

Americans' Trust in Government and Health Behaviors during the COVID-19 Pandemic

Elizabeth Suhay, Aparna Soni, Claudia Persico, and Dave E. Marcotte

School of Public Affairs, American University

Forthcoming in *RSF: The Russell Sage Foundation Journal of the Social Sciences*

ABSTRACT

The importance of trust in government amidst health emergencies has become apparent, especially given its impact on health behavior. Yet, scholars often treat trust simplistically, measuring it at one point in time and in a unidimensional way. We use a unique series of surveys carried out during the first year of the pandemic to examine changing trust in different government actors over time and then link relative trust to compliance with expert-recommended health behaviors. We find that trust in government declined during this period, with especially large declines for federal and state relative to local government. We find somewhat steeper declines among women, Black Americans, the less educated, and Republicans. Finally, we find that trust in state governments and local health officials was positively associated with protective health behaviors, especially among Republicans, while trust in the federal government was associated with a *lower* likelihood of such behaviors.

Keywords: trust in government; COVID-19 pandemic; health behavior; party polarization

Elizabeth Suhay is an associate professor in the Department of Government, School of Public Affairs, American University. suhay@american.edu

Aparna Soni is an assistant professor in the Department of Public Administration and Policy, School of Public Affairs, American University. asoni@american.edu

Claudia Persico is an assistant professor in the Department of Public Administration and Policy, School of Public Affairs, American University, a Faculty Research Fellow at NBER, and Research Affiliate at IZA. cpersico@american.edu

Dave E. Marcotte is a professor in the Department of Public Administration and Policy, School of Public Affairs, American University, and Research Affiliate at IZA. marcotte@american.edu

We gratefully acknowledge funding from the National Science Foundation (Award #2037331). Austin Bartola and Alexandra Rakus provided excellent research assistance. Direct correspondence to: Elizabeth Suhay, suhay@american.edu, American University, 4400 Massachusetts Ave NW, Washington, DC 20016.

Beginning in early Spring 2020, the SARS-COV-2 coronavirus disease 2019 (COVID-19) spread throughout the United States at an alarming rate, eventually leaving a large death toll in its wake. Low rates of compliance with expert health recommendations to contain the spread of the virus have played a role in the persistence of the pandemic (Devine et al. 2020). In this paper, we examine a potentially important factor shaping citizens' decisions to adhere to public health advisories and adopt healthy behaviors: trust in government.

Governments play an outsized role in communicating expert health advice to the public and, at times, mandating that the public follow certain behavioral guidelines. Thus, whether people trust the government is likely critical to their willingness to comply with such advice and mandates. Unfortunately, Americans' trust in government tends to be low and may have decreased further during the pandemic. This suggests there may exist a vicious cycle in the U.S.: low trust, failure to comply with recommended health behaviors, a worsening pandemic, diminishing trust in government, and so on. This said, we argue that this conventional wisdom oversimplifies matters, as government advice is not always conducive to public health. In the U.S., then-President Trump and some high-ranking Republican officials provided problematic advice to the public and undermined health experts. This raises the possibility that, in some instances, a high level of trust in government actors is in fact harmful to public health.

Despite a rapidly growing literature on societal responses to the COVID-19 pandemic, we know of no longitudinal studies of government trust during the pandemic focused on the U.S. And those studies focused on other nations—with respect to COVID-19 as well as prior pandemics—have come to mixed conclusions as to whether trust is likely to rise or fall during a public health crisis (Bangerter et al. 2012; Bol et al. 2020; Schraff 2021). Studies linking trust with health behavior during pandemics have been more plentiful and have come to firmer conclusions: trust

in government appears to increase positive health behaviors (Brodeur, Grigoryeva, & Kattan 2021; Freimuth et al. 2014; Robinson et al. 2021; Siegrist & Zingg 2014). However, we know of no studies—in the U.S. or elsewhere—that have explicitly examined whether trust in government entities conveying advice of varying quality yields different behavioral effects.

Here, we contribute to these literatures by asking two sets of research questions about COVID-19 and trust in government, with a focus on the U.S. context. First, did trust in government decline during the COVID-19 pandemic? If so, are there important differences among government institutions and actors? And, were any declines in trust in government during the COVID pandemic similar across social groups? Second, is trust in government positively associated with Americans' health behaviors? Are there circumstances where trust in government can backfire?

We answer these questions by analyzing data from a unique survey, the Axios/Ipsos Coronavirus Poll, which surveyed a cross-section of the American public nearly every week of the pandemic, beginning March 13, 2020. The survey includes measures of trust in a variety of government entities (federal, state, and local, as well as local health officials), whether respondents engaged in protective health behaviors, and standard political and demographic characteristics.

Focusing on the first year of the pandemic, our results indicate that public trust in government indeed declined as the pandemic progressed during 2020. Trust fell most sharply with respect to the federal government, a finding that might be expected given the federal government's especially poor initial response to the pandemic. However, state governments also experienced a substantial decline in trust. Trust in local health officials fell the least. Trust among several groups declined more than others, including women, Black Americans, those with less education, and Republicans. Turning to the association between trust in government and health behavior, trust in state governments and local health officials was associated with a greater likelihood of engaging

in expert-recommended health behaviors, especially among Republicans; however, trusting the federal government was associated with a *lower* likelihood of such behavior.

