Reducing Affective Partisan Polarization:

Warm Group Relations or Policy Compromise?

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ABSTRACT

Hostility between rival political partisans, referred to as affective partisan polarization, has increased substantially in the United States over the last several decades. The current study contributes to that line of research by testing between two rival explanations for the mitigation (and origins) of affective polarization: an *issue-based model*, in which partisan dislike is driven by increased ideological differences between rival partisans; and a *group-based* grounded in social identity theory, in which partisan dislike is fueled by growing social dissimilarity and consequent disrespect across partisan lines. In two online experimental studies, respondents read a mock news story about an observed interaction between Chuck Schumer, Senate minority leader, and Mitch McConnell, Senate majority leader. The leaders interacted in a warm or hostile manner (as a test of the social relations hypothesis), and independently compromised or did not compromise on immigration matters (as a test of the issue compromise hypothesis). A total of 937 partisans participated in the two studies. In both studies warm contact between leaders improved ratings of the outparty, and thus decreasing affective polarization. In contract, issue compromise had no effect on outparty ratings and did not reduce affective polarization. We consider the implications of these findings for the study of affective polarization and its likely future trajectory.

Hostility between rival political partisans has increased substantially in the United States over the last several decades. Democrats and Republicans now hold a more negative view of their partisan rivals than they did 50 years ago as manifested in colder feelings, more negative trait attributions, and greater social distance (e.g., Iyengar, Sood, and Lelkes 2012; Webster and Abramowitz 2017; Iyengar and Krupenkin 2018; Mason 2018; Iyengar et al. 2019). This growing hostility toward rival partisans has been referred to as affective partisan polarization or just affective polarization.[1] Not surprisingly, affective polarization among the public is a focus of keen research interest because of its various negative consequences, including uncivil online discourse, fewer social interactions between rival partisans, and a hardening of party lines that reduces the opportunity for dispassionate cross-partisan discussion (e.g., Hetherington and Rudolph 2015; Huber and Malhotra 2017; Lelkes and Westwood 2017; Levendusky 2018; Settle and Carlson 2019; Iyengar et al. 2019). In tandem, research is underway on factors that mitigate partisan hostility, decrease partisan defensiveness, and foster open political dialogue. The current study contributes to that line of research by testing between two rival explanations for the mitigation (and origins) of affective polarization.

Policy & Group-Based Models of Affective Polarization

To identify factors that might decrease affective polarization, it is important to understand its origins. Since first documented by Iyengar and colleagues (2012), numerous explanations have been advanced for the emergence and intensification of affective polarization which can be classified into two broad categories. First, several researchers point to growing ideological divergence among elites and possibly the public on a range of policy views. According to the *policy-based model*, partisans' ideological stances and policy preferences have

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[1] Affective partisan polarization is defined and measured in slightly different ways including as negative affect and hostility toward the opposition (e.g., Levendusky and Malhotra 2016), the *difference* in affect toward co-partisans and out-partisans (e.g., Iyengar and Westwood 2015), or both (e.g., Iyengar et al. 2019). We treat affective partisan polarization as hostility toward the opposition because increased polarization over the last decades is almost entirely due to increased hostility toward the out-party (e.g., Webster and Abramowitz 2017; Iyengar et al. 2019). As a short-hand, we refer to affective partisan polarization as affective polarization throughout this manuscript.

become more consistent and coherent over the last several decades, generating affective

polarization (e.g., Bougher 2017; Webster and Abramowitz 2017; see also Orr and Huber 2018).

Rogowski and Sutherland (2016) argue that increased ideological differences between rival

politicians increases affective polarization because it increases partisans' "psychological

investment in the choice between candidates" (p. 489).

Second, other researchers point to increased social and group- based differentiation

between followers of the two major parties as a major cause of affective polarization. According

to the *group-based model* (Green, Palmquist, and Schickler 2002; Huddy, Mason, and Aarøe

2015)grounded in social identity theory (Tajfel 1981), affective polarization is not due to policy

disagreements between rival partisans, but rather a consequence of Democrats and Republicans

becoming more socially dissimilar along lines of race, religion, and gender. This shift is linked to

changes in party platforms but affective hostility towards the outparty is intensified by

differences that extend beyond politics to include lifestyle, non-political values, and behavior. As

an outcome of social partisan sorting, Democrats have become increasingly black, Latino, Asian,

and secular whereas Republicans are increasingly white and religious (Mason 2016). Partisans are

now more distinct from each other demographically than in the past, with fewer cross-cutting

identities to stabilize inter-party relations (Mason 2016; Mason 2018; Mason and Wronski 2018).

Growing partisan social partisan dissimilarity has exacerbated an "us versus them" mentality

resulting in greater negative affect toward partisan rivals (Mason 2015; Mason 2018; see also

Ahler 2018; Ahler and Sood 2018). This rivalry may be even further intensified by the growing

competitiveness between parties in Congressional elections since the early 1980s (Lee 2016).

The jury is still out on which of these two models best accounts for affective

polarization. Numerous empirical investigations have examined the factors that promote

polarization but studies do not always cleanly compare the two major classes of models. For

example, exposure to partisan media has been found to drive affective polarization. But media

exposure contains examples of partisan incivility and partisan hostility in tandem with

information about partisan ideology (Levendusky and Malhotra 2016). Partisan media exposure could therefore enhance partisan ideological differences that move someone closer to their party and further from the other party on major issues or it might underscore partisan enmity and conflict independently of ideology (e.g., Levendusky 2013; Garrett et al. 2014; Lau et al. 2017).[2] Similarly, the documented effect of negative political campaigns on heightened affective polarization (e.g., Iyengar, Sood, and Lelkes 2012; Sood and Iyengar 2016; cf. Ridout et al. 2018) could be caused by an emphasis on partisan policy differences in negative ads or defamatory comments about rival partisans.

We believe it is fruitful to contrast policy and group-based models as causes and, perhaps just as importantly, potential solutions to the reduction of affective polarization. Undoubtedly, it is difficult to separate policy and group factors in cross-sectional data (see Orr and Huber 2018). But the two models suggest different routes to the amelioration of affective polarization and point to different factors that might promote partisan amity. For example, if an us-them mentality drives affective polarization, civility and warmth among rival partisans may be more important than ideology in reducing hostility. Partisan leaders are especially influential in conveying warmth or hostility across party lines. As Arceneaux and Vander Wielen (2017) note "the rise in partisan incivility tracks with increasing levels of polarization in Congress." If affective polarization is driven by ideological differences, however, the parties may need to moderate their ideology and exhibit greater policy compromise before partisan hostilities subside.

Reducing Affective Polarization

To date, most studies have focused on the causes of affective polarization. Nonetheless, there is a small but growing literature on its reduction. As with research on the causes of polarization, however, most studies do not cleanly test between a policy and group-based model of affective polarization. Consider Levendusky and Malhotra's (2016) study on the effects of

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[2] The same can be said about the effect of an increased access to high-speed internet (Lelkes, Sood, and Iyengar 2017).

media attention to partisan polarization. In their research, affective polarization is reduced when respondents read an article in which the public is portrayed as politically moderate. The problem, however, is that the moderate condition conveys information about both moderate issue positions and warm partisan social relations. Similarly, Ahler and Sood (2018) find reduced dislike of the outparty by correcting common misperceptions about the degree to which the outparty is socially sorted (e.g., older people, southerners, evangelicals, and high income make up less of the Republican Party than Americans imagine; ditto for the percent of blacks, LGB, atheists, and union members in the Democratic Party). Yet as they show, this information conveys both social and issue-based information, the perception that the parties hold extreme policy views. In other words, learning that the other political party is more socially diverse than expected might reduce partisan animosity because outpartisans is are seen as more similar socially or because they are seen to hold more palatable policy views.

Other studies on the reduction of affective polarization have similar problems in distinguishing between the effectiveness of social or issue information. For example, priming American identity reduces Americans' hostility toward out-partisans (Levendusky 2018). But this might occur because priming national identity makes salient issues on which Americans agree such as airport security or national defense. Or it could lead Americans to feel closer and like their fellow nationals more when compared to foreigners by increasing the salience of national boundaries.[3]

Research by Druckman and colleagues (2018) stands out as one of the few studies to demonstrate that polarization can be reduced through the manipulation of warm social cues independently of issue information. In their research, issue content in a news segment was held reasonably constant by focusing on coverage of a single issue: Republican efforts to revive the Keystone XL and Dakota Access Pipelines. Respondents were randomly assigned to a news

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[3] Although it is hard to believe that the effect of Americans' winning gold medals in the Olympics on affective polarization (see Levendusky 2018, 60) is related to issues.

segments that varied in the civility expressed toward the outparty that was aired on an in or outparty news source (FOX or MSNBC). Civility towards one's own party from an outparty source reduced polarization whereas incivility increased it, suggesting that positive social relations between parties can reduce polarization regardless of partisan differences on a policy issue.[4] This finding underscores the need to investigate more fully the effects of partisan ideological compromise and warm social relations on the reduction of affective polarization.

<u>Partisan Social Relations</u>

In the current study, we contrast policy and group-based models of affective polarization to better understand factors that ameliorate partisan hostility. We turn first to the group-based model. Once someone identifies with a group or political party, they are motivated "to differentiate their own groups positively from others to achieve a positive social identity" (Turner et al., 1987; p. 42). This leads to ingroup bias or in the case of political parties, a preference for the inparty over the outparty. Typically, ingroup biases reflect a mild preference for one's own group over another (Huddy 2013). Intergroup hostility such as affective polarization emerges, however, when one group threatens the other's status or positive distinctiveness. In the context of politics, elections pose this kind of threat to group members (Huddy, Mason, and Aarøe 2015). A party's positive status is additionally threatened by insults, invectives, and uncivil behavior from outpartisans, an increasingly common feature of American politics (Wolf et al 2012).

Leaders play an especially important role in creating group norms, defining the meaning of group membership, and setting the tone of interparty relations (Hogg and van Knippenberg 2003; Hogg et al 2012). According to Hogg and Reid (2006), group leaders are identity entrepreneurs who define the group through their verbal and nonverbal communication. Hogg and colleagues (2012; Rast, Hoogg, and van Knippenberg 2018; Hogg 2015) have recently

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[4] Unfortunately, the Druckman et al (2018) study lacks a control condition to determine status quo levels of polarization. There is also some evidence in this study that inparty incivility reduces affective polarization.
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extended the influence of group leaders to include the creation of relational identities. Through both their rhetoric and the tenor of their relations with outgroup leaders, ingroup leaders can establish positive (and presumably worsen negative) relations with a potentially hostile outgroup. A leader's creation of a positive relational identity between groups in conflict has been shown to reduce intergroup animosity among ingroup members (Rast et al 2018). Outgroup leaders also contribute to the nature of relational identities by sending warm, friendly or negative, threatening signals about the nature of intergroup relations.

In the context of affective polarization, Hogg and colleagues' research suggests that partisan leaders can improve or worsen partisan animosity. Negative rhetoric, insults, threats, and hostile actions between a leader of one party and the leader of another should exacerbate affective polarization. In contrast, polite rhetoric and warm relations between leaders of the major parties should reduce affective polarization. To generalize to the outparty, Hogg and colleagues (2012) argue that positive interactions between party leaders must involve positive interaction between two leaders seen to be acting on behalf of their party. In that sense, the creation of positive relations between leaders is a form of extended contact by which party followers develop warmer feelings towards an outparty because they witness warm relations among party leaders who are seen as "good representatives (prototypes) for their respective groups" (Mazziotta, Mummendey, and Wright 2011, p. 268; Wright et al. 1997; see also Cairns 2013)

Partisan Issue Compromise

The policy model of affective polarization implies that ideological conflict is responsible for increasing affective polarization. There is some disagreement over the degree to which partisans have polarized over policy issues (Fiorina et al 2011). Nonetheless, there is evidence that partisans have become more internally aligned and coherent on several key policies, such as welfare, which has resulted in greater (or clearer) perceived ideological differences with the outparty. This has, in turn, increased hostility and negative affect toward partisan rivals, who are

perceived as supporting extreme and dangerous policies that are "very harmful to the overall well-being of the nation" (Webster and Abramowitz 2017, 627; see also Abramowitz and Saunders 2008; Bafumi and Shapiro 2009). As Klar and Krupnikov (2016) demonstrate, there has been an increase in recent years in the number of newspaper stories conveying information about party differences on a broad range of issues.

