

Less Partisan but No More Competent: Expressive Responding and Fact-Opinion Discernment

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Research suggests that partisanship interferes with peoples' ability to distinguish between factually verifiable statements and opinion statements. We investigate the degree to which observed partisan bias in fact-opinion discernment is due to expressive responding: Partisans may claim that congenial opinions are facts, and that uncongenial facts are opinions, because they want to express their partisan attitude toward the statement. Four experiments (total $N = 10,614$) show that expressive responding substantially inflates measured partisan differences in fact/opinion classifications, by more than 50% in the United States and about 30% in Israel. Despite this, we find little evidence that our treatments increased the proportion of correct classifications. In other words, although expressive responding makes people look more partisan than they really are, it does not lead surveys to underestimate the average person's ability to distinguish fact from opinion. These results are compatible because of a rarely noted implication of expressive responding theory: When the correct answer is party-congenial, expressive responding makes people look more competent than they really are.

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Mass media societies bombard citizens with information. This information contains a mixture of verifiable facts and subjective opinions, usually without labels to help citizens distinguish one from the other. This could make it difficult for people to critically evaluate the claims they encounter. As [Merpert et al. \(2018, 49\)](#) argue that “[w]ithout being able to identify if information presented is fact or opinion, fact-checkers and the public alike would have no basis on which to begin their scrutinizing.” Research in the United States identifies partisanship as a key factor that interferes with fact-opinion discernment ([Mitchell et al. 2018](#)). When asked in a survey, partisans classify statements in a biased manner, claiming that their side’s opinions are verifiable facts and that facts favorable to the other side are merely opinions.

We study the possibility that apparent partisan bias in fact-opinion discernment is at least partly due to expressive responding, which is the tendency among survey respondents to use questions as an outlet for partisan sentiments rather than their sincere beliefs ([Bullock et al. 2015](#); [Prior et al. 2015](#); [Schaffner and Luks 2018](#)). Our approach draws on the theory of response substitution, which holds that survey respondents often provide “an answer to a question that reflects attitudes or beliefs that they want to convey but that the researcher has not asked about” ([Gal and Rucker 2011, 186](#)). Asking the “unasked question” allows people to say what they want to say, reducing expressive responding. In each of four survey experiments, we allowed randomly selected respondents to express their (dis)agreement with the statement, or their view it was (in)accurate, prior to classifying it. We find that expressive responding substantially inflates observed partisan bias in fact-opinion discernment, by more than 50 percent in the United States and about 30 percent in Israel.

Despite substantial reductions in partisan divides, we find that expressive responding has little effect on the public’s overall average ability to discern fact from opinion. In the United States, the increase in accuracy due to the treatment is equal to about 1% of the baseline. In Israel, we find no evidence of an increase in accuracy. In fact, and contrary to our pre-registered expectations, our estimates suggest that the treatments decreased overall accuracy by 5 to 8%. We attribute the combination of large partisan effects and small accuracy effects to a rarely noted implication

of expressive responding theory. Whereas research on beliefs shows that expressive responding tends to hide knowledge of answers that are uncongenial to one's party (e.g., [Prior et al. 2015](#); [Khanna and Sood 2017](#)), we show that at least in the case of fact-opinion discernment, expressive responding can also exaggerate knowledge of answers that are party-congenial. Our findings have implications for study of media literacy and suggest new directions for the study of expressive responding.

Fact-Opinion Discernment

In a fragmented media environment full of slanted opinions and false or misleading information, media literacy is as important as ever. Several interventions have been shown to improve people's ability to assess the accuracy of factually verifiable information, including tips for spotting false news ([Guess et al. 2020](#); [Hameleers 2022](#)), priming accuracy ([Pennycook et al. 2021](#)), and priming the importance of being a discerning information consumer ([Tully et al. 2020](#)). A smaller but growing body of research examines *fact-opinion discernment*, which is the ability to distinguish statements that are factually verifiable from opinion statements ([Mitchell et al. 2018](#); [Merpert et al. 2018](#); [Crowder-Meyer and Ferrín 2021](#); [Walter and Salovich 2021](#); [Goldberg and Marquart 2024](#)). In real-world settings, fact-opinion discernment is arguably a prerequisite to the more-studied task of evaluating a verifiable statement's accuracy. [Merpert et al. \(2018, 49\)](#) argue that “[w]ithout being able to identify if information presented is fact or opinion, fact-checkers and the public alike would have no basis on which to begin their scrutinizing.”

Existing research on the United States suggests that partisanship may interfere with fact-opinion discernment. A 2018 Pew Research Center (Pew) study found that “Republicans and Democrats were more likely to classify both factual and opinion statements as factual when they appealed most to their side,” with partisan differences of 20 percentage points (pp) or more on four of the ten items tested ([Mitchell et al. 2018](#)). Analyzing the same data, [Crowder-Meyer and Ferrín \(2021\)](#) find that race and ethnicity compound ideological differences. By contrast, [Merpert et al. \(2018\)](#) find little evidence that political affiliation predicts the accuracy of fact-

opinion classifications in political speeches in Argentina.

The only known research on the measurement properties of fact-opinion discernment scales was a series of informal pilot studies conducted by [Mitchell et al. \(2018\)](#). The question format they selected, which we study here, outperformed ten other possible instruments in terms of its clarity. We seek to strengthen the foundation of this emerging body of research by studying a previously unexamined threat to inference: expressive responding.

Expressive Responding

We study the possibility that observed shortfalls in fact-opinion discernment are an artifact of partisan expressive responding, wherein survey-takers choose responses that are more partisan than their underlying beliefs ([Bullock et al. 2015](#); [Prior et al. 2015](#); [Khanna and Sood 2017](#); [Schaffner and Luks 2018](#); [Shino et al. 2022](#)). Our expectations are informed by theories of response substitution, which occurs when survey respondents provide “an answer to a question that reflects attitudes or beliefs that they want to convey but that the researcher has not asked about” ([Gal and Rucker 2011](#), 186). Gal and Rucker give the example of a restaurant with great food and bad service. If a customer survey asked only about the food, one might give it a low rating as a way of expressing disapproval of the service. Adding a question about the service would reverse this. Gal and Rucker refer to this as answering an “unasked question.” In our case, we expect respondents to use fact-opinion discernment questions as a means of expressing their feelings about it rather than its verifiability. If this is occurring, providing respondents with a separate opportunity to express their views about the statement should reduce partisan bias.

Though expressive responding is widely understood to inflate measured partisan differences, it does not necessarily have much effect on overall average accuracy. Consider the factual statement “Our planet is warmer than it was 100 years ago.” This fact is uncongenial to Republicans, whose party opposes efforts to mitigate global warming. Because people usually do worse on uncongenial questions, we expect Republicans to be less likely to answer correctly than Democrats. Expressive responding would reinforce this. Because the statement is uncongenial to Republicans, some who

know that the statement is factually verifiable may nevertheless denigrate it by calling it an opinion, hiding their knowledge of the correct answer. By contrast, because the statement is congenial to Democrats, some who think it is an opinion may say it is a fact, hiding their ignorance and creating an illusion of knowledge. Both forces—hidden knowledge among Republicans and hidden ignorance among Democrats—reinforce partisan differences. Yet they have opposite effects on accuracy, partially cancelling out one another’s influence on the overall average.

Our expectations mirror this example’s emphasis on two sets of directional expectations, the baseline difference and the direction of expressive responding. Figure 1 summarizes our expectations. When a question is congenial, respondents are more likely to answer correctly. This advantage is inflated by expressive responding, which encourages congenial answers. A treatment that reduces expressive responding would counteract this, reducing their accuracy and shrinking their advantage over the other party. On the flip side, when a question is uncongenial, respondents are more likely to answer incorrectly. This disadvantage is exaggerated by expressive responding, which discourages uncongenial responses. A treatment that reduces expressive responding would counteract this, revealing hidden knowledge of uncongenial answers. Treatment again shrinks the gap, but this time by *increasing* accuracy. In this way, the two forces—hidden ignorance on congenial questions and hidden knowledge on uncongenial questions—reinforce one another’s effect on partisan differences but counteract the other’s effect on average accuracy.

Based on our expectations, we preregistered three hypotheses. Hypothesis 1 was that treatment would reduce partisan differences. Based on research about beliefs, we also expected hidden knowledge to be more common than hidden ignorance. For example, [Prior et al. \(2015\)](#) report that their treatments reduced congenial errors more than uncongenial errors. Our other two hypotheses capture this expectation. Hypothesis 2 was that treatment would make respondents more accurate, and Hypothesis 3 was that the effects on uncongenial questions (i.e., hidden knowledge) would be larger than the effects on congenial questions (i.e., hidden ignorance).

Expressive responding is distinct from the concern that observed partisan differences are driven by congenial guessing. Because [Mitchell et al. \(2018\)](#) were designing a measure of an

Figure 1: Summary of Expectations

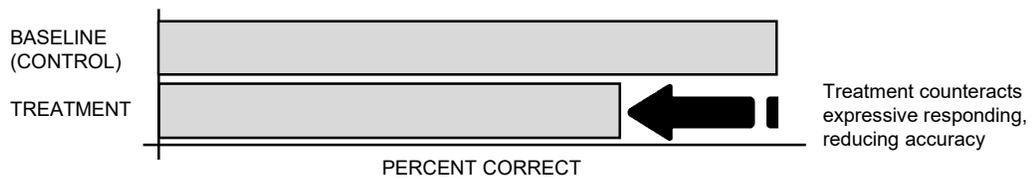
Congential questions are often answered correctly...



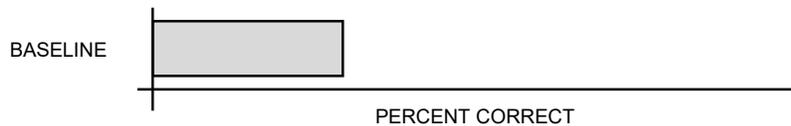
but this could be because expressive responding encourages people to give congenial answers, exaggerating how much they know (“illusory knowledge” or “hidden ignorance”).



Treatment counteracts expressive responding, reducing the number of correct answers. Among the affected responses, this removes the illusion of knowledge and reveals hidden ignorance.



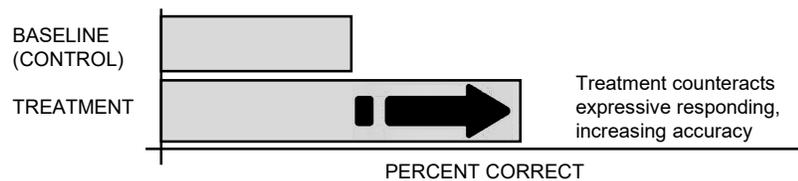
Uncongenial questions are less often answered correctly...



but this could be because expressive responding discourages people from giving uncongenial answers, hiding what they know (“hidden knowledge”).



Treatment counteracts expressive responding, increasing the number of correct answers. This reveals hidden knowledge.



- Hypotheses:**
- Partisan differences decrease (H1).
 - Accuracy will increase (H2).
 - Hidden knowledge on uncongenial questions will be more common than hidden ignorance on congenial questions (H3),

ability (fact-opinion discernment), they followed best practices in educational testing by requiring respondents to guess when they are uncertain. Tests that discourage guessing are biased against people who are more reluctant to make educated guesses (Mondak 2000), which is why standardized tests like the Scholastic Aptitude Test (SAT) encourage students to guess. Our experiments are also not designed to reduce partisan guessing. If respondents who use partisanship as a heuristic really believe that it is informative, we would call this a sincere best guess, and would not expect providing an expressive outlet to induce respondents to lay partisan heuristics aside. Studying guessing's effect on measured belief differences requires an approach similar to Shen, Sood and Weitzel (2023), who compare question formats and instructions that handle guessing and uncertainty differently.

Research Design

We conducted four preregistered survey experiments, each with the same design. The control condition replicated the Mitchell et al. (2018) instrument also used in later U.S. research (Crowder-Meyer and Ferrín 2021; Walter and Salovich 2021). Each statement appeared in the following format:

Consider this statement:

Our planet is warmer than it was 100 years ago.

Would you consider this to be a factual statement (whether you think it is accurate or not) or an opinion statement (whether you agree with it or not)?

[Factual statement] [Opinion statement]

The randomly assigned treatments consisted of an additional question that appeared between the statement and the classification question. In the accurate condition, respondents were asked, "Would you say this statement is accurate or inaccurate?," followed by a scale ranging from "Very inaccurate" to "Very accurate." In the agree condition, respondents were asked, "Do you agree with this statement?," followed by a scale ranging from "Strongly disagree" to "Strongly agree."

By providing respondents with an opportunity to express their feelings toward the statements, these treatments aim to reduce expressive responding.

Our design constitutes a “hard test” of the response substitution hypothesis. The control conditions ask subjects to lay aside their views as to the accuracy or agreeableness of the statements as they formulate their response. These are the same sentiments that our treatments allow subjects to express. In order for our treatments to work, it must be the case that the request is at least partly ineffective.

Case Background

Studies 1 and 2: the United States

Our first two studies examine the United States. We began with this case because it is the subject of most previous research on fact-opinion discernment, including the three previous studies that use the same question format (Mitchell et al. 2018; Crowder-Meyer and Ferrín 2021; Walter and Salovich 2021). Study 1 was conducted from June 2 to 21, 2021 ($N = 2,955$). Study 2 was conducted July 7-31, 2021 ($N = 4,892$). Subjects were recruited through Amazon Mechanical Turk (MTurk), which provides diverse convenience samples.¹ Across the two studies, subjects were 50.5% female, 68.7% white non-Hispanic, and had a mean age of 40.5, all of which are close to Census benchmarks.

The factual and opinion statements used in Study 1 and 2 are a mix of statements from the original Mitchell et al. (2018) study (marked with an * in Figure 2) and some original statements intended to ideologically balance the question battery. Using data from the control condition, Figure 2 displays the full text of each statement and the proportion of accurate classifications by Democrats and Republicans. Overall, respondents classified 77% of statements correctly, including 76% of factual statements and 78% of opinion statements. Democrats classified 78% correctly, compared with 75% for Republicans (difference = 3.7, s.e. = 0.6). This is about halfway between

¹Existing research finds that experimental treatment effects in MTurk come close to effects in more representative samples, but that descriptive quantities may not be representative (Coppock et al. 2018).

perfect performance (100%) and what one would expect from random guessing (50%).

