Interest Group Advertising and Perceptions of Campaign Negativity

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Abstract
Thanks in part to the Citizens United decision by the U.S. Supreme Court, the 2010 and 2012 elections featured a marked increase over previous cycles in the percentage of ads sponsored by independent groups. In addition, both elections were among the most negative in recent history. Trends in both tone and sponsorship raise important questions about the effects of advertising on citizens. Are citizens sensitive to changes in negativity? Can they correctly attribute the tone of the advertising to its sponsor? Combining comprehensive data on the spots aired during the 2010 and 2012 Senate elections with nationally representative survey data, we find that citizens do correctly perceive the tone of the advertising to which they are exposed. Interest group negativity does not appear to infiltrate perceptions of candidate negativity. Moreover, perceptions of negativity also have consequences for people’s opinions of political advertising and their desire for its regulation, but such sentiments do not appear responsive to the levels of negativity in a campaign. These findings suggest that voters are fairly adept at recognizing ad sponsorship, but that they also make evaluations about the electoral system independent of the torrent of negativity in high-profile elections.

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Interest Group Advertising and Perceptions of Campaign Negativity

There is an important division of labor evident in political advertising in recent election campaigns. In races for the U.S. Senate in 2012, for instance, over 20 percent of advertising in the fall campaign was sponsored by outside groups. This exceeded the role played by the traditional party organizations in advocating for candidates. Overwhelmingly, the ads sponsored by interest groups were negative. 85 percent of outside group advertising in the Senate elections of 2012 was negative, with only 8 percent being promotional.

Negative advertising is not necessarily a bad thing for American democracy. It can expose differences among candidates that aid in voter decision-making (Geer 2006), and it seems to have no negative impact on voter turnout (Lau, et al. 2007; Krasno and Green 2008; Franz, et al. 2008) in spite of earlier suggestions to the contrary (Ansolabehere and Iyengar 1995). At the same time, most Americans profess to dislike negative advertising, and a host of experimental studies have demonstrated that candidates experience a backlash when they go on the attack (Brooks and Murov 2012; Dowling and Wichosky 2013; Weber, Dunaway and Johnson 2012).

There is a complication in the present system, however, which rests on the potential inability of voters to determine the source of negativity in a campaign. First, can voters accurately perceive the tone of the ads being aired? Second, can voters distinguish the negativity in ads sponsored by candidates from the negativity they see in ads sponsored by interest groups? Or, given the potential difficulty in figuring out the sponsorship of various advertisements, do voters wrongly perceive the intense volume of attacks coming from interest groups as coming from candidates? If so, what are the consequences on voters’ preferences for the regulation of political advertising?

This research explores the relationship between the tone of advertising aired by various sponsors and people’s perceptions of ad negativity. We examine this by linking ad-tracking data
from the 2010 and 2012 U.S. Senate elections with survey data gathered after this election. We find that citizens do correctly perceive the tone of the advertising to which they are exposed. Moreover, interest group negativity does not appear to infiltrate widely perceptions of candidate negativity. Ideally, citizens should be able to connect particular sponsors with the messages they send, but to the extent that messages and sponsors are conflated, accountability can suffer. By accountability, we mean the expectation that voters’ evaluations of political actors be tied explicitly and uniquely to those actors’ political behavior. We interpret our findings as positive in that regard.

Moreover, we show that while perceptions of negativity are strongly related to evaluations of ads, and their role in the electoral process, the actual volume of negative ads aired in a race—including the volume of outside group negativity—is not related to these perceptions. Voters seem to make independent judgments about how important political ads are in elections, and these attitudes are unmoved by exposure to intense volumes of negativity. This suggests that voters are not overwhelmed by negativity in ways that induce cynicism.

**Perceptions of Advertising Tone**

Existing research, with some dissents, finds support for the notion that the “true” tone of the campaign influences people’s perceptions of campaign tone. For example, perceptions of campaign tone in the 2000 presidential race as measured over time were positively associated with the actual tone of the race over time, as measured by national news media (Sigelman and Voeten 2004). In a different study of three gubernatorial races, the tone of advertising as determined by coders was a significant predictor of survey respondents’ perceptions of tone (Sides, et al. 2010). Similarly, an analysis of nine gubernatorial and U.S. Senate races found that
increased exposure to negative advertising increased the likelihood people would deem a campaign “negative,” while increased exposure to positive advertising increased the likelihood they would deem the campaign “positive” (Ridout and Fowler 2010).

Not all research, however, is in agreement. Sigelman and Kugler (2003), for instance, find substantial disagreement among survey respondents living in the same state in their characterization of the tone of the gubernatorial campaign in that state. While some characterized a race as positive, others characterized it as negative. This suggests that something can be lost in translation between the actual campaign and people’s perception of the campaign. A couple of factors could account for this lack of agreement, however. First, people in the Sigelman and Kugler study were interviewed at different points in time, and thus the actual tone of the campaign messages to which people were exposed likely changed over time. Second, not everyone is exposed to the same “campaign” or the same advertising. A variety of factors, including the media market in which one lives and the amount of television one views, can influence the mix (and thus the tone) of messages to which one is exposed. Finally, there are other factors that may influence perceptions of the tone of the campaign, including the way in which the news media cover the campaign (Ridout and Fowler 2012). In sum, while it seems that, in broad strokes, people are able to pick up on the tone of the advertising aired in a campaign, there are also several other factors that may influence perceptions of tone.

A separate but related question is whether citizens are able to distinguish between the ads aired by different sponsors in the same race. Being able to do so would seem to be important if sponsors are to be held accountable for the tone of the advertising they air. Although negative advertising has some benefits for the voter (Geer 2006), polls show that most Americans are dismayed by the volume of negative ads on their television sets (Pew Center 2010) and may even
want to punish a sponsor for the tone of its advertising. As such, candidates may be perceived more negative than they actually are, and voters may seek to lay blame on candidates for ads aired by unaffiliated allies.

