages, and texts of politicians' posts, and are there terms that specifically dominate posts published on coalition vs. opposition members' pages?

H5: We expect to find terms mentioning specific lead figures of the opposition parties prominent in texts published on opposition parties' pages, while mentions of lead figures from the coalition (such as ministers, the prime minister, etc.) to appear in both corpuses, due to the simple reason that these are holders of central and important positions in the government and are naturally the address of inquiries for the general public (as well as by opposition members and their Facebook followers). In the Israeli parliament, three parties are considered as representatives of the Arab population, constituting 20% of the Israeli population, in the parliament. Although there are some Arab MPs in mainly-Jewish Zionist parties, they are a minority, while the Arab parties are composed of almost entirely Arab representatives, with very few Jewish MPs. As all Arab parties are in opposition, we expect to see Arabic terms appearing only in texts published on opposition pages.

5 METHODOLOGY

A list of all 120 members of the Knesset (the Israeli parliament) during its 19th service (beginning February 5th, 2013, until December 9th, 2014, after the Knesset's dispersion by the Prime Minister) was composed based on data from the Knesset's official website (The Knesset, 2016). To locate the official Facebook page of each MP (or MK, Member of Knesset, the Israeli parliament), three search methods were executed sequentially: Every MP's official personal page in the Knesset's website was scanned in search for a link to the MP's formal Facebook page, followed by a search with Google's search engine. Finally, we looked for the name of each MP in Hebrew,

Arabic, and English, Israel's three official languages, in Facebook's internal search box. A total of 106 MP's formal Facebook pages were found and included in the study.

All 106 pages were scraped using Netvizz, a Facebook application developed by Digital Methods Initiative labs. We used the application to extract and archive all of the posts published by either the pages or users during the entire 21-month period of the 19th Knesset. In total, our general dataset included 441,974 posts. Netvizz automatically attaches the following information to every post: publication date, post origin (page or a user, anonymized), post format (image, video, link, survey, or text status), post text, and various engagement measures, i.e., number of Likes, Comments, and Shares that the post received. It should be noted that during the period examined, Facebook has not introduced Reactions yet, therefore the above engagement indices are the only ones relevant for the posts extracted for the study. As the aim of the study is to examine the Facebook activity of all Israeli MPs throughout an entire service of the Knesset, the period of the 19th Knesset was chosen for the extraction of the data (the 20th Knesset was still at service at the time of analysis and dissolved in April 2019). A majority of MPs in that parliament have also served in previous and in later parliaments. In fact, only 12.5% of MPs of the 19th Knesset have neither served in previous nor in later parliaments, whereas 39% have served both in previous and later parliaments,¹ therefore there is basis to assume generalizability of the research findings to other, previous or later parliament terms.

Some complementary information was added to each post in the dataset, such as post length (number of words), whether the page belongs to a member of the opposition or coalition, and whether the post was published during "ordinary times" or in the time period between June 11th and August 26th, 2014, a period known as the kidnapping of the Israeli teenagers and operation "Protective Edge": On June 11th, 2014 three Israeli teenagers were kidnapped and murdered by members of the Palestinian fundamentalist organization Hamas. The victim's bodies were found nearly 3 weeks later, during which period a dramatic escalation between Israel and Gaza took place. The events led to the embarkation of operation "Protective Edge," which officially began on July 8th, 2014 and ended by ceasefire on August 26th, 2014. For the analysis of posts on the dataset, this period is defined as emergency period. Studying differences in the interaction between MPs and citizens on Facebook during times of crisis compared to during routine can tell an important story about the relationship between citizens and government representatives at times of crisis such as what type of communication is expected from representatives by their constituents at such times (are they expected to take more firm stands, express criticism or rather "rally around the flag" and hold criticism until the crisis is over), are there differences in expectations from coalition and opposition MPs in that sense? As coalition MPs are usually more involved in managing the crisis (holding relevant ministerial positions, serving at the cabinet), are they dramatically more addressed by citizens during emergencies?