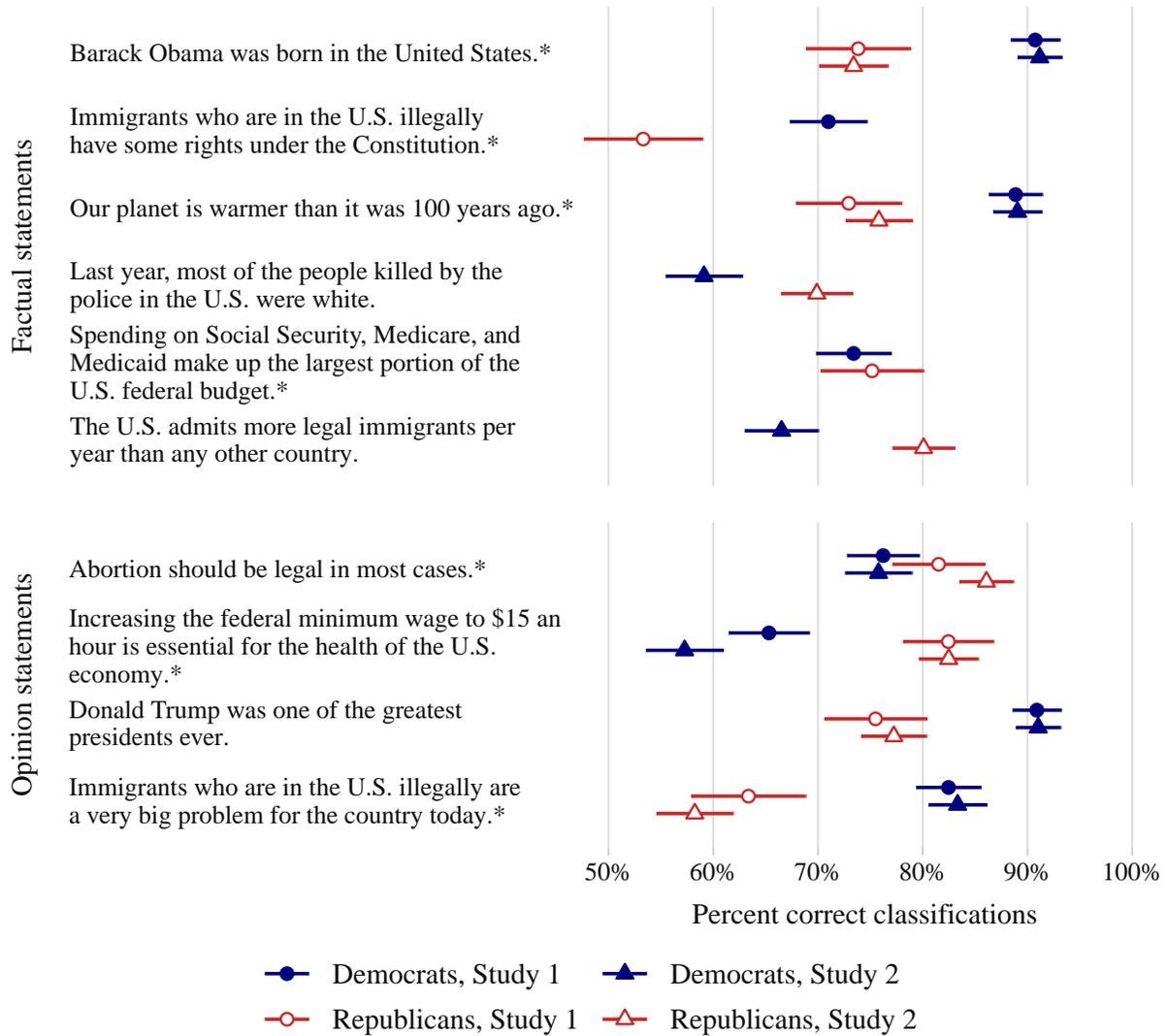
The top panel of Figure 2 displays the six factual statements, four of which appeared in Study 1 and four of which appeared in Study 2.² The first three statements listed are facts that we expected to be congenial to Democrats. Democrats classified these items correctly 87% of the time, compared with 74% among Republicans (difference = 12.4, s.e. = 0.6). The second three statements are facts that we expected to be congenial to Republicans. Republicans were more likely to classify these questions correctly (75% to 67%; difference = 7.1, s.e. = 0.9).

The bottom panel of Figure 2 displays the four opinion statements. The first two statements, advocating abortion access and increases to the federal minimum wage, are opinions that are more likely to be held by Democrats. Republicans are more likely to correctly classify them as opinions (82%), while Democrats are more likely to call them facts (72% correct; difference = 9.8, s.e. = 0.7). The second two opinions, asserting a former Republican president's greatness and that unauthorized immigration is a problem, are more likely to be held by Republicans. Democrats are more likely to correctly classify them as opinion while Republicans are more likely to wrongly assert that they are facts (84% versus 69%; difference = 14.5, s.e. = 0.7).

These results highlight that even when the correct answer is congenial, a substantial percentage of respondents answer incorrectly. Given that 50% of random responses would be expected to be correct, 82 and 84% are about one third of the distance between complete competence and compete incompetence. On some questions, the percentage falls to the midpoint of 75% or lower. This suggests that bias cannot fully explain shortfalls in the public's ability to distinguish fact from opinion. In fact, when the percentage of correct answers is lower, partisan differences tend to be smaller (inter-item correlation = 0.343). We think the most likely explanation for inter-item variation in the proportion of correct answers is differences in difficulty: as in any other test of ability, some questions are harder than others. However, sources of bias other than partisanship could also contribute to low accuracy on these items. We elaborate on the potential value of a broader

² We intended to use the Study 2 statements in both studies and included that list of questions in our Study 1 preregistration. However, we forgot to click the "Publish" button in Qualtrics after finalizing the design of Study 1, causing us to use an earlier draft version of the battery.

Figure 2: Partisan Differences by Statement, Studies 1 and 2 (United States)



Note: Figure displays control group means from Studies 1 and 2. Dots are point estimates. Vertical bars represent 95 percent confidence intervals. * indicates statements that were included in the Mitchell et al. (2018) study.

conception of bias and congeniality in the concluding section (also see Crowder-Meyer and Ferrín 2021).

Studies 3 and 4: Israel

Studies 3 and 4 were fielded in Israel during a time of political turmoil. Following a two-year period which included four national elections, a national unity government was sworn into office in June 2021. The ideologically diverse coalition included parties from the left, right, and

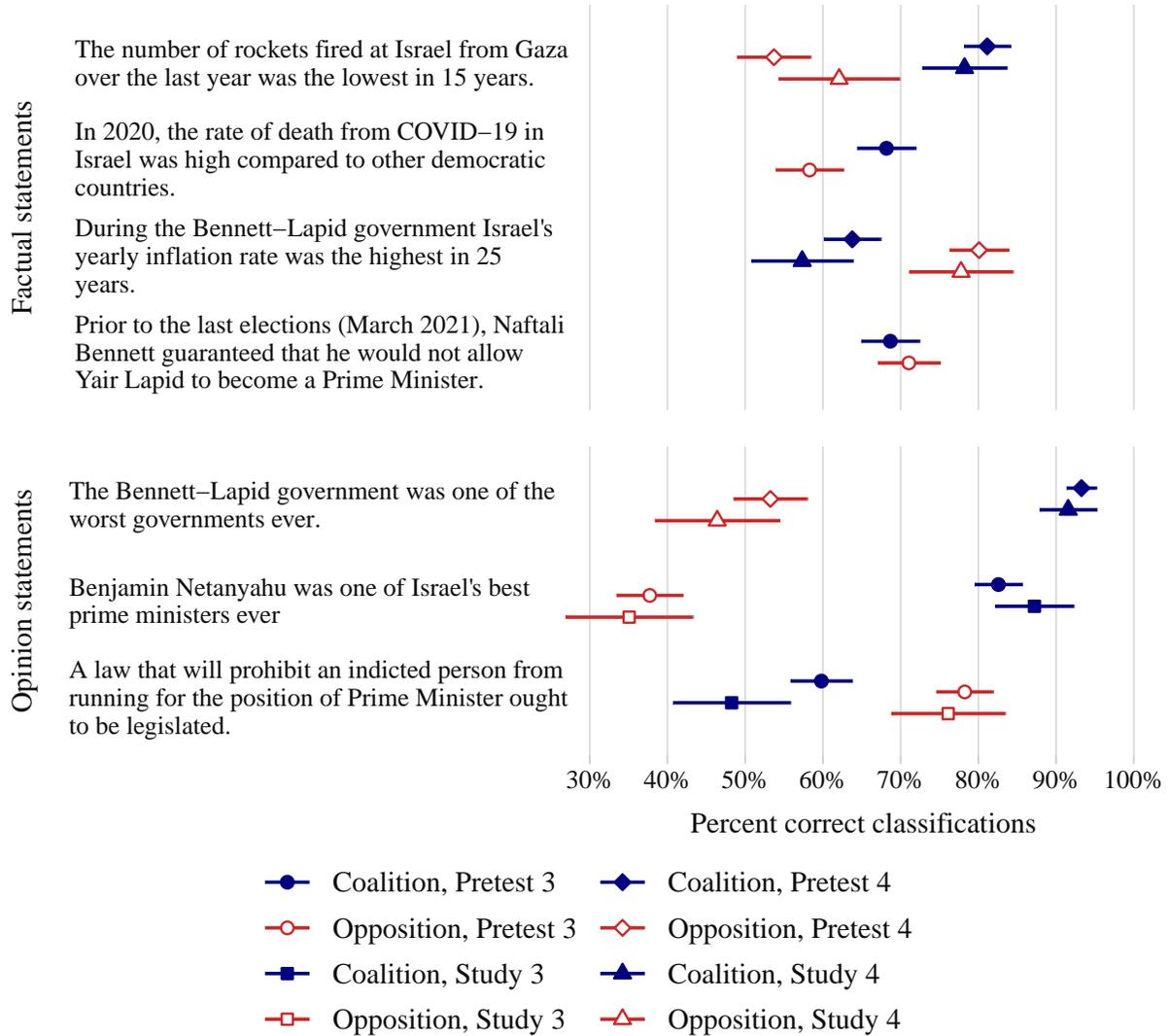
center, as well as the first Arab party in Israel's history to join a coalition. We refer to respondents who report having voted for this government as coalition supporters and those who voted for an opposition party as opposition supporters.

Study 3 was fielded to 1,260 subjects from February 22-27, 2022. Study 4 was fielded to 1,507 subjects from October 24-27, 2022, about one week before the November 1 national election. Subjects were recruited by iPanel, which operates a large opt-in internet panel. Across the two samples, subjects were 50.6% female, 79.9% Jewish, and had an average age of 40.6, all of which come close to population benchmarks. Prior to both studies, we fielded pretests consisting only of the control condition. This allowed us to establish whether partisan differences existed. For the experiments we selected items with larger partisan differences, reasoning that this would make treatment effects easier to detect.

Figure 3 displays the text of the statements and the percentage correct among coalition supporters and opponents. The top panel of Figure 3 displays the four factual statements that were pre-tested before either Study 3 or 4. The first pair was designed to be congenial to coalition supporters. Then-opposition leader Benjamin Netanyahu had presided over a large number of deaths from COVID-19 just before the coalition took over, and the coalition subsequently presided over an unusually small number of rocket attacks from Gaza. On average, these statements were classified correctly by 74% of coalition supporters and 56% of opposition supporters (difference = 17.4, s.e. = 1.7, $p < 0.001$). The second pair of factual statements was designed to be congenial to the opposition: the coalition had presided over record-high inflation, and its former leader (Naftali Bennett) had broken a promise never to turn power over to its current leader (Yair Lapid). Opposition supporters were more likely to classify these statements correctly (71 to 62%; difference = 8.9, s.e. = 1.7, $p < 0.001$).

The bottom panel of Figure 3 displays the three pre-tested opinion statements. The first two, one condemning the current government and the other celebrating the previous prime minister, were opinions likely to be held by opposition supporters. Accordingly, coalition supporters were more likely to correctly classify them as opinions (87% to 48%; difference = 39.2, s.e. = 0.8,

Figure 3: Partisan Differences by Statement, Studies 3 and 4 (Israel)



Note: Figure displays control group means from Studies 3 and 4, as well as group means from the corresponding pre-test. Dots are point estimates. Vertical bars represent 95 percent confidence intervals.

$p < 0.001$), while opposition supporters were more likely to wrongly characterize their side's opinion as a fact. The third and final statement, asserting that indicted individuals should not be allowed to run for prime minister, was an clear swipe at then-opposition leader Netanyahu, whose recent indictment on corruption charges was one of the central controversies in Israeli politics. Opposition supporters were more likely to correctly classify this as an opinion, whereas coalition supporters displayed a greater tendency to call it a fact (72% to 55%; difference = 17.0, s.e. 2.4, $p < 0.001$).

Across the board, accuracy was fairly low in Studies 3 and 4. Overall, respondents classified 67% of statements correctly, including 68% of factual statements and 67% of opinion statements. These proportions of correct classifications are closer to the percentage expected due to random guessing (50%) than perfect accuracy (100%). Accuracy is lowest among respondents who classify their party's opinions as facts, often falling below 50%. On the factual items, accuracy was low across the board, never exceeding 80% even when the correct answer was congenial. The low proportion of correct responses in Israel could be explained by a lack of public competence, but it could also be explained by confusion over the purpose of the fact-opinion questions, which [Mitchell et al. \(2018\)](#) originally developed with U.S. samples. In general, we think that more research is needed on respondents' understanding of fact-opinion discernment measures, which we discuss in the concluding section.

Results

This section presents the results of all four studies. We begin by showing that our treatments substantially reduced partisan differences but did little to increase response accuracy. To show how these findings are compatible, we then present a graphical analysis that breaks our results down by question congeniality.