From this policy-based vantage point, outparty animosity arises because party followers assume their beliefs differ broadly from those of outpartisans. Bougher (2017) finds, for example, that partisan issue alignment (holding the same position as one's party on six key issues) has increased over time in the ANES and that, moreover, it helps to explain affective polarization. There is related evidence that describing candidates as more ideologically divergent increases affective polarization because it enhances voters' "psychological investment in the choice between candidates" on both sides of the political aisle (Rogowski and Sutherland 2016, 489). In a similar vein, Lelkes (2019) finds that ratings of a hypothetical candidate are driven more strongly by information about the ideological extremity of his views than his in or outparty affiliation. status. is rated more negatively if he holds divergent ideological stances regardless of his political party affiliation.

If partisan policy differences drive affective polarization, policy compromise should reduce affective polarization. Partisan animosity should decrease when the outparty abandons their more extreme policy position for one closer to that of the inparty or one's own position on the issues. This is consistent with the study discussed earlier by Levendusky and Malhotra (2016) in which they reduced affective polarization by describing outpartisans as more politically moderate. From our perspective, leaders should also be most effective in conveying information about the party's ideological position. Party leaders craft and enact legislation and are thus far more in control of the party's issue agenda. In addition, Druckman and Levendusky (2019) find that affective polarization is far more likely to be directed at party elites than everyday partisans.

For these reasons we contrast the group and policy-based models by examining the effects of policy compromise and warm social relations between party leaders.

As an aside, we examine separately the effects of our manipulations on ingroup and outgroup affect for several reasons. First, there is ample evidence that increased affective polarization is confined to negative outparty ratings. There has been far less change over time in ratings of one's inparty (Iyengar, Sood, and Lelkes 2012). Second, there are good theoretical and empirical reasons, to assume that inparty ratings are more stable than outparty ratings (Bougher 2017; Brewer 2001). This asymmetry arises, in part, because outgroup negativity is a function of intergroup threat, a dynamic factor that varies over time and across situations and has the potential to transform mild ingroup bias into heated intergroup conflict (Brewer 2001; Huddy 2013).

Hypotheses

We contrast the effects of positive partisan relations and partisan policy compromise on a reduction in affective polarization. We test two key hypotheses. The *social warmth* hypothesis posits that warm relations between partisan leaders will reduce affective polarization. The *issue compromise* hypothesis predicts that compromise on the issues, especially by an outparty leader, will reduce polarization. Our design maximizes the ability to contrast the group and policy-based models of affective polarization by independently manipulating social warmth and issue compromise.

To test our hypotheses, we ran two online experimental studies using the Qualtrics.com online survey platform. Both studies involved a mock news article concerning an observed interaction between Chuck Schumer, Senate minority leader, and Mitch McConnell, Senate majority leader. A total of 937 partisans participated in the studies.[5] In Study 1, the effects of positive and negative social contact were varied independently from issue compromise or its absence. Both factors included control conditions in which there was no reference to either

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[5] All studies have been approved by the IRB at the first author's university.

social relations or compromise. In Study 2, the control condition for social relations was dropped and added conditions included to differentiate in from outparty issue compromise.

Study 1

<u>Sample</u>

Respondents were recruited from Amazon.com's Mechanical Turk (MTurk) and paid $1.25 for completing the survey. All respondents were partisans; pure independents were screened out of the survey. We set quotas for roughly equal numbers of Republicans and Democrats and obtained complete responses from 307 respondents. 17 were dropped to result in a final sample of 290 respondents (135 Republicans and 155 Democrats).[6] The sample was reasonably diverse although reflected biases common in online samples: average respondent age was 36.5 (SD = 10.9), 44% were female, a majority had a college degree (52%), and the sample skewed liberal (50%; Table A1). The survey was fielded between November 1-8, 2017.

<u>Experimental Design.</u>

Respondents answered questions regarding their partisanship and support for various policy issues and then read a mock news story about an observed encounter between Schumer and McConnell in a Washington DC restaurant. They were randomly assigned to one of 9 conditions, in a 3 (*social relations*: warm, hostile, control) X 3 (*issue compromise*: issue compromise, no issue compromise, control) fully-crossed factorial design.

In the *warm relations* condition, Schumer and McConnell were described as having a pleasant encounter in which they seemed happy and were seen laughing and hugging. In the *hostile relations* condition they were described as using obscenities and arguing loudly. The *control* condition omitted any information about the warmth of their encounter. This was followed by

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[6] 17 respondents cheated (e.g., a respondent entered the survey as a Democrat, was screened out due to a quota we set, but then re-entered as a Republican).

the issue condition which described a discussion between the two leaders on immigration policy, specifically, funding for President Trump's proposed border wall and DACA.[7]

In the *issue compromise* condition, the leaders were described as willing to compromise and accept the other party's demands on both DACA and the border wall. In the *no issue compromise* condition, the leaders were described as unwilling to compromise and accept the other party's demands. In the control condition the issue information was omitted. Full wording for all conditions is included in Appendix B.

This experimental design has two main advantages. First, the presence of a control condition provides a baseline level of outparty animosity to which the effects of a warm or hostile encounter or issue compromise or no compromise can be compared Our assumption is that hostile relations and a lack of issue compromise are the status quo and will have little effect on ratings of the other party. Second, the fully-crossed experimental design allows us to assess the independent effects of social relations and issue compromise on outparty negativity, an improvement over past studies which have tended to conflate the two (relatedly, see Dafoe, Zhang, and Caughey 2018).

Following the experimental manipulation, respondents answered a series of questions tapping inparty and outparty attitudes, answered several demographic questions, and were debriefed.

Measures.

Inparty and Outparty Affect. Respondents answered several items used in past research to tap affective polarization (see, e.g., Iyengar et al. 2012, 2019). Respondents rated the warmth of their feelings toward Republicans and Democrats, using a 0 (coldest) to 10 (warmest) feeling thermometer scale. These were used to create a measure of positive inparty and outparty affect

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[7] .Both issues were salient at the time of the study when partisan comrpomise seemed like a real possibility. For example, after a meeting in September, 2017, between President Trump and Democratic leaders, suggested he was willing to protect "dreamers" in exchange for increased border security. The Democrats declared they had reached a deal that would protect "dreamers" without providing funds for the wall although Trump said the following day that no such deal was made (e.g., Smith and Siddiqui 2017; Haberman and Alcindor 2017).

and rescaled to vary between 0-1, with higher values denoting warmer feelings. As expected, partisans had significantly warmer feelings toward the inparty (M = .69; SD = .19) than the outparty (M = .31; SD = .24) ($t(289)$ = 20.39; p < .001).[8]

    Inparty and Outparty Traits. Respondents were asked to rate most Republicans and Democrats on three separate trait scales that varied from 1-10: (i) close-minded/open-minded; (ii) moderate/extremist; and (iii) moral/immoral. The three items were combined to create an overall outparty (alpha = .60) and inparty (alpha = .45) scale, although scales were not especially reliable. Scales were recoded to vary from 0-1, with higher values denote more positive traits ascribed to the outparty/inparty. Partisans ascribed significantly more positive traits to the inparty (M = .62; SD = .16) than the outparty (M = .34; SD = .18) ($t(289)$ = 17.58; p < .001).

    Inparty & Outparty Social Distance. Respondents were asked four social distance questions: how happy they would feel if a member of their immediate family told them they were going to marry a Democrat and then a Republican, and how happy they would feel if they found out that a person with whom they worked closely was a Democrat and then Republican. Variables were created for inparty and outparty marital and co-worker social distance that varied from 0-1 with higher values denoting happier, more positive responses. Once again partisans exhibited significantly greater happiness with inparty than outparty marriage (M = .65; SD = .23 vs. M = .43; SD = .21) ($t(289)$ = 11.77; p < .001) and an inparty than outparty co-worker (M = .63; SD = .21 vs. M = .46; SD = .18) ($t(289)$ = 10.02; p < .001).

    Inparty & Outparty Summary Rating Scale. Finally, we averaged four outparty measures (outparty affect, outparty traits, outparty marriage and outparty co-worker) to create a summary outparty rating scale. The same four items were combined for the inparty. The four outparty items created a reliable scale (alpha = .76); the inparty scale items scaled somewhat less well

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[8] Statistical differences were assessed using a paired comparison t-test.

together (alpha = .59).[9] The inparty rating scale (M = .65; SD = .13) is significantly more positive than the outparty scale (M = .38; SD = .16) ($t(289)$ = 19.13; p < .001).

Personal Affect. Respondents who read an article (those not in the double control condition) answered questions about how angry, enthusiastic, hostile, and hopeful they felt while reading the exchange between Schumer and McConnell. An *Anger* scale was created by averaging the angry and hostile items and rescaled to vary from 0-1, with higher values denoting angrier responses (M = .26; SD = .27). Enthusiastic and hopeful were combined to create an *enthusiasm* scale which varies from 0-1, with higher values denoting more enthusiastic responses (M = .40; SD = .30). Feelings of anger and enthusiasm provide intermediate affective reactions to the mock news story that should show similar trends to outparty ratings. The social relations hypothesis predicts greater enthusiasm and less anger in the warm relations conditions. According to the issue compromise hypotheses, compromise should lead to more enthusiasm and less anger.

Data are analyzed in a series of regression analyses. Dummy variables for each experimental condition (the no story control condition is the omitted category) are regressed onto the dependent variables. In separate analyses, there were no significant interactions between any of the experimental conditions and interaction terms are thus omitted from the analyses (Table D1). Analyses also include a dummy variable for Republican to capture partisan differences in outparty ratings. Major analyses were also calculated separately for Republicans and Democrats (see Table D2 for Study 1 and D7 for Study 2). We note any instance of significant partisan asymmetry in the text. Respondents evaluated both inparty and outparty following the experimental news story but we focus solely on evaluations of the outparty. The experimental manipulations had virtually no influence on inparty evaluations as expected (Table D4, Study1, and Table D9, Study 2).

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[9] There is some dispute over whether social distance measures assess affective polarization (Druckman and Levendusky 2019; Klar, Krupnikov, and Ryan 2018). In this study, the outparty items scale well together suggesting that the social distance measures capture outparty attitudes.

Results

We present regression analyses in Table 1 on the determinants of outparty ratings, the combined rating scale, and affective reactions. As seen in Models 1-5, warm social relations significantly increase the positive overall rating scale, and the coefficient for each of the four component items is positive and significant for outparty warmth and closer outparty marital social distance. In contrast, issue compromise has no effect on outparty ratings as assessed by the overall rating scale or the individual items. Moreover, a coefficient equality test presented at the bottom of Table 1 indicates that warm social relations between Schumer and McConnell leads to more positive ratings of the outparty than hostile relations on the overall scale and its component measures. These data provide strong support for the social relations hypothesis.

Warm relations between Schumer and McConnell had even stronger effects on emotions, significantly and substantially boosting feelings enthusiasm and dampening anger as seen in Models 6 and 7 (Table 1). In addition, hostile relations further reduced enthusiasm when compared to the no information control condition. Even though reading about a hostile encounter between party leaders did not worsen ratings of the outparty, partisans still felt less positive affect in this condition. This provide some insight into the fleeting emotional reactions felt by partisans to instances of partisan leader discord. These findings lend additional support to the social relations hypothesis.

Models 6 and 7 also lend some support to the issue compromise hypothesis. When Schumer and McConnell compromised on immigration matters, partisans felt more enthusiastic than in the control condition. A comparison of regression coefficient demonstrates, however, that the effects of warm social relations had almost double the impact of issue compromise. Issue compromise had not effect on feeligns of anger towards the outparty. Partisan emotions were also unaffected by intransigence on immigration issues. Overall, the nature of social relations between party leaders had greater impact than issue compromise on partisan emotions.

