Does Polarization Imply Poor Representation? A New Perspective on the “Disconnect” Between Politicians and Voters*

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December 16, 2015

Abstract

Many argue elite polarization implies a “disconnect” between moderate citizens and extreme politicians that electing moderate politicians would resolve. We critique two common versions of this claim with unique revealed preference experiments. First, most citizens support mixes of liberal and conservative policies but politicians reliably support one ideological side. Many argue this contrast implies an ideological disconnect in representation. We show citizens are indifferent to whether politicians are polarized in this ideological sense. Polarized representatives can even represent groups of non-polarized voters best. Second, some assert that citizens’ views on issues are reliably more moderate than politicians’. We show citizens hold immoderate views on many issues and prefer politicians who represent these immoderate views. These results complicate the simple picture of polarization scholars widely hold. As influential evaluations of political reforms utilize polarization to judge the quality of representation, our findings suggest many conclusions may need revisiting.

*The authors are listed in alphabetical order. A previous version of this paper circulated under the title “How Ideological Moderation Conceals Support for Immoderate Policies: A New Perspective on the “Disconnect” in American Politics.” We thank the Institute of Governmental Studies at UC Berkeley for support and Nick Carnes for sharing data. We thank Joseph Bafumi, Anthony Fowler, Don Green, Andy Hall, Seth Hill, Josh Kalla, Stephen Jessee, Gabe Lenz, Kevin Quinn, Jonathan Rodden, Boris Shor, Gaurav Sood, Walt Stone, Chris Tausanovitch, Rob van Houweling, and seminar participants at Columbia University, MPSA, the Pew Research Center, and Polmeth for helpful comments.

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Elite political polarization is one of the most significant and thoroughly studied developments in contemporary American politics (Lee 2009; Noel 2014). Almost universally, scholars argue that polarization holds dour consequences for representation. Fiorina and Levendusky (2006) ably summarize this conventional wisdom: “The political class is increasingly polarized” but “the majority of Americans remain largely centrist...The result is a disconnect between the American people and those who purport to represent them.”

This dominant perspective on polarization holds that voters would overwhelmingly prefer politicians to take less polarized, more moderate positions (e.g., Ansolabehere, Rodden and Snyder 2006). For example, Bafumi and Herron’s (2010) influential analysis estimated that over 90% of voters would like their Members of Congress to take more moderate positions.

If moderate politicians would better satisfy nearly all voters, why don’t moderate politicians win more elections? Echoing many, Poole (2004) calls this question “the central puzzle of modern American politics.”

The premise of this puzzle is that nearly all voters would prefer moderate politicians to represent them. In this paper we critique this premise. Instead, we assert that moderate politicians would not necessarily represent voters’ policy views better than today’s elected officials. Our argument is not that representation today is perfect or that moderates may not be better in some circumstances; rather, we argue that encouraging politicians to moderate may not be the political cure-all many have argued.

The premise that voters would widely prefer moderates commonly appears in two forms, one about a “disconnect” in ideology and one about a “disconnect” on individual issues. We critique both. The first half of the paper critiques the claim that citizens want ideologically moderate representatives to represent them. The second half critiques the claim that citizens want politicians with moderate issue positions to represent them. We conclude with an illustration of how our arguments reveal important dynamics in the 2016 Republican Presidential primary that dominant frameworks miss.
The evidence for both these critiques is drawn from a novel series of survey batteries and revealed preference experiments we delivered to voters in a two-wave panel. For reasons that we elaborate in greater detail below, many of our studies allow us to evade ambiguities introduced by observational equivalence and measurement error that has bedeviled previous work.

Our findings show how replacing today’s elected officials with moderates would not necessarily improve representation in most voters’ eyes. This suggests an important corrective to influential trends in American politics research. Most significantly, scholars should be more cautious about using polarization (or lack thereof) as a normative standard for assessing representation. Scholarship assessing political reforms on the basis of whether they encourage politicians to take more moderate positions takes for granted that moderation would improve representation in voters’ eyes (e.g., Ahler, Citrin and Lenz 2016; Brownstein 2007; Bullock and Clinton 2011; Gerber and Morton 1998; Hall 2014; Mann and Ornstein 2013). Our findings suggest reforms that decrease polarization hold far more ambiguous implications for representation than is often assumed.

Part I: Do Citizens Prefer Ideologically Moderate Representatives?

The essence of polarization is ideological orthodoxy: Republican politicians nearly always support the conservative side of policy debates, while Democratic politicians nearly always support the liberal side (e.g., McCarty, Poole and Rosenthal 2006). By contrast, most voters voice support for some liberal policies and some conservative policies (Baldassarri and Gelman 2008; Broockman 2015). Many argue that this contrast between polarized elites and non-polarized voters implies a disconnect in representation between ideologically moderate voters and ideologically extreme representatives (e.g., Ansolabehere, Rodden and Snyder 2006; Bafumi and Herron 2010; Fiorina and Levendusky 2006; Fiorina and Abrams 2009).

We argue this line of reasoning has an important flaw: ideological similarity and agreement on
issues are not synonymous concepts and not even guaranteed to correlate positively. We illustrate why through an example.

The Difference Between Ideology and Issues

Consider the moderate, “non-polarized” voter in Table 1. Like most voters, this moderate voter supports a mix of liberal and conservative policies. The Democratic politician pictured, being “polarized,” consistently supports liberal policies. Finally, like the voter, the moderate politician shown in the final column supports a mix of liberal and conservative policies.

<table>
<thead>
<tr>
<th>Issue</th>
<th>Moderate Voter</th>
<th>Democratic Politician</th>
<th>Hypothetical Moderate Politician</th>
</tr>
</thead>
<tbody>
<tr>
<td>Taxes</td>
<td>1</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>Immigration</td>
<td>1</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>Abortion</td>
<td>0</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Medicare</td>
<td>0</td>
<td>1</td>
<td>1</td>
</tr>
</tbody>
</table>

0-1 Left-Right ‘Ideology’

|             | 0.5 (Moderate, Not Polarized) | 0 (Extreme, Polarized) | 0.5 (Moderate, Not Polarized) |

<table>
<thead>
<tr>
<th>Ideological Proximity to Voter</th>
<th>-0.5</th>
<th>0 (Perfect)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Issue Agreement with Voter</td>
<td>2/4 Issues</td>
<td>0/4 Issues</td>
</tr>
</tbody>
</table>

According to the polarization literature’s line of reasoning, the moderate would be a better representative for the moderate voter than the Democratic politician: both are not loyal to any particular ideology or party and “not polarized.”

Recent literature has given this line of reasoning a formal technical underpinning (e.g., Bafumi and Herron 2010; Clinton 2006; Jessee 2009; Shor 2013; Tausanovitch and Warshaw 2014). This research conceptualizes voters’ views on individual issues as mere windows into an underlying ideology. It is this ideology which is of primary importance for representation. For example, in their prominent study of representation, Bafumi and Herron (2010) write that “if we conceptualize legislators as having ideal points that drive their roll call voting choices, then we should think
similarly about voters’ responses to issue questions (p. 521).

This approach has a similar upshot to conceptualizing answers to SAT questions as primarily diagnostic of underlying mathematical ability: it allows the estimation of one-dimensional descriptions of individuals that “can be compared in a proximate sense” (Bafumi and Herron 2010). Two students are said to have similar mathematical ability if they have the same SAT score. Likewise, two citizens or politicians are said to have similar political views if they have the same ideological ideal point.\footnote{Indeed, the item-response theory (IRT) models most often used to compute voters’ and politicians’ ideal points are borrowed from the educational testing literature (e.g., Clinton, Jackman and Rivers 2004).}

Under the view that citizens’ policy views can be summarized with ideal points that can be “compared in a proximate sense,” the preponderance of American voters who supply mixes of liberal and conservative survey responses have very similar, moderate political preferences. Therefore, the hypothetical moderate politician from Table 1 would be seen as a faithful representative of the moderate voter’s policy views.

But if the latent ideological predispositions that these unidimensional ideal points purportedly summarize do not drive citizens’ political choices, this interpretation may change dramatically. Consider Table 1 again, and suppose the voter’s views on these four issues reflect genuine commitments specific to each. In that case, the voter may view the moderate politician as a very poor representative—they disagree on every issue! And, while the Democrat is not a perfect representative, this voter may see herself as having much more in common with the Democrat as they agree on 2 of the 4 issues.

The broader point of this example is this: just because two individuals are both not consistently liberal or conservative does not mean that they agree on any particular policy matters either. Ideological proximity or ‘degree of polarization’ does not necessarily correspond to agreement on issues.

Importantly, a similar disjuncture between ideological proximity and agreement on issues can
occur at the aggregate level. In the thought experiment in Table 2, a hypothetical district comprises five voters, each of whom holds a liberal view on 3 of 5 issues. Likewise, on each issue, supporters of the liberal position outnumber supporters of the conservative position 3-2. A legislator noting this pattern thus might take the liberal stance on every issue, like the Democratic legislator pictured. In voting this way, however, the Democratic legislator appears “out of step” with the district on an ideological basis. By contrast, the moderate legislator looks similar to the district ideologically—like the district’s voters, he is “not polarized.” However, this legislator can only achieve this distinction by voting against majority will on two issues. Thus, ideological proximity and agreement on individual issues are not only separate concepts, but they are not even guaranteed to correlate positively in the aggregate.

**Table 2: Which Legislator is a Better Representative in the Aggregate?**

<table>
<thead>
<tr>
<th></th>
<th>Liberal Survey Response?</th>
<th>Liberal Position?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Voter 1</td>
<td>Voter 2</td>
</tr>
<tr>
<td>Issue 1</td>
<td>1 0 1 1 0</td>
<td></td>
</tr>
<tr>
<td>Issue 2</td>
<td>1 1 1 0 0</td>
<td></td>
</tr>
<tr>
<td>Issue 3</td>
<td>1 0 0 1 1</td>
<td></td>
</tr>
<tr>
<td>Issue 4</td>
<td>0 1 1 0 1</td>
<td></td>
</tr>
<tr>
<td>Issue 5</td>
<td>0 1 0 1 1</td>
<td></td>
</tr>
<tr>
<td>‘Ideology’</td>
<td>0.6 0.6 0.6 0.6 0.6</td>
<td></td>
</tr>
</tbody>
</table>

These are not cherry-picked pathological examples but instead reflect what real public opinion data looks like. The citizenry the polarization literature depicts as monolithically moderate is in fact internally divided on individual issues (Baldassarri and Gelman 2008; Converse 2006; Kinder 2006; Klar 2014).