In short, we find evidence consistent with a vicious pandemic-era cycle of low trust, noncompliance, worsening health outcomes, and then even lower trust. In the U.S., trust declined over time, which may have led some people to ignore the advice and directives of government authorities, worsening the pandemic. At the same time, our findings also suggest a counterintuitive conclusion: low trust in the federal government specifically appears to have mitigated these negative effects to some degree, as it was those with greater trust in the branch of government headed by President Trump who complied less with expert-recommended health behaviors.

In the next section, we provide a review of relevant literatures on trust in government and behavioral responses to the COVID-19 pandemic and clarify our research questions and tentative expectations. We follow with a detailed explanation of the data on which we draw and our empirical results. We conclude the paper with a discussion of study implications and limitations.

Theoretical Framework

In recent decades, the study of trust in government has become central to efforts to understand a variety of public behaviors, ranging from voting to how people respond during national emergencies. In this article, three key ideas inform our conceptualization of trust in government. First, trust in government combines evaluations of both the competence of a government entity and whether its primary motive is to protect citizens' interests (Bangerter 2012). Second, trust in government involves evaluations of actual government performance as well as subjective expectations of how well government ought to perform, such that any given individual's trust level reflects a rough ratio of their evaluation to their expectation (Hetherington & Husser 2012). Third, low trust—at least in the U.S. context—is better thought of as skepticism rather than “active

distrust.” Trust suggests people give another the benefit of the doubt, and, thus, low trust in government indicates a refusal to “presume that political authorities should be given the benefit of the doubt” (Cook & Gronke 2004, 785).

Trust in government is also multidimensional in that it can be both general (considered with respect to a nation’s governmental system as a whole) and specific (considered with respect to a particular government institution or even person) (Levi & Stoker 2000). Theoretically, the number of specific variants is as large as is the number of government actors in a nation. Most commonly, scholars of U.S. politics distinguish among institutions within the U.S. government (the President, Congress, etc.) or, increasingly, among the levels of government that make up its federal system (the federal government, state governments, local governments) (e.g., see Wolak 2020). One can also distinguish among types of government officials, such as elected representatives, judges, or health officials. In this paper, we investigate trust in multiple levels of government as well as the government actors most relevant to a pandemic: health officials.

Why People Trust, or Don’t

Arguably the most salient fact about trust in U.S. government is that it decreased dramatically in the 1960s and 1970s and has remained at a relatively low level since (Chanley, Rudolph, & Rahn 2000; Levi & Stoker 2000). Scholarly discussion and debate as to why this decline occurred—and stuck—offers a window into the reasons why people do, and don’t, trust the government.

While trust in government has many antecedents (Chanley, Rudolph, & Rahn 2000), it appears to be linked more to people’s perceptions of politics and politically relevant experiences than their personalities or social characteristics (Levi & Stoker 2000). The initial decline in trust in government in the U.S. has been widely attributed to Civil Rights-related unrest, the Vietnam War, and the Watergate scandal. Reasons for the continuation of depressed trust are more varied

and include: growing expectations for government as its resources declined (Mansbridge 1997); unemployment and other economic stresses (e.g., Stevenson & Wolfers 2011); and partisan polarization (Hetherington & Rudolph 2015).

While the specific reasons why Americans' trust in government is low are various, they share one thing in common: trust declines when people perceive that government entities are either unable or unwilling to protect their interests. With this in mind, when government does not prevent or adequately manage major crises, declines in trust are likely to follow. For example, prior research provides evidence for the negative impact on trust of economic downturns (Stevenson & Wolfers 2011), natural disasters, such as Hurricane Katrina (Nicholls 2012), and prior pandemics (outside the U.S.), such as the 2009 H1N1 pandemic (Bangerter et al. 2012). The fact that, early in the pandemic, the U.S. found itself among the top ten countries in the world for per capita COVID deaths (Craig 2020) suggests declines in trust were likely.

All of this said, there is one important caveat to the idea that trust in government is likely to fall when crises harm a population. If a government is perceived as providing some protection for the public from an external threat, trust in government may increase. In foreign affairs, this is called the "rally 'round the flag" effect (see Hetherington & Husser 2012). At least two recent studies have found evidence of *increased* trust in government in Europe during the COVID-19 pandemic (Bol et al. 2020; Schraff 2020).

Shifting from aggregates to the subgroup level, we would also expect lower trust among people who feel as though government is not serving their specific interests. It is well-established that this includes those whose political party is out of power (Hetherington & Rudolph 2015; Levi & Stoker 2000; Pears & Sydnor, this volume). It might also include low-income people and other vulnerable groups, such as Black Americans, who have reason to suspect authorities engage in

racial discrimination (Kennedy, Mathis, & Woods 2007). These individual-level characteristics may interact with crises to shape people's perceptions of government performance. For example, researchers have established that partisanship plays an important role in people's willingness to blame government for failing to adequately manage crises, with blame concentrated among citizens belonging to the "out-party" (Lyons & Jaeger 2014; Malhotra & Kuo 2008). With respect to public health crises specifically, Eichengreen, Saka, and Aksoy (2020) found that confidence in political leaders and governments fell most among young people, those with less education, and women. This may be due to greater psychological stress during the COVID pandemic among marginalized groups (Fancourt, Steptoe, & Bu 2020; Xiong et al. 2020; see Dush, Manning, Berrigan, & Hardeman, this volume, on racial trauma stress specifically).