Table 1: Determinants of Out Party Ratings and Emotions Elicited by the News Story, Study 1

Dependent Variable	(1) Warm Affect	(2) Positive Traits	(3) Family member marry	(4) Work with	(5) Positive rating scale	(6) Anger	(7) Enthusiasm
Warm	0.08 (.03)*	0.04 (.03)	0.08 (.03)**	0.04 (.03)	0.06 (.02)**	-0.11 (.05)**	0.18 (.04)**
Hostile	0.02 (.03)	-0.03 (.03)	-0.04 (.03)	-0.02 (.03)	-0.02 (.02)	0.02 (.04)	-0.11 (.04)**
Issue Compromise	0.02 (.03)	-0.02 (.03)	0.04 (.03)	0.00 (.03)	0.01 (.02)	0.01 (.05)	0.08 (.04)*
No Issue Compromise	0.01 (.04)	-0.00 (.03)	0.05 (.03)*	0.01 (.03)	0.02 (.02)	0.02 (.05)	0.01 (.05)
Republican	0.08 (.03)**	0.03 (.02)	0.01 (.02)	0.00 (.02)	0.03 (.02)*	0.00 (.03)	0.04 (.03)
Constant	0.22 (.03)**	0.34 (.03)**	0.38 (.03)**	0.44 (.03)**	0.35 (.02)**	0.29 (.06)**	0.31 (.06)**
Coefficient equality F-tests (p-value) Warm = Hostile	.047	.003	.0001	.012	.0004	.0004	.0001
Observations	290	290	290	290	290	258	258
R-squared	0.05	0.04	0.06	0.02	0.05	0.05	0.21

Note: Entries are regression coefficients with standard errors in parentheses. The no content control condition was the omitted experimental condition for group-relations and issue compromise factors. ** p<0.01, * p<0.05 (one-tailed test). In Model 1 the dependent variable is Feeling thermometer (warm feeling) toward the outparty; in Model 2 the dependent variable is positive traits of outparty followers; in Models 3-4 the dependent variables are a (positive) feeling toward a family member marrying and working with someone from the outparty; in Model 5 the dependent variable is a summary scale of all 4 positive attitudes toward the outparty; and in Models 6-7 the dependent variables are anger and enthusiasm felt while reading the news story. All variables are scaled to vary between 0 and 1.

The magnitude of these effects can be seen in Figure 1 which depicts positive outparty rating (based on the combined scale) for all nine experimental conditions. As seen in Figure 1, the outparty is rated most positively when Schumer and McConnell are described as having warm relations regardless of whether they compromise or not on immigration matters. For example, compare outparty ratings in the condition in which the leaders exhibit mutual warmth when they fail to compromise (.45) and when they compromise (.42). The outparty is rated essentially the same regardless of compromise or its absence. Similar evidence exists for hostility. When the two leaders are hostile and abusive towards each other, outparty ratings are comparable to those in the control condition and little affected by issue compromise. Admittedly, outparty ratings are lowest when the two leaders are hostile and do not compromise conditions but this interaction is not significant (Table D1). The stronger effects of social relations are not simply due to this information coming first in the news story. Even when social information is absent in the control condition, out party ratings vary little with issue compromise or its absence (and if anything are slightly better in the absence of issue compromise).

The effects of warm social relations on positive outparty ratings are significant for Republicans but weaker and non-significant for Democrats (Table D2). This asymmetry is not robust across studies, however. In Study 2 warm relations between leaders boosts outparty support among both Democrats and Republicans. Moreover, even if warm relations between Schumer and McConnell only gives a mild boost to outparty ratings among Democrats it significantly increases enthusiasm and dampens anger among them. In contrast, issue compromise has no effect on outparty ratings among either Democrats or Republicans. This lends support to the social relations hypothesis among both groups of partisans.

Figure 1: Positive Outparty Rating by Experimental Conditions, Study 1
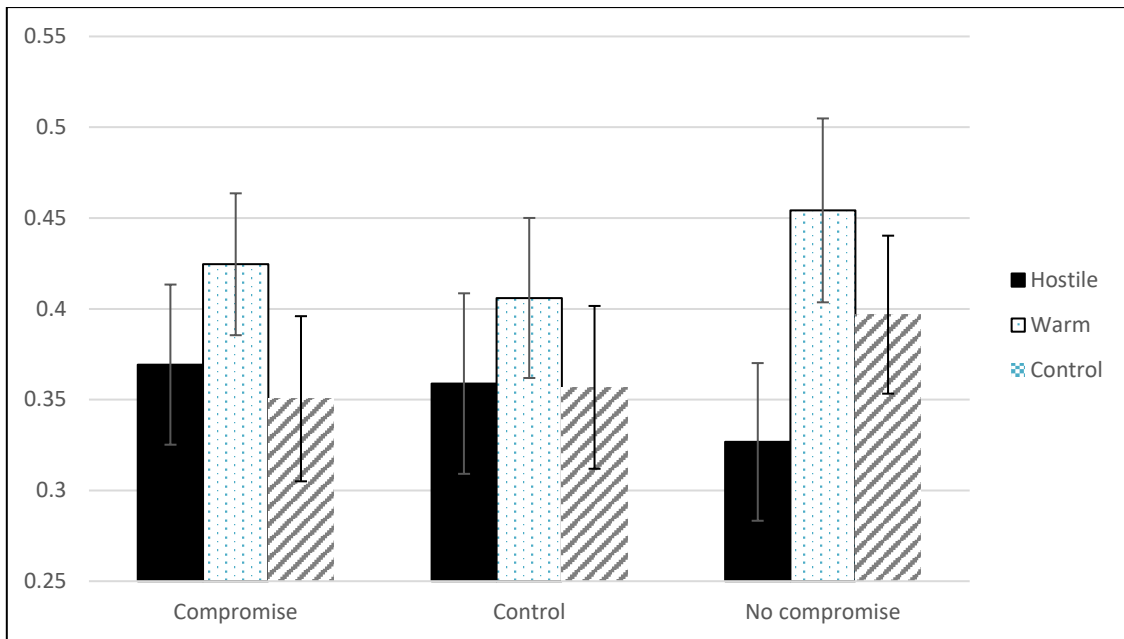
Note: Entries are mean levels of outparty rating in each of the nine experimental conditions.
Partisan Symmetry

Experimental Moderators

We tested the role of several potential factors that might moderate the effects of social warmth and issue compromise on outparty ratings. Specifically, we examined whether those with a strong partisan identity are most affected by warm social relations between leaders because they are more likely to conform to the actions of party leaders (Hogg & Hains, 1996; McGarty et al., 1992; Turner et al., 1987). There is mixed evidence for this supposition. Overall, strong partisans felt more anger and enthusiasm across the board but they also rated the outparty more negatively and felt less enthusiasm after learning of the hostile encounter between Schumer and McConnell (Table D3). But this finding did not extend to anger and did not replicate in Study 2 suggesting that the positive effects of social warmth on outparty ratings occur across the board among all partisans.

We also tested whether those who agreed most fully with their party's stance on immigration rated the outparty more positively when the two leaders compromised. It is possible that they might be most supportive when the other party moves its position closer to one's own

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(although this is conflated with inparty compromise). There is mixed support for this proposition. Partisans who strongly agreed with their party's stance on immigration were more negative towards the outparty in general but this did not vary by condition. Partisans who shared their party's view on immigration were also more enthusiastic than others when the party leaders compromised. But the same individuals did not feel any less angry and rated the party just as negatively in the compromise condition. Issue compromise thus has a mixed role as a moderator of issue compromise. Its effects are not especially robust and did not replicate in Study 2. In sum, there is little evidence issue compromise can improve ratings of an outparty even among those who share their party's stance on immigration.

Finally, it is important to note that the experimental news story had no effect on ratings of the inparty when comparable analyses were run on the inparty rating scale (see Table D4). Inparty ratings were unaffected by warm or hostile relations between Schumer and Mcconnell. They wer also unmoved by the leader's willingness to compromise on immigration issues. This lends indirect support to the notion that affective polarization is driven by relations to the outparty and bolsters our decision to focus on outparty ratings in this research.

In sum, the results of Study 1 provide strong support for the social relations hypothesis: warm relations between party leaders improve affective ratings of the outparty and decrease affective polarization. They provide little or no support to the issue compromise hypothesis that outparty compromise on the issues will improve outparty ratings. Study 1 has two important limitations, however. First, it did not include manipulation checks that could verify the success of the experimental conditions, including the warmth of feeligns between the parties and their stance on issues. Second, respondents read an article in which both leaders either compromised on immigration or did not. But this means that both leaders compromise and does not provide a clean test of issue models. According to this model, outparty ratings should improve when the outparty moves closer to the inparty without any movement by the inparty. We test this possibility in Study 2.

Study 2

Study 2 involves a two-wave panel in which questions about potential moderators and political attitudes were asked in an initial survey and the experimental news story was included in wave 2. We adopted this design to avoid thoughts about the political parties immediately before exposure to the news story. Wave 1 was fielded between June 7-10, 2018 and Wave 2 was fielded some 6 weeks later, between July 17-25, 2018.

Sample.

Respondents were recruited from MTurk. They received $0.75 for completing Wave 1 and $1 for completing Wave 2. We recruited 1,040 respondents in Wave 1 using quotas to obtain roughly equal numbers of Republicans and Democrats. 52 were dropped leaving 988 (468 Republicans and 520 Democrats).[10] 764 respondents completed the Wave 2 survey (re-contact rate = 77.3%); an additional 117 respondents were dropped resulting in a final sample of 647 who completed both waves (281 Republicans and 366 Democrats).[11] Again, the sample is reasonably demographically diverse although contains biases common to on-line samples (M_{age} = 41.0; SD_{age} = 12.3; women = 56.9% of sample; college educated=58%).

Experimental Design

In wave 2 respondents read a slightly altered version of the mock news story involving Schumer and McConnell included in Study 1 (see wording in Appendix C). They were assigned to one of 8 conditions in a 2 (*social relations*: warm, hostile*)*) X 2 (*issue compromise*: both compromise, inparty compromise, outparty compromise, no compromise) fully crossed factorial design. Study 2 thus involves a more differentiated assessment of issue compromise than Study 1

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[10] Twenty-five respondents cheated (e.g., entered the survey as a Democrat, was screened out due to a quota we set, but then re-entered as a Republican), and 27 respondents either did not properly enter their MTurk code or did not enter the survey code into MTurk, and thus could not be re-contacted.

[11] Following Kennedy et al.'s (2018) study, which identified a substantial drop in the data quality on MTurk during the summer of 2018, we dropped 103 respondents who had an IP address from outside the United States, used blocked IP address, or had suspicious geo-locations. In addition, 10 respondents were dropped since we could not match their MTurk code between the two waves, and we dropped four respondents who reported they did not believe the news article.

to determine whether outparty compromise is more likely to boost positive ratings of the outparty.

Following the article, respondents rated the parties on various measures, and answered several items that constitute various manipulation checks (see below) and several political trusts items. Finally, they were debriefed at the end of the survey.

Measures

Inparty & Outparty Ratings. Inparty and outparty affect, traits, and social distance were measured with the same items as in Study 1 with one exception: the in and outparty co-worker social distance measure was dropped in Study 2 (see Appendix B for all item wording). Once again, partisans expressed significantly more positive *inparty than outparty affect (M = .67; SD = .24* vs. *M = .25; SD = .23; t(646) = 29.23; p < .001*), rated inparty than outparty traits more positively (*M = .65; SD = .23* vs. *M = .44; SD = .22; t(646) = 21.70; p < .001*), and held more positive views towards inparty than outparty marriage *M = .60; SD = .18* vs. *M = .33; SD = .20; t(646) = 15.29; p < .001*). In addition, respondents were asked how much they trusted the in and outparty to do what is right for the country (Druckman and Levendusky 2019). Partisans were more trusting of the inparty than the outparty (*M = .54; SD = .23* vs. *M = .25; SD = .22; (t(646) = 23.74; p < .001*).