There is very little research that evaluates the ability of viewers to distinguish between sponsors of political ads. One exception is Magleby (2004), who finds no significant differences across ad sponsorship on vote intention in a study of advertising in the 2000 presidential election. Most others, however—in work that examines the persuasive effects of ads—have found that advertising sponsored by interest groups is more persuasive than advertising sponsored by candidates (Groenendyk and Valentino 2002; Garramone 1985; Weber, Dunaway and Johnson 2012; Groenendyk and Valentino 2002; Dowling and Wichowsky 2012; Johnson, Dunaway and Weber 2011), a result that suggests that citizens are, at the very least, able to make determinations about sponsorship. One major caveat of this line of research, however, is that all of these studies were experimental, and thus it is difficult to know whether the findings hold outside of the laboratory. These experiments tended to be much more blatant in revealing sponsorship information than are actual advertisements, and voters may be more likely to pay attention to such sponsorship information, and take it into account, when they are in an experimental setting.

A final consideration is the intervening effect of voter partisanship. We know from research on campaign ads specifically and political communication more generally that voters process campaigns through the lens of their partisanship. Work on political advertising suggests that ads can polarize voters (e.g., Iyengar, Jackman, and Hahn 2008), with Republican messages more resonant with Republican identifiers and vice versa. If this is the case, Republican voters (Democrats) may resist evaluating Republican (Democratic) candidates as negative. That is, the
influence of the information environment may have less influence on like-minded partisans than on opposing partisans.¹

**Consequences of Ad Tone**

Little research focuses on the impact of *perceptions* of ad tone, but the research that does suggests that perceptions of negativity may lead to normatively undesirable consequences. In terms of people’s attitudes toward the political system and their political behaviors, existing research suggests that, overall, when people perceive a campaign as negative, they are also likely to feel less efficacious (Craig and Kane 2000, Thorson, et al. 2000), trust government less (Craig and Kane 2000, Leshner and Thorson 2000), and are less likely to vote (Crigler, Just and Belt 2002). On the other hand, perceptions of negativity are thought to lead to increased knowledge of the candidates (Craig, Kane and Gainous 2005). When it comes to vote choice, increased perceptions of campaign negativity are associated with more negative evaluations of the candidates (Thorson, et al. 2000) and a smaller chance of voting for the party that is perceived as being negative (Pattie, et al. 2011). People’s preferences for various campaign practices also vary by the characteristics of the individual, with the more educated and more informed expressing support for negative campaigning while at the same time being less willing to say that campaign ads are helpful (Lipsitz, et al. 2005).

While perceptions of campaign tone may influence people’s evaluations of the political system, such correlations may pre-exist the campaign itself, however. In other words, perceptions of tone and system evaluations may be endogenous. Indeed, that seems likely.

Because of this, it makes sense also to examine the effect of negative ad *volume* on voter

¹ This may not hold, however. Ridout and Franz (2011) find significant evidence that ad effects are wide and cross the partisanship of the viewer.
evaluations, to assess whether stronger flows of negative information (from groups and candidates) independently drive voters to see more problems with campaign ads.

There is a fair amount of scholarship on the relationship between campaign negativity (most often in ads) and measures of internal and external efficacy, along with measures of trust in government. The balance of this research tends to suggest that negativity depresses these assessments. No study to our knowledge has examined this question under conditions of heavy interest group advertising, however.

**Argument and Expectations**

The evidence suggests that citizens do have some ability to assess the tone of a political campaign. Knowing whether their television screen is filled with attacks or not is within the realm of the competence of the average citizen. Moreover, political advertising does not require much political sophistication to digest, as it comes neatly packaged in 30-second segments that are professionally designed to appeal to certain emotions (Freedman, Franz and Goldstein 2004). Finally, even people who make an effort to avoid politics would have had a difficult time avoiding the political advertising that appears during commercial breaks on television, especially in recent elections, which were historic in ad volume and in negativity, at least compared to the previous decade (Fowler and Ridout 2010). This leaves open the possibility of “passive learning” (Zukin and Snyder 1984) whereby people can take in information even when not paying attention. Given these arguments and the findings of existing research, we hypothesize that **people's perceptions of the tone of the televised political advertising aired during a campaign will be influenced by the tone of actual ads aired.** This effect, however, may vary in predictable ways. In line with the scholarship on the moderating effect of partisanship, **we**
expect that like-minded partisans will be less likely to evaluate their own candidates as negative compared to other voters.

The difficulty citizens have in gauging the tone of advertising, however, may depend in part on the ad’s sponsor. Knowing whether the television screen is filled with attacks or not seems manageable, but evaluating the source of those attacks seems much more difficult, especially for a citizen who is not all that well informed about or is adverse to politics.

Candidate and party spots seem most likely to be correctly attributed for several reasons. The requirement that candidates for federal office “approve” their ads that was implemented with the Bipartisan Campaign Reform Act of 2002 should enable citizens to more easily keep track of the flurry of spots from candidates. Thus, it might be easy for the citizen to conclude that the particular ad was paid for by the candidate, or launched in conjunction with the candidate, or somehow paid for by the candidate.2

What about interest groups? The experiments discussed earlier suggest that viewers might be able to be able to sort out ad sponsorship. But ads seen in the experimental laboratory typically explicitly cue sponsors, while ads sponsored by independent groups in the real world are often much more implicit in revealing their sponsors. Further complicating the situation, many interest group names are intended to obscure the partisan leaning of the sponsoring group. Voters may simply not sort ads into varying sponsor categories under conditions of high ad volume. As such, we expect that perceptions of candidate tone will be driven not only by the tone of the ads sponsored by candidates but by the tone of ads aired by interest groups as well.

2 In addition, the party labels on both party and coordinated ads should also aid citizens in attributing sponsors to the correct party. Therefore, we combine both party and coordinated spots with candidate advertising in each of our models.
Finally, negativity from candidates and groups may have independent effects on voters’ preference for a reform of the electoral system, as well as their general displeasure with campaign ads.\(^3\) This may be particularly true for voters who see a lot of interest group ads. According to a Washington Post-ABC News poll, a substantial majority (80 percent) of Americans opposed the *Citizens United* ruling with nearly two-thirds (65 percent) expressing strong opposition to the decision.\(^4\) In light of a record breaking years for advertising volume whose negativity did not escape citizen’s notice (Pew Center 2010), it seems likely that heightened exposure to negative campaigning would increase the percentage of citizens seeking reform. As such, we expect that the more negativity ads a voter sees from interest group ads, the more likely they will be to support government reform, and the less likely they are to say that ads are useful. The effect of candidates’ ads should be weaker, but any effect should be negative.