Finally, it is important to consider that the nature of trust in government varies between levels of government and types of actors. Generally, trust in the federal government tends to be lower than trust in state and especially local governments, perhaps because the latter benefit from a combination of lower expectations and having easier tasks to perform (Jennings 1998). Determinants of trust can sometimes differ as well. For example, while economic performance and partisanship shape trust in lower levels of government as they do trust in the federal government, additional factors can loom relatively large, such as the perceived accessibility and responsiveness of government officials (Jennings 1998; Wolak 2000).

As the COVID-19 pandemic unfolded, differences in performance among various government entities became more salient than usual. Experts tend to agree that the United States' unusually poor health outcomes could be traced in large part to then-President Trump's consistent efforts to downplay the pandemic and undermine experienced personnel within the Executive Branch (Rutledge 2020). However, in an effort to avoid responsibility and deflect blame from the

federal government, Trump placed much of the burden of responding to COVID-19 onto states and localities (see James, Tervo, & Skocpol, this volume). Devolution to states is usually an inadequate response to a pandemic, as individual state governments cannot control virus spread into their jurisdiction and coordination across states is extremely difficult (Haffajee & Mello 2020). This said, many states and localities earned relatively high marks for their performance under the circumstances. States and localities innovated and shared information through formal collaborations (Mallinson 2020). Following the ideological leans of their electorates, states diverged from one another in many ways too—with conservative states imposing fewer restrictions on their residents (Kettle 2020; James, Tervo, & Skocpol, this volume). On the one hand, this more competent and ideologically congruent response to the pandemic by lower levels of government may have led to greater trust by citizens relative to the federal government. On the other hand, as the actors responsible for grappling with the pandemic, states and localities may also have been the focal point of public frustration.

Why Trust Matters

Trust in government is beneficial to society in a number of ways. It increases the likelihood that people will obey the law (Scholz & Lubell 1998), and citizens who trust the government are more likely to vote and otherwise participate in government (Lee & Schachter 2018). Low trust in government can also lead to dysfunctional policy outcomes, with people opposing popular programs for fear that the government cannot competently carry them out (Hetherington 2004).

Trust in government is relevant to public health as well. Most people are not public health experts and, thus, must turn to experts and other authorities whom they trust. Normally, this leads to positive health outcomes. For example, Freimuth et al. (2014) found that trust in government in the early stages of the H1N1 pandemic was associated with vaccine acceptance among non-

Hispanic White Americans. With respect to the COVID-19 pandemic specifically, Brodeur, Grigoryeva, and Kattan (2021) found that people in high-trust U.S. counties traveled less after stay-at-home orders were put in place than those in low-trust counties. After a thorough review of research articles on trust in authorities in the context of pandemics globally, Siegrist and Zingg (2014) conclude: “studies conducted in various countries and using various trust measures produced similar findings, suggesting that trust had a positive impact on adopting precautionary behavior during a pandemic” (p. 25).

This said, the link between trust in government and positive health behaviors crucially depends on the quality of the government’s health communications. Then-President Trump seemed to publicly undermine health experts’ advice more often than he shared it. He often refused to wear a mask, encouraged the public to ignore their states’ stay-at-home orders, and repeatedly recommended unproven, and possibly dangerous, COVID treatments (Yamey & Gonsalves 2020). By way of contrast, messages emanating from state governors, especially Democratic ones, were more in line with expert guidance. While Republican governors were far less likely than Democratic governors to enact mask mandates and other formal restrictions (James, Tervo, & Skocpol, this volume), most justified this by appealing to the importance of personal choice rather than by directly contradicting health experts (e.g., see Goldberg, Rouben, & Ollstein 2020). In short, while scholars typically observe a positive association between trust in government and protective health behaviors, the U.S. case during COVID-19 may be different. This positive association is less likely with respect to trust in the *federal government* under then-President Trump. We may also observe variation according to whether state governments are headed by Democratic or Republican governors, with trust in the former more strongly associated with healthy behaviors than trust in the latter.

Data & Empirical Methods

Data Sources

Our primary data source is the Axios/Ipsos Coronavirus Poll, a survey with Ipsos' Knowledge Panel conducted nearly every week of the pandemic (Ipsos 2021). We analyze survey data collected between March 20, when the survey began, and October 26, 2020.¹ The survey provides information on respondents' trust in public institutions, including federal, state, and local government and health agencies. We also observe respondents' socio-economic characteristics (e.g., age, race/ethnicity, income), partisanship, and state of residence. Each week's survey is based on a nationally representative probability sample of approximately 1,000 adults. Appendix table 1 lists the exact interview dates and sample sizes for each survey. Our compiled data set is a repeated cross-section based on 28 surveys of the Axios/Ipsos data (surveys 2 through 29 in Appendix table 1), and our total sample size across all surveys is 29,671.

We supplement the Axios/Ipsos data with data on state-level pandemic severity and policy interventions. To measure pandemic severity, we use data on daily COVID-19 cases and deaths by state from the Centers for Disease Control and Prevention (CDC Case Task Force 2021). We obtain data on state policy interventions—including mask mandates, stay-at-home orders, and business re-openings—from the COVID-19 US State Policy (CUSP) database compiled by researchers at Boston University School of Public Health (Raifman et al. 2020).