Questions the polarization literature has not carefully addressed thus have great importance: do citizens simply care whether politicians exhibit a mixed set of positions, implying ideological moderation under the discipline’s latest methods? Or do citizens instead care more about whether politicians reflect their personal mix of views? To the extent the latter better reflects how citizens
think, electing ideological moderates may not inherently improve representation in their eyes.

Existing empirical evidence has significant ambiguities that leave these questions difficult to resolve. Proponents of the ideological conception of voter preferences argue that responses to individual issue questions are too ridden with measurement error to meaningfully capture citizens’ preferences. Instead, they suggest combining these items into an ideological scale with greater predictive power (Ansolabehere, Rodden and Snyder 2008; Bafumi and Herron 2010; Jessee 2009). Consistent with the predictive power of ideological scales, advocates of using ideological scales to measure representation have shown that citizens whose scores on an ideological index are more similar to a candidate’s score are more likely to vote for that candidate (Boudreau, Elmendorf and MacKenzie 2013; Jessee 2009; Joesten and Stone 2014; Shor and Rogowski 2013; Stone and Simas 2010).

However, in available data, the patterns proponents of ideological voting have documented are observationally equivalent with issue voting. Because today’s polarized politicians sit at the extreme of ideological scales, an ideologically moderate citizen’s score on the scale may reflect the share of policies on which he agrees with one party and not an ideological position per se. We would expect both “more liberal citizens” and “citizens who support a greater number of liberal policies than conservative policies” to be more likely to vote for Democrats than Republicans.

These observational equivalencies in existing research reflect the fact that we rarely get to observe voters making tradeoffs between their issue positions and their (generally) moderate ideological predispositions in the era of elite polarization. Importantly, this observational equivalence will no longer hold if scholars get their wish and non-polarized, ideologically moderate candidates are elected to office. Examining to what extent citizens would indeed prefer ideological moderates to represent them thus has immediate practical relevance—would citizens really prefer the ideologically moderate politicians scholars advocate to their existing representatives? Our first empirical studies consider this question.
Study 1: Apparent Ideological Voting Is An Artifact of Issue Voting

Study 1 examines the degree to which citizens’ preferences for representation are animated by ideological congruence versus representation of individual issue positions. To assess this preference, we presented citizens with a choice between two potential legislators, each of whom held four issue positions. We then examined what appeared to drive the choices citizens made.

This approach complements existing research in two important ways. First, existing studies that claim citizens prefer ideologically moderate politicians typically rely on measurement assumptions that are difficult to test (e.g., Bafumi and Herron 2010). We employ a complementary approach, allowing citizens to reveal the extent to which they prioritize ideological moderation in the way scholars have claimed they do.

Second, existing studies of polarization that do examine candidate choice tend to examine how citizens choose between real politicians. We constructed artificial politicians and examined how citizens choose between these. This allows us to see how citizens react to politicians who do not take a consistent set of liberal and conservative responses across questions—the kind of politicians polarization scholars argue citizens would prefer as representatives, but who are not on offer in American politics today for scholars to observe. Randomizing politicians’ positions also allows us to be sure other unobserved dimensions of real candidates, like differences in candidate quality that may systematically correlate with ideology, do not drive the results.

(To address concerns about external validity, we present an application examining voters’ preferences in the 2016 Republican presidential primary in the discussion.)

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2 We drew these issues from prominent studies that have used issue items to calculate an ideological index for the purpose of assessing representation and polarization.

3 We are not principally concerned with explaining electoral choice per se or in simulating an election accurately; we simply thought a revealed preference exercise would capture citizens’ demand for ideological or issue representation most accurately.
Data

Most of our studies rely on a two-wave panel survey conducted in January and March of 2014. In the first wave, we recruited 1,240 survey respondents from the United States through Survey Sampling International, which recruits samples that compare favorably to Census benchmarks. The sample matches the population reasonably well on key demographic variables, although African-Americans were intentionally oversampled for another project (see Section C.1 in the Online Appendix). We use survey weights to account for this oversampling and to improve the correspondence between the sample and the population on observable covariates.

In the first survey wave, we asked respondents 27 binary choice issue questions to which they indicated agreement or disagreement with the statement given (e.g., “Same-sex couples should be allowed to marry”; see Online Appendix section B for all 27 issue questions). We estimated a latent ideology using the same methods as the latest research examining ideological representation, scaling respondents’ answers to the binary issue questions using a unidimensional item-response theory (IRT) model.\(^4\)

We next conducted a follow-up wave in March 2014 with 515 of the Wave 1 respondents. Wave 2 contained our revealed preference experiments, in which we examined the relationship between choices respondents made in Wave 2 and the opinions they offered in Wave 1. The two months between the waves was intended to preclude pressure to answer consistently with prior responses.

Study 1A: Probing the Demand for Ideological Representation with Random Positions

Our first study broke the observational equivalence between ideological voting and issue voting in the simplest way possible: we presented matchups between two politicians with completely random positions and allowed issues and their implied ideological stance to vary randomly.

In particular, for each respondent, we first picked four issues at random for each candidate and

\(^4\)We use the MCMCpack R package to generate 10,000 draws from a posterior distribution of each respondent’s estimated ideal point.
then assigned candidate $i$ to a liberal (or conservative) position on each issue $j$ with probability 0.5. An example of this stimulus is shown in Figure 1.

**Figure 1:** An Example Matchup from Study 1, As Shown to Respondents

<table>
<thead>
<tr>
<th>Candidate A</th>
<th>Candidate B</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Support the death penalty in this state.</td>
<td>• Do not allow illegal immigrants brought to the US as children to apply for citizenship.</td>
</tr>
<tr>
<td>• Allow illegal immigrants brought to the US as children to apply for citizenship.</td>
<td>• Do not increase taxes for those making over $250,000 per year.</td>
</tr>
<tr>
<td>• Legalize the purchase and possession of small amounts of marijuana.</td>
<td>• Prohibit the purchase and possession of small amounts of marijuana.</td>
</tr>
<tr>
<td>• Increase taxes for those making over $250,000 per year.</td>
<td>• By law, abortion should never be permitted.</td>
</tr>
</tbody>
</table>

Imagine choosing between the two candidates for US Congress described below:

Please take a few moments to review the candidates' positions and think about the degree to which each candidate reflects your views.

If you had to choose, which candidate would you vote for?

- Candidate A
- Candidate B

How does this approach generate random variation in ideology and issue agreement? Table 1 provided an example of how two politicians can provide differing degrees of issue and ideological representation. We calculated ideological distance measures and issue agreement measures for the respondents and the candidates they were shown in the survey just like these statistics were shown at the bottom of Table 1. Citizens’ issue and ideological preferences were computed on the basis of their Wave 1 responses (either their individual issue responses or the latent ideology their responses collective implied) and compared to the experimental candidates they were shown on the Wave 2 survey. Politician B’s issue agreement advantage is a simple fraction—the proportion of positions for which the citizen’s Wave 1 responses agreed with Politician B’s positions minus that same proportion for Politician A.

To measure ideological proximity, we calculated Politician B’s

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More precisely, citizen $i$’s agreement score with Politician A is specified as $\text{Agreement}_{iA} = \frac{\sum_{j=1}^{n} (j_i = j_A)}{n}$, with $j$ indexing the randomly chosen issues and $n$ referring to the set of those issues for which the respondent expressed a
Table 3: The Effect of Ideological Proximity on Political Choice Flows Through Issue Agreement

<table>
<thead>
<tr>
<th></th>
<th>DV: Preference for Politician B</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(1)</td>
</tr>
<tr>
<td>Pol. B ideological proximity advantage</td>
<td>0.48** (0.20)</td>
</tr>
<tr>
<td>Pol. B issue agreement advantage</td>
<td>0.51*** (0.08)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.23** (0.10)</td>
</tr>
<tr>
<td>Observations</td>
<td>513</td>
</tr>
</tbody>
</table>

Robust standard errors reported in parentheses. * = p < 0.10, ** = p < 0.05, *** = p < 0.01.

ideological proximity advantage — the probability that Politician B’s ideal point ($\psi_B$) is ideologically closer than Politician A’s ($\psi_A$) to citizen $i$’s ideal point ($\theta_i$). The dependent variable is which politician the respondent chooses ($A = 0, B = 1$) for their particular matchup.

How do citizens choose? At first glance, ideological proximity seems to affect citizens’ choices. Consistent with studies of ideologically-driven choice (e.g., Boudreau, Elmendorf and MacKenzie 2013; Jessee 2009), the first column of Table 3 shows a significant bivariate association between citizens’ ideological proximity to Politician B and a preference for Politician B (estimated via OLS). Figure 2a shows this graphically, with the x-axis depicting the probability that Politician B is ideologically superior to Candidate A, and the y-axis showing the share of respondents who chose Politician B.

However, ideological proximity only appears to correlate with voters’ choices because of its association with issue agreement. As we noted, an alternative is also possible: when evaluating Wave 1 opinion ($n = 4$ for all respondents). Our main measure of issue congruence in this test is Politician B’s issue agreement advantage, $\text{Agreement}_{iB} - \text{Agreement}_{iA}$.

We did so as follows:

$$\Pr(\text{Politician B is more proximate}) = \frac{\sum_{d=1}^{10,000} |\theta_{id} - \psi_{Bd}| < |\theta_{id} - \psi_{Ad}|}{10,000},$$

where $d$ indexes draws from the posterior distributions. We use this measure of Politician B’s ideological advantage and the measure of Politician B’s issue agreement advantage detailed above to assess the extent to which issues and ideological proximity affect respondents’ tendency to prefer the representation provided by Politician B.
politicians on the basis of issues, citizens also tend to select politicians that appear like an ideological match. Figure 2b shows this phenomenon graphically, reproducing Figure 2a at each level of issue agreement. For example, in the right-most plot, the “Politician B” respondents saw agreed with them on 2 more issues than the “Politician A” they saw; respondents in the center plot plot agreed with their “Politician A” and “Politician B” on the same number of issues. The horizontal axis in each graph depicts the probability that Politician B is ideologically superior, and the vertical axis shows the probability that voters chose Politician B.
To the extent citizens care about ideological fit in and of itself, there should be the same upward sloping pattern from Figure 2a in Figure 2b with ideological proximity predicting choice over and above issue agreement. There is not. Instead, we observe a pattern more consistent with citizens evaluating candidates on the basis of individual issues. Respondents in the subplots to the left saw matchups where Politician A was superior to Politician B on issues, and tend to select Politician A; respondents in the subplots to the right saw matchups where Politician B was superior on issues and tend to select Politician B. Across subplots, however, we fail to find any systematic influence of Politician B’s ideological advantage on respondents’ choices, conditional on issue agreement.

