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Abstract

This paper explores how social media contributes to political polarization in the United States by addressing two of the most common effects that social media users encounter: the backfire effect and the echo chamber effect. By using the results from previous studies on these topics, the two effects are synthesized to show how they collectively contribute to increased political polarization by widening the gap of political discourse between both ends of the spectrum. Additionally, a study that attempts to prove that political polarization is not a result of increased social media use is refuted by exploring how social media microblogging has begun to affect traditional forms of media.

Keywords

American Politics, Political Polarization, Backfire Effect, Echo Chamber Effect, Social Media

Cover Page Footnote

Matthew O'Boyle is an undergraduate student at McGill University majoring in International Development Studies and Sociology. This paper was originally written for a class the author took during his first year at university and was inspired by the contentious nature of the 2020 U.S. presidential election.

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This paper explores how social media contributes to political polarization in the United States by addressing two of the most common effects that social media users encounter: the backfire effect and the echo chamber effect. By using the results from previous studies on these topics, the two effects are synthesized to show how they collectively contribute to increased political polarization by widening the gap of political discourse between both ends of the spectrum. Additionally, a study that attempts to prove that political polarization is not a result of increased social media use is refuted by exploring how social media microblogging has begun to affect traditional forms of media.

In October of 2020, a mutual friend of mine advertised a live stream of a debate they were engaging in. It was promoted as an educational event where a respective Trump and Biden supporter would engage in a discussion more civil than what we had seen in the 2020 presidential debates. As someone interested in politics and longing for refreshing political discourse, I eagerly tuned in on the night of the ‘debate’ only to hear the same talking points that had been repeated the preceding 12 months of election season. As the ‘debaters’ continued through the list of topics, tensions heightened and civil discourse faded. What began as an informative discussion was becoming an uncomfortable stalemate on divisive topics. The conclusion of the debate ended along the lines of, “you will vote Republican no matter what I say, and I will vote Democrat no matter what you say” to which the other debater responded, “I agree. This was useless”.

A political climate in which two students studying at the same university cannot engage in effective political discourse is an issue for American democracy. However, this political divide has not always been the case. According to Pew Research Center data, the majority of American voters shared a mix of liberal and conservative ideologies in 2004 (Dimock et al., 2020). However, in 2014 when the same political values among voters were reevaluated, a significant divide was found between conservative and liberal ideologies with only a small minority of voters who still held mixed beliefs (Dimock et al., 2020). Similarly, polarization among American political parties has been increasing steadily since 1984 and began a rapid, exponential increase in 2008 (Boxell, 2020). As Americans become more politically divided than ever before—and are projected to continue on this trajectory—what can be pointed to as fuel for this polarizing divide (Boxell, 2020)?

After analyzing results from various studies, it is evident that the rise of social media microblogs and the political discourse found on these platforms is one major contributor to political polarization in the United States. Society has never before engaged in such immediate discussions as is possible on the internet today. Tristan Harris, a former Google design ethicist and leading mind on the effects of social media on society, states, “140 characters dominate our social discourse. You can’t say something simple about something complicated and have everybody agree with you. People will misinterpret and hate you for it” (Fifth Entity, 2019). This paper elaborates on the discussion of how ‘simple’ social media posts and engagements create lasting and detrimental effects on political polarization among Americans. Although previous studies have provided evidence for social media users in relation to political polarization, studies have yet to write about the relationship between the two most common effects of social media and how they simultaneously widen the gap of American politics from both ends of the spectrum. By synthesizing previous studies, this paper aims to address why the backfire effect and the echo chamber effect mitigate political discourse among social media users and how these effects collectively contribute to the polarization of American politics.

Literature Review

Backfire Effect

The backfire effect is not specific to social media but rather a widely used term in political discussions of all kinds. Two political and behavioral scientists Wood & Porter (2019) referred to it as, “when the average respondent is made less accurate on a factual question when exposed to a false claim and its correction, compared to those who only see the false claim” (p. 136). In other words, when a false presumption that somebody has on a certain topic is disproved with factual and logical arguments, this can backfire and further solidify the person’s false

presumption. In the political context, a backfire can manifest itself in political debate, campaign advertising, and even more candid interactions with people holding opposing party affiliations. Although all Americans engaged in politics may experience this to a certain extent, the effect is particularly prevalent on social media platforms as people can encounter and be impacted by a wide array of political opinions in one quick scroll.