Variables and Measures

Our first set of outcome variables measures people's trust in various public institutions. Respondents were asked, "How much trust do you have in each of the following to look out for

¹Additional data are available for subsequent months, but we restrict our analytical sample to those interviewed before the 2020 general election to prevent election results from confounding our estimates of the relationship between the pandemic and trust.

the best interests of you and your family?: The federal government, Your state government, Your local government, Local health officials and health care workers.” They could select either “a great deal,” “a fair amount,” “not very much,” or “none at all.” Data on trust in the federal government, state government, and local government are available for our entire study period. Data on trust in local health officials and health care workers are available only for surveys 5 through 23 (which covers respondents interviewed from April 10 through August 23, 2020). For our main analysis, we measure each of these trust variables on a continuous scale from 0 to 1, with 0 representing “none at all,” 0.33 representing “not very much,” 0.67 representing “a fair amount,” and 1 representing “a great deal.” In robustness checks, we use dichotomous measures of trust, with 0 representing “none at all” or “not very much,” and 1 representing “a fair amount” or “a great deal.”

Our second set of outcomes is related to respondents’ compliance with health behaviors intended to reduce the spread of the coronavirus (CDC 2021). Respondents were asked how often they wear a mask and maintain a distance of at least six feet from other people when they leave their homes. They could select either “at all times,” “sometimes but not all the time,” “occasionally but not often,” or “never.” Data on health behaviors are available from surveys 5 through 29 (which covers respondents interviewed from April 10 through October 26, 2020). In our main analysis, we measure each of these behavioral variables on a continuous scale from 0 to 1, with 0 representing “never,” 0.33 representing “occasionally but not often,” 0.67 representing “sometimes but not all the time,” and 1 representing “at all times.” In robustness checks, we use dichotomous measures of behaviors, with 0 representing “never” or “occasionally but not often,” and 1 representing “sometimes but not all the time” or “at all times.” Our final outcome is a dichotomous measure of whether the respondent social distanced in the last week. Respondents

were asked, “In the last week, have you social distanced – that is stayed at home and avoided others as much as possible,” and they could select either “yes” or “no.”

Our analyses control for respondents’ partisanship and socio-demographic characteristics. For partisanship, we use the survey’s “Party ID” variable to construct three dichotomous variables: Democrat, Republican, and Independent (which includes Independents and Others).² Education is measured with a vector of four dichotomous variables indicating whether the respondent’s educational attainment is less than high school, high school or equivalent, some college, or college and beyond. Axios/Ipsos provides respondents’ income in six categories: under \$25,000, \$25,000-\$49,999, \$50,000-\$74,999, \$75,000-\$99,999, \$100,000-\$149,999, and \$150,000+. We recode respondents’ reported income as the upper bound of the reported income range and use their state and household size and US federal poverty guidelines to calculate respondents’ income as a percent of the federal poverty line (FPL) (US Department of Health and Human Services 2021).³ In our analysis, we measure income with a vector of four dichotomous variables indicating whether the respondent’s income is less than 200 percent FPL, 200-400 percent FPL, 400-800 percent FPL, or greater than 400 percent FPL. Race and ethnicity are measured using a set of four indicator variables: non-Hispanic White, non-Hispanic Black, non-Hispanic other race, and Hispanic. We measure age using three dichotomous variables: 18-39 years, 30-64 years, and 65 and older.⁴ We use information on sex and marital status to construct an indicator variable for female respondents and married respondents, respectively. Finally, we use a continuous measure of household size scaled from 0 to 1.

² Axios/Ipsos does not provide information on whether respondents “lean” Democrat or Republican; respondents can choose from Democrat, Republican, Independent, or Other.

³ For example, the FPL for a single person in 2020 was \$12,760, while the FPL for a family of 4 was \$26,200.

⁴ We do not assume that the relationships between age and trust or between income and trust are strictly linear, so we use dichotomous versions of these variables rather than continuous versions.

The severity of, and policy responses to, COVID-19 varied widely by state and likely affect trust and engagement in protective health behaviors, so we control for state-level pandemic severity and policy responses. To measure pandemic severity, we use 1) the logged daily average new COVID cases per 100,000 residents in the respondent's state during their interview week and 2) the logged daily average new COVID deaths per 100,000 residents in the respondent's state during their interview week. In specification checks, we use one-period lagged versions of these severity variables. To account for differences in states' policy responses to the COVID-19 pandemic, our main analyses control for 1) whether the state had a mask mandate in effect during the interview week, 2) whether the state had a stay-at-home order in effect during the interview week, and 3) whether the state reopened businesses during the interview week.