**Data and Methods**

Data on advertising in 2010 and 2012 come from the Wesleyan Media Project ([http://election-ad.research.wesleyan.edu](http://election-ad.research.wesleyan.edu)), which as the successor to the Wisconsin Advertising Project, tracked all political ads on broadcast television throughout the fall elections. Using videos of each political ad, project employees coded in both years close to 2,000 unique ads aired in U.S. Senate races on a variety of characteristics, including their tone. Coders were asked, “In

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\(^3\) Unlike much other work in this area, we do not test ad effects on measures of efficacy and trust. We prefer a more direct test on ad-related assessments. There is less work on such measures. One related study, however, found that the volume of negativity in a race was generally unrelated to voters’ evaluations of ad helpfulness (Sides, et al. 2010).

your judgment, is the primary purpose of the ad to promote a specific candidate, attack a
candidate, or contrast the candidates?” This sorts ads into one of three categories, positive
(“promote a specific candidate”), attack, or contrast.

Our survey data come from two original, national surveys sponsored by the Wesleyan
Media Project and fielded by YouGov in late December 2010 and November 2012. YouGov
interviewed 1135 respondents via the Internet in 2010. They interviewed 1200 respondents in
2012. Respondents were asked several questions related to political advertising, including the
extent to which “political ads helpful in learning about candidates running for office” and the
extent to which “government should do more to regulate political ads that contain attacks.”
Respondents were also asked to assess the tone of the Republican senatorial candidate ads,
Democratic senatorial candidate ads, and (in 2010 only) interest group airings on behalf of the
Republican and the Democratic senatorial candidates. These variables serve as our indicators of
perceptions of tone, which are measured on an ordered scale that ranges from 1 indicating a
response of “mostly positive” to 3 indicating a response of “mostly negative” (2 indicates
“mixed” and we exclude “don’t know” responses from the analysis).

As we are primarily interested in determining the influence of objective ad airings in a
citizen’s media market compared to respondent perceptions, we include two measures of tone:
the volume of negative or contrast ads and the volume of positive ads. We subtract the latter

5 Conducting our 2010 survey seven weeks after Election Day is less than ideal given that people
may have forgotten the activities of the campaign. Still, the delay forced respondents to go back
and think about the entire campaign, making it unlikely that an ad seen in the last few days of the
campaign unduly influenced “top of the head” responses. Our 2012 survey was conducted
immediately following the election, however. If late ads drive perceptions, we might see effects
in 2010 but not 2012.
6 Respondents were matched on gender, age, race, education, partisan identification, ideology
and political interest, and then weighted the matched set of survey respondents to known
marginals for the U.S. based on the American Community Survey.
from the former to get a “negative ad volume advantage” measure. We create two such measures: first by combining all candidate, coordinated and party ads by party and separately for all independent group ads by party. We focus only on ads that aired from September 1 to Election Day.

Setting the Stage

The first step in our analysis is descriptive. As we noted at the outset, interest groups are far more active in American elections after Citizens United than before. This is demonstrated in Table 1, which shows the percentage of House and Senate ads sponsored by outside groups and political party committees between 2000 and 2012. The totals reflect ads aired after August in the election year.

First, the effect of Citizens United should not be overblown. Outside groups in House races had about the same role in 2000 as they did in 2012—the latter election being part of the now infamous “issue advocacy” phase of campaign finance. This was when groups would

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7 We combined negative and contrast ads so as to avoid the collinearity that results when additional measures are included in the model. Theoretically, it also makes sense as many scholars define a negative ad as any ad that mentions an opponent (Lau and Pomper 2004). One alternative approach is to assign half the contrasting ads to the total for negative ads and half to the total of positive ads. Because our measure is the negative/contrast advantage in the market, this amounts to just negative ads minus positive ads. We tried all of our models under this alternative specification and the substantive results are unchanged.

8 Although party ads are separate from coordinated and candidate spots, the clear partisan link in the paid for by line should be sufficient to clue in respondents as to the source of the attack.

9 A more appropriate time frame would be campaign specific, where the start date by state is the day after the primary election. Some candidates do not face real opposition in a primary, however, and generally run general election campaigns (attacking their likely November opponent or promoting their own campaign) during the primary phase. To standardize the approach, we focus on ads aired in the fall.

10 One could expand the focus to include the entire election year. Doing so has the effect of raising the percentages for interest groups (many of whom spend funds throughout the year) while lowering them for parties (who spend most money in the last part of the general election). Such differences are not dramatic, however.
sponsor thinly veiled issue-based messages that advocated for candidates under the auspice of educating voters about policy. They did this to avoid campaign finance limits—in place at the time—on how a group could spend funds to advocate for candidates. Such a presence declined between 2002 and 2008, but interest group pro-candidate advocacy jumped in 2010.

Outside groups in Senate races were never very active before 2008, but their involvement jolted upwards in 2012, such that for the first time in the time series outside groups out-advertised the party committees in a congressional context. Party committees here are generally consistent players in congressional elections between 2000 and 2012. Their role dips a bit in Senate elections, but they regularly account for 20-30 percent of House and Senate ads.

[Table 1 about here]

Of particular focus for us, however, is the tone of campaign ads. Figure 1 uses the content coding of Wesleyan Media Project staff to assess the amount of negativity by candidates, parties, and groups in congressional elections. By all accounts, negativity between 2000 and 2012 is on the rise. Just looking at negative ads shows that they have moved upwards from about 30-plus percent of House candidate and party ads in 2000 to about 40 percent in 2012. Combining contrast ads with negative ads shows an increase of about 10 percent, from about 60 to 70 percent. For the Senate, negativity rises from between 20 and 30 percent for candidates and parties between 2000 and 2004 to over 40 percent in 2008 through 2012. The relative jump is similar if you include contrast ads in the total.

For interest groups, the increases are even larger. At least between 2000 and 2008, interest groups would sponsor anywhere from 20 to 40 percent of their total on positive ads. In the last two cycles, however, groups devote over 80 percent of their ads on pure attacks, while
nearly 90 percent are either contrasting or pure attack. Interest groups have nearly abandoned promotional ads for Senate candidates, and nearly all of these are pure attacks on candidates.