Effects on Partisan Differences

Our motivating expectation (H1) is that despite our request that respondents lay aside their feelings about the statement, the partisan differences observed in [Figures 2 and 3](#) are partly due to expressive responding. To estimate effects on partisan differences, we coded all responses on a left-right spectrum, such that 0 is the response that is more congenial to Democrats (the Neftali-Bennett coalition) and 1 is more congenial to Republicans (the Netanyahu-led opposition). Our estimates of the effect on partisan differences appear in [Table 1](#). In each study, β_2 is the partisan difference in the control group and β_3 is the treatment effect (see [Appendix A.1](#) for a more detailed explanation).

Table 1: Effects on Partisan Differences

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.746** (0.010)	0.739** (0.008)	0.408** (0.026)	0.171** (0.017)
β_1 Treatment	0.015* (0.007)	0.043** (0.007)	0.068** (0.028)	0.012 (0.019)
β_2 RightParty	0.136** (0.011)	0.162** (0.009)	0.400** (0.036)	0.272** (0.028)
β_3 Treatment \times Right	-0.045** (0.014)	-0.063** (0.011)	-0.116** (0.045)	-0.043 (0.035)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.306	0.317	0.145	0.143
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

Note: Cell entries are coefficient estimates. Clustered standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$ (one-tailed).

In the United States, we find clear evidence that the treatments reduced measured partisan differences. In Study 1, the average partisan difference in the control condition was 13.6 pp. This declined to 9.1 pp in the treatment condition, a treatment effect of 4.5 pp (s.e. = 1.4, $p < 0.001$). This suggests that expressive responding inflated partisan differences by about 50 percent.³ In Study 2, treatment reduced the partisan difference from 16.2 pp to 9.9 pp, a treatment effect of 6.3 pp (s.e. = 1.1, $p < 0.001$). This suggests that expressive responding inflated partisan differences by nearly two-thirds at baseline.

The same pattern emerges in Israel. In Study 3, the partisan difference in the control condition was 40.0 pp. This declined to 28.4 pp in the treatment condition, a treatment effect of 11.6 pp (s.e. = 4.5, $p < 0.001$). This means that expressive responding inflated measured partisan differences by about 40 percent. In Study 4, treatment reduced the partisan difference from 27.2 pp to 23.9 pp, a treatment effect of 4.3 pp (s.e. = 3.5, $p = 0.11$). This suggests that expressive responding inflated partisan differences by nearly 20 percent at baseline. Our best guess is that the true effect on partisan differences is somewhere in between the Study 3 and 4 estimates.

³4.5 / 9.1 \approx 0.5.

In sum, the estimated effects on partisan differences provide strong evidence of expressive responding. When subjects are not given an opportunity to state their feelings about the statements, partisan differences are inflated by one-half to two-thirds in the United States and by one- to two-fifths in Israel.⁴ To aggregate more systematically across studies, we conducted a random effects meta-analysis. On average across all four studies, we find that the treatments reduced partisan differences by about 5.7 pp (s.e. = 0.8; $p < 0.001$; 95% CI: $-7.3, -4.1$). Based on this evidence, we conclude that expressive responding inflates measured partisan differences in fact-opinion discernment, supporting H1.

Effects on Accuracy

Next, we examine the effects on citizen competence (H2), which we measure in terms of classification accuracy. We coded all responses in terms of correctness, such that 0 is the incorrect classification and 1 is the correct classification, then used OLS to estimate the average treatment effect (details in Appendix A.2). Our estimates appear in Table 2.

In the United States, we find suggestive evidence of small positive effect on accuracy. Among all partisan subjects in Study 1, classification accuracy in the control group was about 77 percent.⁵ We estimate that treatment increased this by just 0.4 pp (s.e. = 0.9, $p = 0.321$). In Study 2, baseline classification accuracy was 76 percent, which increased by 1.2 pp (s.e. = 0.7, $p = 0.037$) due to treatment. Statistical significance aside, these estimates are substantively small, equalling about 1% of the baseline level of accuracy.

In Israel, we find no evidence that the treatments increased response accuracy. In fact, our point estimates suggest a slight *decrease* in accuracy. In Study 3, we estimate that treatment reduced accuracy by 3.2 pp (s.e. = 2.3). Had we preregistered a two-tailed test instead of a one-tailed test (with the wrong directional expectation), this estimate would not have attained statistical significance (two-tailed $p = 0.16$). In Study 4, we observed a large negative effect on congenial

⁴In an exploratory analysis suggested by a reviewer, we found no evidence of heterogeneity by strength of partisanship in the United States (Appendix A.6), suggesting that differences in strength of partisanship between the two countries are unlikely to explain the results.

⁵The control means differ from the constant term in Table 2 because our regression specification includes statement fixed effects.

Table 2: Effects on Classification Accuracy

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α Constant	0.791** (0.010)	0.817** (0.007)	0.612** (0.022)	0.758** (0.018)
β Treatment	0.004 (0.009)	0.012* (0.007)	-0.032 (0.023)	-0.054 (0.018)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.019	0.023	0.000	0.014
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

Note: Cell entries are coefficient estimates. Clustered standard errors in parentheses. * $p < 0.05$, ** $p < 0.01$ (one-tailed).

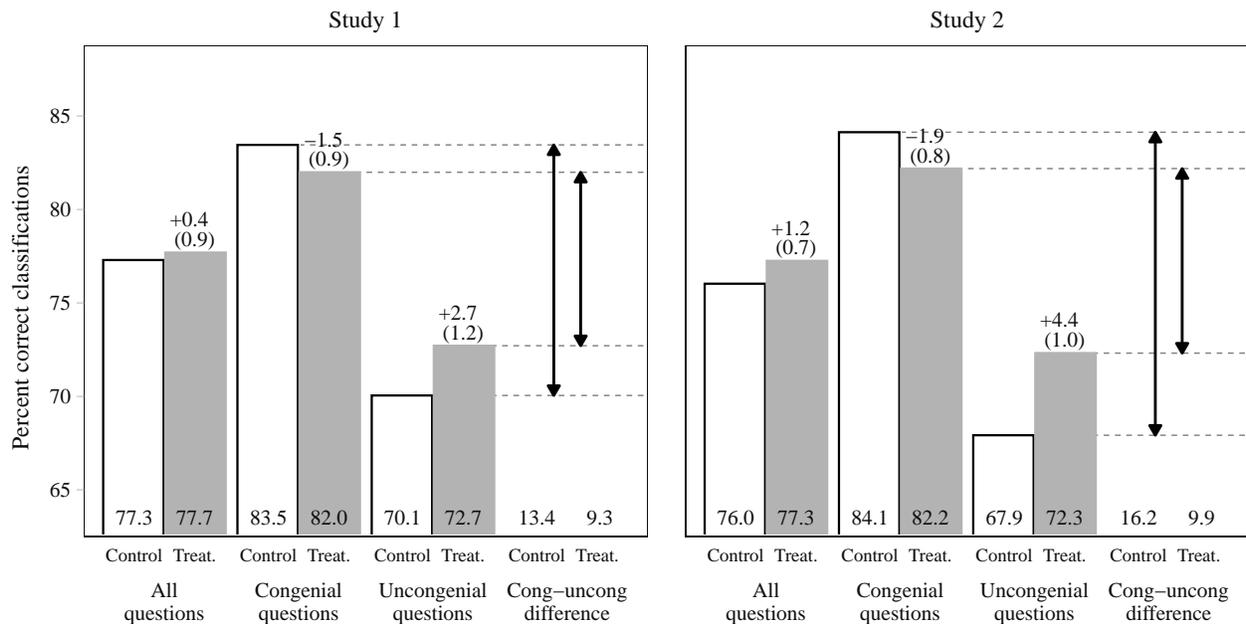
questions and a small negative effect on uncongenial questions. The net result is a 5.4 pp decline in response accuracy (s.e. = 1.8, two-tailed $p = 0.002$). Respectively, these estimates are equal to 5 and 8% of the baseline level of accuracy, which was 62% in Study 3 and 70% in Study 4.

To aggregate across studies, we again turn to random effects meta-analysis. Across the four studies, we estimate a 1.3 pp reduction in classification accuracy (s.e. = 1.5; 95% CI: -4.3, 1.7). Had we preregistered a two-tailed test, this would have been statistically insignificant ($p = 0.397$, two-tailed). Relative to the baseline levels of accuracy, this estimate is also substantively small, equal to roughly 1 to 2 percent of the 60 to 80 percent baseline rates of classification accuracy.

Effects by Question Congeniality

How could the same treatment produce a large decrease in partisan differences alongside minimal, and perhaps even negative, effects on classification accuracy? To provide a deeper look at the results, we now turn to a graphical analysis that splits our results according to whether the question was congenial or uncongenial to the respondent's party. Figures 4 and 5 plot the percentage of correct classifications for all questions, congenial questions, and uncongenial questions. Hollow white bars represent the control condition, and solid grey bars represent the treatment condition. Vertical arrows represent the difference between congenial and uncongenial questions. This difference is identical to the partisan difference in Studies 2 and 3 and very similar in Studies 1 and

Figure 4: Treatment Effects by Question Congeniality, Studies 1 and 2 (United States)



Note: Figure displays estimates from Table 2 (“all questions”) and Appendix Table SM-5 (congenial, uncongenial, and difference). Bars represent the predicted values of group means. Arrows represent partisan differences. Numbers preceded by a + or – are treatment effect estimates. Clustered standard errors in parentheses.

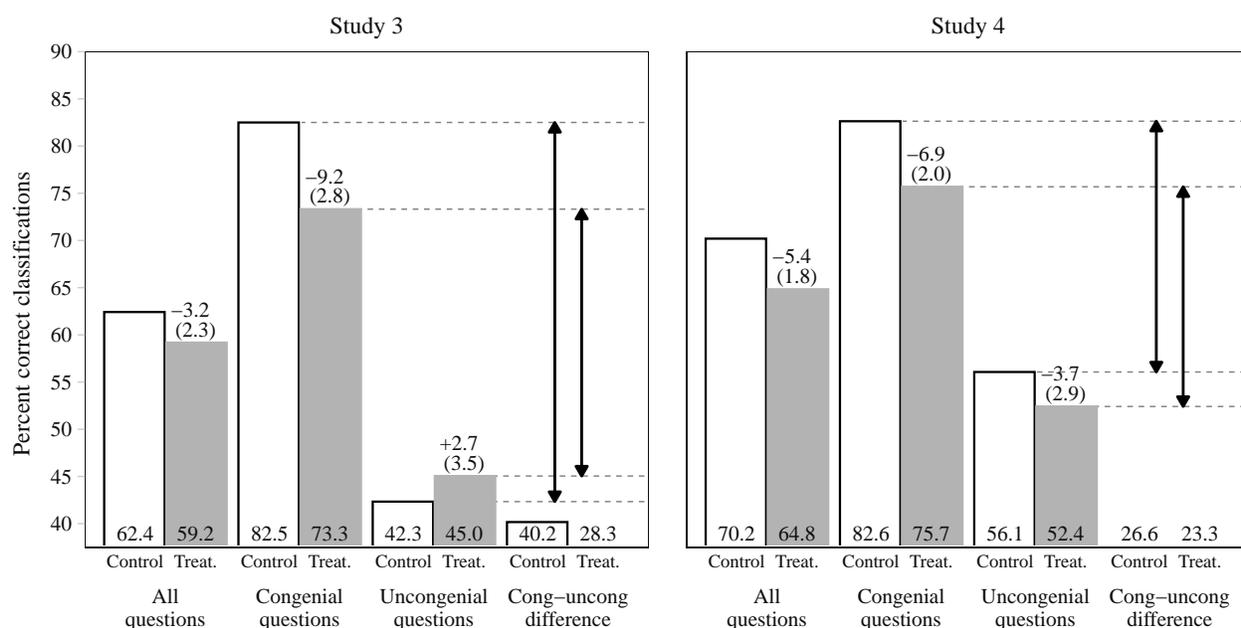
4.⁶

First consider the two U.S. studies. In Study 1 (2), classification accuracy increased by 2.7 pp (4.4 pp) on uncongenial questions. This is hidden knowledge: some respondents who knew the correct answer chose the incorrect answer in order to convey a partisan sentiment. On congenial questions, classification accuracy declined by 1.5 pp (1.9 pp). This is evidence of hidden ignorance: at baseline, some subjects appeared to know the correct answers to congenial questions only because of expressive responding. These changes reduced partisan differences by moving the two groups closer together. In terms of accuracy, however, the positive and negative effects cancelled one another out, resulting in only a small effect on measured competence (+0.4 and +1.2 pp).

The first Israel study, Study 3, was similar in broad strokes to the U.S. studies. Accuracy on uncongenial questions rose by 2.7 pp (hidden knowledge), while accuracy on congenial questions

⁶In general, the congenial/uncongenial difference is very close to the partisan difference, but the two quantities are not always identical. The sources of difference are beyond the scope of this article.

Figure 5: Treatment Effects by Question Congeniality, Studies 3 and 4 (Israel)



Note: See note to Figure 4.

declined by 9.2 pp (hidden ignorance). In terms of partisan difference, these opposite movements brought the parties closer together, resulting in a 11.9 pp decline in the difference between congenial and uncongenial questions. In terms of accuracy, they cancel one another out, resulting in a relatively small effect on measured competence. Study 4 was similar to the first three studies in that it showed substantial evidence of hidden ignorance on congenial questions (a 6.9 pp decline). Surprisingly, however, we estimate a statistically insignificant decline in accuracy on uncongenial questions (by 3.7 pp, s.e. = 2.9). Because both changes were in the same direction, the net result was a smaller-than-usual change in partisan differences. The absence of a “cancelling out” effect resulted in a larger-than-usual change in accuracy.

Relative to the expectations we derived from existing research and Studies 1 and 2, the effects by congeniality in Studies 3 and 4 were surprising. Whereas conventional wisdom holds that most expressive responding is due to hidden knowledge, we find stronger evidence of hidden ignorance. Though the oppositely signed estimates of the effect on uncongenial questions are striking, neither is statistically significant (s.e. = 3.5 and 2.9). Our interpretation of the estimated

effects on uncongenial questions in Studies 3 and 4—similar magnitude, oppositely signed, neither statistically significant—is that there is no evidence of hidden knowledge in the Israel studies.