To analyze the posts, we used a combination of automatic and manual content analyses. The automatic analysis is based on information retrieved by Netvizz, while the manual coding was conducted on a sample of each MP's bi-monthly most popular post. In order to create the sample, we divided the entire period of analysis (19th Knesset service) into periods of 2 months each (e.g., February-March, 2013 was period #1; April-May 2013 was period #2). Then, for each of the periods, and for each MP separately, we sampled the MP's leading post(s) in number of Likes and added the posts to the most-liked sample. The decision to look at the number of Likes rather than the number of comments or shares was made on account of "Likes" being the preferred and most common type of user engagement with posts in the dataset, engaging more users than other types of engagement (see descriptive statistics further on) and the researchers' assessment of "Like" as the most appropriate measurement of favoring a post. Previous research has also demonstrated that "Likes" are the most common and inclusive sort of user engagement with content on the social network [29]. The sample included posts authored by MPs only, as the focus of this study is content posted by MPs, which is most favorable by users. The sampling method

¹Based on information from the Knesset website, retrieved June 25 from <https://main.knesset.gov.il/mk/Pages/Previous.aspx?pg=mkpknessethist&knesset=19>.

described above enabled the equal representation of each MP, throughout the entire period examined. Given that the entire dataset is dominated by a small number of MP pages, and the distribution of likes between posts is highly skewed and biased by posts from specific MPs, mostly members of the coalition, a selection of the overall leading posts in the dataset would form a very biased sample of posts published by a handful of MPs, mostly from the coalition. As different users follow different MPs and we are interested in examining the interactions and engagement with the entire parliament and throughout the entire period, we selected the top posts per MP, bi-monthly. The most-liked posts sample consisted of 944 posts.

Manual coding was conducted by five raters who were trained by the researchers. Repeated training sessions were conducted for categories that achieved less than 90% reliability, until inter-rater agreement of 90% was achieved in all categories. Raters coded the content and tone of posts according to the following categories, each category was coded on a yes/no basis, besides the “criticism/support” category elaborated below, and coded separately, such that a post could be both mobilizing and personal, critical and positive, all of the below, or none of the below:

- (1) Mobilization for online and/or offline action (e.g., asking people to express their opinions in comments, like and share the post, or physically come to political events or demonstrations) (see hypothesis H3b).
- (2) Opinion stating (e.g., “I object to...”, “The party supports this legislation,” “We have to defeat terror”) (see hypotheses H3a, H3c).
- (3) Criticism or support of a person or entity. A post could be either critical (e.g., “The haughty government led by Netanyahu, Bennet and Lapid”), supportive (e.g., “PM Netanyahu’s decision is a brave one”), or neutral (doesn’t include criticism or support or includes both equally) (see hypothesis H3c).
- (4) Object of criticism/support (e.g., another politician by name, a formal entity in the parliament, citizens, publics, non-parliamentary public figures, public figures outside of Israel, media organizations).
- (5) Personal story (e.g., “Joyful times: A new granddaughter was born to our family”) (see hypothesis H3d).
- (6) Emotionality. Posts were coded “emotional” if the text included words that describe emotions (“I am happy,” “we were upset due to...”) or an emotional reaction (“horrified,” “excited,” “annoyed”), use of exclamation marks or emoticons.
- (7) In/formality (examples of informality include “Hi,” use of informal politicians’ nicknames such as “Bibi” for PM Netanyahu. Text containing sarcasm was also coded as informal text (see hypothesis H4a).
- (8) Positive tone (e.g., “We have finally and successfully passed the legislation”) (see hypothesis H4b).
- (9) Negative tone (e.g., “Terrorists belong behind bars and not at the Knesset stage”) (see hypothesis H4b).