Negativity is not ubiquitous, however. The negativity environment fortunately varies significantly, which is what we hope to leverage in the analysis. To see this, Figure 2 plots the distribution of candidate/party negativity by the competitiveness of the race in 2010 and 2012. We look at the volume of negativity (relative to the volume of positive ads) in each Senate race, looking at ad totals in the media markets of each state. We identify competitiveness using the Congressional Quarterly Fall assessments, where each race is scaled from “safe” to “leaning (in one direction)” to “favored (for one party)” to “too-close-to-call.” The graph shows the range separately for each level of competitiveness. The reported dots on the graph show the median negative volume within the race type, and the shaded box shows the range from the 25th to 75th percentile.

*CQ*’s competitive scores conform quite nicely to the levels of negativity. For example, in safe seats, the median tone volume is slightly positive. In races categorized as highly competitive, every market has more negative than positive ads, and the median market has nearly 2,500 more negative ads than positive ones.

For our purposes, this type of range should be useful. For voters in competitive races, for example, some markets have a lot more negative ad volume than others. Some markets have very few ads, or a balance between positive and negative spots. We would hope that voters embedded in these different information environments would respond with assessments of negativity that match well the reality on the airwaves.
We are also interested in the presence of interest groups, of course. And there are lots of markets and Senate races with a heavy amount of outside group electioneering. This too is a positive for our analysis, but it is also problematic. As one might expect, the places where interest groups are heavily active—and negative—are also the places where candidates tend to be negative. This makes it challenging to sort out the influence of candidate/party volume with the influence of group volume.

To demonstrate this, we plot in Figure 3 the level of candidate/party negativity on the level of interest group negativity in Senate races for 2010 and 2012. Each entry on the plot is a media market. A number of important points stand out. First, there is a strong relationship between candidate and group activity. For Democrats, the bivariate plot has an R-squared value of 0.38. For Republicans, it is 0.27. Moreover, the fitted line shows (the OLS equation is at the top of each panel in the graph) that every pro-Democratic group attack produces 1.5 attack ads from Democratic candidates. For Republicans, one ad from groups results in nearly one ad from candidates. Despite the strong relationship, however, the plots do suggest considerable variation. There are lots of markets where interest groups are not present, for example, and lots of markets where the volume of attacks is not even. By controlling for both measures in our models of voter perceptions, we should be able to isolate the effects of each.

[Figure 3 about here]

**Results for Ad Tone Perception**

We suggested earlier three main hypotheses: 1) perceptions of tone should vary with ad tone volume in a campaign, though like-minded partisans may resist seeing their own candidates’ ads as particularly negative; 2) interest group attacks should infiltrate respondents’ assessments
of candidate tone, under the notion that tracking ad sponsorship is not a key priority for voters; and 3) greater levels of ad negativity, particularly from interest groups, should influence assessments of the need for electoral reform and should depress the sense that ads are helpful tools.

Our first step in the analysis is to look broadly at the data. We collapsed voter perceptions (from our two YouGov surveys) in each Senate race in 2010 and 2012 by state, taking the mean candidate and group negativity ratings across relevant media markets. This allows us to look for patterns in the data at the state level. Figure 4 shows the mean state negativity perception for Democratic and Republican candidates against ad volume by candidates and groups. Larger circles are states with a greater number of respondents. We put 2010 and 2012 assessments on the same plot.

[Figure 4 about here]

The data are broadly in line with a few of our expectations. Looking at the left two panels first, we see that greater volumes of negative ads results in higher negativity assessments for candidates. The effect appears fairly linear for Republican candidates, while it increases steadily for Democrats but plateaus in the extreme. Both graphs generally suggest that perceptions of candidate tone are strongly related to the actual information environment.

For the right two panels, the effect of interest group negativity seems less strong. There is no apparent trend in the Democratic case, while the Republican graph reveals a positive though less steep increase compared to candidate ads. In general, these initial relationships point to a stronger effect for candidate ads than interest group ads, though the latter contribute at least something to the mean state-level assessments.
We report individual-level estimates in Table 2. We show the results of six models, two for Republican candidates (2010 and 2012), two for Democratic candidates (2010 and 2012), and one each for Democratic and Republican interest groups (2010 only). The models include measures of ad volume, and we also control for competitiveness, trust in government and standard demographics (partisanship, ideology, gender, age and education).

Our first hypothesis was that the ad information environment would predict well voters’ perceptions of ad tone. The results above suggest this, as does the individual level analysis. For one, our control for competitiveness is a significant predictor of ad perceptions in four of the six models. And we know from Figure 2 that more competitive races are more negative. In the 2012 Democratic candidate model, for example, holding all else constant (even ad volume), the probability of rating the race as mostly positive is 0.34 in a non-competitive race (one rated “safe”) but 0.17 in a highly competitive one. The probability of a “mostly negative” rating doubles, from 0.17 to 0.34. The effect is comparable, though smaller, for Republican candidates (from 0.21 to 0.13 for safe seats; and 0.29 to 0.41 for competitive ones).

More importantly, however, ad volume for candidates is significant in three of the four models, and interest group negativity is significant in both group models. (Our significance indicators in the Table reflect a two-tailed test. Such a standard is really too strong. We would not expect that a more negative campaign would lower assessments of negativity.) In the Democratic candidate model, a one standard deviation change in candidate negativity (a move from roughly 230 more negative ads in the market to a net advantage of 1500) lowers the probability of a “mostly positive” assessment from 0.25 to 0.17 and raises the probability of a
“mostly negative” rating from 0.25 to 0.34.\footnote{The smaller coefficient estimate on Republican candidate ads in 2012 produces a predicted change in perceptions that are only about one-third the size of the Democratic changes. Still, the effect is statistically significant. On this point, it should be noted that controlling for ad volume and competitiveness weakens the impact of the ad volume measures. In the Republican candidate model, for example, the coefficient on candidate ads doubles when we exclude the competitiveness control. We include the control to more efficiently isolate the ad effect, but there is also a linear increase in negativity as competitiveness increases (from Figure 2).} We take this collective evidence as support for the notion that voters quite readily recognize a negative campaign.