Empirical Methods

We begin with a visual assessment of unadjusted trends in the mean level of trust in federal government, state government, local government, and local health officials/health care workers over time. We formalize this descriptive analysis by using a linear regression model to estimate the association between individuals' trust in each of these institutions and time, controlling for individuals' partisanship and socio-demographic characteristics, time-varying state characteristics such as COVID severity and policy responses, and individuals' state of residence.⁵

⁵ Specifically, we estimate Equation 1 below, in which Y_{ist} represents a series of measures of trust for individual i in state s , in time period t . $Survey_t$ is a continuous measure of survey timing. For ease of interpretation, we scale the survey variable from 0 to 1 so that 0 represents our first week's survey and 1 represents our final week's survey. X_{ist} is a vector of socio-demographic control variables, including partisanship, educational attainment, income, race/ethnicity, age, sex, marital status, and household size. Z_{st} is a vector of time-varying state characteristics including the logged daily average of new COVID cases per 100,000 residents, the logged daily average new COVID deaths per 100,000 residents, whether the state had a mask mandate in effect, whether the state had a stay-at-home order in effect, and whether the state reopened business. δ_s is a vector of state fixed effects. The inclusion of state fixed effects removes omitted variable bias by controlling for time-invariant, unobserved differences across states. ε_{ist} is an error term. All analyses use Axios/Ipsos survey weights.

$$Y_{ist} = \alpha + \beta Survey_t + \gamma X_{ist} + \rho Z_{st} + \delta_s + \varepsilon_{ist} \quad (\text{Equation 1})$$

One might be concerned that the change in trust over the course of the pandemic was not linear. In fact, we will show in our visual assessment of unadjusted trends that there appear to be three distinct phases of the pandemic in 2020. Spring marked the beginning of the pandemic and rapid rise in COVID cases; during summer, the number of new daily cases stabilized, and many thought the pandemic might abate; and fall was a period of unprecedented growth in case rates (CDC Case Task Force, 2021) as well as electioneering by the political parties and 2020 election candidates. To assess potential nonlinearities in the evolution of trust over the course of the pandemic, we use a second regression model which assesses the relationship between trust and time separately for individuals interviewed in spring (March through May), summer (June through August), and fall (September through October). As in our first analysis, we control for individuals' partisanship and socio-demographic characteristics, time-varying state characteristics such as COVID severity and policy responses, and individuals' state of residence.⁶

Next, we investigate how the deepening pandemic differentially affected trust among partisan and demographic groups of interest. We assess changes in trust over time for Democrats vs Republicans vs Independents and by educational attainment, income group, age group, race/ethnicity, sex, marital status, and household size.⁷

⁶ Specifically, we estimate Equation 2 below, in which *SpringSurvey_t* is a continuous measure of surveys conducted from March through May (surveys 2-11), *SummerSurvey_t* measures surveys conducted from June through August (surveys 12-23), and *FallSurvey_t* measures surveys conducted from September through October (surveys 24-29). For ease of interpretation, we scale each seasonal survey variable from 0 to 1. All other variables are as described in Equation 1. All analyses use Axios/Ipsos survey weights.

$$Y_{ist} = \alpha + \beta_1 \text{SpringSurvey}_t + \beta_2 \text{SummerSurvey}_t + \beta_3 \text{FallSurvey}_t + \gamma \mathbf{X}_{ist} + \rho \mathbf{Z}_{st} + \delta_s + \varepsilon_{ist}$$

(Equation 2)

⁷ Specifically, we estimate Equation 3 below, in which all variables are as described in Equation 1. The θ coefficients represent the differential change in trust over time for the political/demographic group indicated by $\mathbf{X}_{ist}$. All analyses use Axios/Ipsos survey weights.

$$Y_{ist} = \alpha + \beta \text{Wave}_t + \gamma \mathbf{X}_{ist} + \theta \mathbf{X}_{ist} \times \text{Wave}_t + \rho \mathbf{Z}_{st} + \delta_s + \varepsilon_{ist}$$

(Equation 3)

We conduct the analyses described above for four different outcomes: trust in federal government, trust in state government, trust in local government, and trust in local health officials/workers. Finally, we examine the relationship between trust and compliance with CDC-recommended health behaviors. We do this by estimating linear regression models to show the association between respondents' engagement in a recommended health behavior and their level of trust in the federal government, their state government, their local government, and their local health officials. All analyses control for partisanship and socio-demographic characteristics, time-varying state characteristics such as COVID severity and policy responses, respondents' state of residence, and week of interview.⁸ We estimate this regression separately for three health behaviors: wearing a mask when leaving home, maintaining a 6-foot distance from other people when leaving home, and whether the respondent social distanced in the past week. We conduct this analysis both for the overall sample and separately by partisanship.

Our preferred models use continuous measures of trust, mask wearing, and maintaining 6-foot distance. However, in robustness checks we use dichotomous measure of these outcomes, and the pattern of results is similar. In additional models, we exclude state-level pandemic severity and policy responses and do not control for respondents' state of residence to test whether our estimates are sensitive to the inclusion of these measures.

Results

⁸ Specifically, we estimate Equation 4 below in which $TrustFedGovt_{ist}$ measures respondents' trust in the federal government, $TrustStateGovt_{ist}$ measures respondents' trust in their state government, $TrustLocalGovt_{ist}$ measures respondents' trust in their local government, and $TrustLocalHealth_{ist}$ measures respondents' trust in their local health officials/workers. τ_t is a vector of survey fixed effects. Survey fixed effects remove omitted variable bias by controlling for state-invariant, unobserved differences in health behaviors over time. Other variables are as described in Equation 1. We estimate Equation 4 for three different outcomes Y_{ist} : wear mask when leaving home, maintain 6-foot distance from other people when leaving home, and social distanced in the past week. All analyses use Axios/Ipsos survey weights.

$$Y_{ist} = \alpha + \beta_1 TrustFedGovt_{ist} + \beta_2 TrustStateGovt_{ist} + \beta_3 TrustLocalGovt_{ist} + \beta_4 TrustLocalHealth_{ist} + \gamma X_{ist} + \rho Z_{st} + \delta_s + \tau_t + \varepsilon_{ist} \quad (\text{Equation 4})$$

Table 1 presents descriptive statistics and means of outcomes for our study sample. Across all surveys, the level of trust was highest for local health officials/workers (0.68), second highest for local governments (0.54) and state governments (0.53), and lowest for the federal government (0.39). This result suggests that individuals concentrate their trust more among local authorities during public health emergencies. Appendix table 2 reports means of outcomes for the different socio-demographic subgroups we assess in our regression analyses. Nearly every subgroup had higher levels of trust in their state and local governments than in the federal government. The only exception was Republicans, whose average level of trust in the federal government was slightly higher than in their state government and the same as their local government.