With respect to tone, posts could be both positive and negative, or neither. A post could also be not emotional yet positive or negative. Additionally, posts could be emotional and yet formal, and vice versa. For example, the following text is positive, informal, and emotional: “Our granddaughter was born! Congratulations to the happy parents!” The following is a positive yet not emotional, formal text: “I have just returned from an 8-hour shift at the ER in Rambam hospital. [...] I have seen, from up close, the thorough and complex work of the medical team. [...] They treated the patient with dedication until her recovery [...]” And an example of a negative, formal, not emotional post: “The medical cannabis bill I have promoted was just rejected at the general Knesset assembly. [...] It is well known that cannabis has medical advantages. But what? It doesn’t have a lobby. There are no pharmaceutical companies to support the bill, no money.”

For the analysis of prominent terms, we created two corpuses: Coalition members’ pages corpus included the texts of all posts published on the pages of members of the coalition; Opposition members’ pages corpus included the texts of all posts published on the pages of members of the opposition. For each corpus, we used n-gram extraction tools to extract co-occurring words frequencies in the texts. The tool implements an algorithm by Nagao and Mori (1994) to extract number of co-occurrences of words in the text. We configured the tool to extract terms containing between two and five words, and created lists of the most prominent terms in each corpus by selecting the top 1,000 terms, after editing the results of the tool to remove duplicates, terms contained

in other terms, and errors. For a comparison of shared and different n-grams between the two corpuses, we used Microsoft excel search functions to identify similarities and differences between the lists (once for a comparison between the terms prominent in all users' texts published on coalition vs. opposition pages, and then for a comparison between prominent terms manifested in posts published by coalition and opposition members). A comparison between prominent terms that appear on pages of coalition and pages of opposition MPs, enables an analysis which can reveal, to some extent, the most prominent topics and ideas discussed on these pages, or the language used in the posts, in an automated manner which allows the inclusion of the entire dataset rather than a small sample. Such analysis may provide a different perspective for examining the dataset. While it is naturally less profound than manual analysis, identifying leading terms in the entire corpus and comparing popular terms between coalition and opposition pages may point to the topics citizens are most engaged with in posts directed to their MPs, and to which degree coalition MPs are engaged differently than opposition MPs.

6 RESULTS

6.1 Preliminary Descriptive Statistics

The entire dataset comprises 441,974 posts published by 106 MPs out of 120 (88% of MPs). Post length in words varies between 0 and 6,435 ($M = 78.63$, $SD = 151.02$). The majority of posts (270,631 or 61%) are text-only status updates, followed by links (75,583 or 17%), then images (66,680 or 15%). Unsurprisingly, the dataset is dominated by user-authored posts (403,732 which are 91%) with only 9% (38,242) of posts authored by the pages' administrators (MPs themselves or staff). There is great variance in the number of likes ($M = 83.85$, $SD = 970.53$, range: 0–125,694), comments ($M = 8.81$, $SD = 95.69$, range: 0–18,031), and shares ($M = 6.73$, $SD = 193.76$, range: 0–84,037), with likes significantly being the most popular form of engagement with posts.

In the sample of the most popular posts, comprising 994 posts, the average number of likes per post is 3,433.77 ($SD = 9,656.29$, range: 1–125,694). The average number of comments per post is 282.32 ($SD = 781.41$, range: 0–8,103) and average number of shares per post is 275.26 ($SD = 931.3$, range: 0–11,159).

6.2 Findings Based on Automatic Analysis of Entire Dataset

6.2.1 RQ1: Scope of Publication. 67 out of 106 MPs with Facebook pages (63%) were members of the coalition, and 39 (37%) were opposition MPs. This distribution slightly favors the coalition, which comprised 57% of the 19th Knesset (68 members out of 120). In addition, users tend to prefer Facebook communication with coalition MPs: 86% (347,235) of user-authored posts were published on coalition MPs' pages, with only 14% (56,497) published on opposition MP' pages. When looking at only page-authored posts, 63% were posted by coalition MPs and 37% posted by opposition MPs, matching exactly the proportion between coalition and opposition MPs Facebook accounts. The bias of users in favor of coalition MPs pages is further clarified by the division of user-authored in comparison to pages-authored posts published on the pages: 93.6% of the posts published on coalition MPs' pages were user-authored, and 6.4% published by the pages. On opposition MPs' pages, 79.8% of the posts were published by users and 20.2% by the pages ($\chi^2 = 14,278.97$, $p < 0.001$).

