Look Over There. Where? A Compositional Approach to the Modeling of Public Opinion on the Most Important Problem

Steven Jokinsky^{*} Christine S. Lipsmeyer[†] Andrew Q. Philips[‡] Laron Williams[§] Guy D. Whitten[¶]

Abstract

Objective. The test whether United States public is polarized and or paralel in its assessments of the most important problem. *Methods*. We use compositional time series models and new data on public opinion to test for differences between subgroups. *Results*. We find scant evidence of polarization and remarkably robust evidence of paralel reactions across subgroups to economic and international shocks. *Conclusion*. The US public is remarkably consistent in terms of its assessments of the most important problem and in terms of how they shift in reaction to shocks.

^{*}Ph.D. Candidate, Department of Political Science, University of Missouri-Columbia, Columbia, MO (smjrv8@mail.missouri.edu).

[†]Professor, Department of Political Science, Texas A&M University, 4348 TAMU, College Station, TX 77843 (lipsmeyer@tamu.edu).

[‡]Associate Professor, Department of Political Science, University of Colorado–Boulder, UCB 333, Boulder, CO 80309-0333 (andrew.philips@colorado.edu).

[§]Professor, Department of Political Science, University of Missouri–Columbia, Columbia, MO (williamslaro@missouri.edu).

[¶]Professor, Department of Political Science, Texas A&M University, 4348 TAMU, College Station, TX 77843 (g-whitten@pols.tamu.edu).

The polarization of the American mass public has become a topic for discussion and research not just for political scientists but also for the media and politicians. While much of the attention has been on the divisions within Congress, elections, and voters, we know less about how these political dynamics affect the public's views about national problems and concerns. In addition, extending this beyond partisanship, questions remain about how political or economic groups within the public perceive the nation's problems. Are these subgroups polarized over the important issues, or are they parallel, holding similar opinions in terms of how they define national problems? Thinking about how shocks may shift the groups' priorities, do economic and political changes push groups' concerns apart, or do they react in tandem?

Research on polarization in U.S. politics has focused on a range of levels and outcomes, from members of Congress to voters and from roll call votes to vote choice (Bishop and Cushing 2009; Theriault 2008; Hetherington 2009; Barber et al. 2015; Waugh et al. 2009). Much of the attention has been on partisan polarization with Democrats and Republicans at both the elite and mass levels becoming less similar on ideological scales, leading to gridlock and more ideologically driven rhetoric. However, an alternative (or additional) theoretical option suggests that subgroups within the public may hold parallel views. Research on these "parallel publics" highlights how various groups' opinions can move together over time, showing a propensity for different groups to change their attitudes in similar ways (Page and Shapiro 1992; Eichenberg and Stoll 2012). These two theoretical frames approach public opinion from different angles: polarization by focusing on the different issue and policy stances between groups and parallel publics by emphasizing groups' similar responses to salient events. Therefore, it would be possible, to have both a polarized public that is also parallel: significant differences between groups with shifts in opinion that move in tandem over time.

Deciphering how the public prioritizes problems is a particularly important aspect of public opinion. Uncovering the public's views about what policy areas are most problematic offers insights into what issues are salient to the public and to voters. Research on policy saliency contends that while saliency includes specific policy areas, it emphasizes the varying importance among

those areas (Krosnick 1990; Wlezien 1995; Bevan and Jennings 2014). Therefore, rather than focusing on policy spending, responsibility, or other specific policy changes or solutions, policy salience involves uncovering what issues concern the American public with an eye on understanding what types of issues drive the public discourse. While previous research on salience has acknowledged the reality that issues compete with each other for the public's attention (Zaller 1992; Singer 2011; Jennings and Wlezien 2015), few researchers have treated salience both theoretically and methodologically as a competition (See Junqueira, Kagalwala and Lipsmeyer (2023) for an exception).¹

In this paper, we are interested in investigating how polarized and/or parallel the American public is when choosing the country's most salient issues. Is there common ground when discussing the country's most important problems? And we argue for looking at subgroups that go beyond partisanship in order to understand the possible differences when it comes to policy salience. Therefore, focusing on partisanship, gender, and income, we argue that the divisions within these subgroups may be polarized over the most important problem, leading to different viewpoints. However, in response to economic and international changes, those partisan, gender, and income groups may shift their opinions on policy salience in similar, parallel ways.

Using a dataset of the most important problem facing the country from 1967-2015 in the U.S., we investigate our argument about polarized and parallel publics. However, simply examining issue importance in one policy area is not sufficient to understand the dynamics of collective public opinion, because respondents, like the mass public, have options when making their choices. Our methodological strategy of using an explicitly compositional model allows for competition between the issue areas, so our results indicate the tradeoffs between salient issues. Overall, we find that while our results show little to suggest that our subgroups are polarized around the most important problem facing the nation, they do indicate that the various groups move in parallel ways in the face of rising unemployment and increased international crises. In our conclusion, we con-

¹For a discussion of the zero-sum nature of issues on agenda setting, see McCombs and Zhu (1995); Edy and Meirick (2018).

sider the ramifications of this for public opinion, public policy modifications, and representative government more broadly.

Issue Salience and the Public

Given the representative nature of American democracy, exploring what the mass public thinks about issues or policies continues to be a key aspect of American governance, and understanding what alters public opinion over time remains an important part of this representative link. As previous research has argued, policy salience can be an underlying driver of political behavior with a link to vote choice and attachments to political parties (Downs 1957; Fournier and Nevitte 2003; Belanger and Meguid 2008).² However, while issue salience signals importance, it cannot provide an indication of direction (e.g., pro or con) or degree (e.g., more or less) of the opinion for the issue. Instead, issue salience can show the relevance of issues to the mass public.

Understanding opinions on issue salience can indicate the public's views on what should be on the policy agenda—what is important to the country. How the public views issues and policies drives much of American politics, and scholars have explained the "push and pull" involved in mass public opinion. Singer (2011) explains this as, "the degree to which an issue is important is at least partially dependent on other elements not crowding it out" (287).

Scholars have discussed how this competition between issue areas can affect the salience of issues. Much research has focused on explaining variation in the public's attitudes on issues and policies, but ultimately, there may be limited room when the public considers various topics and issues. For example, Simon (1996) argues that individuals have limited attention spans, especially in the short term that restrict their ability to make strategic and efficient decisions. Jones and Baumgartner (2005) explain this "bottleneck of attention" as leading to selective decision making, since focusing on one issue moves attention away from others. Therefore, when considering the

²Gruszczynski (2019) also finds a link with agenda fragmentation.

issues and policies most important to the public, we should expect to see that the rising saliency of some issues will come at the expense of others, resulting in a competition between issue areas.³

Polarized and/or Parallel Publics and Public Opinion

When explaining mass public opinion, researchers have focused on how various subgroups think about issues and policies. Within the mass public, there are a range of subgroups brought together by various characteristics—e.g., partisanship, income, gender, race, ethnicity, etc.—and how these groups perceive the importance of issues remains of interest. Public opinion research has considered two possibilities for how groups relate to salience: *polarized* publics where subgroups differ on which issues are most important, and *parallel* publics where subgroups shift their preferences in tandem.

The polarization of public opinion has largely been a partisan consideration with a focus on the great distance between Democrats and Republicans on political issues and policies. Discussions about polarization started with research about elites, parties, and Congressional roll call behavior. With a focus on Congressional voting and party elite messages, scholars and political pundits alike have discussed and emphasized that government representatives and party elites are driven by and extol party-centric messages and behavior (Fiorina and Abrams 2008; McCarty, Poole and Rosenthal 2016).⁴ Although research on elite polarization was the early driver for studying political polarization, the shift to studying polarization at the mass public level has not resulted in such clear cut definitions (Hetherington 2009) or conclusions (Abramowitz and Saunders 2008). Evidence for differences between subgroups—as defined by education, income, partisanship—on preferences

 $^{^{3}}$ The most common way of assessing issue importance is with the 'most important problem' question in surveys. Asking for the 'most' important problem means that an issue of rising importance displaces the importance of other issues. See Wlezien (2005) for a formalization of this idea.