[Insert table 1 about here]

Unadjusted Trends in Trust Over Time

In figure 1, we present time series graphs of trends in trust over time. At the beginning of the pandemic, people started off with higher levels of trust in local authorities than in the federal government. Moreover, from March through the end of October, there was a substantial decline in trust in the federal government (-29 percent), a moderate decline in trust in state (-20 percent) and local governments (-15 percent), and a smaller decline for local health officials/workers (-8 percent).⁹ This means that the trust gap between local and federal authorities widened over the course of the pandemic. In appendix figure 2, we examine unadjusted trends in trust over time by race, income, age, and political party. These figures suggest similar trends for these groups;

⁹ Note that our data for trust in local health officials/workers is only available from April through August. Appendix figure 1 presents results from an analysis in which we used the dichotomous measures of trust. The patterns are similar – we find large declines in the proportion of adults who have a high level of trust in the federal (44 percent decline from March to October) and state governments (27 percent decrease), and relatively small decreases for local government (21 percent decline) and local health officials/workers (8 percent fall from April to August).

however, we examine this question formally, and expand our analyses to other groups, in the next section.

[Insert figure 1 about here]

Regression Results for Association between Socio-Demographics and Trust over Time

Figure 2 presents regression coefficients and 95 percent confidence intervals for how trust changes over time, as well as how socio-demographic characteristics are associated with trust.¹⁰ In these analyses and those that follow, all variables have been recoded to range from 0 to 1 to ease interpretation. The full regression results are presented in appendix table 3.

[Insert figure 2 about here]

The analyses reveal statistically significant reductions in trust for all four institutions – particularly for federal and state governments. After adjusting for socio-demographic characteristics, state-level pandemic severity and policy responses, and state of residence, we find a 17 percent decline in trust in the federal government¹¹, a 17 percent decline for state government, a 13 percent decline for local government, and a 12 percent decline for local health officials and health care workers. Figure 2 also shows that partisanship is a strong predictor of trust in all levels of government, with Republicans having significantly higher levels of trust in the federal government than Democrats and significantly lower levels of trust in the other three institutions than Democrats. For socioeconomic status, there was a strong negative relationship with trust in federal government and a positive association with trust in state and local governments and local health officials/workers. For example, college-educated adults had lower levels of trust in the federal government but higher trust in the other three institutions relative to others. The lowest

¹⁰ These are the regression results for Equation 1.

¹¹ Note that we calculate relative decline by dividing the coefficient by the mean of the outcome. For example, here, the regression coefficient 0.067 is divided by the mean of the outcome 0.39.

income group had higher levels of trust in the federal government and lower levels of trust in other institutions. In addition, older adults and women had higher levels of trust in all institutions. Non-Whites had greater trust than Whites in the federal government but lower trust in local health officials/workers; trust in health officials was particularly low among Black Americans. In terms of pandemic severity, higher case rates were associated with lower levels of trust in federal and state governments, which suggests that people who witnessed worse COVID outbreaks in their areas lost trust in both federal and state authorities. Interestingly, both mask mandates *and* business re-openings were associated with lower levels of trust in federal, state, and local government, despite these policies being implemented at the state level (see appendix table 3).

Appendix tables 4 through 6 present several sensitivity analyses.¹² Appendix table 4 shows that when we omit our state-level pandemic severity and policy controls, there appear to be larger reductions in trust over time. This suggests that variations in pandemic severity and policy responses across states and over time account for some of the aggregate decreases in trust in our sample. Similarly, excluding state fixed effects yields coefficients of larger magnitudes on the “Survey” variable, implying that unobserved, time-invariant differences across states affect trust in the aggregate as well (appendix table 5). Finally, appendix table 6 shows that our key takeaways are similar when we use dichotomous rather than continuous measures of trust.

Table 2 presents regression results for the non-linear model in which we examined whether declines in trust varied at different stages of the early pandemic.¹³ The declines in trust in the federal and state governments were largest in spring (March through May) and slowed down

¹² We also estimate a version of Equation 1 that uses a one-period lagged version of the pandemic severity variables. Our first survey is automatically dropped from analysis because we lack lagged severity data for that time period. As expected, coefficients on the “Survey” variable are still negative but smaller in magnitude than those presented in figure 2. This is because the largest drops in trust occurred between the first and second surveys. The coefficients on the socio-demographic and policy variables are nearly identical in the lagged and non-lagged models. Results are available on request.