Coalition pages are not only more active in terms of publication, they are also more engaged by users. Due to the skewed distribution of engagement measures per post, Mann-Whitney tests were conducted to compare engagement indices with posts between opposition and coalition MPs' posts. Results show significant differences between opposition and coalition MPs' posts in terms of the number of likes ($U = 156,181,247.5$, $p < 0.001$) and comments ($U = 139,680,331$, $p < 0.001$), in favor of coalition MPs' posts. These findings support the hypothesis that coalition MPs pages and posts are more active, and more engaged with than opposition MPs' posts. However, in opposition to the hypothesis that opposition MPs are more active than coalition MPs, our data suggests otherwise; coalition MPs are just as active as opposition MPs on Facebook.

6.2.2 RQ2: Posts Format. Interestingly, while the majority (61%) of posts in the entire dataset is textual status updates, when comparing between opposition MPs' and coalition MPs' posts, it appears that opposition MPs

Table 1. Differences in Posts Content between Members of Coalition and Members of Opposition Parties

Category	% of Coalition Posts	% of Opposition Posts	Significance of Differences
Opinion	28%	40.3%	$\chi^2 = 14.04, p < 0.001$
Opinion during emergency	37.9%	38.3%	$\chi^2 = 5.5, p < 0.05$
Mobilization-Offline	3.5%	8%	$\chi^2 = 8.67, p < 0.01$
Mobilization-Online	5.6%	5.3%	$\chi^2 = 27.41, p < 0.001$
Criticism	25.8%	42.3%	
Criticism during emergency	33.7%	46.8%	
Personal Story	19%	13.6%	$\chi^2 = 4.01, p < 0.05$

published more diverse formats and included more images (24.3% of opposition MPs' posts, compared to 13.3% of coalition MPs' posts), links (22.3% compared to 16.1% of coalition MPs' posts), and videos (8.5% compared to 6.2% of coalition MPs' posts). Coalition MPs' posts are mostly textual (64.3%, compared to only 44.9% of opposition MPs' posts) ($\chi^2 = 10,177.22, p < 0.001$). This finding supports hypothesis H2.

6.3 Findings Based on Manual Content Analysis of the Popular Posts Sample

6.3.1 RQ3: Differences in Content between the Most Popular Posts by Opposition and Coalition MPs. We turn to the analysis of the content of user-favored posts published by MPs (the most-liked sample of posts). The posts in the sample vary between opposition and coalition MPs in a number of categories. With respect to Statement of opinion, we hypothesized that users prefer opposition members' posts that include more statements of opinion compared to posts published by members of the coalition. The findings support this hypothesis (H3a): Opposition MPs' favorable posts include significantly more opinion stating (40.3%) compared to coalition MPs' posts (28%) in the most-liked posts sample ($\chi^2 = 14.04, p < 0.001$). These differences suggest that users favor opinion statements, especially from members of the opposition.

Mobilization directed at offline activities (demonstration, fund-raising, etc.) was more frequent in opposition MPs' posts (8%) compared to coalition MPs (3.5%) ($\chi^2 = 8.67, p < 0.01$). These results support H3b. Calls to online participation, however, did not differ between opposition and coalition, and were also relatively rare (5.3% and 5.6%, respectively).