⁴Fiorina and Abrams (2008) also discuss the pros and cons of the various measures of elite polarization.

and opinions on policies and issues suggests a broad polarization of the mass public (Soroka and Wlezien 2010; Castle and Stepp 2021).

Scholars investigating mass public opinion have also identified patterns where groups within the public move their opinions in sync. Expanding the focus beyond partisanship to other groups and emphasizing changes over time, scholars have shown the parallel structure of opinion, whereby opinion at the subgroup level can move in tandem. While these parallel publics differ in their intensity for which issues are important, shifts of opinion appear to move together over time (Page and Shapiro 1992). Although this research acknowledges the differences across various groups in which issues and policies are important and salient, the focus remains on the common movement in public opinion across these groups, rather than the disparity.⁵

We consider whether the underlying divisions in the public may relate to the issues people find important and ask whether political and economic groups split on the issues they deem important. Are these subgroups polarized on how they view the country's problems? In addition, we argue that the economic and political contexts may influence which issues are deemed important, so we ask how do groups respond to economic and political shocks? Is there a common reaction, or do group-level differences affect these opinions on policy salience? Our argument is that the competitive environment shapes issue importance, and key identifiers—i.e., gender, income and partisanship—motivate groups to view different issues as important. However, the groups will respond in similar ways to shifting economic and political conditions.

Groups and Issue Salience

Extending the idea of a polarized, but parallel public, to the competitive arena of issue importance, we begin by identifying three characteristics that structure group-level opinion dynamics. These features play an important role in determining the issues considered most important by voters.

⁵Is this a place to include party sorting and/or neighborhood sorting? also, does it need more attention than a footnote? Hetherington 2009 talks about the mass public being sorted by party but not polarized.

Previous research has noted that a significant group-level determinant is the extent to which being in that group increases the personal connection to that issue (Aldrich and McKelvey 1977). For example, being in a high income group may increase the importance of tax policy because it directly affects one's income. While personal connections can increase a group's accessibility of information about issues, "the accessibility of issue concerns is driven by the strategic choices of politicians attempting to set the agenda and by the frequency and tone of media coverage" (Singer 2011, 286).⁶ Therefore, members of different subgroups may view policy issues, and their importance, in varying ways.

Given this variation in personal preferences, tendencies to mobilize, etc, it is reasonable to expect that there are large difference in how the groups' priorities shift in response to changing conditions. However, we suggest that though these features may produce polarized issue agendas, the groups' responses to issues may be similar and parallel one another. The idea that American mass public opinion was coherent, sensible, and stable with parallel groups trending together over time goes back to Page and Shapiro's argument in *The Rational Public* (1992). While scholars had previously focused on how individual public opinion appeared stable. More importantly, for this paper, it highlighted how opinions across subgroups within the public (e.g., age, income, and partisanship) changed in similar ways. Subgroups may not view issues with the same level of importance, but their opinions on the issues can move in tandem in response to environmental shocks.

These patterns of polarized, but parallel publics are evident in studies of preferences for spending in the US (and across countries). For example, Soroka and Wlezien (2010) explore differences in preferences for spending on various policy areas across education, income and partisan groups and show how those preferences respond to changes in policy. They find that there are larger crossgroup differences in welfare than defense or health/education spending preferences, but "considerable parallelism" for all policy areas and groups (Soroka and Wlezien 2015, 157). While this

⁶See also Ansolabehere and Iyengar (1996); ?

study is useful for strengthening the notion of polarized but parallel groups, its focus on spending preferences limits its relevance to a discussion about policy salience, and while they tackle multiple policy areas, they stop short of acknowledging the competitive nature of issue areas.

Our approach builds on previous studies. The focus of research on spending preferences has been to study these differences and changes for individual issue areas rather than understanding opinion across the issue or policy agenda (Soroka and Wlezien 2010). Some scholars have ac-knowledged that attention on some issues diminishes the saliency of other areas; however, the comparison tends to be between economic policy and other possible issue areas at the individual level (Singer 2011, 2013). Other work discusses the competitive nature of issue importance, as well as how the responses vary across subgroups but stops short of empirically investigating those relationships. In the remainder of this section, we discuss three characteristics that structure subgroup issue importance—partisanship, gender, and income. We select these issues because these identities play an outsized role in research on mass public opinion, and more practically, polling companies have consistently collected this information in surveys in the post-WWII era.

Partisanship

The public's attachment to political parties has been a key factor when discussing differences in vote choice and policy preferences. This focus on partisanship grounds the research on polarization. While the original interest was in the polarization of Democrats and Republicans within Congress and at the elite level (McCarty and Rosenthal 2008; Theriault 2008; Waugh et al. 2009), other debates centered on questions of the polarization of the mass public with some arguing that the American public is polarized on some if not all issues (Abramowitz and Saunders 2008; Mc-Carty and Rosenthal 2008; Castle and Stepp 2021) and others concluding that the American public's ideological and partisan differences remained slight and that polarization largely was at the elite level (Fiorina, Abrams and Pope 2006). Much of this work explores attitudes on various policies or issues as individual components, but scholars have not considered the issues as parts of a larger issue agenda, where the public shifts its preferences between issues.

There is considerable research with regard to how partisanship affects issue attitudes and opinions (Campbell et al. 1960), as well as how the public chooses candidates closest to their ideal positions (Downs 1957; Belanger and Meguid 2008; Fournier and Nevitte 2003). Party elites affect the issue attitudes of co-partisans through messaging and policy positions (Bisgaard and Slothuus 2018). For example, Slothuus and Bisgaard (2021) show that citizen policy opinions shift substantially in accordance with the position of the party to which they are attached. In addition, researchers have argued that Partisan-motivated reasoning may also be at play. The idea here is that individuals conform real-world contexts and factors to their partisan beliefs, interpreting conditions through a partisan lens. (Bisgaard 2015; Dickerson and Ondercin 2017; Jerit and Barabas 2012). Importantly, this cognitive dissonance moves beyond simple changes in attitude within issue areas, and extends to what issues are viewed as important. For example, the existence of an in-(out-) party president affects partisan views concerning whether budgetary issues are (un)important (Kane and Anson 2022). Elite party cues and partisan-motivated reasoning provide potential explanations for why citizens may view some issues as more important than others-such as owned party issues (Petrocik 1996; Druckman, Peterson and Slothuus 2013; Junqueira, Kagalwala and Lipsmeyer 2023)—and therefore, we expect there to be a partisan gap in what issues are salient.

Scholars present competing views of whether partisan differences move asymmetrically (Branham 2018; Enns and Kellstedt 2008; Castle and Stepp 2021) or in parallel (Page and Shapiro 1992) across time. How parties attempt to influence their supporters may affect this, as well. While candidates should try to emphasize the issues their party owns to maximize their chance of victory (Budge and Farlie 1983; Petrocik 1996; Green and Hobolt 2008), research also points to a significant amount of issue convergence between candidates in competitive U.S. elections (Banda 2015; Kaplan, Park and Ridout 2006; Sigelman and Jr. 2004; Simon 2002; Spiliotes and Vavreck 2002). Convergence by candidates to discuss "the issue of the day" may suggest that partisans think similar issues are important, increasing their salience; and therefore, Democrats and Republicans alike

must campaign on these issues (Ansolabehere and Iyengar 1994). Given these possibilities for how parties and partisanship affect voters and the public, Democrats and Republicans may view the most important problems facing the country in similar ways, or depending on the partisan message, they may see different issue areas as most salient.

Gender

Although partisanship often times takes center-stage when discussing public opinion, researchers also have turned to other group categories to investigate polarization and parallel publics.⁷ Here, we are interested in how gender differences may affect the public's perceptions of policy salience. Do men and women view the same or different issues as nationally problematic? With a grounding in work on representation, scholars have focused on how men and women legislators focus on varying policy areas and have gender-based preferences (Taylor-Robinson and Heath 2003; Schwindt-Bayer and Mishler 2005; Lawless 2015). Recently, researchers have turned to the question of whether gender affects how individuals perceive the importance of issues (Yildirim 2022).