¹³ These are the regression results for Equation 2.

considerably by fall (September and October). Differences between the spring and fall were statistically significant at the .01 level. For local health officials/workers, trust fell more during the summer months than spring. Even excluding controls for pandemic severity and policies (appendix table 7) and excluding state fixed effects (appendix table 8), declines in trust were significantly larger in spring than fall for federal, state, and local governments. Appendix table 9 shows that these trends are similar when we use dichotomous rather than continuous measures of trust. In sum, these results show that people lost trust in government institutions rapidly over the early months of the pandemic and continued losing trust as the pandemic progressed, but at slower rates.

[Insert table 2 about here]

Finally, appendix table 10 presents results for how the pandemic differentially affected trust among partisan and demographic groups of interest.¹⁴ Compared to both Independents and Democrats, Republicans had a higher *level* of trust in the federal government, but Republicans experienced steeper *declines* in trust than Independents or Democrats. In contrast, Democrats had a lower *level* of trust in federal government than Independents, but experienced smaller *declines* in trust than Independents. In general, people of lower socioeconomic status and minorities had higher baseline levels of trust but experienced greater declines in trust over the course of the pandemic. For example, less educated adults had higher levels of trust in the federal government but experienced greater declines than those who were more educated. Similarly, Blacks had higher levels of trust in the federal government than Whites but steeper declines over time. Women's trust in federal and local governments fell more rapidly than men's over time. Most of these trends are similar when we exclude measures of pandemic severity and policies (appendix table 11) or state fixed effects (appendix table 12) and use dichotomous measures of trust (appendix table 13).

¹⁴ These are the regression results for Equation 3.

Regression Results for Association between Trust and Protective Health Behaviors

The third part of our analysis studies the relationship between trust and compliance with protective health behaviors recommended by the CDC. The coefficient plots in figure 3 present an abridged version of the coefficient estimates and 95 percent confidence intervals, and appendix table 14 presents the full results in tabular format.¹⁵

[Insert figure 3 about here]

Figure 3 shows that after controlling for party identification, socio-demographic factors, state-level pandemic severity, state-level policy responses, state of residence, and timing of survey, trust in state government and local health officials/health care workers are both associated with increased engagement in protective health behaviors, such as wearing masks, maintaining a 6-foot distance from others, and staying home and avoiding socializing (referred to in the survey as “social distancing”). On the other hand, trust in the federal government is associated with *lower* levels of engagement in these protective behaviors. These effects are large in magnitude as well as statistically significant (and are over and above the effect of partisanship). For example, relative to those with the lowest trust, those with the highest trust in state governments are about 9 percentage points more likely to wear a mask, and those with the highest trust in local health officials/workers are about 16 percentage points more likely to wear a mask. On the other hand, those with the highest trust in the federal government are *less* likely to wear a mask by about 7 percentage points. The relationship between trust in local government and protective behaviors is not statistically significant.¹⁶ These results suggest that trust in government plays a central role in whether people engage in protective health behaviors but that, if misplaced, trust can backfire.

¹⁵ These are the regression results for Equation 4.

¹⁶ As others have found (e.g., Thaler et al., 2020), we also see that Democrats are more likely to engage in recommended health behaviors than both Independents and Republicans, as are Blacks and Hispanics (appendix table 14).

In appendix table 15, we show that the results are substantively similar (though the magnitudes of the coefficients differ) if we use dichotomous measure of the trust and behavior variables. Our results are also similar when omitting controls for state-level pandemic severity and policy responses (appendix table 16).

In figure 4, we present coefficient plots for the same regression models stratified by respondents' party identity. (Appendix table 17 presents the full version of these results and shows whether the coefficient estimates for trust are statistically different by party ID.) We find that trust in the federal government is associated with less mask wearing among *both* Democrats and Republicans alike; there is no statistically significant difference in the magnitudes of the coefficients across parties. However, trust in state government is more strongly associated with this behavior among Republicans than Democrats. For Republicans, a 1-point increase in trust in state government is associated with a 0.17 (or 25 percent) increase in mask-wearing, versus only a 0.02 (or 2 percent) increase for Democrats. Similarly, trust in local health officials/workers is more strongly associated with Republicans' propensity to wear masks than Democrats. For Republicans, a 1-point increase in trust in local health officials/health care workers is again associated with a 0.18 (or 27 percent) increase in mask-wearing versus only a 0.07 (or 8 percent) increase for Democrats. On the other hand, trust in local government does not significantly relate to Republicans' engagement in mask-wearing, whereas it is positively correlated with Democrats' engagement in mask-wearing.

[Insert figure 4 about here]

For maintaining a 6-foot distance in public and social distancing, we find a similar partisan pattern. Trust in the federal government is associated with a lower likelihood of maintaining a 6-foot distance for Democrats (-0.04 or -5 percent) but the effect is null for Republicans. However,

trust in state government has a larger positive coefficient for Republicans (0.11 or 15 percent) than Democrats (0.03 or 3 percent). Similarly, trust in local health officials and health care workers is more strongly associated with Republicans' maintenance of a 6-foot distance (coefficient is 0.14 or 19 percent) than Democrats' (0.07 or 8 percent). This said, again, trust in local government is not related to Republicans' behavior while it is positively associated with Democrats' ($p < .10$).

For social distancing, we find that trust in the federal government is associated with less social distancing for Democrats and Republicans alike. However, trust in state government is associated with more social distancing among Republicans (0.19 or 27 percent) but not Democrats. Trust in local health officials and health care workers also has a larger coefficient for Republicans (0.20 or 28 percent) than Democrats (0.13 or 15 percent). In this analysis, trust in local government is not associated with social distancing for either Republicans or Democrats. In appendix table 18 we show that these findings are robust to omitting the controls for state-level pandemic severity and policy responses.