As hypothesized in H3c, Opposition MPs' popular posts are significantly more critical: Almost half of opposition MPs' most-liked posts (42.3%) were critical, while only 19.3% were supportive and 38.3% were neutral. In contrast, 25.8% of the most-liked coalition MPs' posts were critical, 53.8% neutral, and 20.4% supportive ($\chi^2 = 27.41, p < 0.001$). Criticism of both opposition and coalition MPs was directed mostly at other politicians by name (30.7% of critical opposition MPs' posts and 14.7% of coalition MPs' posts). Support of both opposition and coalition MPs is directed at citizens (27.6% and 26%, respectively) and various publics in the Israeli society (25.9% and 24.4%, respectively). During the emergency period of the teens kidnapping and operation Protective Edge, and contrary to what was hypothesized, opposition MPs most-liked posts tend to be slightly more critical (46.8% compared to 41.5% during routine) but also much more supportive (27.7% compared to 17.8% during routine). (These differences, however, are not significant.) Coalition MPs' posts are significantly more critical during the emergency period (33.7% compared to 24.4% during routine) but also significantly more supportive (29.5% compared to 18.7% during routine) ($\chi^2 = 13.32, p < 0.01$). Interestingly, while opposition MPs' popular posts tend to be slightly less opinionative during emergency periods (38.3% compared to 40.7% during routine), coalition MPs' popular posts include significantly more personal opinions (37.9% compared to routine's 26.1%) ($\chi^2 = 5.5, p < 0.05$). This increase in users' preference for opinion stating in coalition members' posts may be related to the roles some of the members of the coalition play during times of crisis, as members of the cabinet and representatives of the executive branch. As such, they have a greater responsibility and capability to influence the course of the conflict and therefore may be perceived by the public as required to state their own opinion on the matter in real time.

Table 2. Differences in Posts Tone and Sentiment between Members of Coalition and Members of Opposition Parties

Category	% of Coalition Posts	% of Opposition Posts	Significance of Differences
Formality	81.5%	72.1%	$\chi^2 = 10.38, p < 0.01$
Positive Sentiment	67.7%	45%	$\chi^2 = 3.9, p < 0.05$
Negative Sentiment	45.2%	52.2%	$\chi^2 = 3.9, p < 0.05$

With respect to H3d, contrary to the hypothesis that opposition MPs' posts are more personal, the results show otherwise: Personal stories were more prevalent among coalition MPs' popular posts (19%) compared to opposition MPs' posts (13.6%) ($\chi^2 = 4.01, p < 0.05$). In general, personal stories are more favorable by users than originally hypothesized.

6.3.2 RQ4: Differences in Tone and Sentiment between Opposition and Coalition MPs' Posts. As hypothesized in H4a, users prefer opposition MPs' posts to be more informal than posts published by coalition MPs: No less than 81.5% of coalition MPs' popular posts use formal tone and formulation. Opposition MPs' popular posts are also mostly formal, but to a lesser degree: 72.1% use a formal tone ($\chi^2 = 10.38, p < 0.01$).

The results also support H4b: Coalition MPs' most-liked posts tend to be more positive (67.7%), especially compared to opposition MPs' posts (45%) ($\chi^2 = 3.9, p < 0.05$), while opposition MPs' posts tend to be more negative (52.2%) than posts published by coalition MPs (45.2%) ($\chi^2 = 3.9, p < 0.05$).

6.4 Textual Differences and Prominence of Terms Published for and by Members of Coalition vs. Members of Opposition

6.4.1 RQ5: Prominent Terms and Differences between Texts of Posts Published on Coalition and Opposition Members' Pages. Moving to an analysis of the prominent terms in each of the corpuses and comparison between prominent terms in texts published on opposition and coalition members' pages, by users and by the politicians themselves. We used the n-gram tool described above to extract prominent terms and compared between coalition and opposition corpuses.