Column 2 of Table 3 summarizes this result with regression. When introducing Politician B’s issue agreement advantage into the regression of candidate choice on ideological proximity advantage (Column 1), the apparent effect of ideological proximity on politician preference plummets to near zero. Moreover, when we pit ideological advantage and issue agreement advantage against each other in this model, only issue agreement strongly predict citizens’ preferences. In other words, what has been seen as strong evidence that citizens evaluate politicians based on ideological proximity may reflect significant omitted variable bias because agreement on issues is not usually included in these statistical models.

The data from our first study thus suggests that citizens desire representation of their issue positions but appear to be fairly indifferent to ideological match in itself. However, one might mistake their representational preferences as ideologically-driven without explicitly considering distinct issues. This provides our first hint that citizens would not necessarily be much more satisfied with representation if politicians better matched them in a general ideological sense.

Collinearity in a linear regression does not bias estimates (Achen 1982), although it does favor concepts that are more precisely measured. In this case, our measure of ideological agreement is drawn from the literature, but our measure of issue agreement is coarse and does not reflect that citizens might see some issues are more important than others. Nevertheless, we see the coarse measure of issue agreement significantly outperforming the sensitive ideological measure.
Study 1B: Testing The Demand for Ideological Representation with Tailored Politicians

To put the question of citizens’ preference for ideological proximity vis-à-vis a match on issues to a more stringent test, we next presented citizens with a candidate matchup that forced a stark tradeoff between the two. Akin to the voter’s choice in Table 1, respondents faced a choice between a “moderate” who was ideologically proximate yet entirely disagreed with them on issues and a candidate who agreed with them on more issues but was ideologically distant and more “polarized.”

In particular, we tailored the politicians we showed respondents to individual respondents’ expressed positions in Wave 1. To construct the “ideologically correct” politicians for our respondents, we considered every possible hypothetical politician who took four positions, all of which disagreed with a particular respondent’s previously reported positions. We then scaled each of these politicians, one-by-one, with all Wave 1 respondents using IRT, and selected the politician who was closest to the respondent on latent ideology as indicated by IRT. Section B.3 in the Appendix describes this process in greater detail, and Figure 9 shows this process graphically.

As in Study 1A, we asked citizens to imagine choosing between these two candidates in an election. We randomly assigned the “ideologically correct” and “ideologically incorrect” candidate to occupy the positions of “Politician A” and “Politician B” to avoid order effects.

If citizens tend to pick politicians with congruent issue positions that sit at odds with their general ideology, this would represent evidence contrary to the ideological approach to studying representation; on the other hand, if voters tend to prefer politicians with similarly “mixed” positions—even if the individual positions sit entirely at odds—we would have clear evidence that citizens are indeed averse to polarization in itself.

The results show that a minority of respondents opted for a less polarized candidate over a polarized candidate who agreed with them on more issues. We find that they overwhelmingly prefer the politician who agrees with their previously stated issue positions despite being more polarized and inferior from an ideological perspective. 69.9% of the 513 respondents in Study 1B selected the “ideologically incorrect” politician, while just 31.1% selected the “ideologically
correct” politician (95% CI: [24.9%, 37.3%]).

Before exploring the implications of these results in greater detail, we explore their robustness in Study 2.

**Study 2: Citizens are Indifferent to Ideology in the Presence of Issue Information**

A potential alternative explanation for the results from Study 1 is that citizens would have preferred an ideologically proximate politician but did not understand how ideology tends to relate to the issues we selected—that is, they failed to identify “what goes with what” politically (e.g., Converse 1964). Further complicating matters, citizens usually evaluate potential representatives in an information-rich environment, i.e., when campaigns are actively providing ideological cues.

To assess these possibilities and the robustness of citizens’ indifference to ideology, we introduced a series of ideological primes and informational treatments before voters chose in Study 1B. These treatments varied in their impact and directness.

Our first two treatments were relatively indirect. First, before allowing them to choose between the politicians, we randomly asked 122 respondents whether they thought Politician A (randomly assigned to be either the “ideologically correct” or “ideologically incorrect” politician) would agree or disagree with 5 other issue statements (randomly chosen from the 22 binary response issue questions not displayed as part of Politician A’s platform). This task was meant to lead respondents to think about how issues fit together and thus the politicians’ implied ideologies.

Second, we randomly asked 132 respondents where they thought the two politicians stood on a 7-point ideological scale, directly asking them to consider politicians’ ideology before choosing.

Finally, to put the external validity of Study 1B to an even tougher test, our final and most direct treatment actually showed 127 respondents the ideal point estimates for the two politicians, a more direct ideological treatment than even election campaigns typically deliver. In addition to the four
positions for each politician, we showed respondents an image featuring an ideological dimension bounded by “liberal” on the left, “conservative” on the right, and arrows indicating the estimated ideal points for Politicians A and B. (See Figure 3 for an example.) We told respondents that, “based on these positions, scholars believe these two candidates are at about the positions shown on a liberal-conservative spectrum” before asking them to choose between the two. *This treatment should leave no doubt about the ideological aspect of the choice respondents faced. Indeed, studies that adopt the ideological perspective increasingly capture citizens’ views by asking them to place themselves and politicians on scales like this (e.g., Ahler, Citrin and Lenz 2016; Tausanovitch and Warshaw 2014); thus, we suspected that citizens might be able to make sense of these candidates with this aid. (See Figure 3 for an example.)

None of these interventions led citizens to evaluate potential representatives ideologically. As Figure 4 shows, compared to the baseline condition, respondents were no more likely to choose the “ideologically correct” politician when primed to think about where one politician likely stands on other issues. Nor were they more likely to choose the “ideologically correct” politician when asked or informed about the politicians’ likely ideological predispositions. Across all four of these conditions—priming issue packages, priming ideology, providing information about ideology, and

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*Figure 3: Example of “Ideology Shown” Condition*

In this example, Candidate B is the respondent’s “ideologically correct” candidate who nevertheless disagrees with the respondent on all four issues, while Candidate A is the respondent’s “ideologically incorrect” candidate who agrees with the respondent on all four issues.
the baseline—a clear minority of respondents choose the ideologically correct candidate over the ideologically distant candidate who agreed with them on all four issues.

Citizens’ total disregard of the ideological information we provided in Study 2 and prioritization of issue information makes little sense from the point of view that citizens lack meaningful attachments to individual issues separate from their underlying ideology. However, it is fully compatible with our claim that citizens are issue-driven first and foremost in ways that ideological summaries cannot capture.

**Summary and Potential Implications of Studies 1 and 2**

Citizens tend to express a mix of liberal and conservative views across issues. A large literature argues that this implies ideological moderation and that citizens would see representation as
improved if politicians tended to hold such mixed views as well. Our findings thus suggest that cit-
izens do not place much value on the extent to which politicians are “not polarized” in an ideolog-
ical sense. Studies 1 and 2 demonstrate that they do not place any premium on whether politicians
appear moderate in this way. Citizens appear indifferent to whether politicians have a mix of issue
views, but care much more about politicians sharing their own personal mix. Not only are citizens
generally unresponsive to politicians’ ideological proximity, but their views on individual issues—
which many write off as mere error-laden reflections of their underlying ideology—powerfully
dictate their choices. To the extent that there is a salient “disconnect” in representation felt by
ordinary citizens today, electing more ideological moderates does not appear to be a remedy.

These individual-level findings have important aggregate consequences for the reasons depicted
in Table 2. It is certainly possible that a representative who took perfectly congruent positions on
every issue might break from party orthodoxy frequently. However, breaking from party ortho-
doxy alone is not sufficient in voters’ eyes – politicians must do so in a way that actually improves
representation of their views on issues. Existing polarization literature generally fails to measure
agreement between voters and politicians on individual issues, however. This leaves existing ap-
proaches in sufficient for claiming polarization inherently implies poor representation. We expand
on this point in the discussion.

Part II: A Disconnect on the Issues?

“Within the range of alternatives permitted by the mass public, elites in the district further
constrain the congressman by not tolerating some alternatives that were tolerated by the mass.”

– (Kingdon 1989 p., 291)

A second way elite polarization has been said to degrade representation is by encouraging
politicians to take positions within issue areas that are extreme relative to voters’ (Fiorina, Abrams
and Pope 2005; Fiorina and Abrams 2009). For example, if Democrats in Congress support raising
taxes by 5% and Republicans support lowering them by 5%, this view would lead us to expect that nearly all citizens would like their representatives to support a tax rate somewhere in the middle of these extremes. Consistent with this idea, scholars like Ellis and Stimson (2012) speak of a large group of centrist voters who tend to see the policies advanced by leftist parties as “more leftist than it prefers” and the policies advanced by rightist parties as too rightist (p. 47-8).

But elite polarization has more ambiguous implications than many realize for comparing elites’ and voters’ relative extremity (or moderation) on individual issues. Table 4 illustrates why. Suppose policy options on four issues can be arrayed from left to right on a 7-point scale, with Democratic and Republican elites consistently supporting policies at 3 and 5, respectively. Table 4’s voters hold no moderate positions and agree with each other on nothing. Yet, when their views are boiled down to one dimension, these voters appear monolithically moderate. Nevertheless, observing voters’ ideal policies within each area may reveal that politicians are much closer to the center of public opinion on each issue than at first glance.