Altogether, the results by question congeniality illustrate the origin of the differential effects on partisan differences and accuracy. In Studies 1, 2, and 3, the oppositely signed effects on congenial and uncongenial questions both had the effect of moving partisan groups closer together, resulting in large reductions in partisan differences. In terms of accuracy, however, the opposite effects cancelled one another out, resulting in small effects on accuracy. Though we think the differences between Studies 3 and 4 are most likely due to statistical noise, the differences in the Study 3 and 4 point estimates provide a telling illustration of how effects on congenial and uncongenial questions interact. When hidden ignorance is the main consequence of expressive responding, treatments that reduce partisan differences should also be expected to reduce accuracy.

Robustness Checks

Our interpretation of the results above is that expressive responding inflates measured partisan bias in fact-opinion discernment, but has little or no effect on measured competence. This section probes this conclusion with a series of exploratory robustness checks. We begin by testing an additional implication of expressive responding theory, then consider three factors that could have affected our results: confusion about how to classify “false facts,” ambiguity about the correct classification of some statements, and guessing.

Another Test for Expressive Responding

We first test an implication of response substitution theory that we originally overlooked. The theory holds that expressive responding occurs because respondents are not given the opportunity to express something they want to express. If so, treatments that more closely aligned with what respondents want to express should be more effective. In our case, respondents were randomly assigned between one of two treatments: an “accurate” treatment and an “agree” treatment. If alignment matters, the “accurate” treatment should be more effective for factually verifiable items,

for which the in/accurate dimension is more relevant. Meanwhile, the “agree” treatment should be more effective for opinion statements, whose subjective nature makes dis/agreement more relevant.

To test this, we coded a new three-category treatment variable: control, aligned treatment, and unaligned treatment. We find that treatments that are aligned with the correct answer have a larger effect on partisan differences. On average across all four studies, aligned treatments reduced partisan differences by 6.4 pp, compared with 4.6 pp for unaligned treatments (difference = 1.7, s.e. = 0.8, two-sided $p = 0.04$). Similarly, aligned treatments reduced the congenial-uncongenial difference by 6.4 pp, compared with 4.4 pp for unaligned treatments (difference = 2.0, s.e. = 0.8, two-sided $p = 0.02$). These results are consistent with response substitution theory.

What if Respondents Label Verifiably False Statements as Opinions?

The most common line of questioning about our results is about respondent confusion over verifiably false statements. For example, although the statements “the sky is green” and “Chihuahuas are larger than St. Bernards” are factually verifiable, they are also false, which may lead some respondents to classify them as an opinion. The original designers of the survey instrument (Mitchell et al. 2018) dealt with this possibility in two ways: they (1) tested 11 versions of the survey instrument and selected the most easily understood version and (2) excluded the sort of verifiably false statement that motivates the critique. However, the instrument still might not be perfectly clear, and some respondents are likely to think that the true factual statements are false. This means that despite the good-faith effort in earlier research, this form of confusion is still relevant.

For our purposes, the main concern is that confusion changes our treatment effects, which we have interpreted as reflecting only the effect of reducing expressive responding. We think it is plausible that our treatments could have inadvertently made the instrument’s purpose clearer: the separate question about accuracy or agreement could help respondents understand that they are supposed to classify verifiably false statements as facts. This would increase accuracy across the board, which we do not observe (Table 2). More subtly, however, confusion could distort our estimates of expressive responding’s effect on partisan differences. Because respondents are more

Table 3: Results by Statement Type

		Partisan diff. (H1)	Accuracy (H2)	Congeniality (H3)		
				Cong.	Uncong.	Diff.
Fact	Study 1	-4.9* (2.1)	1.2 (0.8)	-0.4 (1.0)	3.6* (1.4)	-4.0* (1.8)
	Study 2	-3.4* (1.6)	1.5* (0.7)	0.3 (0.9)	2.7* (1.1)	-2.4 (1.4)
	Study 4	-4.3 (4.5)	-7.4* (2.0)	-9.0* (2.7)	-5.5 (3.1)	-3.5 (4.2)
	Meta- Analysis	-4.0* (1.2)	-1.3 (2.8)	-2.5 (2.7)	1.0 (2.5)	-3.0* (1.1)
Opinion	Study 1	-4.0 (2.1)	-0.5 (0.8)	-2.7* (1.1)	1.9 (1.3)	-4.6* (1.7)
	Study 2	-9.2* (1.6)	0.6 (0.6)	-3.8* (0.8)	5.7* (1.1)	-9.4* (1.4)
	Study 3	-11.6* (4.7)	-3.0 (2.3)	-9.2* (2.8)	2.8 (3.5)	-12.0* (4.5)
	Study 4	-4.3 (5.6)	-1.8 (2.7)	-3.5 (2.4)	0.8 (5.0)	-4.3 (5.6)
	Meta- Analysis	-7.2* (1.9)	-0.1 (0.6)	-3.7* (0.6)	3.5* (1.4)	-7.5* (1.8)

Note: Cell entries are coefficient estimates. Clustered standard errors in parentheses. * $p < 0.05$.

likely to think that uncongenial facts are untrue, it is also possible that the accuracy effect is larger for uncongenial questions, which would inflate our estimated effects on partisan differences.

To further evaluate the confusion critique, we split our results into fact and opinion statements. Because the critique focuses on verifiably false statements, we do not think it could explain effects on opinion statements. The results appear in Table 3. In Studies 1 and 2 the results are similar or stronger for opinion statements. In Study 3, which only included opinion statements, we obtained our largest point estimate for partisan differences. In Study 4, the accuracy effect for factual statements is negative, the opposite of what we would predict. These patterns provide further reason to believe that our treatment effects are not an artifact of confusion over how to classify verifiably false statements.

What if the Correct Classification is Ambiguous?

Even if respondents correctly understand the purpose of the survey instrument, confusion could also emerge from ambiguity about the correct classification of the statement. For example, a respondent who thinks that presidential performance is easy to measure objectively could think that the statement “Donald Trump was one of the greatest presidents ever” is factual. Although we cannot think of a reason why our treatments would affect this source of confusion, it is still worth examining the possibility that our results were driven by statements that are problematic in some unanticipated way.

To assess whether our results could have been an artifact of poorly chosen statements, we conducted an exploratory analysis that drops every possible combination of two or three statements from our analysis. To do this, we generated all possible combinations, ran our pre-registered tests, and computed meta-analytic estimates. If a statement was included in more than one study, we dropped it from every study. For example, in the run of the analysis that dropped the statements about Barack Obama’s birthplace, climate change, and abortion, all three statements were dropped from both Studies 1 and 2.

The distribution of estimates from this analysis appears in the Supplementary Material (Figure SM-2). For partisan differences (H1), all of the estimates remain negative. For accuracy (H2), the distribution of estimates ranges from -2.1 to 0.6 . None of the positive estimates are statistically significant. Examining accuracy effects by question congeniality (H3), all of the estimates for congenial statements are negative, all estimates for uncongenial statements are positive, and all estimates of the difference are negative. This shows that our results hold regardless of which two or three statements are most problematic.

Correction for Guessing

As noted above, the fact-opinion discernment instrument we are studying followed best practices in the assessment literature by not allowing or encouraging “don’t know” responses (Mondak 2000). This raises the question of whether differences in guessing behavior between the treatment conditions could have driven our results. To speak to this concern, Section A.5 of the Supplemental

Material replicates our main results using the classic guessing correction described by [Diamond and Evans \(1966\)](#) and others. We find no evidence that our results were an artifact of guessing.

Discussion

Existing research suggests that partisanship is an important predictor of failures to correctly distinguish between factually verifiable and opinion statements. Our results suggest that this is partly an artifact of expressive responding: people give answers that are more partisan than their true beliefs, and do so even if the survey asks them not to. Despite this, we find minimal effects on the proportion of accurate classifications. When it comes to the ability to identify statements that are factually verifiable, the average member of the public is less partisan but no more competent than they appear. This has several implications for the study of public opinion.

For the emerging study of fact-opinion discernment, the findings suggest a few lessons. First, expressive responding is very likely to affect observed partisan differences in fact-opinion discernment. It is probably not enough to render partisan differences out of whole cloth, but it is enough to distort important relationships. Second, due to the offsetting effects of hidden knowledge and hidden ignorance, it appears that expressive responding has a larger effect on estimates of bias than on estimates of the public's overall level of competence. Third, given persistent questions about the instrument's clarity, future research should evaluate competing versions on this basis.⁷ Importantly, efforts to improve clarity would need to be carefully distinguished from efforts to improve Americans' capacity for fact-opinion discernment, such as training exercises ([Walter and Salovich 2021](#)). We can think of two measures that would measure clarity but not ability: a comprehension check like "How would you classify a statement that you think is false, but is factually verifiable?" and the difference in classification accuracy between true and false versions of otherwise identical factual statements, e.g. "The sky is blue" versus "The sky is green."

Our findings also have implications for research on expressive responding. First, our discov-

⁷Two possible modifications stand out in our minds: (1) changing the response options to "factually verifiable" and "opinion (not verifiable)," and (2) using four response options that allow simultaneous expression of accuracy and verifiability (e.g., "verifiable and true," "verifiable and false," "unverifiable but true," "unverifiable and false").

ery of a new case in which expressive responding emerges suggests that it is premature to conclude that expressive responding is too limited in scope to be considered important (e.g, [Malka and Adelman 2022](#)). A complete understanding of expressive responding's scope and implications will require more research on which survey items are affected by expressive responding, which are not, and why. Second, our findings suggest that request-style treatments may be too weak to fully eliminate expressive responding. Whereas [Prior et al. \(2015\)](#) and [Rathje et al. \(2023\)](#) find that requests to respond accurately limit partisan differences, we found evidence of expressive responding in a question format that loudly and repeatedly asks respondents not to engage in it. This suggests that null results in earlier studies could be artifacts of weak treatments, not an absence of expressive responding (e.g., [Berinsky 2018](#), Studies 1 and 2; [Graham and Yair 2023](#), Study 1). Third, although we operationalized congeniality in terms of partisan bias, other research on fact-opinion discernment shows that racial and ethnic identity compound ideological bias ([Crowder-Meyer and Ferrín 2021](#)). More generally, a broader conception of what is congenial could be a fruitful direction for future research on expressive responding.

The findings also suggest a need for greater attention to expressive responding's potential to hide ignorance of convenient truths. Existing research on beliefs notes that when the correct answer to a question is uncongenial, one should expect hidden knowledge: the subject knows the correct answer but chooses the wrong answer to convey a partisan sentiment ([Prior et al. 2015](#); [Khanna and Sood 2017](#)). Our reading of the theory is that when partisanship and the truth are aligned, expressive responding should be expected to hide ignorance: the subject only answers correctly because of expressive responding. Depending on the balance of hidden knowledge and hidden ignorance, a reduction in partisan differences may occur alongside either an increase or decrease in accuracy. Although some studies in the beliefs literature report that there is more evidence of hidden knowledge than of hidden ignorance ([Prior et al. 2015](#); [Khanna and Sood 2017](#)), most research on expressive responding does not separate effects by congeniality or report effects on overall accuracy. Though we studied fact-opinion discernment rather than beliefs, our findings suggest that the hidden ignorance deserves further investigation in the larger literature on

expressive responding.

In sum, our findings suggest new directions for the study of fact-opinion discernment and expressive responding. However, they do not overturn the fact-opinion discernment literature's conclusion that the public often struggles to distinguish fact from opinion, an encouraging finding for this emerging body of research.

References

- Berinsky, Adam J. 2018. “Telling the Truth about Believing the Lies? Evidence for the Limited Prevalence of Expressive Survey Responding.” *The Journal of Politics* 80(1):211–224.
- Bullock, John G, Alan S Gerber, Seth J Hill and Gregory A Huber. 2015. “Partisan Bias in Factual Beliefs about Politics.” *Quarterly Journal of Political Science* 10:1–60.
- Coppock, Alexander, Thomas J. Leeper and Kevin J. Mullinix. 2018. “Generalizability of heterogeneous treatment effect estimates across samples.” *Proceedings of the National Academy of Sciences* 115(49):12441–12446.
- Crowder-Meyer, Melody and Mónica Ferrín. 2021. “The Effects of Ideological and Ethnoracial Identity on Political (Mis)Information.” *Public Opinion Quarterly* 85(3):753–779.
- Diamond, James and William Evans. 1966. “The Correction for Guessing.” *Review of Educational Research* 43(2):181–91.
- Gal, David and Derek D Rucker. 2011. “Answering the Unasked Question: Response Substitution in Consumer Surveys.” *Journal of Marketing Research (JMR)* 48(1):185–195.
- Goldberg, Andreas C. and Franziska Marquart. 2024. ““That’s just, like, your opinion” – European citizens’ ability to distinguish factual information from opinion.” *Communications* 0(0).
- Graham, Matthew H. and Omer Yair. 2023. “Expressive Responding and Trump’s Big Lie.” *Political Behavior* (First View).
- Guess, Andrew M., Michael Lerner, Benjamin Lyons, Jacob M. Montgomery, Brendan Nyhan, Jason Reifler and Neelanjan Sircar. 2020. “A digital media literacy intervention increases discernment between mainstream and false news in the United States and India.” *Proceedings of the National Academy of Sciences of the United States of America* 117(27):15536–15545.
- Hameleers, Michael. 2022. “Separating truth from lies: comparing the effects of news media literacy interventions and fact-checkers in response to political misinformation in the US and Netherlands.” *Information Communication and Society* 25(1):110–126.
- Khanna, Kabir and Gaurav Sood. 2017. “Motivated Responding in Studies of Factual Learning.” *Political Behavior* pp. 1–23.
- Malka, Ariel and Mark Adelman. 2022. “Expressive Survey Responding: A Closer Look at the Evidence and Its Implications for American Democracy.” *Perspectives on Politics* (First View):1–12.
- Merpert, Ariel, Melina Furman, María Victoria Anauati, Laura Zommer and Inés Taylor. 2018. “Is That Even Checkable? An Experimental Study in Identifying Checkable Statements in Political Discourse.” *Communication Research Reports* 35(1):48–57.
- Mitchell, Amy, Jeffrey Gottfried, Michael Barthel and Nami Sumida. 2018. “Distinguishing Between Factual and Opinion Statements in the News.” *Pew Research Center* (Washington, DC).
- Mondak, Jeffery J. 2000. “Reconsidering the Measurement of Political Knowledge.” *Political Analysis* 8(1):57–82.
- Pennycook, Gordon, Ziv Epstein, Mohsen Mosleh, Antonio A. Arechar, Dean Eckles and David G. Rand. 2021. “Shifting attention to accuracy can reduce misinformation online.” *Nature* 592(7855):590–595.