The four inparty and outparty items (affect, traits, social distance, trust) were combined to create an overall inparty (α=.77) and outparty rating scale (α = .82) which was more positive for the inparty than the outparty (*M = .61; SD = .17* vs. *M = .32; SD = .18; t(646) = 27.20; p < .001*).

Personal Affect. Respondents were also the same questions as in Study 1 to gauge emotional reactions (angry, enthusiastic, hostile, and hopeful) to create an anger (*M = .29; SD = .28*) and enthusiasm scale (*M = .36; SD = .29*).

Manipulation Checks. Study 1 lacked manipulation checks. In Study 2, respondents were asked 2 we also employed several manipulation checks. In Wave 1 we asked respondents several

questions regarding their perceptions of how Democrats and Republicans rate one another to check on the social relations manipulation and combined them into a scale of inparty ratigns of the outparty and outparty ratings of the inparty.[12] Respondents were also asked several question on whether most Republicans and most Democrats favor or oppose building a wall along the US-Mexico border, and ending DACA as a check on the issue compromise manipulations. They were also asked a question regarding the extent to which there is common ground between Democrats and Republicans as a check on both social relations and issue compromise conditions. These questions were asked in both wave 1 and after the news story in wave 2 to create change scores for each variable.

The manipulation checks were largely successful (see Table D5). Respondents who read about a warm contact between Schumer and McConnell increased their rating of how positively the outparty rated the inparty between waves 1 and 2. They also saw increased common ground between the parties. But they did not report any change in their view of the outparty's stance on either the wall or DACA. This suggests that the social relations conditions was successful in altering views on how warmly the outparty regarded the inparty although had less affect on inparty ratings of the outparty.

Perceptions of where the two parties stand on immigration was affected by issue compromise as expected. When both politicians or the outparty leader compromised, the outparty position on the wall was rated as more moderate than in Wave 1. When the inparty leader compromised, the inparty's position on the wall was rated as more moderate than in Wave 1. Issue compromise had less effect on the parties perceived position on DACA. There was some greater murkiness concerning the effects of compromise on interparty warmth. When both Senate leaders compromised on immigration the inparty's perceived warmth towards the outparty and the outparty's perceived warmth towards the inparty both increased when

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[12] They were asked to evaluate (i) the level of respect and (ii) warmth Republicans (Democrats) have for Democrats (Republicans); how (iii) moral/immoral, and how ignorant/knowledgeable Republicans (Democrats) would rate Democrats (Republicans).

compared to Wave 1. In other words, issue compromise may convey information about the warmth of interparty relations that might complicate the interpretation of the issue compromise condition if significant.

As in Study 1, data are analyzed in a series of regression analyses. Dummy variables for each experimental condition (no compromise is the omitted category for the issue compromise dummies) are regressed onto the dependent variables. And as in Study 1, we also add a dummy variable for a Republican respondent. Analyses focus solely on evaluations of the outparty. In additional analyses, there was no significant interaction between any of the social relations and issue compromise conditions on the outparty rating scale as seen in Table D6.

Results

The effects of the mock news story on outparty rating and personal affect are presented in Table 2. As seen in Models 1-4, warmth between rival partisan leaders leads to significantly more positive ratings of the outparty on all four component measures and the overall rating scale. In contrast, issue compromise had no effect on the overall outparty rating scale or three of its four component measures. The one exception was warmer ratings of the outparty when both leaders compromised on immigration, suggesting that issue compromise can convey information about interparty social relations as seen in discussion of the manipulation effects. But this effect was confined to one variable and did not occur for the scale overall. This finding is thus not especially robust and was not observed in Study 1. These findings provide additional support for the social relations model of affective polarization.

Table 2: Determinants of Out Party Ratings and Emotions Elicited by the News Story, Study 2

Dependent Variable	(1) Warm Feelings	(2) Positive Traits	(3) Family member marry	(4) Trust	(5) Positive scale	(6) Anger	(7) Enthusiasm
Warm	0.06 (.02)**	0.03 (.02)*	0.03 (.02)*	0.05 (.02)**	0.04 (.01)**	-0.17 (.02)**	0.25 (.02)**
Both politicians compromised	0.04 (.02)*	0.01 (.02)	0.01 (.02)	0.03 (.02)	0.02 (.02)	-0.03 (.03)	0.11 (.03)**
Inparty politician compromised	0.00 (.02)	0.01 (.02)	-0.01 (.02)	0.00 (.02)	0.00 (.02)	-0.03 (.03)	0.06 (.03)*
Outparty politician compromised	-0.01 (.03)	-0.00 (.02)	-0.02 (.03)	-0.01 (.03)	-0.01 (.02)	-0.05 (.03)*	0.11 (.03)**
Republican	0.13 (.02)**	0.09 (.02)**	0.09 (.02)**	0.08 (.02)**	0.09 (.01)**	-0.08 (.02)**	0.10 (.02)**
Constant	0.16 (.02)**	0.27 (.02)**	0.39 (.02)**	0.18 (.02)**	0.25 (.02)**	0.44 (.02)**	0.12 (.02)**
Observations	647	647	647	647	647	647	647
R-squared	0.09	0.05	0.04	0.05	0.09	0.13	0.25

Note: Entries are regression coefficients with standard errors in parentheses. The Hostile condition was the omitted experimental condition for contact and no compromise was the omitted condition for the compromise factor. Dependent variables are warm feeling toward outparty (Model 1), positive traits of outparty followers (Model 2); positive feelings toward a family member marrying someone from the outparty (Model 3); trust in the outparty (model 4), and a summary scale of all 4 positive attitudes toward the outparty (Model 5); anger and enthusiasm felt while reading the news story (Models 6 & 7). All variables are scaled to vary between 0 and 1. ** p<0.01, * p<0.05 (one-tailed test).

Further evidence for the social relations model can be seen in Models 6-7. Warm relations between Senate leaders reduces feelings of anger and increases feelings of enthusiasm as in Study 1. There is also additional evidence of more modest cross-over effects of issue compromise on positive and negative affect. All types of issue compromise generate enthusiasm and outparty compromise reduces anger, although these effects are substantially weaker than that of warm social relations.

Figure 2: Positive Outparty Rating Scale by Experimental Conditions, Study 2
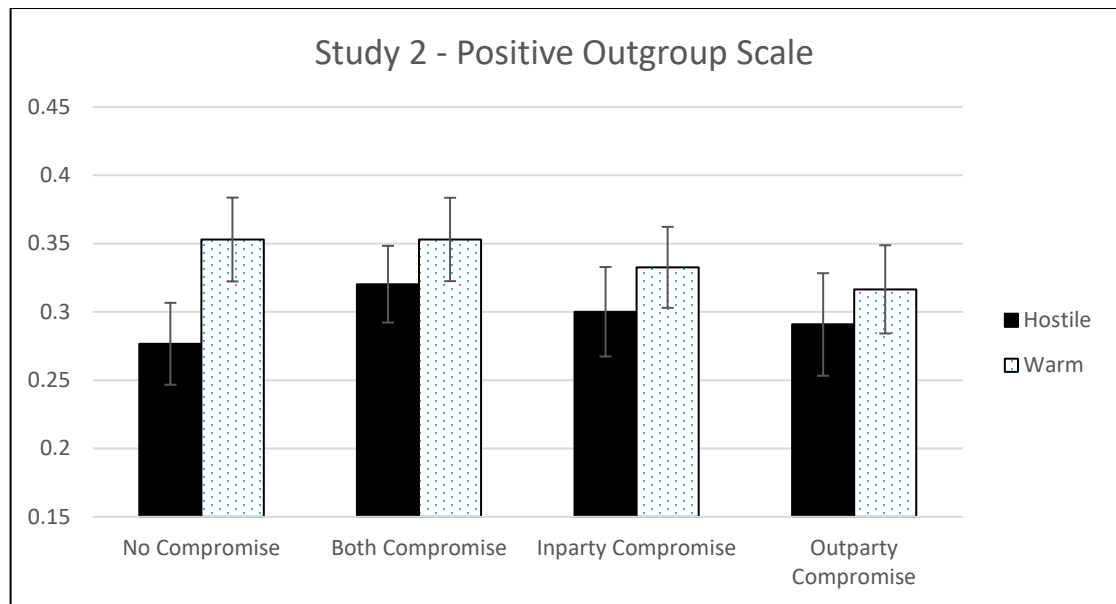
Note. Whiskers denote 90 percent confidence intervals.

The effects of warm social leader relations on positive outparty ratings can be seen in Figure 2 which plots mean ratings for each of the 8 experimental conditions. Out party rating is always more positive in the warm social relations condition regardless of issue compromise or its absence. The outparty is rated more warmly in the warm than hostile relations condition in the no compromise and each of the three compromise conditions. In the no compromise condition, for example, the outparty is rated at roughly .27 in the hostile condition and .35 in the warm condition, a sizeable increase. The effect of warm contact is

somewhat smaller when one or another leader compromises but still leads to significantly more positive ratings than in the hostile condition.

In contrast, warmth towards the outparty was not affected by issue compromise. The outparty was rated more positively when leaders interacted more warmly when they both compromised and when neither compromised. Likewise, the outparty was rated more negatively when the leaders expressed mutual hostility regardless of issue compromise. The outparty was rated more positively when both leaders compromised and the leaders interacted with hostility, an interaction that reaches statistical significance (see Table D6).[13] But this did not occur when the outparty but not inparty leader compromised on the issues. Warm social relations between partisan Senate leaders had equally positive effects on outparty ratings among Democrats and Republicans (Table D7). These effects are slightly stronger than in Study 1 when effects were larger for Republicans than Democrats.

In sum, Study 2 provides us with additional support that warm social interaction between partisan leaders can reduce affective polarization, while providing virtually no support for this occurs when the leaders compromise on immigration issues.

Experimental Moderators

As in Study 1, we tested the effects of a series of potential moderators of social warmth and issue compromise on outparty ratings and emotional reactions to the mock news story. Once again, we found observed experimental effects were largely unmoderated by these factors. The strength of partisan identity did not moderate the effect of social relations (Table D8). There was no evidence that outparty ratings were more positive among those who agreed with the party's position on immigration when the outparty leader

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[13] When all interaction terms are included in the model, the outparty is rated more positively when both politicians compromise in the hostile condition (b=.04, s.e.=.02; p<.05; Table D6). This effect is also visible in Figure 2.

compromised on the wall and DACA. The same held true for feelings of anger and enthusiasm in reaction to the news story. In no case did those who strongly agreed with the party's stance feel more anger or enthusiasm when the inparyt, leader outparty leader or both compromised on immigration. In analyses not shown we also investigated whether those who were averse to conflict as assessed by a conflict aversion scale (Drcukman et al 2019; Mutz XX). The effect of warm relations on improved ratings of the outparty were not greater among those who were conflict averse.

As for Study 1, the tone of social relations and issue compromise in the mock news story had no effect on ratings of the inparty relations (Table D9). Not surprisingly, holding a strong partisan identity and agreeing strongly with the inparty's stance on immigration was associated with positive ratings of the inparty but did not moderate the effects of any experimental factors.

Discussion

The origins of partisan affective polarization are intimately linked to its reduction. In this research we advance an understanding of affective polarization by directly comparing the effects of factors derived from group and policy-based models as agents of reduced affective polarization. We focus specifically on ratings of the outparty and demonstrate that warm relations between Senate leaders consistently improved ratings of the inparty. In contrast, whether the leaders compromised or not on immigration matters had no effect on ratings of the outparty. Moreover, manipulation checks conducted as part of Study 2 demonstrated that warm relations were most effective in dampening the notion that outpartisans disliked inpartisans and increased the perception that the two groups shared common ground. This suggests that concerns over being disliked by outpartisans and being very distant from them are crucial ingredients in affective polarization and its reduction.