**Table 4: Elite Polarization Does Not Imply Politicians’ Ideal Policies Are More Extreme than Voters’**

<table>
<thead>
<tr>
<th></th>
<th>Voter 1</th>
<th>Voter 2</th>
<th>Voter 3</th>
<th>Voter 4</th>
<th>Ideal Policy on 1 to 7 Scale</th>
<th>Democratic Legislator</th>
<th>Republican Legislator</th>
</tr>
</thead>
<tbody>
<tr>
<td>Issue 1</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td>7</td>
<td>3</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td>Issue 2</td>
<td>7</td>
<td>5</td>
<td>3</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td>Issue 3</td>
<td>5</td>
<td>7</td>
<td>1</td>
<td>3</td>
<td>3</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td>Issue 4</td>
<td>3</td>
<td>1</td>
<td>7</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td></td>
</tr>
</tbody>
</table>

Remarkably little existing data speaks to the extent of voters’ support for moderate policies within policy areas; scholars typically infer that citizens have moderate views on issues because they have moderate scores on ideological scales. But, as we have shown, there is far more heterogeneity among “moderate” citizens than this inference requires (see also Baldassarri and Gelman 2008; Broockman 2015). And, if we cannot impute citizens’ policy preferences from their ideological scores, issue-specific measures are necessary to understand how moderate or extreme citizens’ preferences are within issue areas.
Data

To explore the extent of politicians and citizens’ support for moderate policies, we asked respondents for their positions on 13 issues. These 13 issue questions were notably different from those on most surveys. Most issue questions on national surveys are like those we used in Studies 1 and 2: they are binary-choice and ask whether citizens prefer the typical Republican or Democratic position. It is difficult to know from such questions how many citizens would prefer more moderate or more extreme courses of actions than those offered by either party. For example, if a citizen opposes President Barack Obama’s health care plan, does this mean the citizen would prefer a policy somewhere between the Democratic and Republican positions, would be satisfied with the Republicans’ proposals, or perhaps desires a policy even more conservative than this? We cannot tell, and thus it is difficult to assess how well Democrats, Republicans, or alternatives would represent this person on this issue on the basis of their response to this binary-choice question alone.

In order to capture citizens’ issue preferences with greater nuance, our 13 issue questions provided seven response options ranging from very liberal statements to very conservative statements. (See the appendix for all 7-point scales, as well as all binary-choice issue questions from Studies 1 and 2). To craft these scales, a team of research assistants catalogued the positions of all senators from the 113th Congress on these 13 issues. We measured elite positions in the interest of making scale points “3” and “5” correspond with mainstream Democratic and Republican elite positions. We then composed a point “4” occupying centrist ground for each of the 13 issues.

In Study 3, we relied on survey data using these scales to explore whether citizens would reliably prefer policies more moderate than either party, or whether they tend to support either party’s
positions or even more extreme alternatives. We found that a sizable proportion of individuals support policies less moderate than either party’s typical position.

**Study 3: Immoderate Policy Preferences Are Widespread**

We first explore citizens’ demand for politicians with moderate policy positions by exploring demand for moderate policies via responses to the 7-point policy questions. These responses are shown in Figure 5.

*Figure 5: The full range of public opinion on 13 issues.*

We observe widespread support for the policies championed by the parties-in-government on many issues, as well as for policies less moderate. For example, the Democratic Party appears to represent citizens’ preferences on issues of social welfare and economic fairness: on Medicare,
Social Security, and taxes, a majority of respondents placed themselves at scale points 2 or 3, implying that the party’s delegation to Congress represents citizens well on these issues. By contrast, the Republican Party appears to represent the views of at least a clear plurality of citizens on other issues, namely abortion and the policies regulating labor unions.

At first glance, then, citizens do not appear to be stuck in the middle between the elite parties. The median respondent finds herself between the two parties’ orthodox positions on just 4 of the 13 scales, and such moderate opinions are modal for just two of those policy domains. By contrast, on many issues both parties are too far to the left or too far to the right for most Americans’ tastes. For example, it appears most citizens would be pleased if the range of policies that political elites debated moved to the left on issues like taxes, marijuana, Social Security, and Medicare, while on immigration and abortion citizens appear to think the entire range of elite policy debate is too far to the left. These results suggest a different interpretation of the “disconnect” in representation, which we will return to in the conclusion.

**Study 4: A Revealed Preference for Immoderate Politicians**

Should we believe citizens’ claims that they hold these immoderate views on many issues? There is no doubt some measurement error in citizens’ responses to policy questions; but is there enough that we should disregard their answers to these questions entirely? Reassuringly, leveraging our panel design, we find that these preferences on individual issues are relatively stable over time. As we show in OA section [D.3](#) within issues, respondents are far more likely to select their Wave 1 response than any other option as their Wave 2 policy preference, and deviations tend to be proximate to that prior response. Further, immoderate opinions are at least as stable as more moderate opinions, if not more so.

In Study 4, we put this question to an even more dispositive test through another revealed preference experiment. If citizens’ tendency toward ideological moderation merely reflects the fact that they hold meaningful and immoderate—albeit unconstrained—preferences on distinct
issues, we would expect those distinct preferences to guide their political choices. But if these
immoderate opinions instead reflect a genuine desire for moderate outcomes significantly distorted
by measurement error, then we would expect citizens to prefer bona fide moderates to politicians
who represent these idiosyncratically extreme bundles of positions.

Study 4 presented respondents with such a tailored choice between a “congruent extremist”
and a “genuine moderate” in Wave 2 of our survey. The “congruent extremist” took the three
least moderate positions each respondent reported on the 7-point items in Wave 1. This pattern
of positions is immoderate, albeit in an idiosyncratic way consistent with the respondent. Under
the perspective that citizens generally eschew immoderate views, these are the survey responses
that are the likeliest to represent “mistakes.” The other politician in these match-ups (the “genuine
moderate”) consistently took the centrist (“4”) option on those same issues, and thus was moderate
on issues and ideologically.

Table 5 shows an example. If a citizen gave the series of issue positions shown in Table 5a, she
would be shown the candidate match-up in Table 5b. Figure 6 shows how this match-up appeared
to respondents.

<table>
<thead>
<tr>
<th>Table 5: Example: Study 4 stimulus</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>(a) Example Wave 1 Issue Responses</strong></td>
</tr>
<tr>
<td>Issue 1  2</td>
</tr>
<tr>
<td>Issue 2  4</td>
</tr>
<tr>
<td>Issue 3  5</td>
</tr>
<tr>
<td>Issue 4  7</td>
</tr>
<tr>
<td>Issue 5  3</td>
</tr>
<tr>
<td>Issue 6  3</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>(b) Example Wave 2 Match-Up</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Candidate 1</td>
</tr>
<tr>
<td>Issue 1  2</td>
</tr>
<tr>
<td>Issue 4  7</td>
</tr>
<tr>
<td>Issue 9  1</td>
</tr>
</tbody>
</table>

There are at least two reasons to expect that citizens might tend to choose the genuinely mod-
erate politician. First, consistent with the ideological perspective, citizens might recognize that a consistent moderate is likeliest to embody a moderate ideology. Second, if the ostensibly immoderate issue stances citizens claimed to possess in the first wave were simply artifacts of measurement error, the positions selected for the “congruent extremist” are, by virtue of being the most immoderate stances each citizen took, the most likely to reflect error (as citizens tend to be ideological “moderates”). Cognizant of the potential for measurement error to distort moderate views to look extreme, we thus presented citizens with a clean slate in which they could choose to pick their most erroneous responses again or, potentially, recognize the moderate options that better reflect their views.

The results of this study are the most decisive yet. When presented with a choice between a politician who espouses their own least moderate positions and a politician who is centrist on those
same issues, 74.6% of respondents ($n = 513$) select the politician who mirrors their previously reported immoderate issue views ($p < 0.001$, 95% CI: [68.6%, 80.7%]).\textsuperscript{10} This result is consistent with our suggestion that citizens do not reliably clamor for moderates on every issue.\textsuperscript{11} Rather, consistent with findings from the previous studies, citizens appear to desire politicians who represent their own unique bundle of genuinely held positions, including many that are not moderate.\textsuperscript{12}

**Application: The Donald Trump Candidacy**

An important implication of our argument is that “ideologically moderate” citizens’ preferences on individual issues might not be moderate—and as Study 4 suggests, citizens may genuinely wish to see these immoderate positions represented in elite politics.

The evidence thus far comes from a series of revealed preference experiments asking respondents to choose between two candidates offering varying degrees of ideological and issue representation. These experiments allowed us to evade the problem of observational equivalence between ideological choices and issue-based choices and probe whether citizens would prefer the candidates scholars say they would. However, the experiments’ artificiality also raise potential concerns about external validity, namely whether a real candidate appealing to a mix of extreme views on the left and right could actually gain much support among non-polarized American voters.

The meteoric rise of Donald Trump as a candidate for the Republican Party’s 2016 presidential nomination provided unexpected real-world leverage. Over the course of late 2015, Trump’s policy positions—including mass deportation, a Muslim registry, and the end of birthright citizenship for

\textsuperscript{10}Some empirical work finds that citizens tend to prefer moderate candidates in elections (e.g., Canes-Wrone, Brady and Cogan 2002; Hall 2015), but other studies reach contrary conclusions (e.g., Adams et al. 2013; Hopkins 2014; Stone and Simas 2010). For example, Hopkins (2014) finds that “moderates are in fact less electorally secure than their more ideologically extreme congressional colleagues, and their rate of reelection has declined over time.”

\textsuperscript{11}OA subsection A presents an additional study showing that, when faced with a politician with moderate positions or positions taken by the two parties, only a minority of voters select the consistent moderate.

\textsuperscript{12}The ideological implications of the “immoderate” politician appear not to influence respondents’ choices; we find no difference in respondents’ willingness to support the extreme politician across the extremity of this politician. See OA subsection D.1.
children born to immigrants—led many pundits to conclude that his campaign was giving voice to the extreme “right wing fringe” of the Republican Party (e.g., Coppins 2015). But despite these extreme positions, Trump himself is far more ideologically moderate than any of the other prospective nominees: unlike most party politicians—but like most voters—Trump regularly spurns party orthodoxy and his positions do not hew consistently to a familiar left-right philosophy. We thus used a strategy similar to Study 1A’s to assess whether Trump’s ideological moderation or his extreme issue positions fuel his popular support.

To do so, we surveyed 933 Americans recruited through SSI in October 2015. As in Study 1, we computed a measure of respondents’ latent ideology based on their pattern of responses to a broad-based battery of issue questions. (We folded these ideal point estimates to create a measure of ideological moderation.) We also asked additional questions about two policies where Trump’s positions have departed notably from party orthodoxy: immigration (an issue on which Trump’s position is far to the right of the GOP mainstream) and taxes (where Trump’s position is ambiguous but his rhetoric is to the left of the GOP). We used these three measures—ideological moderation, conservatism on immigration, and conservatism on taxes—to predict respondents’ probability of supporting Donald Trump, measured by asking respondents who they intended to vote for in the 2016 presidential primary.