Existing research on public opinion has highlighted various differences between women and men that relate to policies and attitudes.⁸ For example, women are more likely than men to hold liberal opinions, and they tend to support issues that relate to equality and empathy (Shapiro and Mahajan 1986). Research has found that these differences appear across a range of policy areas. From obviously gendered issues, such as equal pay, to more general policy areas such as gun control and education spending, men and women are more likely to find some issue areas more important than others (Lawless 2015; Barnes and Cassese 2017). In the specific areas of war and social welfare, previous research has consistently shown a gender gap in preferences (Huddy, Cassese and Lizotte 2008). These gendered differences within and between issues can have important

⁷For example, Castle and Stepp (2021) investigate both partisanship and religious groups.

⁸Note that the gender gap in policy attitudes does not appear to be simply a function of partisan sorting (Bishop and Cushing 2009), with recent evidence suggesting inter- and intra-party gendered opinion differences. For example, on the scope of government, women prefer a more activist government than men of the same party, Republican or Democrat (Barnes and Cassese 2017; Lizotte 2017).

implications for elections, where attitudes and the salience of issues affect vote choice (Kaufmann and Petrocik 1999; Chaney, Alvarez and Nagler 1998; Harteveld et al. 2019).

Questions remain about whether or not women and men are polarized or parallel when it comes to their views about issue salience. Some scholars argue that men and women shift their opinions in the same direction and by the same magnitude (Eichenberg and Stoll 2012; Page and Shapiro 1992), while other scholars claim men and women shift their opinions in the same direction but by a different magnitude (Kellstedt, Peterson and Ramirez 2010). These scholars argue that differences in historical economic experiences, vulnerabilities, and outlooks lead to different perceptions of the economy and public policy and ultimately, different attitudes between men and women. However, these scholars focus on policy attitudes in a specific issue domain and ignore variations in issue importance across the broader issue agenda. The agenda-setting properties of the media may help to build consensus between subgroups on the most important issues facing the country. For example, men and women who consumed more news, whether from television, radio, or newspapers, were more likely to agree on which issues were most important (McCombs 1997; McCombs and Shaw 1972; Shaw and Martin 1993).⁹.

Income

Our third subgroup emphasizes the socio-economic differences in the American mass public distinctions based on income. There is much research tying income groups to a range of political behaviors, from vote choice and elections to policy preferences and attitudes, with questions remaining about the depth of these relationships. For example, While income has been shown to influence electoral outcomes (Bartels 2010; McCarty and Rosenthal 2008), these differences seem to be contextual, varying by time and region (Gelman 2008).

⁹Even without the influence of the media, men and women had moderate agreement on the most important issues (Shaw and Martin 1993)

How income affects the public's views on issue salience may be related to how their income levels relate to public policies. Much of the research on income and political attitudes touches on self-interest with an emphasis on where groups fall in the redistributive calculation. For example, those in the lower income groups are expected to favor redistributive policies, because the benefits they receive from these policies outweigh the cost of taxes. But the rich and middle class should oppose these policies due to an increased tax burden without the benefits (Meltzer and Richard 1981). Similarly, Page, Bartels and Seawright (2013) find that those in the top income group hold significantly more conservative attitudes on some policy areas than the general population. However, some scholars argue that increased polarization has resulted in the rise in salience of cultural and social cleavages over traditional income differences (Frank 2004; Roemer 1998) with others contending that the traditional cleavage is still as strong as ever (Van Der Waal, Achterberg and Houtman 2007).

The economic voting literature may provide insights into what issues income groups hold important. For instance, research shows that in response to the same economic conditions, income groups had different evaluations of which party was the best manager of the economy in the UK (Palmer, Whitten and Williams 2013; Palmer and Whitten 2011). In particular, low-income voters assessed the Labour Party based on unemployment, while high-income voters assessed the party based on inflation. This is reasonable because economically vulnerable individuals prefer more spending on unemployment regardless of collective economic conditions unless policies are well suited to buffer against these vulnerabilities (Compton and Lipsmeyer 2019). Therefore, what is the most important problem may vary by income group, even under the same economic or social conditions, if they view the context from different, polarized perspectives. But the possibility of parallel income groups also exists, since the public may view national issues or problems from a more sociotropic viewpoint rather than through their own self-interest (Kinder and Kiewiet 1981).

Besides simple cross-sectional differences in issue opinions, we must examine how views on issue importance shift across time. There are two potential factors that influence the perceived importance of issues: the media and economic indicators. The media influence these perceptions using agenda-setting, priming, and framing (Blood and Phillips 1995; Blood and Phillips 1997; Boomgaarden et al. 2011; De Boef and Kellstedt 2004; Nadeau et al. 1999; Soroka et al. 2014; see Moy, Tewksbury, and Rinke 2016 for a review of the literature). For example, when news coverage of economic issues, such as unemployment or inflation, come to the forefront of the public's attention, they will place more importance on these issues. Importantly, people do not need to be "bankers" (see MacKuen, Erikson, and Stimson 1992) to update their economic evaluations (Enns and Kellstedt 2008). They only need to understand how the economy has changed (Soroka, Stecula and Wlezien 2014), and this information can be gathered from the media and personal interactions (Reeves and Gimpel 2012; Books and Prysby 1999; Goidel et al. 2010; Mutz and Mondak 1997). We expect issue opinions to move in parallel across time because of the prevalence of media attention on national economic conditions and local conditions and interactions.

Voters choose to focus on a limited number of issues at a time, and we expect that voters' attention to those issues will shift as conditions change. For example, a weak economy not only changes voters' issue attention toward economic solutions, but also moves it away from other issue areas, such as foreign affairs and social policy (Singer 2011, 2013). These sorts of tradeoffs can appear in other salient issue areas, such as foreign policy. As Heffington, Park and Williams (2019) show, publics respond in rational and predictable ways to salient international crises by emphasizing foreign policy problems and deemphasizing other issues. Considering our argument about polarized and parallel publics, we contend that the various subgroups will be concerned with different sets of issue areas, but we expect that they will respond to economic and political shocks in similar and consistent ways across subgroups.

Our theoretical argument of polarized, but parallel, publics offers two hypotheses about issue importance:

Polarized publics hypothesis: subgroups are concerned with different sets of issue areas.

Parallel publics hypothesis: subgroups respond to shifting conditions in similar and consistent ways.

Research Design

Our theoretical argument offers two hypotheses regarding how subgroups in the public view the importance of issues and how external shocks affect those views. While our expectations are based on aggregate and group-level changes in public opinion, conventional aggregate-level toplines from survey houses or data repositories (such as Roper) are not ideal. Those responses dealing with issue importance do not often provide fine-grained responses that are consistent across time, and they very rarely break out these responses across the necessary groups.

Testing these hypotheses, therefore, requires a unique data collection that allows the aggregation of individual-level responses regarding issue importance. Fortunately, the 'Most Important Problem' Dataset (MIPD) is a massive dataset of individual responses to the 'most important problem' (MIP) question from 1939-2015 (Heffington, Park and Williams 2019; Yildirim and Williams forthcoming). Scholars have used MIP data to tap into a variety of aspects of public opinion including issue salience, issue importance, problem status, public concerns, preferences, etc (See Jennings and Wlezien (2015) for a review). Though widely used, its limitations are also wellknown. MIP responses are generally poor at representing issue opinions (Soroka 2003) and public spending preferences (Jennings and Wlezien 2015), and they cannot tell us the direction of opinion (Wlezien 2005; Junqueira, Kagalwala and Lipsmeyer 2023). Moreover, confusion can arise over the extent to which issues are both "important" and a "problem." For instance, an issue (i.e., the economy) might be the most important issue, but it may not be a problem in a specific period, such as in an economic boom (Wlezien 2005, 556).¹⁰ At its most basic, the MIP response is an individual's plurality winner of important problems, and when aggregated to the group or national level, it represents the public's set of priorities or issue agenda.