Similarities between the coalition and opposition pages corpuses: Out of the 1,000 most prominent terms, there are 642 terms common to both the posts extracted from coalition members pages and posts extracted from opposition members pages, by all users. These common terms include names and titles of lead figures in the coalition and government, e.g., "Prime Minister" ("of the Prime Minister," "to the Prime Minister," "Mr. Prime Minister," etc.) and "Benjamin Netanyahu" by name in several versions, "Minister of Finance" by title and by name ("Yair Lapid"), "Minister of Justice" by title and name, "Minister of Health" by title and name, and so on. Public services and institutions such as "the schools" ("school," "in the schools"), "courts" ("in court"), "social security," "IRS," and so on, are also prominent in both corpuses. Naturally, the "state of Israel" is prominent in a variety of versions ("The state of Israel," "of the state of Israel," etc.) in both corpuses, as well as "the people of Israel" and "the Jewish people." Several terms related to parliamentary work ("The bill," "my bill," "a bill") also appear prominent in both corpuses. There are many terms suggesting citizens demand or calls for some action, e.g., "to increase," "to decrease," "to pass," "to save," "to handle," "to cancel," "to look into," and lastly, it seems that the discourse on the high cost of living is central in both corpuses, with terms such as "the cost of living," "the middle class," and "housing prices."

Differences between the coalition and opposition pages corpuses: The two corpuses, of posts published by all users on pages of coalition and opposition members, differ by approximately a third of their most prominent terms. Differences between the corpuses are affected, from the coalition pages side, by numerous terms generated by texts presumably published by pro-Palestinian hacktivists who attacked the pages of leading politicians with pro-Palestinian and Pro-Syrian slogans. These terms appear only on pages of the main ministers and the prime

minister, and therefore exist in the coalition pages corpus only. Other terms unique to this corpus are approaches to ministers: “Mr. Minister,” “Mr. Minister [of],” “Mr. Minister of Finance,” “To the honorable Minister,” “Mr. Prime Minister,” and so on, and some additional reference to the Prime Minister and the main Ministers in the government in addition to the terms that appeared in both corpuses. “Holocaust survivors” (and “the Holocaust survivors”) are only prominent in the coalition pages corpus, as well as “the educational system” (and “in the educational system”). The list of prominent terms in the coalition pages corpus also includes English terms (such as “the world,” “the jewish,” “The Israeli,” “You will,” “Would you,” etc.) while none of the prominent terms on the opposition pages corpus is in English (with the exception of the names of the pages themselves in some cases, such as “Zehava Galon”). On the contrary, opposition pages contain prominent terms in Arabic (e.g., “من قبل” – “from before,” “من خلال” – “Out of”). The left-right debate is apparent on the opposition pages corpus (“Right vs. Left,” “We are all against the leftist Media,” “We are all against the extreme right”).

7 DISCUSSION AND CONCLUSIONS

Online social media offer representatives novel and convenient platforms for communicating with the public, not only for campaigning purposes but rather as a routine tool used for “sensing the ground” and receiving feedback from constituents, alongside effective means to communicate messages, agendas, and activities directly to the public. In the current study, the use of Facebook by politicians was examined throughout an entire duration of the Israeli parliament (the Knesset), with a focus on the differences between opposition and coalition MPs. The study begins with an automatic digital analysis of an especially large dataset comprising all posts published by MPs during the entire service of the 19th Knesset, followed by a thorough analysis of the content of the leading posts for each MP in terms of number of likes, as a measurement of user preference with regard to the type of messages communicated to them by their representatives.

The analysis reveals some interesting differences between opposition and coalition with regard to Facebook activity. Members of the coalition are slightly overrepresented on Facebook relative to their proportion in the parliament, while members of the opposition are underrepresented. Moreover, members of the coalition are significantly and dramatically more addressed by users, and their posts are significantly more engaged with, suggesting that Facebook, contrary to its image as a possible equalizing platform between opposition and coalition [11, 24], in effect perpetuates the advantage of coalition MPs over members of the opposition with regard to media access and reach of audiences. However, members of the opposition are more successful in utilizing social media in diverse and innovative ways, by uploading rich media and a variety of content types.