As the first column of Table shows, Trump is far from the favorite of the extreme ideological right. Indeed, just as Trump is a “moderate,” so too are his supporters: ideological moderation positively predicts support for Trump within parties. Despite this, moderate views on actual issues do not animate Trump’s support. Examining the issues, we find that conservatism on immigration strongly predicts Trump support, while liberalism on taxes does as well. And when we pit these

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13 Using similar methods as those used to scale respondents and candidates in Studies 1-2, CrowdPAC scores Trump as far more moderate than the other Republican candidates.

14 We measured respondents’ positions on taxes via the 7-point scale also used in Study 3 and presented in the Appendix. We measured respondents’ positions on immigration with a battery of ten binary-choice items related to the issue, which we converted to an index (see Appendix).

15 We include indicators for respondent partisanship, a clear confounding variable, in all analyses.
predictors against each other via multiple regression (OLS), we find that the predictive power of ideology washes out—just as it did in Study 1A when we pitted ideology against issue agreement in predicting support for the fictive candidates.

Table 6: Issue Positions, not Ideology, Predict Trump Support

<table>
<thead>
<tr>
<th></th>
<th>DV: Support for Donald Trump</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(1)</td>
</tr>
<tr>
<td>Ideological moderation</td>
<td>0.15**</td>
</tr>
<tr>
<td></td>
<td>(0.07)</td>
</tr>
<tr>
<td>Conservatism on immigration</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Conservatism on taxes</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Republican</td>
<td>0.13***</td>
</tr>
<tr>
<td></td>
<td>(0.04)</td>
</tr>
<tr>
<td>Democrat</td>
<td>-0.18***</td>
</tr>
<tr>
<td></td>
<td>(0.03)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.20</td>
</tr>
<tr>
<td></td>
<td>(0.04)</td>
</tr>
<tr>
<td>Observations</td>
<td></td>
</tr>
</tbody>
</table>

All variables scaled 0-1. Robust standard errors reported in parentheses. * = p < 0.10, ** = p < 0.05, *** = p < 0.01.

Most fundamentally, the fact that Trump and his supporters qualify as moderates on a left-right scale illustrates just how misleading popular definitions of ideological moderation are. It would be facetious to anoint Trump as a moderate who will decrease polarization because of his and his supporters’ positions on ideological scales. But, as a corollary, pundits should not be so quick to assume that existing ideological moderates like Olympia Snowe are particularly well-attuned to general public opinion, either.

Like ideologically moderate voters, ideologically moderate politicians can have wildly differing political views on different issues which may or may not reflect what many Americans want and may or may not be extreme. Ideological moderation simply does not imply much about the representation a politician would provide; and, moderation on issues does not mean a politician would be a close representative of public opinion.
Discussion: A New Perspective on the Representational “Disconnect”

The essence of polarization is the lack of elected officials who have a mix of liberal and conservative positions. Most voters do, and a popular perspective laments this contrast as a clear failure of representation (e.g., Bafumi and Herron 2010; Fiorina and Abrams 2009). This paper raised new questions about two common forms of this lament.

First, according to a common perspective, this contrast implies that the distribution of polarized politicians’ ideological positions fails to mirror the public’s generally moderate ideological preferences in a way that the public would like to see resolved. However, we found that the public appears largely indifferent to ideological representation and does not seem to have a strong desire for ideologically moderate politicians per se. Citizens do appear moderate on ideological scales that attempt to boil down their preferences on many issues into a single score, yet do not seem to place any premium on whether politicians appear this way as well. Specifically, in Study 1 we found that citizens tend to prefer politicians who represent their distinct issue positions rather than their ideological predispositions. In Study 2 we found that this pattern holds even when we encourage citizens to think ideologically in a number of ways—including directly showing citizens politicians’ ideological locations. These studies suggest that increasing politicians’ congruence with citizens’ implied ideological orientations will do little to improve representation in citizens’ eyes in and of itself. Rather, citizens appear to evaluate representation on the basis of individual issues.

It is on individual issues where a second group of scholars see elite polarization as implying a disconnect between extreme politicians and moderate voters (Ellis and Stimson 2012; Fiorina, Abrams and Pope 2005; Fiorina and Abrams 2009). However, surprisingly little data has evaluated the extent of citizens’ support for more moderate policies within areas, rather than assuming that these positions can be inferred from citizens’ ideologies. In Study 3, we found that citizens’
opinions on the issues do not seem reliably more moderate than the parties. Study 4 also indicated that citizens’ demand for politicians who represent these immoderate issue views appears greater than their desire for politicians with centrist positions.

Our findings do not imply the absence of a representational disconnect but rather prompt us to revisit its nature, pointing towards two additional disconnects previous literature does not fully acknowledge.

First, because each citizen prefers a different mix of policies and wants politicians to represent their own personal mix, not just a mix, there is no one mix a politician could adopt that would broadly satisfy all citizens. This suggests inherent difficulties in achieving the robust collective representation American political thought has long valued. John Adams hoped American legislators would look like “in miniature an exact portrait of the people at large.” If nearly all Americans wanted politicians to take a clear set of moderate positions on issues or to position themselves as moderates in an ideological sense, this ideal would be relatively straightforward to achieve. But we have suggested a different portrait of the “disconnect” between elites and citizens in American politics than scholars and observers typically paint. Contrary to the conventional wisdom rooted in the ideological perspective, most citizens do not seem to wish the Senate were composed of 100 Olympia Snowes and Max Baucuses, the noted Senate moderates. But this does not mean that Americans are satisfied with the politicians who represent them either. Unfortunately, because each citizen’s pattern of views across issues appears unique, each citizen is likely to be “disconnected” from the positions their representatives take in his or her own way, a situation which the election of more moderates—or more of any other one particular kind of politician—could not easily resolve (Plott 1967).

Our studies also point towards a second, aggregate disconnect between politicians and voters on issues that politicians could resolve. However, it is not the straightforward portrait of the disconnect that places Democratic politicians to the far left of the public and Republicans to the far right of the public on all issues. Instead, many citizens support policies that seem to fall outside of
the range of policy options considered in elite discourse. However, despite outside-the-mainstream positions comprising modal preferences on some issues—such as the legalization of cannabis or the implementation of more draconian immigration policies—these opinions are often characterized as illegitimate and unworthy of representation, at least at the national level. The normative implications of such a disconnect lie beyond our aims here, but the frustrations of citizens who ardently espouse positions outside of elite debate are easily appreciated. And, importantly, they present a stark contrast to the traditional notion of the disconnect engendered by traditional interpretations of polarization: that citizens yearn for politicians taking moderate positions on every issue.

This revised understanding of the disconnect has important implications for efforts to improve representation. Reforms attempting to elect moderates by giving citizens a stronger voice are increasingly under consideration, predicated on the view that citizens would broadly prefer to be represented by moderates if they had the chance. Scholars have played an important role in judging the success of these reforms (Ahler, Citrin and Lenz 2016; Bullock and Clinton 2011; Kousser, Phillips and Shor 2013; Hall 2014; McGhee et al. 2013). Quite often, the metric scholars use to judge the success of these reforms is whether they decreased polarization. Our data indicates this popular measure is likely to say little about whether representation has improved.

There are certainly many political ills that polarization may cause or exacerbate. Decreasing agreement between parties may create gridlock (Krehbiel 1998) and incentives to tarnish the other party’s reputation may make it even more difficult for new laws to be passed (Lee 2009). Our data says little about these potential consequences. However, it does underscore that the implications of polarization for representation are not always as obvious as they may seem. The precise ways in which polarization degrades representation—not only its antecedents—appear to deserve more careful scrutiny than many realize.
References


Online Appendix

A  Study OA1: Would Citizens Prefer Moderates to Contemporary Party Politicians?

We have argued that the “disconnect” between citizens and representatives does not reflect a wholesale failure of politicians to take moderate positions on issues, as citizens want to see their issue views represented and appear to have many immoderate views on issues. Study 3A was consistent with this notion, as citizens explicitly register such preferences. Here we test another implication of our perspective—that even if candidates with moderate positions were on offer in American politics, most voters would still prefer their copartisan representatives.

In Study OA1, we showed respondents three hypothetical candidates for US House, a “pure Republican,” a “pure moderate,” and a “pure Democrat.” These candidates took positions on three distinct issues. We randomly selected which issues these were, but not the positions themselves: the “pure Democratic” politician consistently took the Democratic party-line position on all issues, the “3” statement on the corresponding 7-point policy scale. The “pure Republican” politician consistently took the Republican party-line position on all issues, or the “5” statement. Finally, the “pure moderate” politician consistently took the centrist position between the two parties, or the “4” on statement. To avoid party effects, we labeled all three candidates with the respondent’s self-professed party label from the previous wave. Table 7 shows an example of how these positions were assigned, and Figure 7 shows how the choice appeared to respondents.

Table 7: Example Matchup Shown to Respondents in Study OA1

<table>
<thead>
<tr>
<th>Party</th>
<th>Candidate 1</th>
<th>Candidate 2</th>
<th>Candidate 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Issue 3</td>
<td>Same as Respondent</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>Issue 5</td>
<td>3</td>
<td>Same as Respondent</td>
<td>4</td>
</tr>
<tr>
<td>Issue 10</td>
<td>3</td>
<td>4</td>
<td>Same as Respondent</td>
</tr>
</tbody>
</table>

Would citizens reliably prefer politicians who take moderate positions over politicians who take the positions contemporary Democrats and Republicans take? These results of Study OA1 imply that the public’s demand for centrists is weaker than many suggest. Just 32.5% of all respondents (n = 513) voted for the consistently centrist candidate. By contrast, the candidate who consistently took Democratic party-line positions won the most votes with 40.3%. The consistently Republican party-line candidate took 27.2%. (As expected, respondents tended to gravitate towards politicians with positions similar to their parties’: a majority (50.7%) of Democratic and Democratic-leaning respondents selected the consistently liberal candidate, and a plurality (38.2%) of Republican and Republican-leaning respondents selected the consistently conservative candidate.)

16We randomly assigned non-leaning independents to see either all Democrats or all Republicans.
The results of Studies 3 and OA1 challenge the notion that an overwhelming majority of Americans would favor a representative with moderate positions over one with the issue positions typically taken by their party. To be clear, these results are consistent with the view that moderate politicians may perform better in elections under certain electoral rules. Some Americans also seem to prefer the positions moderate politicians take on the whole. But, the demand for representatives with moderate positions on issues is nowhere near a majority preference, much less universal.