- Prior, Markus, Gaurav Sood and Kabir Khanna. 2015. "You Cannot be Serious: The Impact of Accuracy Incentives on Partisan Bias in Reports of Economic Perceptions." *Quarterly Journal of Political Science* 10:489–518.
- Rathje, Steve, Jon Roozenbeek, Jay J. Van Bavel and Sander van der Linden. 2023. "Accuracy and Social Motivations Shape Judgements of (Mis)Information." *Nature Human Behavior* (first view).
- Schaffner, Brian F. and Samantha Luks. 2018. "Misinformation or Expressive Responding?" *Public Opinion Quarterly* 82(1):135–147.
- Shen, Lucas, Gaurav Sood and Daniel Weitzel. 2023. "A Measurement Gap? Effect of Survey Instrument and Scoring on the Partisan Knowledge Gap." *Unpublished Manuscript* (National University of Singapore).
- Shino, Enrijeta, Daniel A. Smith and Laura Uribe. 2022. "Lying for Trump? Elite Cue-Taking and Expressive Responding on Vote Method." *Public Opinion Quarterly* 86(4):837–861.
- Tully, Melissa, Emily K. Vraga and Leticia Bode. 2020. "Designing and Testing News Literacy Messages for Social Media." *Mass Communication and Society* 23(1):22–46.
- Walter, Nathan and Nikita A. Salovich. 2021. "Unchecked vs. Uncheckable: How Opinion-Based Claims Can Impede Corrections of Misinformation." *Mass Communication and Society* 24(4):500–526.

Supplemental Material for

Less Partisan but No More Competent: Expressive Responding and Fact-Opinion Discernment

Matthew H. Graham

Omer Yair

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A Additional Results

A.1 Partisan Differences (H1)

Our first hypothesis was that treatment would reduce partisan differences. To compute the estimates in main text Table 1, we coded all responses on a left-right spectrum, such that 0 is the response that is more congenial to Democrats (the Neftali-Bennett coalition) and 1 is more congenial to Republicans (the Netanyahu-led opposition). We then used OLS to estimate

$$Y_{ij} = \alpha_0 + \beta_1 T_i + \beta_2 R_i + \beta_3 (T_i \times R_i) + \sum_{j=1}^J \alpha_j Q_{ij} + \epsilon_{ij}, \quad (1)$$

where i indexes respondents, j indexes questions, T_i indicates assignment to either treatment condition, R_i indicates right-leaning partisanship (Republican or opposition), and Q_{ij} is a question fixed effect. The primary coefficients of interest are β_2 , which is the partisan difference in the control condition, and β_3 , which is the treatment effect on partisan differences.

Our preregistration documents state that we will use question \times party fixed effects. We switched to this specification because it allows us to interpret β_2 as the baseline partisan difference. Table SM-1 presents estimates with the inclusion of question \times party fixed effects. This has almost no effect on our estimates of β_3 .

Table SM-1: Effects on Partisan Differences (with Statement \times Party Fixed Effects)

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.766 (0.011)	0.776 (0.010)	0.469 (0.029)	0.099 (0.017)
β_1 Treatment	0.015 (0.007)	0.043 (0.007)	0.068 (0.028)	0.012 (0.019)
β_2 RightParty	0.081 (0.018)	0.084 (0.014)	0.255 (0.043)	0.452 (0.035)
β_3 Treatment \times Right	-0.045 (0.014)	-0.063 (0.011)	-0.116 (0.045)	-0.043 (0.035)
Party \times Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.308	0.320	0.165	0.159
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

Our preregistration also states that we would report separate estimates for the effect of the accuracy

and agree conditions. These appear in Table SM-2.

Table SM-2: Effects on Partisan Differences by Treatment Condition

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
Constant	0.766 (0.011)	0.776 (0.010)	0.469 (0.029)	0.099 (0.017)
RightParty	0.081 (0.018)	0.084 (0.014)	0.255 (0.043)	0.452 (0.035)
Accurate treatment	0.012 (0.008)	0.041 (0.008)	0.057 (0.031)	0.016 (0.022)
Agree treatment	0.018 (0.008)	0.045 (0.008)	0.081 (0.033)	0.009 (0.022)
Accurate treatment \times Right	-0.041 (0.015)	-0.062 (0.012)	-0.137 (0.054)	-0.031 (0.041)
Agree treatment \times Right	-0.049 (0.016)	-0.064 (0.012)	-0.103 (0.053)	-0.059 (0.040)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.308	0.320	0.165	0.159
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

A.2 Accuracy (H2)

Our second hypothesis was that treatment would reduce partisan differences. To compute the estimates in main text Table 2, we coded all responses in terms of correctness, such that 0 is the incorrect classification and 1 is the correct classification. We then used OLS to estimate

$$Y_{ij} = \alpha_0 + \beta T_i + \sum_{j=1}^J \alpha_j Q_{ij} + \epsilon_{ij}. \quad (2)$$

With the exception of the recoded dependent variable (Y), all terms retain their meaning from equation (1). The coefficient of interest is β , which quantifies the effect on overall response accuracy. For comparability with the results above, we estimate these effects among partisan respondents only.

As with H1, we dropped party \times statement fixed effects from our preregistered specification in order to make the baseline more interpretable. Table SM-3 presents results from the preregistered psecification, which is identical but for its inclusion of party \times statement fixed effects. The treatment effect estimates are very close to the estimates in main text Table 2.

Table SM-3: Effects on Classification Accuracy (with Statement \times Party Fixed Effects)

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α Constant	0.773 (0.011)	0.798 (0.010)	0.539 (0.026)	0.928 (0.017)
β Treatment	0.005 (0.009)	0.011 (0.007)	-0.036 (0.022)	-0.054 (0.018)
Party \times Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.037	0.047	0.127	0.096
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

Our preregistration also states that we will report separate estimates for the effects of the accuracy and agree conditions. These appear in Table SM-4.

Table SM-4: Effects on Classification Accuracy by Treatment Condition

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α Constant	0.791 (0.010)	0.817 (0.007)	0.612 (0.022)	0.758 (0.018)
Accurate treatment	0.007 (0.010)	0.005 (0.008)	0.010 (0.027)	-0.079 (0.022)
Agree treatment	0.001 (0.010)	0.019 (0.008)	-0.074 (0.027)	-0.028 (0.021)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.019	0.023	0.005	0.016
Num. obs.	21424	33757	1832	3312
Num. clusters	2684	4227	916	1104

A.3 Congeniality (H3)

To test H3, regarding effects by question congeniality, we used OLS to estimate the parameters in

$$Y_{ij} = \alpha_0 + \beta_1 T_i + \beta_2 C_{ij} + \beta_3 T_i \times C_{ij} + \sum_{j=1}^J \alpha_j Q_{ij} + \epsilon, \quad (3)$$

where Y_{ij} is an indicator for correct responding, C_i is an indicator for a congenial question, and all other terms are defined above. Our estimates appear in Table SM-5. These estimates were also used to compute the predicted values and treatment effects displayed in Figures 4 and 5.

Table SM-5: Effects on Congenial/Uncongenial Difference

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.739 (0.010)	0.738 (0.008)	0.435 (0.030)	0.601 (0.025)
β_1 Treatment	0.027 (0.010)	0.044 (0.007)	0.027 (0.035)	-0.037 (0.027)
β_2 Congenial	0.134 (0.010)	0.162 (0.008)	0.402 (0.036)	0.266 (0.027)
β_3 Treatment \times Congenial	-0.041 (0.012)	-0.063 (0.010)	-0.119 (0.045)	-0.033 (0.033)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.034	0.044	0.109	0.078
Num. obs.	21424	33757	1832	3312

In order to interpret β_2 as an estimate of the baseline average congenial-uncongenial difference, we again dropped party \times statement fixed effects from our preregistered specifications. Estimates from the preregistered specification, which is identical except in its inclusion of party \times statement fixed effects, appear in Table SM-6. In every case the estimates of the parameter of interest, β_3 , are identical.

As with the other two hypotheses, our preregistration also states that we will report separate estimates for the effects of the accuracy and agree conditions. These appear in Table SM-7.

Table SM-6: Effects on Congenial/Uncongenial Difference (with Statement \times Party FE)

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.758 (0.012)	0.776 (0.010)	0.499 (0.032)	0.494 (0.029)
β_1 Treatment	0.027 (0.010)	0.043 (0.007)	0.024 (0.034)	-0.037 (0.027)
β_2 Congenial	0.079 (0.018)	0.084 (0.013)	0.256 (0.043)	0.445 (0.034)
β_3 Treatment \times Congenial	-0.041 (0.012)	-0.063 (0.010)	-0.119 (0.044)	-0.033 (0.033)
Party \times Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.038	0.048	0.130	0.096
Num. obs.	21424	33757	1832	3312

Table SM-7: Effects on Congenial/Uncongenial Difference by Treatment Condition

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
Constant	0.739 (0.010)	0.738 (0.008)	0.435 (0.030)	0.601 (0.025)
Congenial	0.134 (0.010)	0.162 (0.008)	0.402 (0.036)	0.266 (0.027)
Accurate treatment	0.027 (0.011)	0.036 (0.009)	0.075 (0.040)	-0.066 (0.031)
Agree treatment	0.026 (0.011)	0.051 (0.008)	-0.020 (0.040)	-0.006 (0.031)
Accurate treatment \times Congenial	-0.037 (0.014)	-0.062 (0.011)	-0.130 (0.052)	-0.022 (0.039)
Agree treatment \times Congenial	-0.045 (0.014)	-0.065 (0.011)	-0.108 (0.052)	-0.046 (0.039)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.034	0.044	0.113	0.080
Num. obs.	21424	33757	1832	3312

A.4 Balance Tests

In all four studies we tested whether the three experimental conditions were balanced on several demographic and political individual-level characteristics. In the two US studies the characteristics were age, gender, college education, race (White respondents vs. all others), and party identification (Republicans/Independent/Democrats). In Israel, the characteristics were age, gender, college education, religion (Jewish/non-Jewish), religiosity level, and left-right ideological self-identification (right/center/left). Specifically, we conducted Chi-square tests for the nominal variables (i.e., gender; college education; race [US] or religion [Israel]; and party identification [US] or left-right self-identification [Israel]) and an ANOVA test for the remaining age variable (two-tailed tests were used in all tests in the section.)

In Study 1, these analyses indicate that the three conditions were overall adequately balanced on all five demographic and political variables: three of the tests were statistically insignificant ($ps > 0.36$) and two of the tests (for age and race) were marginally significant ($.05 < ps < .1$). In addition, a multinomial regression in which the dependent variable was the three experimental conditions was employed to determine whether the individual-level variables predicted a respondent's chance of being randomly assigned to one of these conditions. The model was statistically insignificant ($p = 0.207$).

The same analyses were repeated in Study 2, and they indicated that the three conditions were adequately balanced on all five demographic and political variables. All five tests were statistically insignificant ($ps > 0.10$). Moreover, we similarly ran a multinomial regression in which the dependent variable was the three experimental conditions with the individual-level variables as predictors of a respondent's chance of being assigned to one of the three conditions. The model was statistically insignificant ($p = 0.563$), suggesting that randomization was successful.

The same analyses were repeated in Studies 3 and 4 in Israel (among the entire sample, i.e., including Arab respondents). These analyses indicated that in both studies the three conditions were adequately balanced on most demographic and political variables ($ps > .07$) but were unbalanced on the college education variable in Study 3. Specifically, respondents in the accuracy condition in Study 3 had higher levels of college education (55.5%) compared to those in the control (46.9%) and those in the agree condition (44.5%), a significant difference ($\chi^2(2)=11.14$; $p=.004$). Still, when we ran a multinomial regression in which the dependent variable was the three experimental conditions with the individual-level variables as predictors, the model was statistically insignificant ($p = 0.120$)

A.5 Guessing Correction

The purpose of our survey instrument is to measure the ability to measure fact from opinion. Best practices from the educational assessment literature hold that measures of ability are most trustworthy when all test-takers are required to answer all questions, with no opportunity to say “don’t know.” [Mondak \(2000\)](#) applies these principles to the measurement of political knowledge. When guessing is not required, people from some demographic groups are more likely to guess than others, introducing bias into the measure.⁸ Consistent with these principles, Mitchell and colleagues’ instrument and our replication of it eschews a “don’t know” option or other measures of uncertainty.

To get a sense of whether our results could be driven by guessing, we applied the classic guessing correction described by [Diamond and Evans \(1966\)](#) and others. The method re-scores measured knowledge as $C - I \times (1/K)$, where C is the number of correct answers, I is the number of incorrect answers, and K is the number of response options. In words, making the assumption that all guessing is blind allows the formula to infer the proportion of correct answers that were likely due to lucky guessing.

For our purposes, a minor downside of the guessing correction approach is its requirement that responses be scored in terms of correct and incorrect answers. This prevents us from testing H1, which scores responses on a left-right scale. Fortunately, our test of H3 involves estimating the congenial-uncongenial difference, which is similar to the partisan difference in all four studies. Even focusing only on H2 and H3, we can test our core conclusions.

Tables [SM-8](#) and [SM-9](#) presents the results in their natural units. Although these results are directionally similar to our main results, the magnitudes are hard to compare because scoring some responses as negative changes the range of the scale. To account for this, Table [SM-10](#) and [SM-11](#) presents the same results on a 0 to 1 scale, matching the theoretical range of the main results. The estimates are similar in magnitude to the main results.

⁸That is, the measure of ability is contaminated by the willingness to guess.

Table SM-8: Effects on Classification Accuracy, Guessing Correction

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α Constant	0.580 (0.019)	0.617 (0.015)	0.224 (0.043)	0.516 (0.036)
β Treatment	0.008 (0.017)	0.022 (0.014)	-0.065 (0.045)	-0.107 (0.037)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.019	0.022	0.000	0.014
Num. obs.	21496	34736	1832	3312
Num. clusters	2687	4342	916	1104

Note: Equivalent of Table 2 with guessing correction applied.