The MIPD is particularly useful for this project since it codes responses with the Comparative Agendas Project (CAP) coding scheme (Jones and Baumgartner 2005). We then can calculate

¹⁰Having said that, the fact that "most important issue" (MII) responses are "strikingly similar" to MIP responses (Jennings and Wlezien 2011, 545) helps to mitigate concerns that the variation in MIP responses over time is completely driven by variation in problem status.

monthly percentages of the public identifying various categories as the "most important problem" facing the country. This is crucial to examining any questions related to how issues compete and tradeoff with each other in the aggregate. We collapse the 20 categories from the CAP into six broad categories: Economic Issues (including Macroeconomy, Employment, Inflation, Taxes and Fiscal Policy), Social Welfare, Crime, International Affairs (including National Security), Culture (including Immigration), and Other (including Civil Rights, Environment and Energy, Government Operations, and all remaining categories).¹¹ These categories are consistently the most important problems over time and are therefore more likely to be the target of media attention and elite messaging strategies.

Since the MIPD uses polling data from a number of survey houses, there are slight variations in the wording of the MIP questions, as well as the response sets. For example, while the most prominent MIP question is the typical "most important problem facing the country today," there are other wordings used quite often (e.g., "most important issue," "most important problem for Congress to solve," etc). The vast majority of surveys offer open-ended responses (that are then coded into 30-45 categories by the polling house), but a small percentage (almost 2%) forces the respondent to choose between around 10 categories. In the interest of generating as complete of a dataset as possible for our time period, we use the most inclusive criteria for deciding which surveys to use. We then calculate the weighted¹² percentage identifying each category as the MIP out of all those who identified a problem.¹³ The MIPD offers the exact dates of fieldwork, so we create monthly percentages. Percentages for the months without available surveys are interpolated linearly. Due to missing data in our MIP indicator, we limit our temporal domain to 1967-2015.

In Figure 1, we display the smoothed estimates of the monthly percentages of the six issue categories. The first observation is that one of two issue categories—economic issues or international

¹¹The "other" category includes responses that do not fit into the remaining categories.

¹²Population weights are generally available for this time period (90%), but where they are unavailable we assume that all respondents are weighted equally. We calculate these percentages by survey, so variations in the weighting scheme used do not influence the survey aggregation at each time period.

¹³The alternative is to include those respondents who said "don't know" or were "missing" into the denominator to calculate the percentages. We choose to exclude these from the calculation, because we want a measure of issue importance for those who consider there to be problems present with the country.

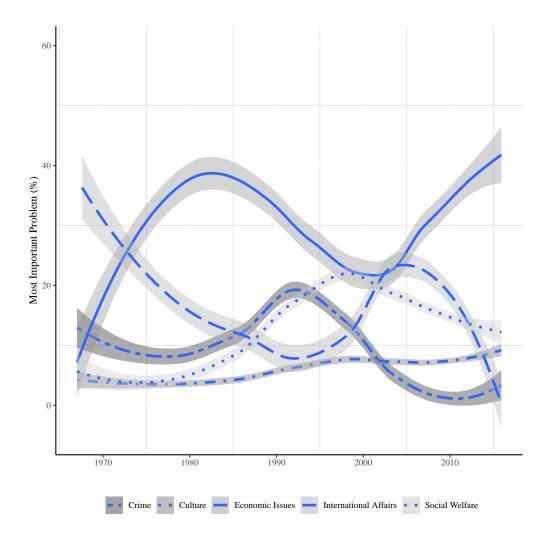


Figure 1: Issue Importance Over Time (1967-2015)

affairs—typically are considered the "most important problem" by the public. A second, related, observation is that there appears to be evidence consistent with competing issue attention for the public. There are clear instances when the importance of economic issues (possibly due to recession or a shock) rises in importance to eclipse previously-salient international affairs (possibly due to an international crisis), and there are other noteworthy tradeoffs that may be less publicized. As crime and social welfare issues grow in importance in the late-1980s and 1990s, international affairs become much less important. We also note that there is a great deal of "stickiness" in the series, meaning that issues that are important in one month tend to remain important until a major shock shifts the public's relative issue importance.

As an illustration of issue importance in the aggregate, consider Figure 2 that shows the percentages of the public choosing the economic issues as the most important problem broken down by partisanship–Democrats and Republicans.¹⁴ Overall, we see common patterns of highs and lows for both partisan groups, suggesting shared perceptions of the country's problems. To better illustrate this movement, we include a snapshot from 2008-2009 in Figure 3 which suggests a parallel, possibly polarized, structure to the public's perceptions of salient policies. While the shifts in the choice of economic issues as the most important problem move in tandem for Democrats and Republicans, the vertical distance between the partisan groups suggests polarization.

These exploratory figures illustrate that, though subgroups may differ as to the most important problem, they respond to shifting circumstances in similar ways. This is consistent with our theory that the public responds to changing conditions by reprioritizing salient issues on their agenda, and this produces patterns of issue tradeoffs at the aggregate level. Therefore, our priority in terms of model specification is to adequately capture the changing economic, political, and international landscapes, so that we can fully understand which circumstances induce tradeoffs and to what extent. We model the relative tradeoffs between six prominent issue categories (explained above). The compositional nature of our dependent variable—i.e., the categories are bound by 0 and 100,

¹⁴Though periods of domestic crises or international disputes periodically elevate other issues on the agenda (Mueller 1973; Ostrom and Job 1986), issues related to the macroeconomy are typically the most important problems.

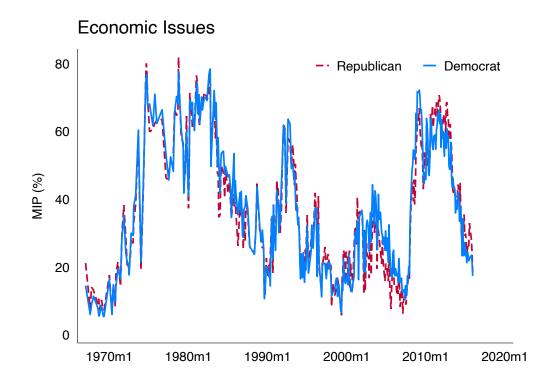


Figure 2: Economic Issues MIP Percentage Over Time (1967-2015) and Across Party Identification

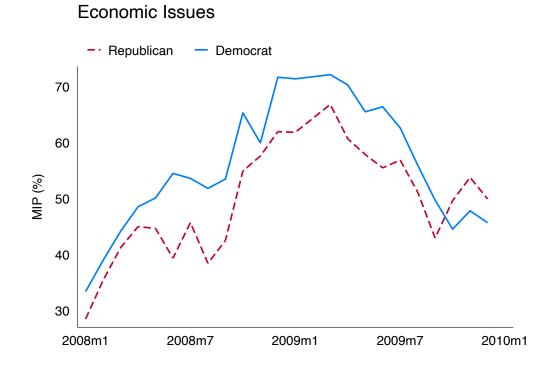


Figure 3: Economic Issues MIP Percentage Snapshot (2008-2009) and Across Party Identification

sum to 100%, and we expect correlated errors across categories—means that traditional ordinary least squares regression is inappropriate (Zellner 1962). As per Philips and Whitten (2016), we use seemingly unrelated regression (SUR) to model how exogenous shocks influence the public's relative tradeoffs across issue categories. The categories are autoregressive, so we also include the percentages of each issue category in the previous month.

Our independent variables fall into three broad categories that capture the ongoing media, economic, and international situations. First, the media plays a clear role in setting the agenda and identifying the particular issues that ought to be salient on the public's agenda (Soroka 2003; Moy, Tewksbury and Rinke 2016). Moreover, the media is the primary source of information for voters, so it is unlikely that issues will become important to the public without being covered extensively by the media. We measure the percentage of *New York Times* articles devoted to three issues: macroeconomy, law and crime, and international affairs (Baumgartner and Jones 2002). We expect that the public responds positively to media coverage with a short delay, and model fit statistics suggest that the public responds with a three-month lag. We therefore measure all media coverage variables at time t - 3.