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In contrast, leader compromise on salient immigration issues did little or nothing to reduce affective polarization. This suggests that Democrats and Republicans working together on policy matters is insufficient to defuse partisan animosity. Senator John McCain provides an interesting example of a partisan leader who may have been able to reduce polarization. He co-sponsored highly visible bipartisan legislation such as the McCain - Feingold bill on campaign finance reform. But he may have been even more effective in reducing affective polarization through his visible respect for Democrats. For example in the 2008 presidential campaign, he defended his opponent Barack Obama saying in response to a statemen that Obama was an Arab "No ma'am, he's a decent family man, a citizen that I just happen to have disagreements with on fundamental issues."

Past research has failed to definitively identify the origins of affective polarization or clearly identify the factors that lead to its reduction. The pursuit of theoretically distinct explanations in empirical research that successfully and clearly tests between major classes of explanation will provide a step forward. In our research, and consistent with Druckman (2019), social factors linked to interparty respect and warm leader relations more effectively reduced negative ratings of the outparty. Party leaders show no signs of defusing interparty hostility and civility but without change of that kind it will be difficult to reduce hostility between Democrats and Republicans.

References

Abramowitz, A. I., & Saunders, K. L. (2008). Is polarization a myth? Journal of Politics, 70(2), 542–555.

Ahler, Douglas J. 2018. "The Group Theory of Parties: Identity Politics, Party Stereotypes, and Polarization in the 21st Century." *The Forum* 16 (1): 3–22. doi:10.1515/for-2018-0002.

Ahler, Douglas J., and Gaurav Sood. 2018. "The Parties in Our Heads: Misperceptions About Party Composition and Their Consequences." *The Journal of Politics* 80 (3): 964–81.

Arceneaux, Kevin, and Ryan J. Vander Wielen. 2017. *Taming Intuition: How Reflection Minimizes Partisan Reasoning and Promotes Democratic Accountability.* Cambridge: Cambridge University Press.

Bafumi, Joseph, and Robert Y. Shapiro. "A New Partisan Voter." *The Journal of Politics* 71, no. 01 (2009): 1–24. https://doi.org/10.1017/S0022381608090014.

Bougher, Lori D. 2017. "The Correlates of Discord: Identity, Issue Alignment, and Political Hostility in Polarized America." *Political Behavior* 39 (3). Springer US: 731–62. doi:10.1007/s11109-016-9377-1.

Brewer, M. B. 2001. The many faces of social identity: Implications for political psychology. *Political Psychology,* 22: 115–125.

Cairns, Ed. 2013. "Northern Ireland : Power Sharing, Contact, Identity, and Leadership." In *Power Sharing in Deeply Divided Places*, edited by Joanne McEvoy and Brendan O'Leary, 278–94. University of Pennsylvania Press.

Dafoe, Allan, Baobao Zhang, and Devin Caughey. 2018. "Information Equivalence in Survey Experiments." *Political Analysis* 26: 399–416.

Druckman, James N., S. R. Gubitz, Matthew S. Levendusky, and Ashley M. Lloyd. 2018. "How Incivility On Partisan Media (De-)Polarizes the Electorate." In *American Political Science Associationw*.

Druckman, James N., and Matthew S. Levendusky. 2019. "What Do We Measure When We Measure Affective Polarization?" *Public Opinion Quarterly*.

Fiorina, M., Abrams, S., & Pope, J. (2011). Culture war?: The myth of a polarized America. Boston, MA: Longman.

Garrett, R. Kelly, Shira Dvir Gvirsman, Benjamin K. Johnson, Yariv Tsfati, Rachel Neo, and Aysenur Dal. 2014. "Implications of Pro- and Counterattitudinal Information Exposure for Affective Polarization." *Human Communication Research* 40 (3): 309–32. doi:10.1111/hcre.12028.

Green, Donald, Bradley Palmquist, and Eric Schickler. 2002. *Partisan Hearts and Minds: Political Parties and the Social Identities of Voters*. New Haven: Yale University Press.

Haberman, Maggie, and Yamiche Alcindor. 2017. "Pelosi and Schumer Say They Have Deal With Trump to Replace DACA." *The New York Times*. https://www.nytimes.com/2017/09/13/us/politics/trump-dinner-schumer-pelosi-daca-obamacare.html.

Hetherington, Marc J., and Thomas J. Rudolph. 2015. *Why Washington Won't Work: Polarization, Political Trust, and the Governing Crisis*. Chicago, IL: University of Chicago Press.

Hogg, M. A., & Hains, S. C. (1996). Friendship and group identification: A new look at the role of cohesiveness in groupthink. *European Journal of Social Psychology*, *28*, 323-41.

Hogg, M. A, & Reid , S. A. (2006). Social Identity, self-categorization, and the communication of group norms. *Communication Theory*, *16*, 7-30.

Hogg, M. A., van Knippenberg, D., & Rast, D. E., III. (2012). Intergroup leadership in organizations: Leading across group and intergroup boundaries. *Academy of Management Review*, 37, 232-255.

Hogg, M. A., & van Knippenberg, D. 2003. Social identity and leadership processes in Groups. *Advances in Experimental Social Psychology,* 35: 1–52.

Hogg, M. A. (2015). Constructive leadership across groups: How leaders can combat prejudice and conflict between subgroups. *Advances in Group Processes*, 32, 177-207.

Huber, Gregory A., and Neil Malhotra. 2017. "Political Homophily in Social Relationships: Evidence from Online Dating Behavior." *The Journal of Politics* 79 (1): 269–83. doi:10.1017/CBO9781107415324.004.

Huddy, Leonie. 2013. "From Group Identity to Political Cohesion and Commitment." In *The Oxford Handbook of Political Psychology*, edited by Leonie Huddy, David O. Sears, and Jack Levy, Second, 737–73. New York: Oxford University Press.

Huddy, Leonie, Lilliana Mason, and Lene Aarøe. 2015. "Expressive Partisanship: Campaign Involvement, Political Emotion, and Partisan Identity." *American Political Science Review* 109 (1): 1–17. doi:10.1017/S0003055414000604.

Iyengar, Shanto, and Masha Krupenkin. 2018. "The Strengthening of Partisan Affect." *Political Psychology* 39 (S1): 201–18. doi:10.1111/pops.12487.

Iyengar, Shanto, Yphtach Lelkes, Matthew Levendusky, Neil Malhotra, and Sean J. Westwood. 2019. "The Origins and Consequences of Affective Polarization in the United States." *Annual Review of Political Science.*

Iyengar, Shanto, Gaurav Sood, and Yphtach Lelkes. 2012. "Affect, Not Ideology: A Social Identity Perspective on Polarization." *Public Opinion Quarterly* 76 (3): 405–31. doi:10.1093/poq/nfs038.

Iyengar, Shanto, and Sean J. Westwood. 2015. "Fear and Loathing across Party Lines: New
Evidence on Group Polarization." *American Journal of Political Science* 59 (3): 690–707.
doi:10.1111/ajps.12152.

Kennedy, Ryan, Scott Clifford, Tyler Burleigh, Ryan Jewell, and Phili Waggoner. 2018. "The
Shape of and Solutions to the MTurk Quality Crisis."
https://www.researchgate.net/profile/Scott_Clifford2/publication/328580368_The_S
hape_of_and_Solutions_to_the_MTurk_Quality_Crisis/links/5bd708f04585150b2b8e
6a87/The-Shape-of-and-Solutions-to-the-MTurk-Quality-Crisis.pdf.

Klar, Samara, Yanna Krupnikov, and John Barry Ryan. 2018. "Affective Polarization or
Partisan Disdain? Untangling a Dislike for the Opposing Party from a Dislike of
Partisanship." *Public Opinon Quarterly*. doi:10.1093/poq/nfy014.

Lau, Richard R., David J. Andersen, Tessa M. Ditonto, Mona S. Kleinberg, and David P.
Redlawsk. 2017. "Effect of Media Environment Diversity and Advertising Tone on
Information Search, Selective Exposure, and Affective Polarization." *Political Behavior* 39
(1). Springer US: 231–55. doi:10.1007/s11109-016-9354-8.

Lee, Frances E. 2016. *Insecure Majorities: Congress and the Perpetual Campaign*. University of
Chicago Press.

Lelkes, Yphtach. 2019. "Policy over Party: Comparing the Effects of Candidate Ideology and
Party on Affective Polarization." *Political Science Research and Methods*.

Lelkes, Yphtach, Gaurav Sood, and Shanto Iyengar. 2017. "The Hostile Audience: The
Effect of Access to Broadband Internet on Partisan Affect." *American Journal of Political
Science* 61 (1): 5–20. doi:10.1111/ajps.12237.

Lelkes, Yphtach, and Sean J. Westwood. 2017. "The Limits of Partisan Prejudice." *The
Journal of Politics* 79 (2). doi:10.1086/688223.

Levendusky, Matthew. 2013. "Partisan Media Exposure and Attitudes Toward the

    Opposition." *Political Communication* 30 (4): 565–81. doi:10.1080/10584609.2012.737435.

Levendusky, Matthew, and Neil Malhotra. 2016. "Does Media Coverage of Partisan

    Polarization Affect Political Attitudes?" *Political Communication* 33 (2): 283–301.

    doi:10.1080/10584609.2015.1038455.

Levendusky, Matthew S. 2018. "Americans, Not Partisans: Can Priming American National

    Identity Reduce Affective Polarization?" *The Journal of Politics* 80 (1): 59–70.

    doi:10.1086/693987.

Mason, Lilliana. 2015. "'I Disrespectfully Agree': The Differential Effects of Partisan Sorting

    on Behavioral and Issue Polarization." *American Journal of Political Science* 59 (1): 128–45.

    doi:10.1111/ajps.12089.

———. 2016. "A Cross-Cutting Calm: How Social Sorting Drives Affective Polarization."

    Public Opinion Quarterly 80 (S1): 351–77. doi:10.1093/poq/nfw001.

———. 2018. "Losing Common Ground : Social Sorting and Polarization." *The Forum* 16

    (1): 47–66.

Mason, Lilliana, and Julie Wronski. 2018. "One Tribe to Bind Them All: How Our Social

    Group Attachments Strengthen Partisanship." *Political Psychology* 39 (Suppl. 1): 257–77.

    doi:10.1111/pops.12485.

Mazziotta, Agostino, Amélie Mummendey, and Stephen C. Wright. 2011. "Vicarious

    Intergroup Contact Effects: Applying Social-Cognitive Theory to Intergroup Contact

    Research." *Group Processes and Intergroup Relations* 14 (2): 255–74.

    doi:10.1177/1368430210390533.

McGarty, C., Turner, J. C., Hogg, M. A., David, B., & Wetherell, M. S. (1992). Group

    polarization as conformity to the prototypical group member. *British Journal of Social*

    Psychology, 31, 1-20.

Orr, Lilla V., and Gregory A. Huber. 2018. "The Policy Basis of Measured Partisan

    Animosity in the United States."

Rast, David E., Michael A. Hogg, and Daan van Knippenberg. "Intergroup Leadership

    Across Distinct Subgroups and Identities." *Personality and Social Psychology Bulletin* 44, no.

    7 (July 2018): 1090–1103. https://doi.org/10.1177/0146167218757466.

Ridout, Travis N., Erika Franklin Fowler, Michael M. Franz, and Kenneth Goldstein. 2018.

    "The Long-Term and Geographically Constrained Effects of Campaign Advertising on

    Political Polarization and Sorting." *American Politics Research* 46 (1): 3–25.

    doi:10.1177/1532673X17721479.

Rogowski, Jon C., and Joseph L. Sutherland. 2016. "How Ideology Fuels Affective

    Polarization." *Political Behavior* 38 (2). Springer US: 485–508. doi:10.1007/s11109-015-

    9323-7.

Settle, Jaime E., and Taylor N. Carlson. 2019. "Opting Out of Political Discussions." *Political*

    Communication. doi:10.1080/10584609.2018.1561563.

Smith, David, and Sabrina Siddiqui. 2017. "Democrats Say Agreement Reached with Trump

    to Protect Young Immigrants." *The Guardian*. https://www.theguardian.com/us-

    news/2017/sep/14/senior-democrats-say-agreement-reached-with-trump-to-protect-

    young-immigrants%0D.