Table SM-9: Effects on Congenial/Uncongenial Difference with Guessing Correction

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.476 (0.021)	0.464 (0.016)	-0.129 (0.060)	0.202 (0.050)
β_1 Treatment	0.053 (0.019)	0.084 (0.015)	0.054 (0.069)	-0.073 (0.054)
β_2 Congenial	0.267 (0.020)	0.315 (0.015)	0.803 (0.072)	0.531 (0.054)
β_3 Treatment \times Congenial	-0.081 (0.024)	-0.124 (0.019)	-0.238 (0.090)	-0.066 (0.066)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.034	0.042	0.109	0.078
Num. obs.	21496	34736	1832	3312

Note: Equivalent of Table SM-5 with guessing correction applied.

Table SM-10: Effects on Classification Accuracy, Rescaled Guessing Correction

	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α Constant	0.290 (0.010)	0.308 (0.007)	0.112 (0.022)	0.258 (0.018)
β Treatment	0.004 (0.009)	0.011 (0.007)	-0.032 (0.023)	-0.054 (0.018)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.019	0.022	0.000	0.014
Num. obs.	21496	34736	1832	3312
Num. clusters	2687	4342	916	1104

Note: Equivalent of Table SM-8 with rescaling to 0-1.

Table SM-11: Effects on Congenial/Uncongenial Difference with Rescaled Guessing Correction

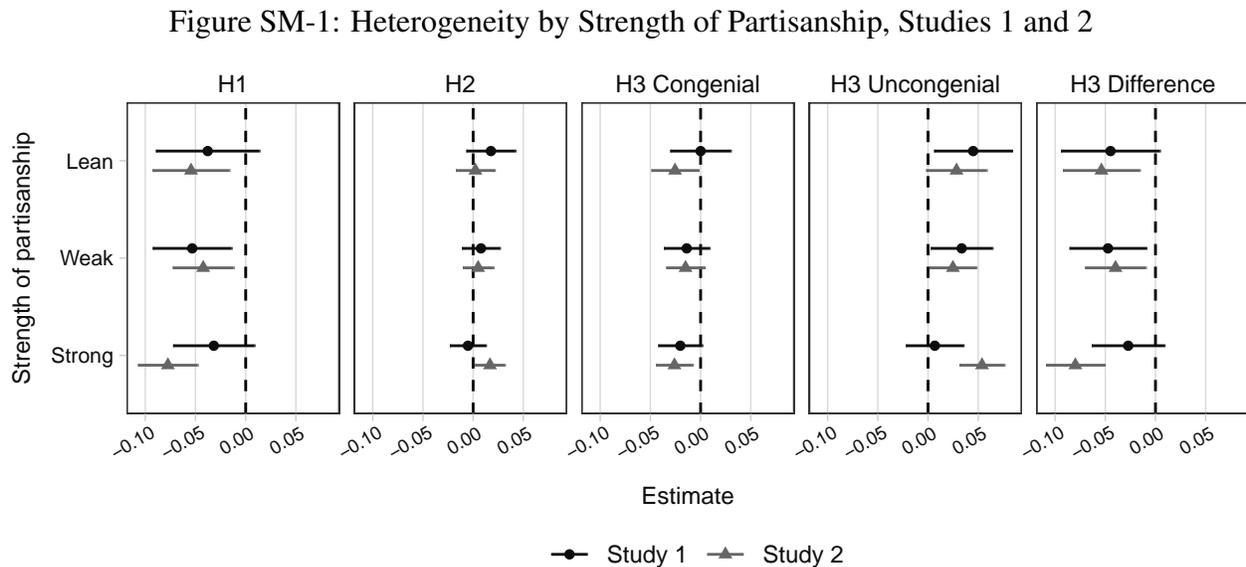
	United States		Israel	
	Study 1	Study 2	Study 3	Study 4
α_0 Constant	0.238 (0.010)	0.232 (0.008)	-0.065 (0.030)	0.101 (0.025)
β_1 Treatment	0.026 (0.010)	0.042 (0.007)	0.027 (0.035)	-0.037 (0.027)
β_2 Congenial	0.133 (0.010)	0.158 (0.008)	0.402 (0.036)	0.266 (0.027)
β_3 Treatment \times Congenial	-0.040 (0.012)	-0.062 (0.009)	-0.119 (0.045)	-0.033 (0.033)
Statement FE	Yes	Yes	Yes	Yes
Adj. R ²	0.034	0.042	0.109	0.078
Num. obs.	21496	34736	1832	3312

Note: Equivalent of Table SM-9 with rescaling to 0-1.

A.6 Strength of Partisanship

One possible explanation for the difference in results between the United States and Israel is differences in the strength of party attachments. We do not have a measure of strength of partisanship in Israel, but we have one for the United States. In order for differences in the strength of partisan attachments to explain the difference in effect sizes between the two countries, it must be that the treatments have differential effects by partisan strength. Accordingly, as a plausibility check on the “strength of partisanship explanation,” we examine heterogeneity by strength of partisanship in the United States.

Figure SM-1 plots all of our estimates separately by strength of partisanship. Little evidence of heterogeneity emerges. Across all studies and all hypotheses, the estimates for leaners, weak partisans, and strong partisans are all about the same. For strong partisans, a bit of between-study heterogeneity emerges, with strong partisans appearing to have the smallest effects in Study 1 and the largest in Study 2. However, the average of these two sets of estimates is about equal to weak partisans and leaners. We think that statistical noise is the best explanation for this apparent difference in results.

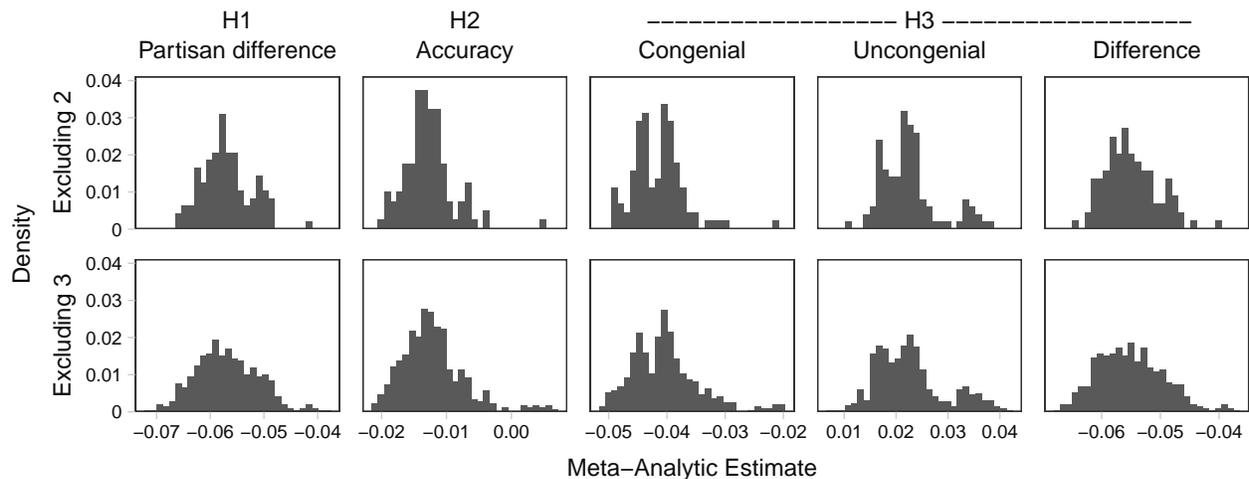


A.7 Dropping Statements

In the Robustness Checks section, we describe an analysis that drops all possible combinations of 2 or 3 statements from the analysis. Figure SM-2 displays the results of this analysis. For ease of reference, we quote the main text description of the figure:

“For partisan differences (H1), all the estimates remain negative. For accuracy (H2), the distribution of estimates ranges from -2.1 to 0.6. None of the positive estimates are statistically significant. Examining accuracy effects by question congeniality (H3), all the estimates for congenial statements are negative, all estimates for uncongenial statements are positive, and all estimates of the difference are negative. This shows that our results hold regardless of which two or three statements are most problematic.”

Figure SM-2: Distribution of Estimates Dropping All Combinations of 2 or 3 Statements



B Survey Information

B.1 Studies 1 and 2

Oversight: The study was reviewed and approved by the George Washington University Institutional Review Board (IRB).

Population: All respondents were workers on Amazon Mechanical Turk, a nonprobability convenience sample vendor. To be eligible, respondents had to reside in the United States, confirm this during the survey, and have at least a 95 percent approval rating on previous tasks. Once recruited, respondents read and agreed to an IRB-approved consent form, and had to pass a captcha. Respondents were not screened out for inattention or speeding.

Recruitment: In Study 1, we recruited 3,616 subjects for a baseline survey between May 10-23, 2021, containing demographic information and pre-treatment measures of the outcome for a separate study (Graham and Yair 2023). Of those recruited, 3,613 agreed to participate (0.1 percent refusal rate) and 3,603 completed the survey (0.4 percent drop-off rate). Between June 2-21, 2021, 2,959 of these respondents accepted our invitation to participate in the main survey containing the experiment. Of these, 2,942 completed the experiment (0.6 percent drop-off rate).

In Study 2, we recruited 4,980 subjects for the preliminary survey. Of these, 4,978 agreed to participate (0.1 percent refusal rate) and 4,915 completed the experiment (1.3 percent drop-off rate).

Response time and compensation: Respondents who completed Study 1 were paid \$0.50. The median response time was 2 minutes, 16 seconds. Respondents who completed Study 2 were paid \$0.60. The median response time was 2 minutes, 33 seconds.

Demographics: The table below compares the two surveys to another recent nationally representative survey, the 2018 CCES. Relative to the general population, the samples are younger, more-educated, and more likely to prefer the Democratic party.

	Study 1 – June 2021 (MTurk)	Study 2 – July 2021 (MTurk)	CCES 2018
Age (Mean)	39.1	41.5	47.7
Women (% of sample)	48.2%	52.4%	52%
College degree (% of sample)	66.2%	57.9%	30%
Non-Hispanic White (% of sample)	66.6%	71.0%	68%
Democrats (% of sample)	59.3%	46.6%	44%
Republicans (% of sample)	31.6%	42.2%	38%

Note. CCES stands for Cooperative Election Study (<https://cces.gov.harvard.edu/>). $N_{study1} = 2,955$; $N_{study2} = 4,892$.

B.2 Studies 3 and 4

Oversight: The study was reviewed and approved by the Reichman University IRB.

Population: The survey respondents in Studies 3 and 4 were recruited by iPanel, a survey company that operates a large, opt-in internet panel in Israel. In both studies, a non-probability quota sampling was employed, with the survey company recruiting a sample that is nationally representative in terms of gender, age groups, region, and religiosity. To be eligible, respondents had to (1) read and agree to an IRB-approved consent form and (2) pass two pre-treatment attention checks.

Recruitment: For Study 3, the survey company sent out a total of 11,235 invitations to complete the survey, and 1,260 respondents provided a usable response. The participation rate was 11.2%. For Study 4, the survey company sent out a total of 10,308 invitations, and 1,507 respondents provided a usable response. The participation rate was 14.6%.

Demographics: The table below compares the two surveys to another recent nationally representative survey, the 2021 Israeli National Election Study. Relative to the general population, the samples are younger and slightly more centrist.

	Study 3 – Feb. 2022	Study 4 – Oct. 2022	INES March 2021 sample
Age (Mean)	40.7	40.6	47.3
Women (% of sample)	50.6%	50.7%	52.2%
Jewish respondent (% of sample)	79.8%	80.0%	81.4%
College education (% of sample)	49.0%	50.0%	47.8%
Ideological self-placement (% of sample)			
Right	48.2%	50.7%	51.1%
Center	29.4%	25.9%	22.8%
Left	22.4%	23.4%	26.1%

Note. INES stands for Israeli National Election Studies (<https://www.tau.ac.il/~ines/>). $N_{study3} = 1,260$; $N_{study4} = 1,506$.

Coalition/opposition classification: Following our preregistration, we considered the coalition to be made up of people who reported voting for Yes Atid, Kachol-Lavan, Yemina, Ha’Avoda [Labor], Yisrael Beytenu, Tikva Hadasha, Meretz, and Ra’am; and the opposition to be made up of people who voted for Likud, Shas, Yahadut Ha’Torah, Religion Zionism, and The Joint List. The vote choice questions appear on the first page of each survey instrument (see Section B.4 below). Parties that did not meet the 3.25% legal threshold for Knesset seats were excluded from the survey instrument. Respondents who indicated voting for one of these parties (by marking “Another party”) were excluded from all analysis.

B.3 Preregistration

We preregistered three hypotheses. The tests appear in the following places:

- *H1. Partisan differences.* Tables 1 and SM-1.
- *H2. Accuracy.* Tables 2 and SM-3.
- *H3. Congeniality.* Figures 4 and 5, Tables SM-5 and SM-6.

Anonymized versions of our preregistration documents are available at the following links. Upon publication, we will link to author-identified versions.

- *Study 1:* <https://aspredicted.org/8wn8f.pdf>
- *Study 2:* <https://aspredicted.org/8u6xh.pdf>
- *Study 3:* <https://aspredicted.org/gx5bs.pdf>
- *Study 4:* <https://aspredicted.org/bu9d9.pdf>

We wish to disclose the following differences between our preregistrations and the analysis:

- *Study 1 statements.* We intended to field the same statements in Studies 1 and 2. Consequently, the preregistered lists of statements are identical. However, in Study 1, we accidentally fielded the survey with two of the Mitchell et al. (2018) statements instead of the two original statements we had written to replace them. The main text describes how this happened (footnote 2, page 8).
- *Party \times question fixed effects.* In Studies 1-3, our preregistered model specifications included party \times question fixed effects. We dropped these to make the estimates of β_2 more informative. The main text discusses this in footnote ?? (page ??). Appendix tables present equivalent estimates with the omitted fixed effects included (compare Table 1 to Table SM-1, Table 2 to Table SM-3, and Table SM-5 to SM-6). In one case cases, the estimated treatment effect changes by 0.004 (Study 3 accuracy). In all other cases, the estimates are unchanged or change by 0.001.
- *Omission of H3 from Study 3.* After Studies 1 and 2, we observed that the partisan difference is very similar to the congenial/uncongenial difference and decided to omit H3 from the Study 3 preregistration. Later, we decided that splitting the results by congeniality would provide a useful illustration of the compatibility between the H1 and H2 results. Consequently, we restored H3 for the Study 4 preregistration. We include tests of H3 in Study 3 for consistency with the other studies.
- *Description of H3.* The preregistration documents describe H3 in terms of cross-pressure rather than congeniality. All uses of “not cross-pressured” can be replaced with “congenial,” and all uses of “cross-pressured” with “uncongenial.” This change in terminology does not affect the analysis.