The second category includes variables that measure objective economic conditions that are of utmost concern to the public. They are: quarterly *GDP growth* (from the Bureau of Economic Analysis), monthly *inflation* and *unemployment* (both from the Bureau of Labor Statistics), and *growth in oil prices* (percentage change per gallon from the previous month, from the Energy Information Administration). We expect all of these to be closely related to the percentage of the public viewing macroeconomic issues as salient. We lagged these variables by one month (t - 1).

Our final category of independent variables controls for the tendency for salient international crises to shift the public's attention away from domestic issues and toward international or security-based issues (Mueller 1973). We measure international conflict with the *total number of crises*_{t-1} that counts the number of crises occuring in that month (the International Crisis Behavior Data,

Brecher and Wilkenfeld (2000); Brecher et al. (N.d.)). This variable has a high threshold for crisis, so we expect these events to break through the noise and attract a great deal of public attention.

Results

The sheer number of coefficients in our models, combined with their nonlinear nature, limits the ability to assess the substantive impact of variables solely from their coefficients. As with other nonlinear models (such as logit or probit), quantities of interest ease the burden required for interpretation (King and Wittenberg 2000). Other scholars have offered graphical techniques of exploring these quantities of interest in the presence of temporal dynamics (similar to this model), either in the simple case of OLS (Williams and Whitten 2012) or in compositional models (Philips and Whitten 2016; Lipsmeyer, Philips and Whitten 2023). Those graphical methods are already quite complex, so scholars reduce their complexity by simplifying the scenarios used in the simulations. The nonlinear nature of compositional models means that each configuration of independent variables in the data potentially produces a different substantive effect for the variable of interest. Our approach is to examine the change in the relative issue importance across the six categories given a change in the independent variable, and then average those changes across all *N* observations (Hanmer and Kalkan 2013; Williams 2018).¹⁵

To assess whether or not groups are polarized, we estimated separate compositional models for each subgroup in order to control for a range of variables and to more rigorously generate predicted proportions of all six categories across partisanship, gender, and income groups. The results from

¹⁵The conventional approach is to generate quantities of interest at "average" values; unfortunately, this "averagecase approach" has a number of prominent weaknesses that limit its usefulness in dynamic compositional models. First, Hanmer and Kalkan 2013: 266) demonstrate mathematically that calculating the marginal effect for a scenario with all values at their means is not the same as taking the mean of the marginal effects calculated for all observations. Second, scholars are only rarely interested in inferring the substantive effect for a specific observation, and in those rare cases, scholars are hardly ever interested in an observation with "average" values of everything. Instead, more effective evaluations of theories focus on the average substantive effect across conditions observed in the data. This is the "observed-value approach", and it has some appealing connections to notions of "average treatment effects" in experimental settings. Finally, Williams (*forthcoming*) shows that scenarios based on the "average-case approach" have a high risk of being extrapolated and quite far from the bulk of the observations. The "observed-value" approach removes the risk of misleading inferences about treatment effects due to unrepresentative simulation scenarios

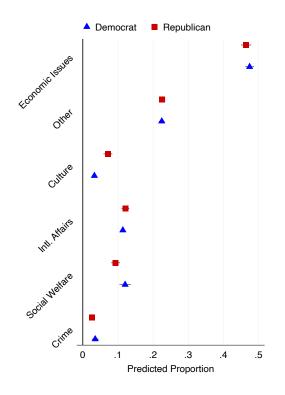


Figure 4: Partisan Differences across Issue Importance Categories

these analyses are shown in Figures 4-6.¹⁶ If the confidence intervals for subgroups do not overlap each other, then we conclude that the proportions of the various subgroups (e.g., men and women) choosing an issue as the most important problem are significantly different from each other. Across these figures, we see scant evidence of polarization.

In Figure 4, the proportion of Republicans likely to choose Culture as the country's biggest problem is significantly higher than that of Democrats. And, the proportion of Democrats likely to choose Social Welfare as the country's biggest problem is significantly higher than that of Republicans. For all other issue areas, the partisan proportions overlap each other. For gender differences in Figure 5, we see polarized groups for Economic Issues (men with a higher proportion) and Social Welfare (women with the higher proportion). Figure 6 illustrates a slight degree of income polarization. For three issue areas (Economic Issues, Other, and Crime), we see significant dif-

¹⁶For simplicity, Figure 4 focuses on those who identify as either Democrat or Republicans. Leaners and Independents are omitted from the figure.

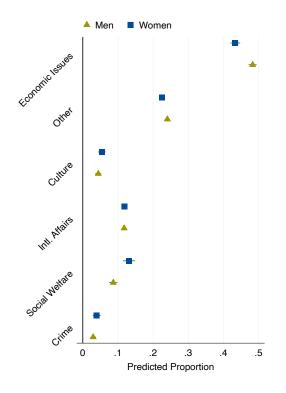


Figure 5: Gender Differences across Issue Importance Categories

ferences across various income quartiles, and for the other issue categories (Culture, International Affairs, and Social Welfare), similar proportions of income groups choose those areas.

In the remainder of this section, we focus our attention on subgroup responses to a selection of the most highly influential exogenous shock variables, *total number of crises* and *unemployment*.¹⁷ These figures are useful assessing whether or not groups have parallel reactions to shocks. In Figures 7 and 8, we show the predicted long-run changes¹⁸ from the baseline proportions in all six issue categories across Democrats and Republicans in response to one-standard deviation increases in *total number of crises* and *unemployment*, respectively. Looking first to the results after an increased shock in unemployment, we find responses that illustrate our *parallel publics* argument. As the unemployment situation becomes more dire, both Democrats and Republicans increase their attention to Economic Issues at the expense of nearly every other issue (Figure 7). In addition, the

¹⁷Other exogenous variables have no statistical impact on issue importance.

¹⁸Although multiple quantities of interest would make sense to explore, we narrow our focus to presenting the long-term effects (which result from the dynamic and highly autoregressive nature of the issue importance series).

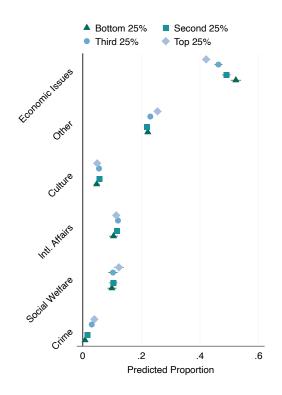


Figure 6: Income Differences across Issue Importance Categories

results illustrate that those issue areas significantly likely to decrease (i.e., culture, social welfare and crime) are similar across partisan groups, as well.

The results in Figure 8 also indicate that Democrats and Republics respond to interstate crises in similar ways by increasing their attention to International Affairs issues. The results suggest limited policy area tradeoffs in the area of Economic Issues (for Democrats) and Culture (for Republicans). In nearly every case – the one exception is how partisans respond to unemployment shocks with respect to Culture – there is no statistical difference in how Republicans and Democrats respond to shifting conditions in terms of issue importance. This lends support to the *parallel publics* hypothesis.

Our results for how external shocks affect gender groups point to similar parallel patterns found in the partisanship figures. Issue competition across men and women in response to unemployment (Figure 9) and interstate crises (Figure 10) suggest groups with similar reactions to these shocks. In Figure 9, an increase in unemployment results in the same pattern: Economic Issues become

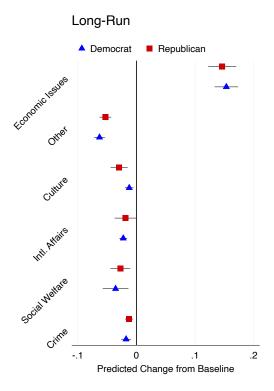


Figure 7: Long-Run Change from Baseline Proportions across Partisanship in Response to Unemployment

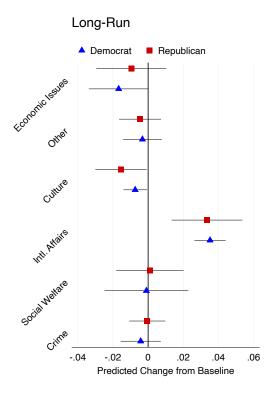


Figure 8: Long-Run Change from Baseline Proportions across Partisanship in Response to Interstate Crises

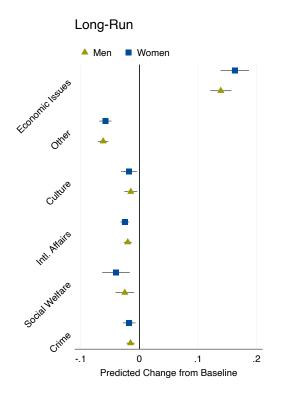


Figure 9: Long-Run Change from Baseline Proportions across Gender in Response to Unemployment

significantly much more important to both men and women at the expense of every other category. For interstate crises, the results in Figure 10 indicate a parallel pattern with the proportions of those choosing international affairs increasing significantly for both men and women, while neither gender offsets that increase by significantly decreasing other policy areas.