Such a result is not surprising, perhaps, as it comports with findings from prior scholarship. What about the effect of interest group negativity in the candidate models, though? In only one case is the measure significant (for Democratic candidates in 2010), but even in that case the results should be contextualized. Figures 2 and 3 put 2010 and 2012 ad volumes in the same display, but pro-Democratic groups were not strongly involved in 2010. (In the entire election year, across all media markets in Senate races, pro-GOP groups out-advertised pro-Democratic ones by nearly 3 to 1.) The balance of the results, especially with more aggressive investments by Republican groups in both years and by Democratic groups in 2012, suggest only weak evidence that interest group ads independently impact assessments of candidate tone.

This set of results is a good one normatively. And although it is not in line with the hypothesis we laid out, it does point to a fairly discerning electorate. Still, the results are not a wash for interest groups. Note, for example, the size of the coefficient estimates in the Republican candidate models. In neither case do the effects approach statistical significance, but the estimated effects compete with the candidate coefficient. As with the state-level aggregations in Figure 4, interest groups have some impact here, even if very weak.

One feature of our first hypothesis also expected heterogeneity in the ads-to-perceptions translation. We argued that given standard theories of persuasion and the moderating effect of
receiving and accepting out-partisan elite appeals, partisans might see their own party’s ads as less negative than their opponent’s ads. There is some evidence of this in Table 2, where partisans across the board view their own candidate and allied groups as less negative. Indeed, these effects are more consistent than the measures of ad volume. For example, in the 2012 Democratic models, moving from pure independent to strong Democrat lowers the probability of a “mostly negative” perception by 0.10. In the Republican model, moving from a pure independent to a strong Republican lowers that assessment 0.15. The effect of partisanship is present in all six of our main models.

However, we are particularly interested in the joint effect of partisanship and ad volume by candidates and parties. To assess this, we interacted both ad measures with indicators for Republicans (weak and strong identifiers), Democrats, and Independents (pure and partisan leaners). This produces six coefficient estimates per model, and these are listed in Table 3. (Control variables are not shown, but their effects are nearly identical to what we present in Table 2.)

[Table 3 about here]

This set of evidence is not all that convincing as it relates to our expectations. Consider the shaded entries in the Table, which are the effects for in-partisans. Five of the ten coefficients are significant. This means that higher volumes of interest group or candidate negativity raise these partisans’ perception that their preferred candidate ran a more negative campaign.\(^\text{12}\) For out-partisans, four of ten estimates are significant. For independents, only two of ten coefficients reach significance. There is just not strong evidence here that partisans actively resist the volume of negativity from their own side of the aisle. It is true, as we noted, that—a priori—

\(^\text{12}\) Admittedly, the two effects for the GOP group model (Model 4) are marginal at best (p~=.08 under a one-tailed test). However, we consider them important given the size of the coefficients.
partisans see levels of negativity differently for candidates of different parties, but high levels of negativity can still make an impact. Again, this is not in line with what we thought we would see, but it does imply additional good news. There is much discussion in the scholarship currently about voters’ partisan selective exposure to news (Stroud 2011), which implies the acceptance of a very restricted set of political information. In this setting, while partisans do see candidate negativity through a filter, ad volume can still break through.

It should be noted, finally, that interest group ads are still less likely to move candidate perceptions in these models. With the disaggregation by party in Table 3, two interest group measures are significant compared to seven candidate coefficients.\textsuperscript{13}

\textbf{Results on Assessments of Ads and Reform}

Our final investigation concerns the consequences of negativity on voters’ assessments of the value of ads and the need for government regulation of negativity. Both measures are fairly unique in the literature on negative ads (though see Sides et al 2010). Most scholars focus on measures of internal and external efficacy or trust in government. We are interested specifically in the effect of negativity on assessments of ads themselves.

We approach this section in two ways. First, we model assessments as a function of candidate and interest group ad volume (negative and contrast ads minus positive ads in the market, combining Democratic and Republican ads).\textsuperscript{14} Second, we include ad volume alongside

\textsuperscript{13} We noted earlier the delay in the fielding our 2010 survey. The fact that interest group ad volume shows up as significant only in that year might be an artifact of this delay. As the election receded in memory for voters, assessments may get more jumbled. In 2012, interest groups were more active and more negative. And yet, levels of negativity have no discernible impact in our models of heterogeneous effects.

\textsuperscript{14} We also tried models of ad volume with separate Democratic and Republican ad measures, and the results reported below are unaffected.
respondents’ perceptions of Senate candidate tone. What effect do ads have directly, and what
effect do perceptions of more negative campaigns have?

The results in Table 4 are clear: ad volume has no impact on our dependent variables,
whether we include tone perceptions as a control or not. In contrast, perceptions of candidate
tone are strongly related to assessments of ads. On the question pertaining to ad helpfulness,
greater perceptions of negative Republican and Democratic campaigns lowers helpfulness
ratings. For example, in the 2012 models, in a race where respondents assess both candidates as
running a “mixed” positive and negative campaign, the probability of “strongly disagreeing” that
ads are helpful is 0.35. It rises to 0.56 when both candidates are perceived as “mostly negative.”
The probability that a respondent “somewhat agrees” that ads are helpful declines from 0.31 to
0.18.

On the question of regulating attacks, GOP negativity (in 2010) is associated with higher
need for such regulation, but Democratic negativity (in 2012) has the opposite effect. We
suspect that this is the influence of respondent partisanship working through the tone
perceptions. Republicans in general have a weaker preference for government regulation (the
effect of partisanship is significant in 2010 and 2012), and they also perceive Democrats as
running more negative campaigns (see Table 2). The same indirect effects (for Democratic
respondents) could be responsible for the positive relationship between Republican negativity
and support for regulation.

[Table 4 about here]

All told, the results imply that ads directly have no effect on voters’ general attitudes
about the utility of ads and their corroding influence. As with Sides et al (2010), we can
conclude that to the extent campaigns themselves drive (down) these assessments, the effect is
coming from other components of the campaign (or other features of ads not studied here) than negative ads broadly defined. More importantly for our purposes, interest group negativity is similarly not responsible for any movement in these assessments. Attitudes about ads seem to largely pre-date the campaign itself. Indeed, the stronger effects of tone perceptions in this section, and not ad volume, suggest voters enter campaigns with some pre-existing attitudes about elections more generally. It is not a stretch to see the perception and assessment variables as endogenous and not indicative of a causal pattern that is the result of campaign content specifically.