B.4 Full Text

The following pages contain the full text of the survey instruments in this order:

- Study 1 (page SM-16)
- Study 2 (page SM-21)
- Study 3 Hebrew (page SM-24)
- Study 3 English translation (page SM-27)
- Study 4 Hebrew (page SM-32)
- Study 4 English translation (page SM-36)

Survey Instrument: Study 1, Wave 1

Screening

captcha
consent

Covariates

state In which state do you currently reside?

- ▼ Alabama (1) ... I do not reside in the United States (53)

age What is your year of birth?

gender Are you... ?

- Male (1)
 Female (2)
 Other (please specify) (3) _____

race Choose one or more races that you consider yourself to be:

- White (1)
 Black or African American (2)
 American Indian or Alaska Native (3)
 Asian (4)
 Native Hawaiian or Pacific Islander (5)
 Other (6) _____

hispanic Are you Spanish, Hispanic, or Latino?

- Yes (1)
 No (2)

educ What is the highest level of education you have completed?

- Less than high school degree (1)
 High school graduate (high school diploma or equivalent including GED) (2)
 Some college but no degree (3)
 Associate degree in college (2-year) (4)
 Bachelor's degree in college (4-year) (5)
 Master's degree (6)
 Doctoral degree (7)
 Professional degree (JD, MD) (8)

pid_base Generally speaking, do you usually think of yourself as a Democrat, a Republican, or an independent?

- Democrat (1)
 Republican (2)

- Independent (3)
- Other (4)

Display This Question if Democrat or Republican

pid_strong Would you say you are a strong $\{\text{pid_base/ChoiceGroup/SelectedChoices}\}$?

- Strong $\{\text{pid_base/ChoiceGroup/SelectedChoices}\}$ (1)
- Not a strong $\{\text{pid_base/ChoiceGroup/SelectedChoices}\}$ (2)

Display This Question if not Democrat and not Republican

pid_closer Do you think of yourself as closer to the Republican party or the Democratic party?

- Closer to Republican (1)
- Closer to Democrat (2)
- Neither (3)

Pre-treatment outcome questions for a different study (study 1 only)

dv_econ_w1 What do you think about the state of the economy in the United States? Would you say the state of the economy is good or bad?

- Very bad (1)
- Bad (2)
- Slightly bad (3)
- Neither good nor bad (4)
- Slightly good (5)
- Good (6)
- Very good (7)

dv_vax_w1 What do you think about COVID-19 vaccination in the United States? Would you say the country is doing a good job or a bad job?

- Very bad (1)
- Bad (2)
- Slightly bad (3)
- Neither good nor bad (4)
- Slightly good (5)
- Good (6)
- Very good (7)

dv_fraud_w1 Would you say that Joe Biden only won the 2020 presidential election due to voter fraud, or do you think he would have won either way?

- Definitely due to voter fraud (1)
- Probably due to voter fraud (2)
- Not sure (3)
- Probably would have won either way (4)
- Definitely would have won either way (5)

Survey Instrument: Study 1, Wave 2

Consent

consent You are being asked to participate in a research study...

Do you consent to participate in the study?

- I agree to participate. (1)
- I do not agree to participate. (2)

Pew instructions

In the first part of the survey, you will be shown a series of statements. We would like to know whether you consider each statement to be a factual statement (whether you think it is accurate or not) or an opinion statement (whether you agree with it or not).

Pew DVs

Consider this statement:

[Statements from Figure 1 in random order]

Display This Question If $z_pew = agree$

pew_agree Do you agree or disagree with this statement?

- Strongly disagree (3)
- Disagree (4)
- Slightly disagree (8)
- Neither agree nor disagree (5)
- Slightly agree (9)
- Agree (6)
- Strongly agree (7)

Display This Question If $z_pew = accurate$

pew_accurate Would you say this statement is accurate or inaccurate?

- Very inaccurate (3)
- Inaccurate (4)
- Slightly inaccurate (7)
- Neither accurate nor inaccurate (5)
- Slightly accurate (6)
- Accurate (8)
- Very accurate (9)

dv_pew Would you consider this to be a factual statement (whether you think it is accurate or not) or an opinion statement (whether you agree with it or not)?

- o Factual statement (1)
- o Opinion statement (2)

Unrelated studies

Before the survey ends, we have a few questions about current events.

Start of Block: Economic

Display This Question If z_econ = approve

econ_approve Do you approve or disapprove of the way Joe Biden is handling the economy?

- o Strongly disapprove (1)
- o Disapprove (2)
- o Slightly disapprove (3)
- o Neither approve nor disapprove (4)
- o Slightly approve (5)
- o Approve (6)
- o Strongly approve (7)

Display This Question If z_econ = responsible

econ_responsible Who would you say has had more influence on the current state of the economy: Donald Trump or Joe Biden?

- o Definitely Trump (1)
- o Probably Trump (2)
- o Not sure (3)
- o Probably Biden (4)
- o Definitely Biden (5)

dv_econ_w2 What do you think about the state of the economy in the United States? Would you say the state of the economy is good or bad?

- o Very bad (1)
- o Bad (2)
- o Slightly bad (3)
- o Neither good nor bad (4)
- o Slightly good (5)
- o Good (6)
- o Very good (7)

End of Block: Economic

Start of Block: Vaccines

Display This Question If z_vax = responsible

vax_responsible Who would you say has had more influence on the availability of COVID-19 vaccines: Donald Trump or Joe Biden?

- Definitely Trump (1)
- Probably Trump (2)
- Not sure (3)
- Probably Biden (4)
- Definitely Biden (5)

dv_vax_w2 What do you think about COVID-19 vaccination in the United States? Would you say the country is doing a good job or a bad job?

- Very bad (1)
- Bad (2)
- Slightly bad (3)
- Neither good nor bad (4)
- Slightly good (5)
- Good (6)
- Very good (7)

End of Block: Vaccines

Start of Block: Voter fraud

Display This Question If z_fraud = fraud

fraud_howmuch Which comes closest to your view?

- There was no voter fraud in the 2020 presidential election. (1)
- There was a little voter fraud in the 2020 presidential election. (8)
- There was a lot of voter fraud in the 2020 presidential election. (2)

Display This Question If z_fraud = mistake

fraud_mistake Which comes closest to your view?

- Electing Joe Biden was the right decision for the country (1)
- Electing Joe Biden was the wrong decision for the country (2)

dv_fraud_w2 Would you say that Biden only won the 2020 presidential election due to voter fraud, or do you think he would have won either way?

- Definitely due to voter fraud (1)
- Probably due to voter fraud (2)
- Not sure (3)
- Probably would have won either way (4)
- Definitely would have won either way (5)

End of Block: Voter fraud

Survey Instrument: Study 2

Consent

consent You are being asked to participate in a research study...

Do you consent to participate in the study?

- I agree to participate. (1)
- I do not agree to participate. (2)

Screening

captcha

consent

Covariates

state In which state do you currently reside?

- ▼ Alabama (1) ... I do not reside in the United States (53)

age What is your year of birth?

gender Are you... ?

- Male (1)
- Female (2)
- Other (please specify) (3) _____

race Choose one or more races that you consider yourself to be:

- White (1)
- Black or African American (2)
- American Indian or Alaska Native (3)
- Asian (4)
- Native Hawaiian or Pacific Islander (5)
- Other (6) _____

hispanic Are you Spanish, Hispanic, or Latino?

- Yes (1)
- No (2)

educ What is the highest level of education you have completed?

- Less than high school degree (1)
- High school graduate (high school diploma or equivalent including GED) (2)
- Some college but no degree (3)
- Associate degree in college (2-year) (4)
- Bachelor's degree in college (4-year) (5)

- o Master's degree (6)
- o Doctoral degree (7)
- o Professional degree (JD, MD) (8)

pid_base Generally speaking, do you usually think of yourself as a Democrat, a Republican, or an independent?

- o Democrat (1)
- o Republican (2)
- o Independent (3)
- o Other (4)

Display This Question if Democrat or Republican

pid_strong Would you say you are a strong $\{\text{pid_base}/\text{ChoiceGroup}/\text{SelectedChoices}\}$?

- o Strong $\{\text{pid_base}/\text{ChoiceGroup}/\text{SelectedChoices}\}$ (1)
- o Not a strong $\{\text{pid_base}/\text{ChoiceGroup}/\text{SelectedChoices}\}$ (2)

Display This Question if not Democrat and not Republican

pid_closer Do you think of yourself as closer to the Republican party or the Democratic party?

- o Closer to Republican (1)
- o Closer to Democrat (2)
- o Neither (3)

Pew instructions

Next, you will be shown a series of statements. We would like to know whether you consider each statement to be a factual statement (whether you think it is accurate or not) or an opinion statement (whether you agree with it or not).

Pew DVs

Consider this statement:

[Statements from Figure 1 in random order]

Display This Question If $z_{\text{pew}} = \text{agree}$

pew_agree Do you agree or disagree with this statement?

- o Strongly disagree (3)
- o Disagree (4)
- o Slightly disagree (8)
- o Neither agree nor disagree (5)
- o Slightly agree (9)
- o Agree (6)
- o Strongly agree (7)

Display This Question If z_pew = accurate

pew_accurate Would you say this statement is accurate or inaccurate?

- Very inaccurate (3)
- Inaccurate (4)
- Slightly inaccurate (7)
- Neither accurate nor inaccurate (5)
- Slightly accurate (6)
- Accurate (8)
- Very accurate (9)

dv_pew Would you consider this to be a factual statement (whether you think it is accurate or not) or an opinion statement (whether you agree with it or not)?

- Factual statement (1)
- Opinion statement (2)

Unrelated study

Finally, we have questions about one more topic.

Page Break

Display This Question If: z_fraud = control

Y0 Which statement is most likely to be true?

- Donald Trump will be restored as President of the United States by the end of August. (1)
- Donald Trump will not be restored as President of the United States by the end of August. (4)

Page Break

BONUS OPPORTUNITY

On the next page, you will make a choice between two tickets with predictions about the future. Everyone whose prediction comes true will be entered into a drawing for a \$500 bonus. The winner will be randomly selected and paid on September 1, 2021.

Page Break

Y1 Which ticket would you like to enter into the drawing?

- Donald Trump will be restored as President of the United States by the end of August. (1)
- Donald Trump will not be restored as President of the United States by the end of August. (4)

Remember that if the prediction on your ticket comes true, you will be entered into a drawing for a \$500 bonus.

Study 3 Survey (Hebrew)

[שאלות pretreatment]

1. מדברים כיום הרבה על ימין ושמאל בפוליטיקה. היכן היית ממוקם/ת את עצמך ברצף של "ימין-שמאל"?
תן/י את תשובתך בסולם מ-1 עד 7 כאשר 1 משמעותו ימין, 7 משמעותו שמאל ו-4 הוא נקודת האמצע

ימין (מרכז)	1	2	3	4	5	6	7	8
לא יודע/ת				מרכז			שמאל	

2. עבור איזו רשימה הצבעת בבחירות לכנסת שהתקיימו ב-9 במרץ, 2021?

- a. הליכוד
- b. יש עתיד
- c. ש"ס
- d. כחול לבן
- e. ימינה
- f. העבודה
- g. יהדות התורה
- h. ישראל ביתנו
- i. הציונות הדתית
- j. הרשימה המשותפת
- k. תקווה חדשה
- l. מרצ
- m. הרשימה הערבית המאוחדת (רע"ם)
- n. מפלגה אחרת, פרט: _____
- o. לא יודע
- p. הצבעתי פתק לבן
- q. לא הצבעתי בבחירות האחרונות

ניסוי (הקצאה אקראית לאחת משלוש קבוצות):

קבוצה 1 [בקרה]:

כעת נשאל אותך שאלות בנושא אחר.

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"בתפקידו כראש ממשלה, בנימין נתניהו היה אחד מראשי הממשלה הטובים ביותר אי פעם."

בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[עמוד חדש]

2. חשוב/חשבי על האמירה הבאה:

"צריך לחוקק חוק שימנע מחבר כנסת אשר נאשם בפלילים להתמנות לתפקיד ראש הממשלה."
בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

קבוצה 2 [הסכמה]:

כעת נשאל אותך שאלות בנושא אחר.

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"בתפקידו כראש ממשלה, בנימין נתניהו היה אחד מראשי הממשלה הטובים ביותר אי פעם."
האם אתה מסכים/ה או לא מסכים/ה עם האמירה הזו? [אפשרויות תשובה: 1- מאד לא מסכים; 2- די לא מסכים; 3-לא מסכים ומסכים באותה המידה; 4- די מסכים; 5- מסכים מאד]

2. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[עמוד חדש]

3. חשוב/חשבי על האמירה הבאה:

"צריך לחוקק חוק שימנע מחבר כנסת אשר נאשם בפלילים להתמנות לתפקיד ראש הממשלה."
האם אתה מסכים/ה או לא מסכים/ה עם האמירה הזו? [אפשרויות תשובה: 1- מאד לא מסכים; 2- די לא מסכים; 3-לא מסכים ומסכים באותה המידה; 4- די מסכים; 5- מסכים מאד]

4. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

קבוצה 3 [דיוק]:

כעת נשאל אותך שאלות בנושא אחר:

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"בתפקידו כראש ממשלה, בנימין נתניהו היה אחד מראשי הממשלה הטובים ביותר אי פעם."
האם לדעתך האמירה הזו מדויקת או לא מדויקת? [אפשרויות תשובה: 1- כלל לא מדויקת; 2- די לא מדויקת; 3-לא מדויקת ומדויקת באותה מידה; 4- די מדויקת; 5- מדויקת מאד]

2. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[עמוד חדש]

. חשוב/חשבי על האמירה הבאה:

"צריך לחוקק חוק שימנע מחבר כנסת אשר נאשם בפלילים להתמנות לתפקיד ראש הממשלה."
האם לדעתך האמירה הזו מדויקת או לא מדויקת? [אפשרויות תשובה: 1- כלל לא מדויקת; 2- די לא מדויקת; 3-לא מדויקת ומדויקת באותה מידה; 4- די מדויקת; 5- מדויקת מאד]

4. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[סוף הניסוי]

[שאלות דמוגרפיה]

1. מהו גילך? _____

2. מין: מהו מינך?

a. נקבה

b. זכר

3. אנא סמן/י את רמת ההשכלה הגבוהה ביותר שרכשת:

a. ללא השכלה תיכונית

b. השכלה תיכונית – ללא תעודת בגרות

c. השכלה תיכונית – עם תעודת בגרות

d. על תיכונית לא אקדמית

e. תואר אקדמאי חלקי

f. תואר ראשון

g. תואר שני

h. תואר שלישי

4. מהי דתך?

a. יהודי/ה

b. מוסלמי/ת

c. נוצרי/ה

d. דרוזי/ת

e. אחר

Study 3 Survey (English Translation)

Pretreatment items

1. We hear a lot of talk these days about right and left in politics. Where would you position yourself on the right-left spectrum? Please answer on a scale of 1 to 7, where 1 is right, 7 is left, and 4 is the midpoint (center).