Issue competition across income quartiles also displays evidence of parallel publics. In Figure 11, an increased shock to unemployment significantly increases the importance of Economic Issues for all income groups, although there are no significant differences between these groups. The relative decreases in other areas (i.e., Other, Culture, Social Welfare and Crime) also do not significantly differ across income categories.¹⁹ Turning to how interstate crisis can affect public policy salience across income groups, the results in Figure 12 show that all quartiles increase their concern for International Affairs in response to an increase in international crisis, but these

¹⁹The one slight exception is for Crime, where shifting attention to Economic Issues produces a smaller decline in the proportion of the poorest individuals selecting Crime.

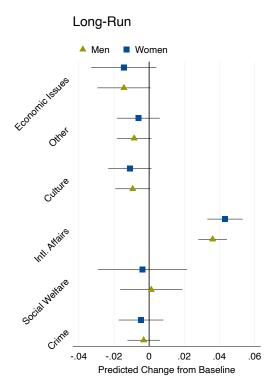


Figure 10: Long-Run Change from Baseline Proportions across Gender in Response to Interstate Crises

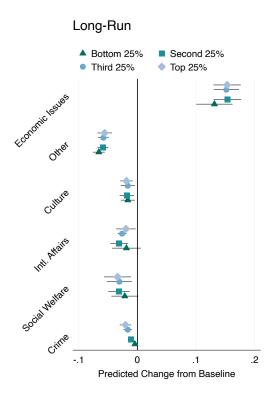


Figure 11: Long-Run Change from Baseline Proportions across Income Quartiles in Response to Unemployment

increases are not statistically different across all four income groups. Similarly, the decreasing tradeoffs to Culture for the second and third income categories are not significantly different from the other groups. Taken together, these results also suggest parallel behavior in policy salience across income groups.

Conclusion

Research and news coverage about polarization and divisiveness present a country split by partisan and ideological differences. The difficulties of passing legislation in a divided Congress, combined with the heated discussions about policy differences across party lines can lead to a pessimistic view of the American political situation. In this paper, however, we take a step back from the legislation and policy debates to investigate how the American public views the problems in the

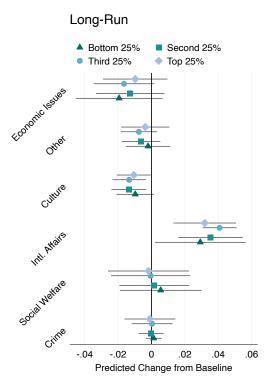


Figure 12: Long-Run Change from Baseline Proportions across Income Quartiles in Response to Interstate Crises

nation. While partisanship may divide the mass public when it comes to policy prescriptions, might the public actually agree on what is wrong?

Before debating policy solutions, the public first considers what needs to be fixed. Therefore, we have been interested in what national issues and problems are most salient across a variety of groups in society—by partisanship, gender, and income. In our estimates of typical assessments of the most important problem, we found scant differences across subgroups. And, when we did model-based simulations of rising unemployment and international conflict to see if the groups (e.g., men and women or Democrats and Republicans) responded to these shocks in different ways, we found common reactions. For example, the proportions of both men and women who chose "international affairs" significantly increased in a tandem response to interstate crises. We find similar results when we turned to income groups with the range from high to low income groups reacting in tandem to both rising unemployment and international crises shocks. What about partisan differences? Given the attention on partisan polarization, how do these external shocks affect partisans' views of issue salience? When it comes to national problems, Democrats and Republicans reacted similarly to economic and international shocks, increasing the proportions that choose "macroeconomy" and "international affairs," respectively.

How do we reconcile our results about issue salience and national concerns that suggest "parallel" publics with the vast literatures on policy spending, legislation, policy preferences, and voting that highlight differences across partisanship, gender, and income? Research on topics that question the role of individuals and government in politics and society touch on the cornerstone of partisanship, as well as aspects that create differences across other subgroups in society. For instance, studying preferences for government spending on redistributive policies can tap into numerous underlying economic, political, and social attitudes. It is not surprising that research on preferences, attitudes, voting, and legislation would uncover some level of polarization.

The results in this paper suggest that at a basic level, though the mass public (and the subgroups) is cohesive in its views of the most important issues in the nation. Rather than seeing different

problems, these groups hold similar views of what plagues the country, and their reactions to economic and international crises move in parallel. On a basic level, the mass public agrees on the importance of issues. However, we note that within these groups, people may not agree on how to fix the problem or even who bears the responsibility for the problem, but that would shift the discussion into the partisan realm. If the mass public agreed on all of the policy prescriptions to fix the nation's problems, then there would be no differences between Demcrats and Republicans.

References

- Abramowitz, Alan I and Kyle L Saunders. 2008. "Is Polarization a Myth?" *The Journal of Politics* 70(2):542–555.
- Aldrich, John H and Richard D McKelvey. 1977. "A Method of Scaling with Applications to the 1968 and 1972 Presidential Elections." *American Political Science Review* 71(1):111–130.
- Ansolabehere, Stephen and Shanto Iyengar. 1994. "Riding the Wave and Issue Ownership: The Importance of Issues in Political Advertising and News." *Public Opinion Quarterly* 58:335–357.
- Ansolabehere, Stephen and Shanto Iyengar. 1996. "The craft of political advertising: A progress report." *Political persuasion and attitude change* pp. 101–122.
- Banda, Kevin K. 2015. "Competition and the Dynamics of Issue Convergence." American Political Research 43(5):821–845.
- Barber, Michael, Nolan McCarty, Jane Mansbridge and Cathie Jo Martin. 2015. "Causes and consequences of polarization." *Political negotiation: A handbook* 37:39–43.
- Barnes, Tiffany D. and Erin C. Cassese. 2017. "American Party Women: A Look at the Gender Gap within Parties." *Political Research Quarterly* 70(1):127–141.
- Bartels, Larry M. 2010. Unequal Democracy. Princeton University Press.
- Baumgartner, Frank R and Bryan D Jones. 2002. Policy dynamics. University of Chicago Press.
- Belanger, Eric and Bonnie M. Meguid. 2008. "Issue Salience, Issue Ownership, and Issue-Based Vote Choice." *Electoral Studies* 27:477–491.
- Bevan, Shaun and Will Jennings. 2014. "Representation, agendas, and Institutions." *European Journal of Political Research* 53:37–56.
- Bisgaard, Martin. 2015. "Bias Will Find a Way: Economic Perceptions, Attributions of Blame, and Partisan-Motivated Reasoning during Crisis." *The Journal of Politics* 77(3):849–860.
- Bisgaard, Martin and Rune Slothuus. 2018. "Partisan Elites as Culprits? How Party Cues Shape Partisan Perceptual Gaps." *American Journal of Political Science* 62(2):456–469.
- Bishop, Bill and Robert G Cushing. 2009. *The big sort: Why the clustering of like-minded America is tearing us apart.* Houghton Mifflin Harcourt.
- Blood, Deborah J. and Peter C. B. Phillips. 1995. "Recession Headline News, Consumer Sentiment, the State of the Economy and Presidential Popularity - A Time Series Analysis 1989-1993." *International Journal of Public Opinion Research* 7:1–22.
- Blood, Deborah J. and Peter C. B. Phillips. 1997. *Economic Headling News on the Agenda: New Approaches to Understanding Causes and Effects*. Routledge.