The analysis of the most-liked posts demonstrates which content posted by members of the opposition and coalition is most preferable by users. Users favor opposition MPs’ posts which include statements of opinion more than coalition MPs’ posts. Mobilization was not very common in MPs’ posts (in line with findings from New Zealand described in Ross et al. [24]); however, opposition MPs’ posts mobilizing for offline actions (such as demonstrations) are more prevalent among the most-liked posts, a finding consistent with the perception of opposition in democratic societies as a critical, adversative entity. Another consistent finding is the higher rate of criticism in opposition members’ posts (as in New Zealand [24] and the European Parliament case described by Van Kessel and Castelein [34]), in routine and, surprisingly, even more so at times of emergency. Opposition members do not spare criticism at times of crisis; however, they restrict opinion stating to some extent, as opposed to coalition members’ increase criticism alongside opinion stating. In contrast to previous research [24], popular opposition posts are significantly less personal than popular coalition posts. And while politicians may not be as prone to publish personal posts (e.g., in the US [10] or Denmark [25]), the higher percentages of personal stories in the most-liked posts sample suggests that users favor such posts published by politicians. This finding suggests that within social media platforms, politicians are expected to communicate with their followers on a personal level, exposing their personal lives in addition to posting political content. A preference to personal angles specifically from members of the coalition may be related to the higher public exposure of coalition

members, resulted from more excessive media coverage of coalition MPs. Being seen as public personas, more familiar to users, may result in higher preference for exposing the users to these MPs personal lives.

Finally, users favor opposition members' posts that are more informal, and as expected, more negative (in line with Soroka [26] and Soroka and McAdams [27]) and less positive compared to coalition members' posts (in line with, e.g., Germany [2]).

The analysis of prominent terms in coalition and opposition members' pages reveals that the discourse tends to focus on leading figures such as the Prime Minister, Minister of Finance, other ministers, and public institutions in both corpuses. It is apparent that the discourse in pages of members of coalition is dominated by discussions and references to central Israeli public agendas, such as the educational system and cost of living. Direct appeal to ministers is prominent only on coalition members' pages. It is interesting that English terms appear only on pages of members of the coalition, again suggesting the preference of wider audiences to communicate political manners on pages of members of the coalition, ministers, and the prime minister. The Arab minority, on the contrary, communicates in Arabic only on pages of members of the opposition, where most of the Arab MPs, and all Arabic parties, serve. This leads to the nonexistence of Arabic terms in the coalition members pages corpus.

The findings portray an image of the content posted by coalition in comparison to opposition MPs, and the preferences of social media followers with regard to type, tone, and content uploaded by their representatives. For many, social media have become the main, often only, means of communicating with representatives and getting involved in national politics. While most followers of politicians' social media pages rarely comment or share content uploaded to the pages, the option to "Like" a post is much more common and signifies a preference for the type, tone, message, and theme of posts, and thus serves as a measurement of the type of messages the public would be more likely to consume and engage with. Posts that attract a high number of likes are more likely to appear in users' news feed and reach larger audiences, including friends of page fans who are not subscribed to the page (and, naturally, other media outlets). For this reason, reaching a high number of likes is a primary target for page administrators. Understanding the features of the posts that are most preferred by users may provide politicians, either in coalition or opposition, guidelines for successful communication with their followers, as well as potential wider audiences, on social media. Based on the findings, politicians may conclude that use of personal angles and expression of opinions, especially from members of opposition, are preferred by users. Additionally, criticism and negative content is more likely to receive user attention, by coalition and moreover by opposition members. The analysis of an entire term of service allows for an examination of the type of content and tone that receives more user engagement in routine, and throughout an entire parliament, as opposed to sampling specific periods or highly engaged MPs accounts. For these reasons, the current study focused on the leading posts of each MP in terms of user likes rather than on a random sample. While not a representative sample, studying specifically the most-liked posts reveals the kind of messages users prefer from their representatives in the coalition or opposition, and the probability of certain messages to reach larger audiences and have a greater potential to be seen and influence.

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