### B Issue Questions and Policy Scales

#### B.1 Binary-Choice Issue Questions

We asked respondents to indicate whether they agreed or disagreed with each of the following items in Wave 1. (We did this across many screens, with different tasks in between screens, to
Figure 8: Citizens do not Overwhelmingly Choose the Centrist Candidate in Study OA1

prevent respondent fatigue.) In Wave 2, we presented either these statements (or crafted versions, for purposes of making sense as politician statements) or their negations to make the politician profiles.

- I support free trade and oppose special taxes on the import of non-American-made goods.
- There should be strong restrictions on the purchase and possession of guns.
- Implement a universal healthcare program to guarantee coverage to all Americans, regardless of income.
- Laws covering the sale of firearms should be made less strict than they are.
- The US should immediately act to destroy Iran’s nuclear weapons development facilities.
- Grant legal status to all illegal immigrants who have held jobs and paid taxes for at least 3 years, and not been convicted of any felony crimes.
- Increase taxes for those making over $250,000 per year.
- Regulate greenhouse gas emissions by instituting a carbon tax or cap and trade system.
• Allow doctors to prescribe marijuana to patients.

• Require minors to obtain parental consent to receive an abortion.

• The government should provide parents with vouchers to send their children to any school they choose, be it private, public, or religious.

• Same-sex couples should be allowed to marry.

• Legalize the purchase and possession of small amounts of marijuana.

• The US should contribute more funding and troops to UN peacekeeping missions.

• The government should not provide any funding to the arts.

• Allow illegal immigrants brought to the US as children to apply for citizenship.

• Give preference to racial minorities in employment and college admissions in order to correct for past discrimination.

• Let employers and insurers refuse to cover birth control and other health services that violate their religious beliefs.

• Allow more offshore oil drilling.

• By law, abortion should never be permitted.

• I support the death penalty in my state.

• Government spending can stimulate economic growth.

• The federal government should subsidize student loans for low income students.

• The minimum wage employers must pay their workers should be increased.

• The federal government should try to reduce the income differences between rich and poor Americans.

• This country would be better off if we just stayed home and did not concern ourselves with problems in other parts of the world.

• The federal government should do more about protecting the environment and natural resources.
B.2  7-Point Policy Scales

We presented respondents with these scales in Wave 1. Respondents randomly saw the scales ordered either as shown below (1 is most liberal, 7 is most conservative) or in the reverse order to minimize order effects while preserving ordinal scale.

- Marijuana

1. The federal government should legalize marijuana for all uses.
2. The federal government should allow states to individually determine whether to legalize marijuana for both medical and recreational uses.
3. The federal government should allow states to individually determine whether to legalize marijuana for medical uses, but prohibit recreational use of marijuana.
4. The federal government should keep marijuana illegal for all purposes, but decriminalize its use (decrease the severity of punishments).
5. The federal government should keep marijuana illegal for all purposes and/or keep punishments at their current levels.
6. The federal government should impose harsher penalties on those who produce, use or distribute marijuana with measures including lengthy prison terms and mandatory minimum sentences.
7. The federal government should put people in jail for life if they are convicted of using or distributing marijuana.

- Energy/Environment

1. The government should institute a carbon tax or cap and trade system that would significantly decrease US carbon emissions over the next several decades.
2. The government should institute a carbon tax or cap and trade system that would keep US carbon emissions at or just below their current levels.
3. The government should discourage the use of energy sources that contribute most heavily to global warming (e.g., coal) and subsidize the use and development of solar, wind, and nuclear energy. However, there should be no general cap on or market for carbon emissions overall.
4. The government should enact regulations encouraging energy efficiency and subsidize the use and development of solar, wind, and nuclear energy.
5. The government should encourage energy efficiency but not subsidize the development of ‘green’ energy.
6. The government should allow for further oil drilling offshore and/or on federal lands, prioritizing American energy independence and low prices over environmental concerns.
7. The government should both allow AND subsidize increased domestic production of fossil fuels (i.e., coal, oil, and gas).

• Social Security

1. The government should increase social security benefits AND provide new, direct non-cash benefits to seniors such as food aid and in-home care.
2. Social security benefits should be increased.
3. Social security benefits should remain at their current levels.
4. Social security benefits should be tied to the Chained Consumer Price Index, meaning that benefits would rise slower with time than they currently do.
5. Federal spending on social security should decrease, either by raising the retirement age or decreasing cash benefits.
6. Social security should be mostly or wholly privatized, allowing taxpayers to invest their social security savings as they see fit.
7. Social security should be abolished entirely or made semi-voluntary, with the government potentially providing incentives for retirement saving but not managing individuals’ retirement funds.

• Gun Control

1. Sales of firearms of any kind should be completely banned in the United States.
2. Weapons with high-capacity magazines of all kinds should be banned in addition to fully automatic weapons, and those wishing to buy other kinds of guns should always have to pass a background check. Ammunition should be heavily regulated, with certain types (e.g., armor-piercing bullets) banned outright. Additionally, it should be illegal for civilians to carry concealed guns in public.
3. Weapons with high-capacity magazines of all kinds should be banned in addition to fully automatic weapons, and those wishing to buy other kinds of guns should always have to pass a background check. Ammunition should also be heavily regulated, with certain types (e.g., armor-piercing bullets) banned outright.
4. Fully automatic guns like high-powered machine guns should be extremely difficult or illegal for civilians to purchase. Those wishing to buy other kinds of guns should always have to pass a background check, except when buying guns from friends and family.
5. Fully automatic guns like high-powered machine guns should be extremely difficult for civilians to purchase. Other firearms should be free to be bought and sold at gun shows and in other private transactions without restrictions.
6. All Americans should be allowed to buy any kind of gun they want, including automatic guns. No background checks or licenses should be required.
7. Certain Americans who are not in law enforcement (e.g., teachers and school staff) should be REQUIRED to own a gun to protect public safety.

• Health Care

1. The United States should move to a system like Great Britain’s, where the government employs doctors instead of private companies and all Americans are entitled to visit government doctors in government hospitals free of charge.

2. The government should expand Medicare to cover all Americans, directly providing insurance coverage for all Americans free of charge.

3. The government should guarantee full private health insurance coverage to all Americans, regardless of their age or income.

4. The government should help pay for all health care for vulnerable populations like the elderly, children, and those with low incomes. Other Americans should only receive assistance in paying for catastrophic illnesses.

5. The government should help pay for some health coverage for vulnerable populations like the elderly and those with very low incomes, including prescription drugs. However, other individuals should not receive government assistance. The government should primarily pursue market reforms (e.g., tort reform, increasing tax deductions, allowing citizens to buy across state lines) to make insurance more affordable.

6. The government should only help pay for emergency medical care among the elderly and those with very low incomes. Other individuals and any routine care should not be covered. Instead, the government should pursue market reforms to make insurance more affordable.

7. The government should spend no money on health care for individuals. Those who cannot afford health care should turn to their families and private charity for help.

• Immigration

1. The United States should have open borders and allow further immigration on an unlimited basis.

2. Legal immigration to the United States should greatly increase among all immigrant groups, regardless of their skills. Immigrants already in the United States should be put on the path to citizenship.

3. Immigration of highly skilled individuals should greatly increase. Immigration by those without such skills should continue at its current pace, although this immigration should be legalized.

4. Immigration of highly skilled individuals should greatly increase, and immigration among those without such skills should be limited in time and/or magnitude, e.g., through a guest worker program.
5. The United States should admit more highly skilled immigrants and secure the border with increased physical barriers to stem the flow of other immigrants.

6. Only a small number of highly skilled immigrants should be allowed into the United States until the border is fully secured, and all illegal immigrants currently in the US should be deported.

7. Further immigration to the United States should be banned until the border is fully secured, and all illegal immigrants currently in the US should be deported immediately.

• Federal Taxes

1. Establish a maximum annual income, with all income over $1,000,000 per year taxed at a rate of 100%. Decrease federal taxes on the poor and provide more services benefiting the middle class and poor.

2. Increase federal income taxes on those making over $250,000 per year to pre-1990s levels (over 5% above current rates). Use the savings to significantly lower taxes and provide more services to those making less and to invest in infrastructure projects.

3. Increase federal income taxes on those making over $250,000 per year to 1990s rates (5% above current rates). Use the savings to lower taxes and provide more services to those making less while also paying down the national debt.

4. Maintain current levels of federal spending and federal income taxes on the rich, middle class, and poor.

5. Decrease all individuals’ income tax rates, especially high earners who pay the most in taxes now, accomplished by decreasing government services.

6. Move to a completely flat income tax system where all individuals pay the same percentage of their income in taxes, accomplished by decreasing government services.

7. Move to a flat consumption tax where all individuals pay the same percentage of their purchases in taxes, banning the income tax, even if this means the poor pay more in taxes than the rich. Significantly decrease government services in the process.

• Abortion

1. Abortions should always be legal, and the government should pay for all abortions.

2. Abortions should always be legal, and the government should help women pay for abortions when they cannot afford them.

3. Abortions should be legal in the first two trimesters at least, and the government should require private insurers to cover abortions.

4. Abortions should be legal in the first two trimesters, though the government should not play any role in financially supporting abortions.

5. Abortion should only be legal if the life of the mother is in danger or in cases of rape and incest.
6. Abortion should only be legal if the life of the mother is in danger.
7. Abortion should always be illegal.

- Medicare

1. Replace Medicare with government-run hospitals and clinics for the elderly that directly employ doctors, nurses, and surgeons.
2. Increase spending on Medicare, allowing the program to provide even more benefits than it does today, although retain its current structure.
3. Maintain the current annual growth in Medicare spending and all other aspects of the program in their current form.
4. Reduce the rate of growth in Medicare funding over time, though continue to leave the program as structured.
5. Reduce the rate of growth in Medicare funding over time and transition towards a voucher system that helps seniors to buy private insurance instead of directly covering health costs.
6. Significantly reduce funding for Medicare so that it helps seniors only with catastrophic health costs like expensive surgeries, leaving other costs to be paid for by their savings, their families, and private charities.
7. The government should not assist the elderly in paying for any health expenses.