Sood, Gaurav, and Shanto Iyengar. 2016. "Coming to Dislike Your Opponents: The

    Polarizing Impact of Political Campaigns." doi:10.2139/ssrn.2840225.

Tajfel, H. (1981). *Human groups and social categories*. Cambridge: Cambridge University Press.

Turner, J. C., Hogg, M. A., Oakes, P. J., Reicher, S. D., & Wetherell, M. S. (1987).

    Rediscovering the social group: A self-categorization theory. Oxford: Basil Blackwell.

Webster, Steven W., and Alan I. Abramowitz. 2017. "The Ideological Foundations of

    Affective Polarization in the U.S. Electorate." *American Politics Research* 45 (4): 621–47.

Wolf, Michael R., J. Cherie Strachan, and Daniel M. Shea. "Incivility and Standing Firm: A

    Second Layer of Partisan Division." *PS: Political Science & Politics* 45, no. 3 (July 2012):

    428–34. https://doi.org/10.1017/S1049096512000509.

Wright, Stephen C., Arthur Aron, Tracy McLaughlin-Volpe, and Stacy A. Ropp. 1997. "The

    Extended Contact Effect: Knowledge of Cross-Group Friendships and Prejudice."

    Journal of Personality and Social Psychology 73 (1): 73–90. doi:10.1037/0022-3514.73.1.73.

APPENDIX A: SAMPLE CHARACTERISTICS
Table A1: Sample characteristics, Studies 1 and 2

	Study 1's Sample (November 2017)	Study 2's Sample (June-July 2018)
Partisanship		
Democrat (% of sample)	53.5%	56.6%
Republican (% of sample)	46.6%	43.4%
Age (Mean; *SD*)	36.5 (*10.*9)	41.0 (*12.3*)
Women (% of sample)	43.1%	56.9%
White (% of sample)	--	82.1%
Ideology		
Conservative (% of sample)	34.8	36.5
Liberal (% of sample)	50.3	51.3
Moderate (% of sample)	14.8	12.2
Highest education obtained		
High-school	17.6%	10.1%
Some college/associate degree	30.7%	32.5%
B.A.	39.7%	40.2%
Post-graduate degree	12.1%	17.3%

APPENDIX B: WORDING OF NEWS STORY, STUDY 1 & 2

STUDY 1
Experimental Factors (3 X 3 design):
1) **Inter-party social relations** (Warm; control [no mention of any inter-party contact]; hostile);
2) **Inter-party compromise** (issue compromise; control [no mention of issues]; no issue compromise)

News Story Headline:
Democratic and Republican Senators seen at a local DC restaurant
[Followed by:]

Warm inter-party social relations condition
You can't escape politics in Washington D.C., not even over dinner. This was made clear to diners eating at a well-known DC restaurant this past weekend. Senator Chuck Schumer (D-N.Y.), the Democratic minority leader, was seen dining and laughing with Republican Senate majority leader Mitch McConnell (R-Ky.). The two men looked very happy together and parted with a hug. The men's wives who often socialize together were engaged in a pleasant and intimate conversation. Their fellow diners were surprised at the degree of public warmth shown by the two senators.

[Or]
Hostile inter-party social relations condition
You can't escape politics in Washington D.C., not even over dinner. This was made clear to diners eating at a well-known DC restaurant this past weekend. Senator Chuck Schumer (D-N.Y.), the Democratic minority leader, was heard using obscenities and arguing loudly with Republican Senate majority leader Mitch McConnell (R-Ky.). The two men looked extremely angry and left each other shaking their head and muttering to themselves. The men's wives who are known to dislike each other glared at each other with obvious hostility. Their fellow diners were surprised at the degree of public hostility shown by the two senators.

[Or]
Control condition (no mention of inter-party social relations)

Followed by the second factor (Inter-party compromise):
Issue compromise
Curious diners overheard McConnell and Schumer discussing immigration. Schumer named several Dreamers and described one young man who had started a successful computer software company. McConnell said he was willing to grant legal status to the "Dreamers", children brought to the US illegally, under certain conditions. The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants. Schumer said that he was willing to increase funds for the Wall in exchange for legal status for the Dreamers.

No issue compromise
Curious diners overheard McConnell and Schumer discussing immigration. Schumer named several Dreamers and described one young man who had started a successful computer

software company. McConnell said he was unwilling to grant legal status to the "Dreamers", children brought to the US illegally. The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants. Schumer said that he was opposed to the Wall and was unwilling to approve funding.

[Or]
Control condition (no mention of issue compromise / no issue compromise)

STUDY 2
Experimental Factors (2 X 4 design):
1) **Inter-party social relations** (warm; hostile);
2) **Issue compromise** (both compromised; no issue compromise; Democrat compromised; McConnell compromised)

News Story Headline:
Democratic and Republican Senators seen at a local DC restaurant
[Followed by:]
Warm inter-party social relations condition
You can't escape politics in Washington D.C., not even over dinner. This was made clear to diners eating at a well-known DC restaurant this past weekend. Senator Chuck Schumer (D-N.Y.), the Democratic minority leader, was seen dining and laughing with Republican Senate majority leader Mitch McConnell (R-Ky.). The two men looked very happy together and parted with a hug. The men's wives who often socialize together were engaged in a pleasant and intimate conversation. Their fellow diners were surprised at the degree of public warmth shown by the two senators.

[Or]
Hostile inter-party social relations condition
You can't escape politics in Washington D.C., not even over dinner. This was made clear to diners eating at a well-known DC restaurant this past weekend. Senator Chuck Schumer (D-N.Y.), the Democratic minority leader, was heard using obscenities and arguing loudly with Republican Senate majority leader Mitch McConnell (R-Ky.). The two men looked extremely angry and left each other shaking their head and muttering to themselves. The men's wives who are known to dislike each other glared at each other with obvious hostility. Their fellow diners were surprised at the degree of public hostility shown by the two senators.

Followed by the second factor (Issue compromise):

Both compromised
Curious diners overheard McConnell and Schumer discussing immigration and learned that both senators were willing to make compromises to advance legislation. McConnell said he was willing to grant legal status to the "Dreamers", children brought to the US illegally, if the Democrats met certain of his conditions. Schumer named several Dreamers and described one young man who had started a successful computer software company, but he also said he would be willing to delay action on the Dreamers in exchange for Republican support on other issues.

The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants but said he might be willing to delay action on this for the moment. Schumer said that he was willing to increase funds for the Wall in exchange for legal status for the Dreamers.

[Or]
No issue compromise
Curious diners overheard McConnell and Schumer discussing immigration, and learned that neither senator was willing to compromise to advance legislation. McConnell said he was unwilling to grant legal status to the "Dreamers", children brought to the US illegally. Schumer named several Dreamers and described one young man who had started a successful computer software company, and said he was unwilling to delay action on the "Dreamers". The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants. Schumer said that he was opposed to the Wall and was unwilling to approve funding.

[Or]
Schumer [Democrat] compromised
Curious diners overheard McConnell and Schumer discussing immigration and learned that Senator Schumer (Democrat) was willing to make compromises to advance legislation. Schumer named several Dreamers and described one young man who had started a successful computer software company, but he also said he would be willing to delay action on the Dreamers in exchange for Republican support on other issues. The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants. Schumer said that he was willing to increase funds for the Wall in exchange for legal status for the Dreamers.

[Or]
McConnell [Republican] compromised
Curious diners overheard McConnell and Schumer discussing immigration and learned that Senator McConnell (Republican) was willing to make compromises to advance legislation. McConnell said he was willing to grant legal status to the "Dreamers", children brought to the US illegally, if the Democrats met certain of his conditions. Schumer named several Dreamers and described one young man who had started a successful computer software company. The two men also discussed government funds to build the Wall on the Mexican border. McConnell made his case for spending on the Wall to stop illegal immigrants but said he might be willing to delay action on this for the moment.

APPENDIX C: ITEM WORDING STUDY 1 &2

<u>Dependent variables</u>:
Social distance items (Study 1 & 2)
<u>Marriage</u> [question order (Republican/Democrat) was rotated]:**How do you think you would feel if a member of your immediate family told you they were going to marry a Democrat / Republican**? **[**Very unhappy / Somewhat unhappy / Somewhat happy / Very happy / It would not matter]

[**Asked only in Study 1:**] <u>Co-worker</u> [question order (Republican/Democrat) was rotated]: How do you think you would feel if you found out that a co-worker with whom you worked closely was a **Democrat /** Republican? [Very unhappy / Somewhat unhappy / Somewhat happy / Very happy / It would not matter]

Traits/stereotypes items (Study 1 & 2)
<u>Open-minded /close-minded:</u> [question order (Republican/Democrat) was rotated]: On a scale of 1 to 10 where 1 represents CLOSE MINDED and 10 represents OPEN MINDED where would you rate most Democrats / Republicans?

<u>Moderate / extremist</u>: [question order (Republican/Democrat) was rotated]: On a scale of 1 to 10 where 1 represents MODERATE and 10 represents EXTREMIST where would you rate most Democrats / Republicans?

<u>Moral / immoral</u>: [question order (Republican/Democrat) was rotated]: On a scale of 1 to 10 where 1 represents MORAL and 10 represents IMMORAL where would you rate most Democrats / Republicans?

<u>Scale creation</u>: The outparty-traits items created a somewhat reliable scale in both Study (Alpha = .60) and Study 2 (Alpha = .58) and an "outparty traits" scale was created by averaging the four items and rescaling them to vary 0-1. The inparty-traits items also created a somewhat reliable scale in both Study (Alpha = .45) and Study 2 (Alpha = .51) and an "inparty traits" scale was created by averaging the four items and rescaling them to vary 0-1.

Thermometer/warmth items: **(Study 1 & 2)**
[Question order (Republican/Democrat) was rotated]: On a scale from 0 (coldest) to 10 (warmest) how do you feel about Republicans / Democrats?

Trust items [**Asked only in Study 2:**]
<u>Partisan trust</u> [question order (Republican/Democrat) was rotated]: How much of the time do you think you can trust Republicans / Democrats to do what is right for the country? [Almost never / Once in a while / About half the time / Most of the time / Almost always]

Scale creation: The outparty items created a reliable scale in both Study 1 (Alpha = .76) and Study 2 (Alpha = .82), and an "outparty positive scale" scale was created by averaging the four items (marriage, thermometer, the outparty traits scale, and either the co-worker item [Study 1] or the trust item [Study 2]) in each study and rescaling them to vary 0-1. The inparty items created a slightly less reliable scale in Study 1 (Alpha = .59) and a more reliable scale in Study 2 (Alpha = .77), and an "inparty positive scale" scale was created by averaging the four items in each study and rescaling them to vary 0-1.

Emotional reactions (Study 1 & 2)
Anger: When reading about the exchange between Schumer and McConnell, how ANGRY did you feel? [Very angry / Somewhat angry / Not very angry / Not at all angry]

Enthusiasm: When reading about the exchange between Schumer and McConnell, how ENTHUSIASTIC did you feel? [Very enthusiastic / Somewhat enthusiastic / Not very enthusiastic / Not at all enthusiastic]

Hostile: When reading about the exchange between Schumer and McConnell, how HOSTILE did you feel?   [Very hostile / Somewhat hostile / Not very hostile / Not at all hostile]

Hopeful: When reading about the exchange between Schumer and McConnell, how HOPEFUL did you feel? [Very hopeful / Somewhat hopeful / Not very hopeful / Not at all hopeful

Scale creation: The Anger and Hostile items created a reliable scale in both Study 1 (Alpha = .85) and Study 2 (Alpha = .83), and an "Anger" scale was created by averaging the two items in each study and rescaling them to vary 0-1. The Enthusiasm and Hopeful items also created a reliable scale in Study 1 (Alpha = .85) and in Study 2 (Alpha = .85), and an "Enthusiasm" scale was created by averaging the two items in each study and rescaling them to vary 0-1.