We can offer one final test with a different set of data. To this point we have looked only at ad volume and survey data. Much of the research in this area relies on experiments, however. As part of another project, we utilized experimental data to test ad persuasion effects, but the analysis there can be leveraged here as a robustness check on the inferences we’ve drawn in this section.

In that analysis, we exposed respondents using Amazon.com’s Mechanical Turk (MTurk) interface to an ad in a fictional state senate race. We showed respondents a negative ad, which was identical across treatments but for the sponsor. For our purposes here, we report the results of showing 200 respondents the candidate ad and 200 other respondents an ad sponsored by the fictional Center for American Democracy. Post-treatment, we asked respondents the same two questions from Table 4, and we also asked respondents to rate the usefulness of the specific ad in making a decision on how to vote. The mean results in each treatment group are reported in Table 5.

[Table 5 about here]
The mean differences between groups are not statistically significant, and the effect actually runs opposite what one might expect. Respondents in the treatment group rate ads (generally and specific to the treatment) as more helpful than the candidate ad. And respondents express a slightly lower need for government regulation of attacks. One might quibble with the reliance on Mturk respondents, but for our purposes here—as a secondary check on a pattern in survey data—the results allow us to more confidently accept our larger inference: interest group negativity is not driving down voters’ assessments of ads. It seems to have no effect whatsoever, in fact.

**Implications and Conclusions**

There are a number of important caveats to consider in this analysis. For one, our dependent variables—especially our measures of ad tone perceptions—are perhaps too blunt. Respondents could only offer one of three evaluations on the ad tone in their Senate campaign. It would be better to consider a scale that might allow volume to impact perceptions more finely. Second, given the nature of the analysis, we were forced to combine candidate and party ads, along with negative and contrast ads. The resulting measure is noisier than focusing only on candidate ads, or by scaling each ad to differing levels of negativity. By splitting ads into group, candidate, and party sponsors, and including measures of negative, contrast, and positive ads for each, we would have introduced too much collinearity in the models. We were forced to make these trade-offs to study real-world survey data, however, and we still find effects that allow for important inferences.

For one, the balance of the evidence suggests only a weak connection between interest group negativity and perceptions of candidate tone. With controls for candidate and party
negativity, along with respondent partisanship and ideology, the volume of outside attacks in a race are not strongly predictive in the candidate models. This is not to suggest that the relationship is flat, though. Indeed interest group ads are a better predictor in one model and the coefficient estimates in two others approach the size of the candidate ad volume measure. Still, there is not a significant amount added to these models from the inclusion of interest group advertising, and we can more firmly conclude that voters evaluate the tone of a candidate’s campaign based more on what she and her party committees are putting on the air than what allied groups do.

This simple finding has potentially enormous implications. Most importantly, it contributes to the small but growing scholarship on the persuasive power of campaign ads by confirming that voters can and do make distinctions about the sponsor of the ads they see. A reasonable assumption is that an ad is an ad, and voters care little and pay even less attention to an ad’s tagline or candidate “stand by” disclaimer. Our findings suggest, however, that voters might be more adept at sorting messages—even loosely sorting—by sponsor. If interest group attacks had infiltrated assessments of candidate tone, one could infer that voters assume all ads on either side of the aisle are of a piece. We are not convinced of this given the evidence we show.

Moreover, our findings on ratings of ad helpfulness and the need for regulation are in line with some prior scholarship. Sides et al (2010) find something similar for their study of gubernatorial and presidential elections, and we contribute to this with the analysis of interest group ads. Here too, heavy attacks from groups do not induce respondents to evaluate ads as less helpful, nor do they raise voters’ perceived need for additional regulations. Such attitudes seem to either pre-date the campaign or come from other forms of campaigning not picked up in our
measures. All told, these findings might reasonably suggest that voters are not reacting to interest groups with newfound levels of cynicism.

The combined set of findings is reassuring. Voters evaluate campaigns as more negative when they are; candidate ads drive perceptions of candidate campaigns more than group ads do, suggesting a fairly adept discernment of sponsorship; and negativity writ large or in the form of interest group ads is not the primary driver of voters’ evaluations of the electoral process. There may be much to dislike about the new campaign finance environment, one that encourages heavy interest group advertising. And there may be reasons to look at increased levels of negativity as a cause for concern. The research in this paper is not the final word on the matter, but the evidence as a whole suggests a more sanguine reaction.
Appendix:
Coding of Variables, 2010 and 2012 YouGov Surveys

Ad Tone Perceptions: Thinking about political advertising in your state what kind of television ads did each of the following run? [Randomize SENATE CANDIDATE A, SENATE CANDIDATE B, Democratic independent groups on behalf of SENATE CANDIDATE A (2010 only), Republican independent groups on behalf of SENATE CANDIDATE B (2010 only)]
1=Mostly Positive , 2=Mixed, 3=Mostly Negative, Dropped=Don’t know or unsure.

Beliefs About Advertising: Please state whether you strongly agree, somewhat agree, somewhat disagree or strongly disagree with the following statements {RANDOMIZE ORDER OF QUESTIONS}{Rotate order of scale but stay consistent within respondent} 1=Strongly disagree, 2=Somewhat disagree, 3=Somewhat agree, 4=Strongly agree. “Political ads are helpful in learning about the candidates running for office.” “The government should do more to regulate the content of political ads that contain attacks.”

7-Point Partisanship: 1=Strong Democrat, 2=Not strong Democrat, 3=Lean Democrat, 4=Independent or don’t know, 5=Lean Republican, 6=Not strong Republican, 7=Strong Republican

Ideology: 1=Very liberal, 2=Liberal, 3=Moderate, 4=Conservative, 5=Very Conservative.

Gender: 0=male, 1=female

Education: 1=No high school, 2=High school graduate, 3=Some college, 4=2-year degree, 5=4-year degree, 6=Post-graduate degree.