- Books, John and Charles Prysby. 1999. "Contextual Effects on Retrospective Economic Evaluations: The Impact of the State and Local Economy." *Political Behavior* 21(1):1–16.
- Boomgaarden, Hajo G., Joost van Spanje, Rens Vliegenthart and Claes H. de Vreese. 2011. "Covering the crisis: Media coverage of the economic crisis and citizens' economic expectations." *Acta Politica* 46:353–379.
- Branham, J. Alexander. 2018. "Partisan Feedback Heterogeneity in Opinion Responsiveness." *Public Opinion Quarterly* 82(4):625–640.
- Brecher, Michael and Jonathan Wilkenfeld. 2000. A Study of Crisis. The University of Michigan Press.
- Brecher, Michael, Jonathan Wilkenfeld, Kyle Beardsley, Patrick James and David Quinn. N.d. "International Crisis Behavior Data Codebook, Version 14.". URL: http://sites.duke.edu/icbdata/data-collections/
- Budge, Ian and Dennis J. Farlie. 1983. *Explaining and Predicting Elections: Issue Effects and Party Strategies in Twenty-Three Democracies*. London: George Allen and Unwin.
- Campbell, Angus, Philip E. Converse, Warren E. Miller and Donald E. Stokes. 1960. *The American Voter*. New York: Wiley.
- Castle, Jeremiah J and Kyla K Stepp. 2021. "Partisanship, religion, and issue polarization in the United States: a reassessment." *Political Behavior* pp. 1–25.
- Chaney, Carol Kennedy, R. Michael Alvarez and Jonathan Nagler. 1998. "Explaining the Gender Gap in U.S. Presidential Elections, 1980-1992." *Political Research Quarterly* 51:311–339.
- Compton, Mallory E. and Christine S. Lipsmeyer. 2019. "Everybody Hurts Sometimes: How Personal and Collective Insecurities Shape Policy Preferences." *The Journal of Politics* 81(2):539– 551.
- De Boef, Suzanna and Paul M. Kellstedt. 2004. "The Political (and Economic) Origins of Consumer Confidence." *American Journal of Political Science* 48:633–649.
- Dickerson, Bradley T. and Heather L. Ondercin. 2017. "Conditional Motivated Reasoning: How the Local Economy Moderates Partisan Motivations in Economic Perceptions." *Political Research Quarterly* 70(1):194–208.
- Downs, Anthony. 1957. An Economic Theory of Democracy. New York: Harper and Row.
- Druckman, James N, Erik Peterson and Rune Slothuus. 2013. "How elite partisan polarization affects public opinion formation." *American Political Science Review* 107(1):57–79.
- Edy, Jill A and Patrick C Meirick. 2018. "The fragmenting public agenda: Capacity, diversity, and volatility in responses to the "most important problem" question." *Public opinion quarterly* 82(4):661–685.

- Eichenberg, Richard C. and Richard J. Stoll. 2012. "Gender Differences or Parallel Publics? The Dynamics of Defense Spending Opinions in the United States, 1965-2007." *The Journal of Conflict Resolution* 56:331–348.
- Enns, Peter K. and Paul M. Kellstedt. 2008. "Policy Mood and Political Sophistication: Why Everybody Moves Mood." *British Journal of Political Science* 38(3):433–454.
- Fiorina, Morris P and Samuel J Abrams. 2008. "Political polarization in the American public." *Annu. Rev. Polit. Sci.* 11:563–588.
- Fiorina, Morris P, Samuel J Abrams and Jeremy Pope. 2006. *Culture war?: The Myth of a Polarized America*. Longman Publishing Group.
- Fournier, Patrick, Andre Blais Richard Nadeau Elisabeth Gidengil and Neil Nevitte. 2003. "Issue Importance and Performance Voting." *Political Behavior* 25:51–67.
- Frank, Thomas. 2004. *What's the Matter with Kansas? How Conservatives Won the Heart of America*. First ed. Metropolitan Books.
- Gelman, Andrew. 2008. Red State, Blue State, Rich State, Poor State. Princeton University Press.
- Goidel, Kirby, Stephen Procopio, Dek Terrell and H. Denis Wu. 2010. "Sources of Economic News and Economic Expectations." *American Politics Research* 38(4):759–777.
- Green, Jane and Sara B. Hobolt. 2008. "Owning the Issue Agenda: Party Strategies and Vote Choices in British Elections." *Electoral Studies* 27(3):460–476.
- Gruszczynski, Mike. 2019. "Evidence of partisan agenda fragmentation in the American public, 1959–2015." *Public Opinion Quarterly* 83(4):749–781.
- Hanmer, Michael J. and Kerem Ozan Kalkan. 2013. "Behind the Curve: Clarifying the Best Approach to Calculating Predicted Probabilities and Marginal Effects from Limited Dependent Variable Models." *American Journal of Political Science* 57(1):263–277.
- Harteveld, Eelco, Stefan Dahlberg, Andrej Kokkonen and Wouter Van Der Brug. 2019. "Gender differences in vote choice: Social cues and social harmony as heuristics." *British Journal of Political Science* 49(3):1141–1161.
- Heffington, Colton, Brandon Beomseob Park and Laron K. Williams. 2019. "The 'Most Important Problem' Dataset (MIPD): a new dataset on American issue importance." *Conflict Management and Peace Science* 36(3):312–335.
- Hetherington, Marc J. 2009. "Putting Polarization in Perspective." *British Journal of Political Science* 39(2):413–448.
- Huddy, Leonie, Erin Cassese and Mary-Kate Lizotte. 2008. "Gender, Public Opinion, and Political Reasoning." *Political women and American democracy* pp. 31–49.
- Jennings, Will and Christopher Wlezien. 2015. "Preferences, Problems and Representation." *Political Science Research and Methods* 3(3):659–681.

- Jerit, Jennifer and Jason Barabas. 2012. "Partisan Perceptual Bias and the Information Environment." *The Journal of Politics* 74(3):672–684.
- Jones, Bryan D and Frank R Baumgartner. 2005. *The politics of attention: How government prioritizes problems*. University of Chicago Press.
- Junqueira, Andrea, Ali Kagalwala and Christine S Lipsmeyer. 2023. "What's your problem? How issue ownership and partisan discourse influence personal concerns." *Social Science Quarterly* 104(1):25–37.
- Kane, John V. and Ian G. Anson. 2022. "Deficit Attention Disorder: Partisanship, Issue Importance and Concern About Government Overspending." *Political Behavior*.
- Kaplan, Noah, David K. Park and Travis N. Ridout. 2006. "Dialogue in American Political Campaigns? An Examination of Issue Convergence in Candidate Television Advertising." *American Journal of Political Science* 50(3):724–736.
- Kaufmann, Karen M. and John R. Petrocik. 1999. "The Changing Politics of American Men: Understanding the Sources of the Gender Gap." *American Journal of Political Science* 43:864– 887.
- Kellstedt, Paul M., David A. M. Peterson and Mark D. Ramirez. 2010. "The Macro Politics of a Gender Gap." *Public Opinion Quarterly* 74(3):477–498.
- Kinder, Donald R. and D. Roderick Kiewiet. 1981. "Sociotropic Politics: The American Case." *British Journal of Political Science* 11:129–162.
- King, Gary, Michael Tomz and Jason Wittenberg. 2000. "Making the Most of Statistical Analyses: Improving Interpretation and Presentation." *American Journal of Political Science* 44:347–361.
- Krosnick, Jon A. 1990. "Government policy and citizen passion: A study of issue publics in contemporary America." *Political behavior* 12:59–92.
- Lawless, Jennifer L. 2015. "Female candidates and legislators." *Annual Review of Political Science* 18:349–366.
- Lipsmeyer, Christine S, Andrew Q Philips and Guy D Whitten. 2023. *The Politics of Budgets: Getting a Piece of the Pie.* Cambridge University Press.
- Lizotte, Mary-Kate. 2017. "Gender, Partisanship, and Issue Gaps." Analyses of Social Issues and Public Policy 17(1):379–405.
- MacKuen, Michael B., Robert S. Erikson and James A. Stimson. 1992. "Peasants or Bankers? The American Electorate and the US Economy." *American Political Science Review* 86:597–611.
- McCarty, Nolan, Keith T. Poole and Howard Rosenthal. 2008. *Polarized America: The Dance of Ideology and Unequal Riches*. MIT Press.
- McCarty, Nolan, Keith T Poole and Howard Rosenthal. 2016. *Polarized America: The Dance of Ideology and Unequal Riches*. MIT Press.