- Gay Rights

1. Same-sex couples should be allowed to marry and adopt children; the government should prosecute companies for firing individuals because they are lesbian or gay; the government should require corporations to offer the same benefits to partners of gay and lesbian employees as they do to straight employees’ partners; and, government should require that all schools teach children about gay and lesbian relationships.
2. Same-sex couples should be allowed to marry and adopt children; the government should prosecute companies for firing individuals because they are lesbian or gay; and, the government should require corporations to offer the same benefits to partners of gay and lesbian employees as they do to straight employees’ partners.
3. Same-sex couples should be allowed to marry and adopt children; and, the government should prosecute companies for firing individuals because they are lesbian or gay.
4. Same-sex couples should be allowed to marry each other and adopt children.
5. Same-sex marriage should not be legal, although the government should not regulate homosexual conduct or ban gays and lesbians from adopting children.
6. Gay sex should be permitted, but same-sex marriage should be illegal and known gays and lesbians should not be allowed to adopt children.
7. Gay sex should be illegal and punishable by imprisonment, similar to the penalties for committing incest and bestiality.

- Unions

1. The government should periodically administer union elections in all workplaces where a union has not been formed.

2. The government should automatically recognize unions in instances when over 50% of a workplace’s employees indicate interest in forming a union.

3. Workers should be allowed to attempt to form unions that charge mandatory dues, by secret ballot. If a company's workers form a union, new employees may be compelled to join.

4. Workers should be allowed to attempt to form unions with voluntary dues and membership. Unions should only be formed through secret ballots. Corporations should not be allowed to fire workers for starting them.

5. Workers should be allowed to attempt to form unions with voluntary dues and membership. Unions should only be formed through secret ballots, and unionized workplaces must hold recertification elections regularly. Corporations should not be allowed to fire workers for starting them.

6. Workers should be allowed to attempt to form unions with voluntary dues, but corporations should have the right to fire workers for attempting to start such unions and/or the power of the National Labor Relations Board to issue directives to unionized companies should be significantly curtailed.

7. Workers should not be allowed to form unions, just as corporations are not allowed to form cartels.

- Birth Control

1. The government should help pay for birth control pills for all women AND other forms of contraceptives for women who cannot afford them.

2. The sale of birth control pills should be allowed. Pharmacists should be required to sell them and the government should cover their cost.

3. The sale of birth control pills should be allowed. Pharmacists should be required to sell them and insurance companies should be forced to cover their cost.

4. The sale of birth control pills should be allowed and pharmacists should not be allowed to refuse selling birth control pills. However, employers and insurance companies may decline to cover birth control.

5. The sale of birth control pills should be allowed to people of all ages. However, insurance companies, pharmacists, and employers should be allowed to refuse selling or covering birth control.
6. The sale of birth control pills should be allowed, but only to women over 18 years of age. Insurance companies, pharmacists, and employers should be allowed to refuse selling or covering birth control.

7. Birth control pills should be banned.

- Public Funding for Private Education

   1. All children should attend public schools. Private schools perpetuate economic inequality and should be banned.
   2. Private schools should be legal but the government should play no role in funding private education – for example, private schools should not be exempt from taxes.
   3. Private schools should be legal and retain tax exempt status, but government should play no active role in funding private education.
   4. The government should create private school voucher programs in school districts where regular public schools are failing so all families in such areas can send their children to a private school if they wish.
   5. The government should create a voucher program in all school districts, paying private school tuition for families so that they always have the choice to send their children to private schools.
   6. The education system should be fully privatized, although the government should still provide support for private school tuition.
   7. The education system should be fully privatized, with government playing no role in paying for families’ education expenses. However, private school tuition should be tax deductible.

B.3 Constructing Ideologically Incorrect and Ideologically Correct Candidates

We use mean squared distance as a measure of proximity between “politicians” and respondents. By the ideological perspective, the citizen should be quite satisfied with this politician despite having taken issue positions entirely at odds in the previous wave. In pseudo-code, the procedure for finding the ‘ideology-only agreement’ candidate is as follows:

```python
for voter in all.voters:
    for candidate in all.possible.candidates:
        if issue.agreement.proportion(voter, candidate) == 0:
            ideal.points <- scale([all.voters, candidate])
        else:
            pass
```
We then constructed an “ideologically incorrect” politician who took positions in concordance with each of the respondent’s previously stated issue preferences but who was the most likely to be ideologically inferior to the “ideologically correct” politician of all such politicians, with ideological proximity again being assessed by IRT. To construct the “ideologically incorrect” politicians, we took a similar approach to the one described in Footnote ??.

In pseudo-code, the procedure for finding these “issue-only agreement” candidates is as follows:

```plaintext
for voter in all.voters:
    for candidate in all.possible.candidates:
        if issue.agreement.proportion(voter, candidate) == 1:
            ideal.points <- scale([all.voters, candidate])
        else:
            pass
    candidate.shown[voter] <- which(max(ideological.distance))
```

C Weak Correlations Between Issue Positions in the Mass Public

As Figure 10 shows, correlations between 2012 American National Election Study respondents’ reported preferences on abortion, environmentalism, and social spending are quite weak; most citizens express conservative views on some issues and liberal views on others.

C.1 Sample Demographics

Table SI-1 compares the demographics of the SSI sample used in this study to a probability sample of U.S. citizens (the 2012 American National Election Study [ANES]) as well as to Census data.
Figure 9: Constructing the Tradeoff in Study 1B

(a) Process for selecting each respondent’s “ideologically correct” choice

For each voter $i$...

All $n$ possible candidates with 4 issue positions who disagree with Voter $i$ on every issue

For each candidate $j$, IRT:

For all posterior draws $1 \ldots k$:

\[
E_k | \theta_{C_{i,k}} - \theta_{V_{i,k}} |^2
\]

Pick $j$ that minimizes MSD

Candidate minimizing MSD assigned as $C_{\text{Spatially Correct},i}$

(b) Process for selecting each respondent’s “ideologically incorrect” choice

For each voter $i$...

All $n$ possible candidates with 4 issue positions who agree with Voter $i$ on every issue

For each candidate $j$, IRT:

For all posterior draws $1 \ldots k$:

\[
E_k | \theta_{C_{i,k}} - \theta_{V_{i,k}} |^2
\]

Pick $j$ to max $\Pr(\theta_{C_{i,k}} - \theta_{V_{i,k}} > |\theta_{C_{\text{Spatially Correct},i,k}} - \theta_{V_{i,k}}|)$

Candidate most likely to be inferior assigned as $C_{\text{Spatially Incorrect},i}$

(c) Example of the tradeoff respondents faced

NOTE: The distribution of respondents’ estimated ideal points is shown by the black density curve. One actual respondent’s ideal point shown in blue. “Ideologically correct” politician (chosen by 31.1% of respondents) shown in green. “Ideologically incorrect” politician (chosen by 69.9% of respondents) shown in red.
Figure 10: 2012 ANES Scale Responses Across Policy Areas Correlate Only Weakly
Table 8: Raw and Unweighted SSI Sample Compared to ANES and Census Data

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
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</thead>
<tbody>
<tr>
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<td>w/ survey weights</td>
<td>probability</td>
<td>weighted prob.</td>
<td>population</td>
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<td>7.3%</td>
<td>0.6%</td>
<td>1.4%</td>
<td>9.2%</td>
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<td>25-34</td>
<td>21.0%</td>
<td>19.6%</td>
<td>3.9%</td>
<td>9.4%</td>
<td>17.5%</td>
</tr>
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<td>35-49</td>
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<td>26.9%</td>
<td>16.6%</td>
<td>27.3%</td>
<td>27.2%</td>
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<td>50-64</td>
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<td>26.6%</td>
<td>49.1%</td>
<td>40.3%</td>
<td>17.9%</td>
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<td>17.2%</td>
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<td></td>
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<td>Male</td>
<td>47.6%</td>
<td>55.6%</td>
<td>61.2%</td>
<td>57.7%</td>
<td>49.1%</td>
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<td>Female</td>
<td>52.4%</td>
<td>44.4%</td>
<td>38.8%</td>
<td>42.4%</td>
<td>50.9%</td>
</tr>
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<td>Race/Ethnicity</td>
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<td></td>
<td></td>
<td></td>
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<td>Non-Hispanic White/Caucasian</td>
<td>41.6%</td>
<td>59.7%</td>
<td>83.3%</td>
<td>83.0%</td>
<td>63.7%</td>
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<tr>
<td>Black/African-American</td>
<td>30.5%</td>
<td>13.9%</td>
<td>4.9%</td>
<td>4.9%</td>
<td>12.2%</td>
</tr>
<tr>
<td>Asian/PI</td>
<td>11.7%</td>
<td>4.9%</td>
<td>1.0%</td>
<td>2.0%</td>
<td>4.8%</td>
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<tr>
<td>Hispanic/Latino</td>
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<td>17.3%</td>
<td>4.6%</td>
<td>4.0%</td>
<td>16.4%</td>
</tr>
<tr>
<td>Native American</td>
<td>1.8%</td>
<td>0.3%</td>
<td>0.9%</td>
<td>0.7%</td>
<td>1.1%</td>
</tr>
<tr>
<td>Other</td>
<td>1.4%</td>
<td>3.9%</td>
<td>5.3%</td>
<td>5.4%</td>
<td>6.2%</td>
</tr>
<tr>
<td>Education</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than HS degree</td>
<td>1.2%</td>
<td>3.8%</td>
<td>0.5%</td>
<td>2.6%</td>
<td>8.9%</td>
</tr>
<tr>
<td>High school/GED</td>
<td>18.6%</td>
<td>37.2%</td>
<td>7.8%</td>
<td>9.9%</td>
<td>31.0%</td>
</tr>
<tr>
<td>Some college/2-year degree</td>
<td>39.8%</td>
<td>25.2%</td>
<td>33.2%</td>
<td>33.7%</td>
<td>28.0%</td>
</tr>
<tr>
<td>4-year college degree</td>
<td>25.1%</td>
<td>22.7%</td>
<td>31.3%</td>
<td>29.6%</td>
<td>18.0%</td>
</tr>
<tr>
<td>Graduate/professional degree</td>
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<td>11.0%</td>
<td>27.2%</td>
<td>24.3%</td>
<td>9.3%</td>
</tr>
<tr>
<td>Party Identification</td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Democratic (inc. leaners)</td>
<td>55.3%</td>
<td>47.3%</td>
<td>46.9%</td>
<td>49.0%</td>
<td></td>
</tr>
<tr>
<td>Republican (inc. leaners)</td>
<td>27.4%</td>
<td>39.9%</td>
<td>41.9%</td>
<td>39.0%</td>
<td></td>
</tr>
<tr>
<td>No party preference/Other</td>
<td>17.3%</td>
<td>12.8%</td>
<td>11.3%</td>
<td>11.9%</td>
<td></td>
</tr>
<tr>
<td>Ideology</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Liberal (inc. leaners)</td>
<td>34.4%</td>
<td>25.2%</td>
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<tr>
<td>Moderate</td>
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<td>15.5%</td>
<td>18.9%</td>
<td></td>
</tr>
<tr>
<td>Conservative (inc. leaners)</td>
<td>26.8%</td>
<td>34.5%</td>
<td>45.0%</td>
<td>42.3%</td>
<td></td>
</tr>
</tbody>
</table>
D Supporting Information for Study 2

D.1 Study 2A: No Order Effects for Vote Choice and Spatial Perception Items

In Study 2A we find that participants’ ideological perceptions of the hypothetical politicians correlate positively and significantly with the actual estimated ideal points for these hypothetical politicians. We further find that this trend holds when we fold both measures, implying that citizens do have some sense of how positions fit together in terms of elite ideology. However, we asked some participants for their ideological perceptions of these politicians before they voted while we asked others to do so after. Here, we show that there are no significant differences in the groups’ predictive abilities based on whether they voted first or reported perceptions first.