Don't know	Left			Center			Right
8	7	6	5	4	3	2	1

2. Which party did you vote for in the last Knesset election, held on March 9, 2021?
- a. Likud
 - b. Yesh Atid
 - c. Shas
 - d. Kachol Lavan
 - e. Yemina
 - f. Labor
 - g. Yahadut Ha'Torah
 - h. Yisrael Beitenu
 - i. Religious Zionism
 - j. The Joint List
 - k. New Hope
 - l. Meretz
 - m. United Arab List (Ra'am)
 - n. Other party (specify: _____)
 - o. Don't know
 - p. Blank ballot
 - q. I didn't vote in the last election

Experiment (a random assignment to one of three conditions)

Condition 1 (control):

We will now ask you questions on another matter.

We will present you with several statements, and will ask you whether you believe the statement is a factual statement or an opinion statement.

[A new page]

1. Consider the following statement:

"In his position as a prime minister, Benjamin Netanyahu was one of Israel's best prime ministers ever."

Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

2. Consider the following statement:

" A law that will prohibit an indicted person from running for the position of Prime Minister ought to be legislated."

Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

Condition 2 (agreement):

We will now ask you questions on another matter.

We will present you with several statements, and will ask you whether you believe the statement is a factual statement or an opinion statement.

[A new page]

1. Consider the following statement:

"In his position as a prime minister, Benjamin Netanyahu was one of Israel's best prime ministers ever."

Do you agree or disagree with this statement?

[Response options: 1- strongly disagree; 2- somewhat disagree; 3- agree and disagree to the same extent; 4- somewhat agree; 5- strongly agree]

2. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

3. Consider the following statement:

" A law that will prohibit an indicted person from running for the position of Prime Minister ought to be legislated."

Do you agree or disagree with this statement?

[Response options: 1- strongly disagree; 2- somewhat disagree; 3- agree and disagree to the same extent; 4- somewhat agree; 5- strongly agree]

4. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

Condition 3 (accuracy):

We will now ask you questions on another matter.

We will present you with several statements, and will ask you whether you believe the statement is a factual statement or an opinion statement.

[A new page]

1. Consider the following statement:

"In his position as a prime minister, Benjamin Netanyahu was one of Israel's best prime ministers ever."

Do you consider this statement accurate or inaccurate?

[Response options: 1- entirely inaccurate; 2- somewhat inaccurate; 3- accurate and inaccurate to the same extent; 4- somewhat accurate; 5- very accurate]

2. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

3. Consider the following statement:

" A law that will prohibit an indicted person from running for the position of Prime Minister ought to be legislated."

Do you consider this statement accurate or inaccurate?

[Response options: 1- entirely inaccurate; 2- somewhat inaccurate; 3- accurate and inaccurate to the same extent; 4- somewhat accurate; 5- very accurate]

4. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[Demographic items]

1. What is your age? _____
2. Sex: what is your sex?
 - a. Female
 - b. Male
3. Please indicate the highest level of education you've acquired
 - a. No high school education
 - b. High school (secondary) education – no matriculation certificate
 - c. High school (secondary) education – with matriculation certificate
 - d. Non-academic post-secondary education
 - e. Partial college or university education
 - f. Bachelor's degree
 - g. Master's degree
 - h. PhD
4. What is your religion?
 - a. Jewish
 - b. Muslim
 - c. Christian
 - d. Druze
 - e. Other

Study 4 (Hebrew)

[שאלות pretreatment]

1. עבור איזו רשימה הצבעת בבחירות האחרונות לכנסת שהתקיימו ב-9 במרץ, 2021?

- a. הליכוד
- b. יש עתיד
- c. ש"ס
- d. כחול לבן
- e. ימינה
- f. העבודה
- g. יהדות התורה
- h. ישראל ביתנו
- i. הציגונות הדתית
- j. הרשימה המשותפת
- k. תקווה חדשה
- l. מרצ
- m. הרשימה הערבית המאוחדת (רע"מ)
- n. מפלגה אחרת, פרט/י: _____
- o. לא יודע/ת
- p. לא הצבעתי בבחירות האחרונות

2. מדברים כיום הרבה על ימין ושמאל בפוליטיקה. היכן היית ממוקם/ת את עצמך ברצף של "ימין-שמאל"?
תן/י את תשובתך בסולם מ-1 עד 7 כאשר 1 משמעותו ימין, 7 משמעותו שמאל ו-4 הוא נקודת האמצע (מרכז)

ימין	1	2	3	מרכז	4	5	6	שמאל	7	לא יודע/ת	8
------	---	---	---	------	---	---	---	------	---	-----------	---

ניסוי (הקצאה אקראית לאחת משלוש קבוצות):

קבוצה 1 [בקרה]:

[עמוד חדש]

קעת נשאל אותך שאלות בנושא אחר.

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"במהלך כהונת ממשלת בנט-לפיד, שיעור האינפלציה השנתי היה הגבוה ביותר זה 25 שנה."

בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]
[עמוד חדש]

2. חשוב/חשבי על האמירה הבאה:

"כמות הרקטות שנורו מרצועת עזה לישראל במהלך השנה האחרונה היא הנמוכה ביותר מזה 15 שנה."

בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[עמוד חדש]

3. חשוב/חשבי על האמירה הבאה:

"ממשלת בנט-לפיד הייתה אחת מממשלות ישראל הגרועות ביותר אי פעם."

בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

קבוצה 2 [הסכמה]:

כעת נשאל אותך שאלות בנושא אחר.

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"במהלך כהונת ממשלת בנט-לפיד, שיעור האינפלציה השנתי היה הגבוה ביותר זה 25 שנה."

האם אתה מסכים/ה או לא מסכים/ה עם האמירה הזו? [אפשרויות תשובה: 1- מאד לא מסכים; 2- די לא מסכים; 3- לא מסכים ומסכים באותה המידה; 4- די מסכים; 5- מסכים מאד]

2. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[עמוד חדש]

3. חשוב/חשבי על האמירה הבאה:

"כמות הרקטות שנורו מרצועת עזה לישראל במהלך השנה האחרונה היא הנמוכה ביותר מזה 15 שנה."

האם אתה מסכים/ה או לא מסכים/ה עם האמירה הזו? [אפשרויות תשובה: 1- מאד לא מסכים; 2- די לא מסכים; 3- לא מסכים ומסכים באותה המידה; 4- די מסכים; 5- מסכים מאד]

4. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה]: 1- אמירה עובדתית; 2- אמירת דעה

[עמוד חדש]

5. חשוב/חשבי על האמירה הבאה:

"ממשלת בנט-לפיד הייתה אחת מממשלות ישראל הגרועות ביותר אי פעם."
האם אתה מסכים/ה או לא מסכים/ה עם האמירה הזו? [אפשרויות תשובה]: 1- מאד לא מסכים; 2- די לא מסכים; 3-לא מסכים ומסכים באותה המידה; 4- די מסכים; 5- מסכים מאד]

6. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה]: 1- אמירה עובדתית; 2- אמירת דעה

קבוצה 3 [דיוק]:

כעת נשאל אותך שאלות בנושא אחר:

נציג בפניך מספר אמירות, ונשאל אותך האם לדעתך האמירה הינה אמירה עובדתית או אמירת דעה.

[עמוד חדש]

1. חשוב/חשבי על האמירה הבאה:

"במהלך כהונת ממשלת בנט-לפיד, שיעור האינפלציה השנתי היה הגבוה ביותר זה 25 שנה."
האם לדעתך האמירה הזו מדויקת או לא מדויקת? [אפשרויות תשובה]: 1- כלל לא מדויקת; 2- די לא מדויקת; 3-לא מדויקת ומדויקת באותה מידה; 4- די מדויקת; 5- מדויקת מאד]

2. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה]: 1- אמירה עובדתית; 2- אמירת דעה

[עמוד חדש]

3. חשוב/חשבי על האמירה הבאה:

"כמות הרקטות שנורו מרצועת עזה לישראל במהלך השנה האחרונה היא הנמוכה ביותר מזה 15 שנה."
האם לדעתך האמירה הזו מדויקת או לא מדויקת? [אפשרויות תשובה]: 1- כלל לא מדויקת; 2- די לא מדויקת; 3-לא מדויקת ומדויקת באותה מידה; 4- די מדויקת; 5- מדויקת מאד]

4. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם אתה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה]: 1- אמירה עובדתית; 2- אמירת דעה

[עמוד חדש]

5. חשוב/חשבי על האמירה הבאה:

"ממשלת בנט-לפיד הייתה אחת מממשלות ישראל הגרועות ביותר אי פעם."
האם לדעתך האמירה הזו מדויקת או לא מדויקת? [אפשרויות תשובה: 1- כלל לא מדויקת; 2- די לא מדויקת; 3- לא מדויקת ומדויקת באותה מידה; 4- די מדויקת; 5- מדויקת מאד]

6. בלי קשר לידיעותיך בנושא, האם לדעתך זוהי אמירה עובדתית (בין אם לדעתך האמירה מדויקת ובין אם לא) או אמירת דעה (בין אם את/ה מסכים/ה עם האמירה ובין אם לא)? [אפשרויות תשובה: 1- אמירה עובדתית; 2- אמירת דעה]

[סוף הניסוי]

[שאלות דמוגרפיה]

1. מהו גילך? _____

2. מין: מהו מינך?

a. נקבה

b. זכר

3. אנא סמן/י את רמת ההשכלה הגבוהה ביותר שרכשת:

a. ללא השכלה תיכונית

b. השכלה תיכונית – ללא תעודת בגרות

c. השכלה תיכונית – עם תעודת בגרות

d. על תיכונית לא אקדמית

e. תואר אקדמאי חלקי

f. תואר ראשון

g. תואר שני

h. תואר שלישי

4. מהי דתך?

a. יהודי/ה

b. מוסלמי/ת

c. נוצרי/ה

d. דרוזי/ת

e. אחר

Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

2. Consider the following statement:

"The number of rockets fired at Israel from Gaza over the last year was the lowest in 15 years."

Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

3. Consider the following statement:

"The Bennett–Lapid government was one of the worst governments ever."

Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

Condition 2 (agreement):

We will now ask you questions on another matter.

We will present you with several statements, and will ask you whether you believe the statement is a factual statement or an opinion statement.

[A new page]

1. Consider the following statement:

"During the Bennett–Lapid government Israel's yearly inflation rate was the highest in 25 years."

Do you agree or disagree with this statement?

[Response options: 1- strongly disagree; 2- somewhat disagree; 3- agree and disagree to the same extent; 4- somewhat agree; 5- strongly agree]

2. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

3. Consider the following statement:

"The number of rockets fired at Israel from Gaza over the last year was the lowest in 15 years."

Do you agree or disagree with this statement?

[Response options: 1- strongly disagree; 2- somewhat disagree; 3- agree and disagree to the same extent; 4- somewhat agree; 5- strongly agree]

4. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

5. Consider the following statement:

"The Bennett–Lapid government was one of the worst governments ever."

Do you agree or disagree with this statement?

[Response options: 1- strongly disagree; 2- somewhat disagree; 3- agree and disagree to the same extent; 4- somewhat agree; 5- strongly agree]

6. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

Condition 3 (accuracy):

We will now ask you questions on another matter.

We will present you with several statements, and will ask you whether you believe the statement is a factual statement or an opinion statement.

[A new page]

1. Consider the following statement:

"During the Bennett–Lapid government Israel's yearly inflation rate was the highest in 25 years."

Do you consider this statement accurate or inaccurate?

[Response options: 1- entirely inaccurate; 2- somewhat inaccurate; 3- accurate and inaccurate to the same extent; 4- somewhat accurate; 5- very accurate]

2. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

3. Consider the following statement:

"The number of rockets fired at Israel from Gaza over the last year was the lowest in 15 years."

Do you consider this statement accurate or inaccurate?

[Response options: 1- entirely inaccurate; 2- somewhat inaccurate; 3- accurate and inaccurate to the same extent; 4- somewhat accurate; 5- very accurate]

4. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[A new page]

5. Consider the following statement:

"The Bennett–Lapid government was one of the worst governments ever."

Do you consider this statement accurate or inaccurate?

[Response options: 1- entirely inaccurate; 2- somewhat inaccurate; 3- accurate and inaccurate to the same extent; 4- somewhat accurate; 5- very accurate]

6. Regardless of what you know of with regard to this issue, do you consider this a factual statement (regardless of whether you think the statement is accurate or not) or an opinion statement (regardless of whether you agree with the statement or not)

[Response options: 1- factual statement; 2- opinion statement]

[Demographic items]

1. What is your age? _____
2. Sex: what is your sex?
 - a. Female
 - b. Male
3. Please indicate the highest level of education you've acquired
 - a. No high school education
 - b. High school (secondary) education – no matriculation certificate
 - c. High school (secondary) education – with matriculation certificate
 - d. Non-academic post-secondary education
 - e. Partial college or university education
 - f. Bachelor's degree
 - g. Master's degree
 - h. PhD
4. What is your religion?
 - a. Jewish
 - b. Muslim
 - c. Christian
 - d. Druze
 - e. Other