- McCombs, Maxwell. 1997. "Building Consensus: The News Media's Agenda-Setting Roles." *Political Communication* 14(4):433–443.
- McCombs, Maxwell and Donald Shaw. 1972. "The Agenda Setting Function of Mass Media." *Public Opinion Quarterly* 36:176–185.
- McCombs, Maxwell and Jian-Hua Zhu. 1995. "Capacity, diversity, and volatility of the public agenda: Trends from 1954 to 1994." *Public Opinion Quarterly* 59(4):495–525.
- Meltzer, Allen H. and Scott F. Richard. 1981. "A Rational Theory of the Size of Government." Journal of Political Economy 89(5):914–927.
- Moy, Patrica, David Tewksbury and Eike Mark Rinke. 2016. "Agenda-Setting, Priming, and Framing." *The International Encyclopedia of Communication Theory and Philosophy* pp. 1–13.
- Mueller, John. 1973. War, Presidents and Public Opinion. New York: Wiley.
- Mutz, Diana C. and Jeffery J. Mondak. 1997. "Dimensions of Sociotropic Behavior: Group-Based Judgements of Fairness and Well-Being." *American Journal of Political Science* 41:284–308.
- Nadeau, Richard, Richard G. Niemi, David P. Fan and Timothy Amato. 1999. "Elite Economic Forecasts, Economic News, Mass Economic Judgments, and Presidential Approval." *Journal of Politics* 61:109–135.
- Page, Benjamin I, Larry M Bartels and Jason Seawright. 2013. "Democracy and the Policy Preferences of Wealthy Americans." *Perspectives on Politics* 11(1):51–73.
- Page, Benjamin I. and Robert Y. Shapiro. 1992. *The Rational Public: Fifty Years of Trends in Americans' Policy Preferences*. Chicago: University of Chicago Press.
- Palmer, Harvey D. and Guy D. Whitten. 2011. "Through Thick and Thin? The Dynamics of Government Support across Income Groups During Economic Crises." *Electoral Studies* 30:427– 437.
- Palmer, Harvey D., Guy D. Whitten and Laron K. Williams. 2013. "Who Should Be the Chef? The Dynamics of Valence Evaluations across Income Groups During Economic Crises." *Electoral Studies* 32:425–431.
- Petrocik, John R. 1996. "Issue Ownership in Presidential Elections with a 1980 Case Study." *American Journal of Political Science* 40(3):825–835.
- Philips, Andrew Q., Amanda Rutherford and Guy D. Whitten. 2016. "Dynamic Pie: A Strategy for Modeling Trade-Offs in Compositional Variables over Time." *American Journal of Political Science* 60(1):268–283.
- Reeves, Andrew and James G. Gimpel. 2012. "Ecologies of Unease: Geographic Context and National Economic Evaluations." *Political Behavior* 34:507–534.
- Roemer, John E. 1998. "Why the poor do not expropriate the rich: an old argument in new garb." *Journal of Political Economics* 70:399–424.

- Schwindt-Bayer, Leslie A and William Mishler. 2005. "An integrated model of women's representation." *The Journal of politics* 67(2):407–428.
- Shapiro, Robert Y and Harpreet Mahajan. 1986. "Gender Differences in Policy Preferences: A Summary of Trends from the 1960s to the 1980s." *Public Opinion Quarterly* 50(1):42–61.
- Shaw, Donald L. and Shannon E. Martin. 1993. "The Function of Mass Media Agenda Setting." *Journalism Quarterly* 69(4):902–920.
- Sigelman, Lee and Emmett H. Buell Jr. 2004. "Avoidance or Engagement? Issue Convergence in US Presidential Campaigns, 1960-2000." *American Journal of Political Science* 48(4):650–661.
- Simon, Adam F. 2002. *The Winning Message: Candidate Behavior, Campaign Discourse, and Democracy*. Cambridge: Cambridge University Press.
- Simon, Herbert A. 1996. The sciences of the artificial. MIT press.
- Singer, Matthew M. 2011. "Who Says 'It's the Economy'? Cross-National and Cross-Individual Variation in the Salience of Economic Performance." *Comparative Political Studies* 44:284–312.
- Singer, Matthew M. 2013. "The Global Economic Crisis and Domestic Political Agendas." *Electoral Studies* 32:404–410.
- Slothuus, Rune and Martin Bisgaard. 2021. "How Political Parties Shape Public Opinion in the Real World." *American Journal of Political Science* 65(4):896–911.
- Soroka, Stuart N. 2003. "Media, Public Opinion, and Foreign Policy." Press/Politics 8:27-48.
- Soroka, Stuart N. and Christopher Wlezien. 2010. Degrees of Democracy: Politics, Public Opinion, and Policy. Cambridge University Press.
- Soroka, Stuart N., Dominik A. Stecula and Christopher Wlezien. 2014. "It's (Change in) the (Future) Economy, Stupid: Economic Indicators, the Media, and Public Opinion." *American Journal of Political Science* 59(2):457–474.
- Spiliotes, Constantine J. and Lynn Vavreck. 2002. "Campaign Advertising: Partisan Convergence or Divergence?" *The Journal of Politics* 64(1):249–261.
- Taylor-Robinson, Michelle M and Roseanna Michelle Heath. 2003. "Do women legislators have different policy priorities than their male colleagues? A critical case test." Women & Politics 24(4):77–101.
- Theriault, Sean M. 2008. Party polarization in congress. Cambridge University Press.

.

- Van Der Waal, Jeoren, Peter Achterberg and Dick Houtman. 2007. "Class Is Not Dead-It Has Been Buried Alive: Class Voting and Cultural Voting in Postwar Western Societies (1956-1990)." *Politics & Society* 35(3):403–426.
- Waugh, Andrew Scott, Liuyi Pei, James H Fowler, Peter J Mucha and Mason A Porter. 2009. "Party polarization in congress: A network science approach." *arXiv preprint arXiv:0907.3509*

- Williams, Laron K. 2018. "Temporal Dependence and the Sensitivity of Quantities of Interest: A Solution for a Common Problem." *International Studies Quarterly* 62:892–902.
- Williams, Laron K. and Guy D. Whitten. 2012. "But Wait, There's More! Maximizing Substantive Inferences from TSCS Models." *The Journal of Politics* 74:685–693.
- Wlezien, Christopher. 1995. "The Public as Thermostat: Dynamics of Preferences for Spending." *American Journal of Political Science* 39(4):981–1000.
- Wlezien, Christopher. 2005. "On the Salience of Political Issues: The Problem with the 'Most Important Problem'." *Electoral Studies* 24.
- Yildirim, T. Murat and Laron K. Williams. forthcoming. "Problem Importance across Time and Space: Updating the 'Most Important Problem Dataset'." *Journal of Elections, Public Opinion and Parties*.
- Yildirim, Tevfik Murat. 2022. "Rethinking Women's Interests: An Inductive and Intersectional Approach to Defining Women's Policy Priorities." *British Journal of Political Science* 52(3):1240–1257.
- Zaller, John R. 1992. *The Nature and Origins of Mass Opinion*. New York: Cambridge University Press.
- Zellner, Arnold. 1962. "An Efficient Method of Estimating Seemingly Unrelated Regressions and Tests for Aggregation Bias." *Journal of the American Statistical Association* 57:348–368.