In one study conducted by Columbia University, Democratic and Republican test subjects were hired to follow a Twitter bot that retweeted posts opposing their expressed political views (Bail et al., 2018). The bot carefully scouted out posts from “high-profile elites” and popular politicians to curate a feed for the test subjects (Bail et al., 2018). Because many politicians have an active presence online, there was a plethora of content for the test subjects to engage with; however, this content differs greatly from the typical, more formal political rhetoric seen in debates and addresses (Bail et al., 2018). Instead of this orthodox political content, test subjects were shown the microblogs of popular political minds and engaged with the brief statements these accounts made on a variety of topics. At the conclusion of the experiment, the research showed the test subjects did not have an increased understanding of the political views of opposing political parties (Bail et al., 2018). In fact, the opposite effect occurred. There was an increase in discontent, rivalry, and divide between the views of Republican and Democrat test subjects that further solidified the respective subjects’ identification with their original party (Bail et al., 2018). A study aiming to increase mutual understandings between parties was counterproductive and further deepened the inability of someone affiliated with one party to understand the stance of someone else. Ultimately, divergence between the opposing parties was deepened due to the backfire effect of Twitter microblogs.

Thomas Wood's 2019 study takes a different approach to the backfire effect. Rather than confronting subjects with counterproductive microblog posts from politicians opposite their political affiliation, Wood attempted to explain in depth the misconceptions that political parties had about certain topics (Wood & Porter, 2019). Republicans and Democrats read about common misconceptions members of their party tend to believe and then engaged in a thoughtful discussion about *why* these are misconceptions (Wood & Porter, 2019). After thoughtful, logical, and factual arguments that disproved misconceptions were presented to these test subjects, each subject reported that the correction had negative effects on their understanding of the argument (Wood & Porter, 2019). Efforts to disprove misconceptions only confused subjects as they struggled to fathom the proven reality. The results of this study show how a formal, logical, and truthful explanation of a misconception can have a converse effect on people. When logical arguments lose effectiveness and cause counterproductivity, illogical and irrational statements—the type that are prolific on microblog platforms—risk an even greater opportunity for the backfire effect to occur.

Echo Chamber Effect

The echo chamber effect is another commonly used expression in politics that has risen alongside social media popularity. An echo chamber is essentially a type of ideological homophily in which a person is surrounded by constant support and encouragement of their beliefs and never met with refutation or challenges that cause them to deliberate on these topics further (Colleoni et al., 2014). The idea of someone being stuck in an “echo chamber” may seem like a far-fetched possibility; however, social media can easily foster this into a reality through the implementation of user-specific algorithms. Algorithms are a way for social media sites to curate a feed that interests and engages each user (DeVito, 2017). Unfortunately, these

algorithms often create feedback loops—or echo chambers—of thoughts and ideas that the user will engage with. This form of content curation is a cycle that draws in social media users and shapes their political ideology in the direction that their algorithm sees fit.

One study aims to reveal how users utilize and consume content on the microblogging social media site Twitter. Because of the overwhelming amount of political diversity on the Twitter platform, the researchers in this study hypothesize that users should have no trouble consuming diverse political content (Colleoni et al., 2014). However, this is not the case. Despite hosting a variety of political discussions, Twitter is ultimately used—and therefore functions—as a social media site (Colleoni et al., 2014). This means that certain posts gain popularity, traction, and engagement while others remain untouched (Colleoni et al., 2014). In the world of social media, there is no better way to guarantee popular content than having a large and loyal following.

The same study shows that American Republicans tend to follow Republican politicians on social media and American Democrats tend to follow Democratic politicians on social media (Colleoni et al., 2014). Not a shocking discovery considering the culture of party loyalty in American politics. However, another study further explores how users trust the people they follow on these sites based on political affiliations. The researchers conclude that people are more likely to trust politically like-minded individuals not only on political topics but even on topics that have nothing to do with politics, such as categorizing shapes (Marks et al., 2019). Furthermore, they are more likely to trust these politically like-minded individuals over an expert in the field of research in question (Marks et al., 2019). The study found that someone's judgment on topics completely unrelated to political issues is inherently influenced by political affiliation because they believe someone holding the same political views as them is simply

better at any and all tasks (Marks et al., 2019). This blind trust presents an obvious issue with the ability of American political parties to coexist with one another. For example, if an American is more likely to trust a politician that represents their party instead of medical doctors in regard to health and medical-related issues, the effects of political affiliation and polarization could extend into legitimate health risks. With blind trust placed in politicians and the microblog statements they make on social media sites, it is difficult to become aware of biased social media consumption and increasingly easier to feed a polarized consumer base. The user algorithms have only proved to increase the level of biased social media consumption.

As Colleoni's study showed, Twitter has a variety of political discussions going on but is ultimately used as a social media site meaning user consumption is dependent on user algorithms (Colleoni et al., 2014; DeVito, 2017). The issue of the echo chamber arises because what is determined as 'popular' is completely dependent on each user's algorithm (DeVito, 2017). After analyzing Facebook's own algorithm which has been widely applied to many social media sites, Michael DeVito (2017) defined user algorithms as:

Constantly updated, personalized machine learning model, which changes and updates its outputs based on your behavior, the behavior of people you are connected with, and the behavior of the affinity and personality-based sub-group of users the system judges you to belong to (p. 768).