In particular, if there was an order effect, we would expect to see a significant coefficient associated with the interaction between question order and estimated ideal point when we regress ideological perceptions on these two variables plus their interaction. As the table below shows, we fail to observe such a coefficient, either in the analysis of perceived ideology or implied perceived extremity (folded perceptions).

<table>
<thead>
<tr>
<th></th>
<th>DV: Perceived Ideology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated politician ideology</td>
<td>0.92***</td>
</tr>
<tr>
<td></td>
<td>(0.13)</td>
</tr>
<tr>
<td>Order: Vote First</td>
<td>0.09</td>
</tr>
<tr>
<td></td>
<td>(0.11)</td>
</tr>
<tr>
<td>Order x Estimated Ideology</td>
<td>-0.13</td>
</tr>
<tr>
<td></td>
<td>(0.16)</td>
</tr>
<tr>
<td>Constant</td>
<td>3.66***</td>
</tr>
<tr>
<td></td>
<td>(0.09)</td>
</tr>
<tr>
<td>R²</td>
<td>0.15</td>
</tr>
<tr>
<td>SER</td>
<td>1.68</td>
</tr>
<tr>
<td>Respondent-politician Pairs</td>
<td>772</td>
</tr>
</tbody>
</table>

Table 9: Can Citizens Infer Ideology from Issue Positions?

Robust standard errors, clustered at the respondent level, reported in parentheses. * = p < 0.10, ** = p < 0.05, *** = p < 0.01.

Note that the apparent positive correlation between perceived extremity and estimated extremity falls out of conventional ranges of statistical significance, but also that this is because the standard error rises (compared to Table 3 in the paper) because we are effectively cutting the data in half by estimating the correlation separately for the two groups (those who voted first and those who reported perceptions first). The strength of the correlation is largely unchanged.
D.1.1 Study 2A: Ideological Perceptions of “Spatially Correct” and “Spatially Incorrect” politicians

To further demonstrate that the apparent correlation between respondents’ ideological perceptions of the hypothetical politicians and those politicians’ estimated ideal points is robust, we show that the correlation appears for both “spatially correct” and “spatially incorrect” politicians separately.

Table 10: Can Citizens Infer Ideology from Issue Positions? (“Spatially Correct” Politicians Only)

<table>
<thead>
<tr>
<th></th>
<th>DV: Perceived Ideology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated politician ideology</td>
<td>0.95***</td>
</tr>
<tr>
<td></td>
<td>(0.14)</td>
</tr>
<tr>
<td>Constant</td>
<td>3.63***</td>
</tr>
<tr>
<td></td>
<td>(0.09)</td>
</tr>
<tr>
<td>$R^2$</td>
<td>0.11</td>
</tr>
<tr>
<td>SER</td>
<td>1.71</td>
</tr>
<tr>
<td>Respondents</td>
<td>386</td>
</tr>
</tbody>
</table>

Robust standard errors reported in parentheses. * = $p < 0.10$, ** = $p < 0.05$, *** = $p < 0.01$.

Table 11: Can Citizens Infer Ideology from Issue Positions? (“Spatially Incorrect” Politicians Only)

<table>
<thead>
<tr>
<th></th>
<th>DV: Perceived Ideology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated politician ideology</td>
<td>0.76***</td>
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<tr>
<td></td>
<td>(0.08)</td>
</tr>
<tr>
<td>Constant</td>
<td>3.83***</td>
</tr>
<tr>
<td></td>
<td>(0.09)</td>
</tr>
<tr>
<td>$R^2$</td>
<td>0.17</td>
</tr>
<tr>
<td>SER</td>
<td>1.65</td>
</tr>
<tr>
<td>Respondents</td>
<td>386</td>
</tr>
</tbody>
</table>

Robust standard errors reported in parentheses. * = $p < 0.10$, ** = $p < 0.05$, *** = $p < 0.01$. 51
D.2 Study 3

D.2.1 Study 3: Distribution of Opinion Across All 7-Point Policy Scales

See the appendix in the paper for the corresponding policy positions.

Table 12: Opinion is Dispersed and Not Always Moderate in Central Tendency

<table>
<thead>
<tr>
<th>Issue</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marijuana</td>
<td>26.7%</td>
<td>23.2%</td>
<td>18.7%</td>
<td>6.7%</td>
<td>4.1%</td>
<td>9.8%</td>
<td>10.9%</td>
</tr>
<tr>
<td>Energy/Environment</td>
<td>16.0%</td>
<td>6.8%</td>
<td>7.4%</td>
<td>26.8%</td>
<td>15.3%</td>
<td>14.1%</td>
<td>13.6%</td>
</tr>
<tr>
<td>Social Security</td>
<td>23.4%</td>
<td>36.8%</td>
<td>16.1%</td>
<td>5.3%</td>
<td>7.0%</td>
<td>9.8%</td>
<td>1.5%</td>
</tr>
<tr>
<td>Gun Control</td>
<td>4.0%</td>
<td>21.2%</td>
<td>22.8%</td>
<td>20.5%</td>
<td>17.2%</td>
<td>7.9%</td>
<td>6.4%</td>
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<tr>
<td>Health Care</td>
<td>17.5%</td>
<td>6.6%</td>
<td>19.4%</td>
<td>17.22%</td>
<td>21.7%</td>
<td>10.3%</td>
<td>7.3%</td>
</tr>
<tr>
<td>Immigration</td>
<td>4.7%</td>
<td>17.4%</td>
<td>10.8%</td>
<td>12.0%</td>
<td>17.0%</td>
<td>13.8%</td>
<td>24.4%</td>
</tr>
<tr>
<td>Taxes</td>
<td>11.7%</td>
<td>26.22%</td>
<td>28.6%</td>
<td>10.9%</td>
<td>1.4%</td>
<td>13.3%</td>
<td>7.9%</td>
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<tr>
<td>Abortion</td>
<td>1.0%</td>
<td>9.8%</td>
<td>9.2%</td>
<td>19.4%</td>
<td>30.4%</td>
<td>13.1%</td>
<td>17.1%</td>
</tr>
<tr>
<td>Medicare</td>
<td>14.7%</td>
<td>32.7%</td>
<td>30.3%</td>
<td>9.6%</td>
<td>8.7%</td>
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D.3 Study 3

D.3.1 Relative Stability of Policy Preferences Across Waves

Should we believe citizens’ claims that they have these immoderate views on many issues? There is no doubt some measurement error in citizens’ responses to policy questions; but is there enough that we should disregard their answers to these questions entirely? Reassuringly, we find that these preferences on individual issues are relatively stable over time. The panel data we collected allows us to explore whether these views reflect mistaken measurement, as we can examine whether citizens take the same position again two months later. At the end of Wave 2, we asked respondents a random subset of the 7-point policy questions from Wave 1. As Figure 9 shows, citizens who express views outside the elite mainstream on an issue also tend to do so again two months later. Within issues, respondents are far more likely to select their Wave 1 response as their preference than any other option in Wave 2, and deviations tend to be proximate to that prior response. Furthermore, immoderate opinions are at least as stable as more moderate opinions, if not more so. We thus find it difficult to chalk immoderate attitudes up to measurement error. (Study 4 considers this possibility in more detail.)

The panel data we collected allows us to explore whether these views reflect mistaken measurement, as we can examine whether citizens take the same position again two months later. At the end of Wave 2, we asked respondents a random subset of the 7-point policy questions from Wave 1. As Figure 11 shows, citizens who express views outside the elite mainstream on an issue also tend to do so again two months later. We thus find it difficult to chalk immoderate attitudes up to measurement error. (Study 4 considers this possibility in more detail.)

Figure 11: Intertemporal Stability Within Issues
Moreover, as Figure 12 shows, the correlations between Wave 1 and Wave 2 responses are considerably stronger within issue domains than across issue domains. If citizens merely answer survey questions by attempting to apply their overall ideology, we should not see this pattern. Instead, we find evidence that these policy preferences are both genuine and unique to their issue domains, and thus not mere reflections of citizens’ ideologies; there are clearly attitudes respondents rely on specific to each issue.
Figure 12: Intertemporal Stability Within Issues but not Across Issues

Notes: Each subgraph depicts responses on a first issue during the first survey wave on the x-axis and responses on a second issue a month later on the y-axis. Raw data is plotted with jitter given the categorical nature of the variables. Red lines depict the loess smoothed relationship between the responses. Polychoric correlations are shown above each graph. Issue names for the x- and y-axes of each graph are shown, respectively, along the top and left of the figure.
D.4 Study 4

D.4.1 Study 4A: Extremity of the Extreme Politician Fails to Affect Choices

In Study 4A, we asked respondents to choose between two tailored politicians: one who took the four most immoderate positions they expressed in Wave 1, and one who took the moderate positions on those issues. As the figure below shows, the ideological implications of the “immoderate” politician appears not to influence respondents’ choices. Since just 6.8% of respondents took four or more outside-the-mainstream positions and roughly 30% took none at all, we observe variation in the overall extremity of the “extreme” politician. However, we find no difference in respondents’ willingness to support the extreme politician across the extremity of this politician.

Figure 13: Choice of Extreme Politician, by Extremity of Extreme Politician