Manipulation checks: **asked only in Study 2 – in both Waves 1 & 2**
Partisan perceptions [questions order (Republican/Democrat) was rotated]
Respect/disrespect: How much respect or disrespect do most DEMOCRATS / REPUBLICANS have for REPUBLICANS / DEMOCRATS? [A great deal of respect / some respect / a little respect / a little disrespect / some disrespect / a great deal of disrespect]

Warmth/cold: On a scale from 0 (coldest) to 10 (warmest) how do most DEMOCRATS / REPUBLICANS feel about REPUBLICANS / DEMOCRATS?

Moral/immoral: On a scale of 1 to 10 where 1 represents MORAL and 10 represents IMMORAL where would most DEMOCRATS / REPUBLICANS rate REPUBLICANS / DEMOCRATS?

Ignorant/knowledgeable: On a scale of 1 to 10 where 1 represents IGNORANT and 10 represents KNOWLEGEABLE where would most DEMOCRATS / REPUBLICANS rate REPUBLICANS / DEMOCRATS?

Scale creation: The moral/immoral item's correlations with the other items – in both Waves – was much lower than the other inter-item correlations (e.g., in Wave 1 the former correlations was lower than .2 while the later were all greater than .45), as accordingly this item was dropped for the "partisan perceptions" scale. We created such a scale, in both waves, as the scales reliability was good in both waves (Alphas>.8 for both Republicans perceptions of Democrats and Democrats perceptions of Republicans – in both waves), by averaging the three remaining items in each wave and rescaling them to vary 0-1.

Common ground: In general, how much common ground is there between Democrats and Republicans? [A great deal / A fair amount / Some / Not too much / None at all]

Attitudes toward a border wall: How strongly do you think most REPUBLICANS / DEMOCRATS favor or oppose building a wall along the US border with Mexico? [Strongly Favor / favor / Somewhat favor / Somewhat oppose / oppose / Strongly oppose]

Attitudes toward DACA/"Dreamers": DACA is the Deferred Action for Childhood Arrivals policy that grants temporary legal status to children known as "dreamers" who came with parents to the US illegally. How strongly do most REPUBLICANS / DEMOCRATS favor or oppose ending DACA? [Strongly Favor / favor / Somewhat favor / Somewhat oppose / oppose / Strongly oppose]

Additional items (both Study 1 & 2):
Typicality: How typical do you think this kind of exchange is among Washington politicians? [Very typical / Somewhat typical / Not very typical / Not at all typical]

Helps America: Do you believe the interaction between Schumer and McConnell helps or hurts the functioning of American democracy, or does it have no effect? [Helps / It has no effect / Hurts]

Potential moderators: (both Study 1 & 2)
Ideological issues (question order was rotated)
Abortion: Do you think:
1. By law, abortion should never be permitted.
2. The law should permit abortion only in case of rape, incest, or when the woman's life is in danger.
3. The law should permit abortion for reasons other than rape, incest, or danger to the woman's life, but only after the need for the abortion has been clearly established.

4. By law, a woman should always be able to obtain an abortion as a matter of personal choice.

Gun control: How strongly do you favor or oppose stricter gun control laws that make it more difficult for someone to buy a gun? [Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

Gay marriage: How strongly do you favor or oppose allowing gays and lesbians to marry legally? [Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

Death penalty: How strongly do you favor or oppose the death penalty for persons convicted of murder?
[Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

Health care: **How strongly do you favor or oppose a single payer health care system in which all Americans would get their health insurance from one government plan that is financed by taxes?**
[Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

Taxes: **Which one best describes what you think Congress should do as regards federal taxes?...**
   1. **Cut taxes on individuals,**
   2. **Cut taxes on businesses,**
   3. **Cut taxes on both individuals and businesses,**
   4. **Not cut taxes at this time**

Government assistance: Where would you place yourself on a scale in which 1 represented people who strongly believe the government should provide fewer services even in areas such as health and education in order to reduce spending and 7 represented people who strongly believe the government should provide many more services even if it means an increase in spending.
[SLIDER SCALE]

Border wall: **How strongly do you favor or oppose building a wall along the US border with Mexico?**
[Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

DACA/"dreamers": **DACA is the Deferred Action for Childhood Arrivals policy that grants temporary legal status to children known as "dreamers" who came with parents to the US illegally. How strongly do you favor or oppose ending DACA?** [Strongly Favor / Favor / Somewhat favor / Somewhat oppose / Oppose / Strongly oppose]

Scale creation: these two items did not exhibit good reliability in Study 1 (Alpha = .36) or Study 2 (Alpha = .56). Nonetheless, we created an "immigration scale" from these two variables by averaging them and rescaling them to vary 0-1. Higher values denoted more agreement with the Republican party on immigration. We then created our analyses-relevant, " inparty – conforming" immigration scale by examining how much each partisan respondent's immigration attitudes are congruent with his/her party. To do so, we subtracted 0.5 from respondents score on the later "immigration scale". The absolute value of that result was considered as one's inparty-conforming immigration scale. In case a partisan respondent's attitudes on the immigration scale were on the opposite side (e.g., a republican whose attitudes were more in line with the Democrat party's stance on immigration), they were assigned 0 on the inparty-conforming immigration scale.

Partisan identity items (both Study 1 & 2)
1) How important is being Republican/Democrat to you? [Extremely important / Very important / Not very important / Not important at all]
2) How well does the term Republican/Democrat describe you? [Extremely well / Very well / Not very well / Not at all]
3) When talking about Republicans/Democrats, how often do you use "we" instead of "they"? [All of the time / Most of the time / Some of the time / Rarely / Never]
4) To what extent do you think of yourself as being Republican/Democrat? [A great deal / Somewhat / Very Little / Not at all]

Scale creation: these items created a reliable scale (Alpha = .88 in Study 1; and .89 in Study 2), and a "partisan social identity" scale was created by averaging the four items and rescaling them to vary 0-1.

APPENDIX D: ANALYSES

Table D1. Study 1 - Main results - Interactions between the two experimental factors

Dependent Variable	(1) Warm Feeling toward the outparty	(2) Positive Traits of outparty	(3) Family member marrying an outparty	(4) Working with an outparty	(5) Outparty scale
Warm	0.11*	0.04	0.07	-0.02	0.05
	(0.06)	(0.04)	(0.05)	(0.04)	(0.04)
Hostile	0.05	0.00	-0.01	-0.04	0.00
	(0.06)	(0.05)	(0.05)	(0.05)	(0.04)
Issue agreement	0.03	-0.06	0.05	-0.05	-0.01
	(0.06)	(0.05)	(0.05)	(0.05)	(0.04)
Issue disagreement	0.06	0.05	0.06	-0.01	0.04
	(0.06)	(0.04)	(0.05)	(0.04)	(0.04)
Warm * Issue compromise	-0.03	0.05	-0.02	0.10	0.02
	(0.08)	(0.06)	(0.07)	(0.06)	(0.05)
Warm * No issue compromise	-0.05	-0.04	0.05	0.08	0.01
	(0.09)	(0.06)	(0.07)	(0.07)	(0.06)
Hostile * Issue compromise	-0.01	0.04	-0.02	0.06	0.02
	(0.09)	(0.07)	(0.07)	(0.07)	(0.06)
Hostile * No issue compromise	-0.08	-0.13*	-0.06	-0.02	-0.07
	(0.09)	(0.06)	(0.07)	(0.06)	(0.06)
Republican	0.08**	0.03	0.01	0.00	0.03*
	(0.03)	(0.02)	(0.02)	(0.02)	(0.02)
Constant	0.20**	0.33**	0.37**	0.47**	0.34**
	(0.04)	(0.03)	(0.04)	(0.03)	(0.03)
Observations	290	290	290	290	290
R-squared	0.05	0.07	0.07	0.03	0.07

Standard errors in parentheses; ** $p<0.01$, * $p<0.05$ (one-tailed test). In Model 1 the dependent variable is Feeling thermometer (warm feeling) toward the outparty, in Model 2 the dependent variable is positive traits of outparty, in Models 3-4 the dependent variables are a (positive) feeling toward family member marrying an outparty and working with an outparty, respectively, and in Model 5 the dependent variable is a summary scale for positive attitudes toward the outparty. All dependent variables vary between 0-1.

Table C2. Study 1 - Main results: Separate analyses for Democrats and Republicans

Dependent Variable	(1) Outparty scale	(2)	(3) Anger	(4)	(5) Enthusiasm	(6)
	Democrats	Republicans	Democrats	Republicans	Democrats	Republicans
Warm	0.03	0.09**	-0.14*	-0.08	0.20**	0.16**
	(0.03)	(0.03)	(0.06)	(0.07)	(0.07)	(0.06)
Hostile	-0.02	-0.01	0.03	0.00	-0.09	-0.13*
	(0.03)	(0.03)	(0.06)	(0.06)	(0.07)	(0.06)
Issue compromise	0.01	0.01	0.05	-0.04	0.10	0.07
	(0.03)	(0.03)	(0.06)	(0.07)	(0.06)	(0.06)
No issue compromise	0.02	0.02	0.07	-0.04	0.00	0.02
	(0.03)	(0.03)	(0.06)	(0.07)	(0.07)	(0.07)
Constant	0.35**	0.36**	0.27**	0.33**	0.29**	0.37**
	(0.03)	(0.03)	(0.07)	(0.08)	(0.08)	(0.08)
Observations	155	135	135	123	135	123
R-squared	0.02	0.09	0.10	0.02	0.21	0.20

Standard errors in parentheses; ** $p<0.01$, * $p<0.05$ (one-tailed test). In Models 1-2 the dependent variable is a summary scale for positive attitudes toward the outparty, in Models 3-4 the dependent variable is negative emotional reactions, and in Models 5-6 the dependent variable is positive emotional reactions. All dependent variables vary between 0-1.

Table D3. Study 1 - Main results – with moderators (partisan social identity scale; immigration scale)

Dependent Variable	(1) Outparty scale	(2) Anger	(3) Enthusiasm	(4) Outparty scale	(5) Anger	(6) Enthusiasm
Warm	0.10*	-0.16*	0.42**	0.05*	-0.12**	0.17**
	(0.05)	(0.10)	(0.09)	(0.02)	(0.05)	(0.04)
Hostile	0.08	0.09	0.05	-0.02	0.02	-0.10*
	(0.05)	(0.10)	(0.10)	(0.02)	(0.05)	(0.04)
Partisan Social Identity	0.00	0.27*	0.60**			
	(0.07)	(0.14)	(0.14)			
Warm * Social Identity	-0.08	0.08	-0.53**			
	(0.09)	(0.18)	(0.17)			
Hostile * Social Identity	-0.18*	-0.17	-0.37*			
	(0.10)	(0.18)	(0.18)			
Issue compromise	0.00	0.01	0.09*	0.01	0.00	0.01
	(0.02)	(0.04)	(0.04)	(0.03)	(0.06)	(0.06)
No issue compromise	0.02	0.02	0.02	-0.01	0.01	-0.02
	(0.02)	(0.05)	(0.05)	(0.03)	(0.07)	(0.07)
Immigration scale				-0.12**	-0.06	-0.18*
				(0.04)	(0.09)	(0.09)
Issue compromise * Immigration scale				-0.01	0.01	0.20*
				(0.05)	(0.11)	(0.11)
No issue compromise * Immigration scale				0.07	0.03	0.08
				(0.05)	(0.11)	(0.11)
Republican	0.03	0.00	0.05	0.02	-0.01	0.04
	(0.02)	(0.03)	(0.03)	(0.02)	(0.03)	(0.03)
Constant	0.35**	0.17*	0.02	0.40**	0.32**	0.39**
	(0.04)	(0.08)	(0.08)	(0.03)	(0.07)	(0.07)
Observations	290	258	258	290	258	258
R-squared	0.08	0.11	0.28	0.13	0.06	0.23

Standard errors in parentheses; ** $p<0.01$, * $p<0.05$ (one-tailed test). In Models 1 & 4 the dependent variable is a summary scale for positive attitudes toward the outparty, in Models 2 & 5 the dependent variable is negative emotional reactions, and in Models 3 & 6 the dependent variable is positive emotional reactions. All dependent variables vary between 0-1.