In simpler terms, a user algorithm is an equation that produces a perfect assortment of content for users to consume based on the interests they have previously expressed on these online platforms. His study explores the intricacies that inform each user's algorithm and found the following nine values drive algorithmic content curation for users: friend relationships, explicitly expressed user interests, prior user engagement, implicitly expressed user preferences, post age,

platform priorities, page relationships, negatively expressed preferences, and content quality (DeVito, 2017). As these nine values show, a user's feed is dependent on who and what they are interacting with. When social media users engage with certain politicians, journalists, or niche communities, that content will find its way back into their social media feed each time they hit refresh (DeVito, 2017). This process excludes certain information from the opposite side of a user's position on the political spectrum and contributes to biased consumption from the favorable side, ultimately decreasing the ability for exposure or engagement in diverse political discourse.

Discussion

It is clear that the backfire effect is a phenomenon that has snuck its way into social media and disrupted mutual understandings between the two political parties of the United States. If social media users confronted with opposing, logical political discourse simply reclude deeper into their own party's ideology, the divide between mutual understanding has the opportunity to widen with every political interaction. Political discourse, and more specifically poorly crafted political discourse found on microblogs, risks polarizing the two parties against one another rather than improving mutual understanding.

The issue with echo chambers in the context of political division is the lack of discussion and the ability of biased content or fake news to spread within echo chambers. As we saw in DeVito's study, when social media users belong to a community online, the content that they consume is specified to the interests of this community (DeVito, 2017). When these communities are overtly political, echo chambers of political content in which followers possess a blind loyalty to political figures and political ideologies are created (Marks et al., 2019). When this

loyalty is established within echo chambers, there is no room for political discourse, and the gap of mutual political understanding widens.

These two effects—the backfire effect and echo chamber effect—most evidently show their contribution to political divergence when ‘viral content’ is spread on the internet. Microblog posts that go ‘viral’ among communities are those that draw the most attention, not those with legitimate ideas or factual evidence (Houston et al., 2020). When outrageous posts gain popularity, they find their way into more and more social media sub-groups and effectively into more and more users’ algorithms (DeVito, 2017). If this content finds its way into the algorithms of people with opposing ideologies, the backfire effect occurs. Conversely, when viral content makes its way into niche communities that accept and encourage its message, the echo chamber effect takes place and ideologies are further solidified. In both cases, the same social media post can increase political divide between American social media users from both ends of the spectrum due to the dangerous combination of these two effects.

Refute

To fully understand the impact of social media on political polarization, we must address evidence that attempts to show otherwise or provide another explanation for the rise in political polarization. In a 2018 study, economists and social scientists broke down the issue of political polarization into age-specific categories of ages 18-39, 40-64, and 65+ (Boxell et al., 2017). Within each of these age categories, the increase of political polarization was tracked from the years 1996-2016 (Boxell et al., 2017). In an effort to disprove previous studies, the results showed that division increased the most among age groups that use the internet the least and prefer to consume news from traditional forms of media (Boxell et al., 2017). This study shows

how increase in internet usage and increase in political polarization are not proportional to one another.

Although this is an interesting study that attempts to explain the relationship between internet usage and political divergences, it fails to address the influence of the internet on traditional forms of media. This phenomenon is referred to as the “twitterization of journalism” in a 2020 study that aims to explain the relationship between social media and traditional media (Houston et al., 2020). In this study, researchers Houston et al. (2020) state that Twitter is “the central circulatory system of information among reporters” (p. 615). Houston et al. (2020) then address how Twitter is a popular site among journalists to “generate story ideas, identify sources or gain information for news stories” (p. 615). Because of the immediacy of the platform, journalists use Twitter as a tool in every step of their writing process, including the promotion of their stories once published (Houston et al., 2020). Therefore, the traditional media that these journalists are creating is affected by their use of social media. The study ultimately shows that the production of traditional media forms has been affected by journalists’ increased use of social media. Due to the nature of social media discussed in previous sections of this paper, posts that spark political polarization are certain to find their way into the algorithms of these journalists and inadvertently into the creation of their content, indirectly affecting their readers’ consumption of polarized media. The microblog posts and short explanations for long problems still dictate much of the rhetoric around journalism today and therefore, even age groups that do not have high levels of internet usage are still affected by the political divergence that microblog content invigorates.

Conclusion and Limitations

Studies exploring how the backfire effect and the echo chamber effect contribute to social media users' experiences support that users engaging with content are subject to both effects, contributing to the breach in political discourse between the two major political parties in the United States. By following the spread and consumption of one individual post, it becomes clear that online echo chambers can amplify its message while the backfire effect discourages users from its message, creating a divergence of interaction between the two opposing consumers of this content. Additionally, a study that discusses how the age group with the lowest internet activity has the highest levels of political polarization has been elaborated on by discussing how the polarization that occurs on social media indirectly affects people consuming traditional content. Although there would need to be further studies conducted in order to directly prove how these age groups are affected by political polarization, it is important to discuss the presence of social media in traditional forms of news reporting and how this understanding changes the interpretation of the study's results.

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