Age: age in years.

Trust in Government: How much of the time do you think you can trust the government in Washington to do what is right? Just about always, most of the time, or only some of the time? {Rotate ordering of scale}. Coded: 1=Never, 2= Only some of the time, 3=Most of the time, 4= Just about always,
Tables and Figures

Table 1—Group and Party Ads in Congressional Elections, 2000-2012

<table>
<thead>
<tr>
<th>Percent sponsored by...</th>
<th>Groups</th>
<th>Parties*</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>House</td>
<td>Senate</td>
</tr>
<tr>
<td>2000</td>
<td>16.12%</td>
<td>5.74%</td>
</tr>
<tr>
<td>2002</td>
<td>6.46%</td>
<td>4.83%</td>
</tr>
<tr>
<td>2004</td>
<td>1.49%</td>
<td>4.55%</td>
</tr>
<tr>
<td>2006</td>
<td>3.73%</td>
<td>4.24%</td>
</tr>
<tr>
<td>2008</td>
<td>5.73%</td>
<td>13.35%</td>
</tr>
<tr>
<td>2010</td>
<td>13.45%</td>
<td>14.50%</td>
</tr>
<tr>
<td>2012</td>
<td>17.78%</td>
<td>22.55%</td>
</tr>
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</table>

*Party ads combine independent and coordinated exp.
All Ads aired post 8/31
Source: Wisconsin Advertising Project and Wesleyan Media Market. Before 2008 only top 75 or 100 markets are included.
Figure 1—Negative Advertising, 2000-2012

Source: Wesleyan Media Project; 2006 tone numbers are not avail.
Figure 2—Senate Tone by Competition, 2010-2012

Candidate/Party Negativity, 2010-2

Source: Wesleyan Media Project, Senate ads post 8/31; Totals are at state/market level
Figure 3—Candidate Ads and Interest Group Ads in Senate Races, 2010 and 2012

*Each entry is a media market in a Senate race. The plot only includes ads aired after August.
Figure 4—Ads and Mean Candidate Perceptions by State, 2010 and 2012

Source: Wesleyan Media Project and YouGov
Table 2—Effects of Ad Negativity on Perceptions of Tone

<table>
<thead>
<tr>
<th></th>
<th>(1)</th>
<th>(2)</th>
<th>(3)</th>
<th>(4)</th>
<th>(5)</th>
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<tr>
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<td>Dem</td>
<td>GOP</td>
<td>Dem</td>
<td>GOP</td>
<td>Dem</td>
<td>GOP</td>
</tr>
<tr>
<td></td>
<td>Cand</td>
<td>Cand</td>
<td>Groups</td>
<td>Groups</td>
<td>Cand</td>
<td>Cand</td>
</tr>
<tr>
<td>Cd/Pty neg (1000 ads)</td>
<td>-0.010</td>
<td>0.151+</td>
<td>0.211+</td>
<td></td>
<td>0.076+</td>
<td></td>
</tr>
<tr>
<td>IG neg (1000 ads)</td>
<td>0.213+</td>
<td>0.149+</td>
<td>0.361+</td>
<td>0.279+</td>
<td>0.013</td>
<td>0.055</td>
</tr>
<tr>
<td></td>
<td>(p=.381)</td>
<td>(p=.116)</td>
<td></td>
<td></td>
<td></td>
<td>(p=.519)</td>
</tr>
<tr>
<td>Party (Dem to Rep)</td>
<td>0.231*</td>
<td>-0.265*</td>
<td>0.263*</td>
<td>-0.252*</td>
<td>0.119*</td>
<td>-0.156*</td>
</tr>
<tr>
<td>Ideology (Lib to Cons)</td>
<td>0.205</td>
<td>-0.404*</td>
<td>0.202+</td>
<td>-0.449*</td>
<td>0.240*</td>
<td>-0.134+</td>
</tr>
<tr>
<td>Female</td>
<td>0.212+</td>
<td>-0.072</td>
<td>0.175</td>
<td>-0.286*</td>
<td>0.118</td>
<td>0.041</td>
</tr>
<tr>
<td>Age (in yrs)</td>
<td>-0.003</td>
<td>-0.010</td>
<td>-0.010+</td>
<td>-0.014*</td>
<td>0.003</td>
<td>-0.003</td>
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<td>Education</td>
<td>0.014</td>
<td>0.089+</td>
<td>0.152*</td>
<td>0.151*</td>
<td>-0.031</td>
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<tr>
<td>Trust Gov’t</td>
<td>-0.484*</td>
<td>0.150</td>
<td>-0.539*</td>
<td>0.047</td>
<td>-0.120</td>
<td>-0.014</td>
</tr>
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<td>Competitive race</td>
<td>0.305*</td>
<td>0.080</td>
<td>0.317*</td>
<td>0.113</td>
<td>0.176*</td>
<td>0.106*</td>
</tr>
<tr>
<td>cut1</td>
<td>0.146</td>
<td>-3.112</td>
<td>0.103</td>
<td>-3.774</td>
<td>0.453</td>
<td>-0.997</td>
</tr>
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<td>cut2</td>
<td>2.486</td>
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<td>2.246</td>
<td>-1.505</td>
<td>1.806</td>
<td>0.332</td>
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<td>Observations</td>
<td>525</td>
<td>546</td>
<td>513</td>
<td>534</td>
<td>527</td>
<td>472</td>
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+ p<.10, * p<.05 (all two-tailed)
All estimates are models with standard errors clustered by state
Table 3—Heterogeneity in Tone Perceptions