Table D4. Study 1 – Results for inparty

Dependent Variable	(1) Inparty scale	(2) Inparty scale	(3) Inparty scale
Warm	-0.01	0.01	0.00
	(0.02)	(0.04)	(0.02)
Hostile	0.01	-0.07	0.01
	(0.02)	(0.04)	(0.02)
Partisan Social Identity		0.24**	
		(0.05)	
Warm * Social Identity		-0.03	
		(0.07)	
Hostile * Social Identity		0.12	
		(0.07)	
Issue compromise	-0.02	-0.01	-0.04
	(0.02)	(0.02)	(0.03)
No issue compromise	-0.02	-0.01	-0.03
	(0.02)	(0.02)	(0.03)
Immigration scale			0.03
			(0.03)
Issue compromise * Immigration scale			0.04
			(0.05)
No issue compromise * Immigration scale			0.03
			(0.05)
Republican	-0.02	-0.01	-0.01
	(0.02)	(0.01)	(0.02)
Constant	0.67**	0.54**	0.65**
	(0.02)	(0.03)	(0.02)
Observations	290	290	290
R-squared	0.01	0.24	0.04

Standard errors in parentheses; ** p<0.01, * p<0.05 (one-tailed test). The dependent variable, which varies between 0-1, is a summary scale for positive attitudes toward the inparty.

Table D5. Study 2 - Manipulation checks

Dependent Variable (Change in perceptions)	(1) Outparty rate inparty positively	(2) Inparty rate outparty positively	(3) Outparty moderation on Border wall	(4) Inparty moderation on Border wall	(5) Outparty moderation on DACA	(6) Inparty moderation on DACA	(7) Perception of more common ground b/w parties
Warm	0.03**	0.01	0.00	0.00	-0.01	0.02	0.07**
	(0.01)	(0.01)	(0.02)	(0.01)	(0.03)	(0.03)	(0.02)
Both politicians compromised	0.03*	0.06**	0.04*	0.03	0.03	0.03	0.03
	(0.02)	(0.02)	(0.02)	(0.02)	(0.04)	(0.04)	(0.02)
Inparty politician compromised	-0.00	0.02	-0.01	0.05**	0.03	0.01	0.02
	(0.02)	(0.02)	(0.02)	(0.02)	(0.04)	(0.04)	(0.02)
Outparty politician compromised	0.01	0.01	0.04*	0.00	0.05	0.01	-0.01
	(0.02)	(0.02)	(0.02)	(0.02)	(0.05)	(0.04)	(0.02)
Republican	0.03*	0.04**	0.05**	-0.00	-0.02	0.02	0.03
	(0.01)	(0.01)	(0.02)	(0.01)	(0.03)	(0.03)	(0.02)
Constant	-0.03*	-0.05**	-0.05**	-0.03*	-0.11**	-0.11**	-0.06**
	(0.02)	(0.02)	(0.02)	(0.02)	(0.04)	(0.03)	(0.02)
Observations	646	645	646	646	646	646	647
R-squared	0.02	0.03	0.03	0.01	0.00	0.00	0.04

Standard errors in parentheses; ** $p<0.01$, * $p<0.05$ (one-tailed test). All dependent variables vary between -1 and 1. In Models 1-2 the dependent variables are change in evaluations from Wave 1 to Wave 2, with higher values indicating a more positive rating. In Models 3-6 the dependent variables are change in perceptions of issue moderation from Wave 1 to Wave 2, with higher values indicating a perception of increased moderation. In Model 7 the dependent variable is a change in evaluations from Wave 1 to Wave 2, with higher values indicating increased perception of common ground between the parties.

Table D6. Study 2 - Main results - Interactions between the two experimental factors

Dependent Variable	(1) Warm Feelings	(2) Positive Traits	(3) Family member marry	(4) Trust	(5) Positive scale
Warm	0.08**	0.05*	0.09**	0.08**	0.08**
	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)
Inparty politician compromised	0.01	0.03	0.02	0.03	0.02
	(0.04)	(0.03)	(0.03)	(0.03)	(0.03)
Outparty politician compromised	0.04	0.00	0.02	-0.00	0.01
	(0.04)	(0.03)	(0.04)	(0.04)	(0.03)
Both politicians compromised	0.05	0.02	0.05*	0.04	0.04*
	(0.03)	(0.03)	(0.03)	(0.03)	(0.02)
Warm * Inparty politician compromised	-0.02	-0.05	-0.05	-0.06	-0.04
	(0.05)	(0.04)	(0.05)	(0.05)	(0.04)
Warm * Outparty politician compromised	-0.09*	-0.02	-0.08	-0.02	-0.05
	(0.05)	(0.05)	(0.05)	(0.05)	(0.04)
Warm * Both politicians compromised	-0.03	-0.02	-0.10*	-0.03	-0.04
	(0.05)	(0.04)	(0.05)	(0.05)	(0.04)
Republican	0.13**	0.09**	0.09**	0.08**	0.09**
	(0.02)	(0.02)	(0.02)	(0.02)	(0.01)
Constant	0.15**	0.26**	0.36**	0.17**	0.24**
	(0.03)	(0.02)	(0.02)	(0.02)	(0.02)
Observations	647	647	647	647	647
R-squared	0.10	0.06	0.05	0.05	0.09

Note: Entries are regression coefficients with standard errors in parentheses. The Hostile condition was the omitted experimental condition for contact and no compromise was the omitted condition for the agreement factor. Dependent variables are warm feeling toward outparty (Model 1), positive traits of outparty followers (Model 2); positive feelings toward a family member marrying someone from the outparty (Model 3); trust in the outparty (model 4), and a summary scale of all 4 positive attitudes toward the outparty (Model 5); anger and enthusiasm felt while reading the news story (Models 6 & 7). All variables are scaled to vary between 0 and 1. ** $p<0.01$, * $p<0.05$ (one-tailed test).

Table D7. Study 2 – Main analyses: Separate analyses for Democrats and Republicans; perceptions regarding the outparty

Dependent Variable	(1) Warm Feeling toward the outparty	(2)	(3) Positive Traits of outparty	(4)	(5) Family member marrying an outparty	(6)	(7) Trust of outparty	(8)	(9) Outparty scale	(10)
	Democrats	Republicans	Democrats	Republicans	Democrats	Republicans	Democrats	Republicans	Democrats	Republicans
Warm	0.06**	0.05*	0.03	0.03	0.03	0.03	0.04*	0.07**	0.04*	0.04*
	(0.02)	(0.03)	(0.02)	(0.02)	(0.02)	(0.03)	(0.02)	(0.03)	(0.02)	(0.02)
Both politicians compromised	0.02	0.08*	0.00	0.03	0.02	-0.01	0.03	0.02	0.02	0.03
	(0.03)	(0.04)	(0.03)	(0.03)	(0.03)	(0.04)	(0.03)	(0.04)	(0.02)	(0.03)
Inparty politician compromised	-0.00	0.01	0.01	0.01	-0.01	0.01	0.02	-0.02	0.00	0.00
	(0.03)	(0.04)	(0.03)	(0.03)	(0.03)	(0.04)	(0.03)	(0.04)	(0.02)	(0.03)
Outparty politician compromised	-0.05	0.03	-0.02	0.01	-0.02	-0.03	-0.01	-0.01	-0.02	-0.00
	(0.03)	(0.04)	(0.03)	(0.03)	(0.03)	(0.04)	(0.03)	(0.04)	(0.03)	(0.03)
Constant	0.17**	0.27**	0.28**	0.36**	0.39**	0.48**	0.18**	0.25**	0.26**	0.34**
	(0.02)	(0.03)	(0.02)	(0.03)	(0.02)	(0.03)	(0.02)	(0.03)	(0.02)	(0.02)
Observations	366	281	366	281	366	281	366	281	366	281
R-squared	0.03	0.03	0.01	0.01	0.01	0.01	0.01	0.03	0.02	0.02

Standard errors in parentheses; ** p<0.01, * p<0.05 (one-tailed test). In Models 1-2 the dependent variables are a feeling thermometer (warm feeling), in Models 3-4 the dependent variables are positive traits, in Models 5-6 the dependent variables are a (positive) feeling toward family member marrying an outparty, in Models 7-8 the dependent variables are trust toward the outparty, and in Models 9-10 the dependent variables are a summary scale for positive attitudes toward the outparty. All dependent variables vary between 0-1.

Table D8. Study 2 - Main results – with moderators (partisan social identity scale; immigration scale)

Dependent Variable	(1) Outparty scale	(2) Anger	(3) Enthusiasm	(4) Outparty scale	(5) Anger	(6) Enthusiasm
Warm	0.06*	-0.18**	0.30**	0.04**	-0.17**	0.25**
	(0.03)	(0.05)	(0.05)	(0.01)	(0.02)	(0.02)
Partisan Social Identity	-0.06	0.14**	0.08			
	(0.04)	(0.06)	(0.06)			
Warm * Social Identity	-0.03	0.02	-0.10			
	(0.05)	(0.08)	(0.08)			
Both politicians compromised	0.02	-0.03	0.12**	0.01	-0.07*	0.17**
	(0.02)	(0.03)	(0.03)	(0.03)	(0.04)	(0.04)
Immigration scale				-0.14**	-0.01	-0.01
				(0.03)	(0.05)	(0.05)
Both compromised * Immigration scale				0.04	0.09	-0.13*
				(0.04)	(0.07)	(0.06)
Inparty politician compromised	0.00	-0.03	0.06*	-0.02	-0.08*	0.09*
	(0.02)	(0.03)	(0.03)	(0.03)	(0.04)	(0.04)
Inparty compromised * Immigration scale				0.03	0.10	-0.05
				(0.04)	(0.07)	(0.07)
Outparty politician compromised	-0.01	-0.05*	0.12**	-0.03	-0.01	0.12**
	(0.02)	(0.03)	(0.03)	(0.03)	(0.05)	(0.04)
Outparty compromised * Immigration scale				0.04	-0.10	-0.02
				(0.05)	(0.07)	(0.07)
Republican	0.09**	-0.07**	0.10**	0.07**	-0.07**	0.08**
	(0.01)	(0.02)	(0.02)	(0.01)	(0.02)	(0.02)
Constant	0.28**	0.37**	0.08*	0.33**	0.45**	0.13**
	(0.03)	(0.04)	(0.04)	(0.02)	(0.03)	(0.03)
Observations	647	647	647	647	647	647
R-squared	0.10	0.14	0.25	0.15	0.14	0.26

Standard errors in parentheses; ** $p<0.01$, * $p<0.05$ (one-tailed test). In Models 1 & 4 the dependent variable is a summary scale for positive attitudes toward the outparty, in Models 2 & 5 the dependent variable is negative emotional reactions, and in Models 3 & 6 the dependent variable is positive emotional reactions. All dependent variables vary between 0-1.

Table D9. Study 2 – Results for inparty

Dependent Variable	(1) Inparty scale	(2) Inparty scale	(3) Inparty scale
Warm	0.00	0.02	0.00
	(0.01)	(0.03)	(0.01)
Partisan Social Identity		0.36**	
		(0.03)	
Warm * Social Identity		-0.03	
		(0.05)	
Both politicians compromised	-0.02	-0.01	0.02
	(0.02)	(0.02)	(0.03)
Immigration scale			0.10**
			(0.03)
Both compromised * Immigration scale			-0.09*
			(0.04)
Inparty politician compromised	-0.01	-0.00	-0.02
	(0.02)	(0.02)	(0.03)
Inparty compromised * Immigration scale			0.02
			(0.04)
Outparty politician compromised	-0.01	0.00	0.02
	(0.02)	(0.02)	(0.03)
Outparty compromised * Immigration scale			-0.06
			(0.05)
Republican	-0.04**	-0.03*	-0.02
	(0.01)	(0.01)	(0.01)
Constant	0.64**	0.45**	0.59**
	(0.02)	(0.02)	(0.02)
Observations	647	647	647
R-squared	0.02	0.25	0.05

Standard errors in parentheses; ** p<0.01, * p<0.05 (one-tailed test). The dependent variable, which varies between 0-1, is a summary scale for positive attitudes toward the inparty.