<table>
<thead>
<tr>
<th>Ads (Neg/con-Pos) (1000s)</th>
<th>Party of R</th>
<th>(1)</th>
<th>(2)</th>
<th>(3)</th>
<th>(4)</th>
<th>(5)</th>
<th>(6)</th>
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<tr>
<td></td>
<td></td>
<td>Dem Cand</td>
<td>GOP Cand</td>
<td>Dem Groups</td>
<td>GOP Groups</td>
<td>Dem Cand</td>
<td>GOP Cand</td>
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<td>Cd/Pty</td>
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<td>-0.058</td>
<td>0.097</td>
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<td></td>
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<tr>
<td></td>
<td>Rep</td>
<td>0.145*</td>
<td>0.175*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Ind</td>
<td>-0.083</td>
<td>0.196</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>IG</td>
<td>Dem</td>
<td>0.415*</td>
<td>0.218</td>
<td>0.520*</td>
<td>0.356 (p&lt;.156)</td>
<td>-0.006</td>
<td>-0.073</td>
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<tr>
<td></td>
<td>Rep</td>
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<td>0.266</td>
<td>0.421</td>
<td>0.282 (p&lt;.146)</td>
<td>0.121</td>
<td>0.205</td>
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<tr>
<td></td>
<td>Ind</td>
<td>0.075</td>
<td>-0.119</td>
<td>-0.193</td>
<td>0.073</td>
<td>-0.047</td>
<td>0.064</td>
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</table>

Observations 530 552 519 540 527 472

+ p<.10, * p<.05 (all two-tailed)

All estimates are models with standard errors clustered by state
Control Variables not shown
Shaded cells are effects on in-partisans
<table>
<thead>
<tr>
<th></th>
<th>Ads are helpful</th>
<th>Regulate ads</th>
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<tr>
<td></td>
<td>(1) 2010</td>
<td>(2) 2010</td>
<td>(3) 2012</td>
<td>(4) 2012</td>
<td>(5) 2010</td>
<td>(6) 2010</td>
<td>(7) 2012</td>
<td>(8) 2012</td>
</tr>
<tr>
<td>Cd/Pty neg (1000 ads)</td>
<td>0.018</td>
<td>0.032</td>
<td>0.036</td>
<td>0.051</td>
<td>-0.033</td>
<td>-0.059</td>
<td>0.019</td>
<td>0.027</td>
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<tr>
<td>IG neg (1000 ads)</td>
<td>-0.018</td>
<td>-0.012</td>
<td>0.004</td>
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<td>0.003</td>
<td>0.022</td>
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<td>Dem tone perception</td>
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<td>-0.195*</td>
<td></td>
<td></td>
<td>-0.099</td>
<td></td>
<td>-0.214*</td>
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<tr>
<td>GOP tone perception</td>
<td>-0.605*</td>
<td>-0.339*</td>
<td></td>
<td></td>
<td>0.424*</td>
<td></td>
<td>0.095</td>
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<tr>
<td>Party (Dem to Rep)</td>
<td>0.048</td>
<td>0.033</td>
<td>-0.040*</td>
<td>-0.069*</td>
<td>-0.184*</td>
<td>-0.095+</td>
<td>-0.071*</td>
<td>-0.047+</td>
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<tr>
<td>Ideology (Lib to Cons)</td>
<td>0.112</td>
<td>0.016</td>
<td>0.120*</td>
<td>0.152</td>
<td>-0.166*</td>
<td>-0.068</td>
<td>-0.139*</td>
<td>-0.113+</td>
</tr>
<tr>
<td>Female</td>
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<td>-0.011</td>
<td>0.032</td>
<td>0.041</td>
<td>0.325*</td>
<td>0.471*</td>
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<td>0.165</td>
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<tr>
<td>Age (in yrs)</td>
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<td>0.010*</td>
<td>-0.002</td>
<td>-0.002</td>
<td>0.009</td>
<td>0.008</td>
<td>0.009*</td>
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<tr>
<td>Education</td>
<td>-0.149*</td>
<td>-0.129*</td>
<td>-0.070+</td>
<td>-0.043</td>
<td>-0.116*</td>
<td>-0.105*</td>
<td>-0.093*</td>
<td>-0.108*</td>
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<td>Trust Gov’t</td>
<td>0.544*</td>
<td>0.654*</td>
<td>0.210*</td>
<td>0.140</td>
<td>0.312*</td>
<td>0.181</td>
<td>0.111*</td>
<td>0.119</td>
</tr>
<tr>
<td>Competitive race</td>
<td>-0.126</td>
<td>-0.090</td>
<td>-0.058</td>
<td>-0.065</td>
<td>0.025</td>
<td>-0.012</td>
<td>0.070*</td>
<td>0.076*</td>
</tr>
<tr>
<td>cut1</td>
<td>0.280</td>
<td>-1.248</td>
<td>0.091</td>
<td>-0.945</td>
<td>-1.856</td>
<td>-0.851</td>
<td>-0.908</td>
<td>-0.870</td>
</tr>
<tr>
<td>cut2</td>
<td>1.576</td>
<td>0.035</td>
<td>0.743</td>
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<td>-0.835</td>
<td>0.032</td>
<td>-0.251</td>
<td>-0.240</td>
</tr>
<tr>
<td>cut3</td>
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<td>0.640</td>
<td>1.502</td>
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<td>0.611</td>
</tr>
<tr>
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<td>485</td>
<td>719</td>
<td>437</td>
<td>711</td>
<td>486</td>
<td>720</td>
<td>439</td>
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</table>

+ p<.10,  * p<.05 (all two-tailed)

All estimates are models with standard errors clustered by state
Ad measures within sponsor combine Democratic and Republican ads.
All DV range from strongly disagree to strongly agree
Table 5—Results of Experiment on Ad Assessments

<table>
<thead>
<tr>
<th></th>
<th>Ads are helpful</th>
<th>Gov’t should regulate attacks</th>
<th>This ad was helpful</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Cand. Ad</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mean</td>
<td>2.88</td>
<td>3.19</td>
<td>2.98</td>
</tr>
<tr>
<td>N</td>
<td>203</td>
<td>203</td>
<td>203</td>
</tr>
<tr>
<td>Std. Dev.</td>
<td>1.05</td>
<td>1.20</td>
<td>1.08</td>
</tr>
<tr>
<td><strong>Group Ad</strong></td>
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</tr>
<tr>
<td>Mean</td>
<td>3.05</td>
<td>3.04</td>
<td>3.09</td>
</tr>
<tr>
<td>N</td>
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<tr>
<td>Std. Dev</td>
<td>1.12</td>
<td>1.15</td>
<td>1.15</td>
</tr>
</tbody>
</table>

Scales range b/w 1 (strongly disagree) and 5 (strongly agree)
No differences are statistically significant
Source: MTurk experiment (July 2013)
References