Overall, the results presented in figure 4 show that the relationship between trust in government actors and recommended health behaviors often differs by partisanship. The relationships between trust in state government and health behaviors among Republicans stand out as especially strong relative to those for Democrats. That said, this pattern merits further exploration, as it could be driven by the fact that state legislatures and governorships are currently dominated by Republican elected officials. In other words, partisans may be more likely to follow health advice from co-partisan politicians.

Thus, in our final analysis, we assess the relationship between trust in state government and protective health behaviors for those whose party identification matches that of their state governor. Appendix table 19 shows that for Democrats in states with Democratic governors (panel

A) and for Republicans in states with Republican governors (panel C), trust in state government is associated with a greater likelihood of mask wearing and maintaining a 6-foot distance. For Republicans in states with Republican governors, trust in state government is also associated with social distancing. While the relationships between trust and behavior among Republican respondents remain stronger (especially for social distancing), the coefficients for Democratic respondents' trust in state government has increased, suggesting that the earlier results were driven in part by the dominance of the Republican Party in state politics.

This said, the analyses showing results for partisans living in states with *out-party* governors tell a different story. For Democrats in states with Republican governors (panel B), greater trust in state government is associated with a reduced likelihood of engaging in protective health behaviors. For Republicans in states with Democratic governors (panel D), higher levels of trust in state government greatly increase the probability of wearing masks, maintaining a 6-foot distancing, and social distancing. Coefficients here are 50 to 100 percent larger than when Republicans in states with Republican governors are examined.

Discussion

We define trust in government as the belief that government is both competent and oriented toward the public interest and that people weigh performance against expectations. With this in mind, the trends we have observed in trust in government are to a significant degree sensible: while the COVID-19 pandemic could not have been prevented by the U.S. government, it certainly could have been better managed, especially by the federal government. As a result, Americans' trust in the federal government saw some of the steepest aggregate declines. States, which bore the greatest responsibility—many experts would argue unfairly—in grappling with the pandemic during the period under study, also saw significant declines. While no government entities were spared, trust

in local governments and health officials/workers declined the least.¹⁷ These findings are robust to the inclusion of various control variables, including state-level fixed effects and overtime state-level variation in pandemic severity and policies, suggesting these trends are robust, nation-wide reactions to an ongoing national crisis. We also note that omitting the state-level controls for pandemic severity and policy responses results in even larger declines in trust, especially for federal and state governments (appendix table 4). This suggests both that our main estimates represent conservative estimates of declines in trust during this period and also that Americans' *personal* experiences with the pandemic—knowledge of case counts nearby and interactions with state policies—explains some of the variance in changing trust over time.

We also investigated whether declines in trust varied according to partisanship or membership in vulnerable social groups. Prior research suggests trust in the federal government among Democrats may have declined more than among Republicans, as Democrats should be less likely to interpret federal government actions in a favorable light. In addition, low-income people, Black and Hispanic Americans, and women suffered disproportionately during the pandemic, suggesting we might find greater declines in trust among these groups as well. We found mixed results here. We did not find that Democrats' trust in the federal government declined most; in fact, Republicans' did. Our findings with respect to social groups were more in line with expectations, with trust in the federal government among women, Black Americans, and less educated Americans falling disproportionately. While our theoretical framework suggests these declines are due to pandemic-caused distress, another interpretation is plausible. The above groups, including Republicans, had higher trust in the federal government at the outset of the study. Thus, these trends may stem in part from initially elevated trust relative to others.

¹⁷ We cannot be certain whether the results for local health officials and workers would hold if we had fall 2020 data available for this group.

Turning to the relevance of trust in government to health behaviors, our results suggest that trust is indeed consequential. Those who trusted their state governments and, especially, their local health personnel were more likely to report that they wore a mask, maintained a 6-foot distance from others, and avoided socializing altogether. These effects were especially large among Republicans. Further, we found that trust in state governments among Republicans living in states with Democratic governors was particularly strongly associated with engaging in expert-recommended health behaviors; the trust-behavior effect was smaller for Republicans in states with Republican governors and *reversed* for Democrats in states with Republican governors (see appendix table 19), suggesting a complicated relationship contingent on both the quality of health advice being provided at the state level and a person's partisanship and associated baseline behaviors. We observed another reversal, this time regardless of partisanship, with respect to the federal government. Those with higher trust than others in the federal government, led at the time of our study by President Donald Trump, were *less* likely to engage in protective health behaviors. Cook and Gronke (2004) argue that low trust need not be a bad thing—it merely indicates skepticism, or a refusal to give authorities the benefit of the doubt. This example supports their logic: low trust in the federal government during the COVID pandemic may have saved lives.

Our study is limited in two main regards. One caveat is that we are unable to rule out all potential threats to validity necessary to interpret our findings as causal. We can observe that trust declined over time, but we cannot be certain that disappointment with various government entities' handling of the pandemic is the cause. Likewise, we can observe an association between trust in certain government actors and protective health behaviors, but we are not certain whether the former causes the latter or what precisely might link the two phenomena. A second caveat is that our findings are time bound, relevant to the COVID pandemic before the 2020 election. We cannot

know how the dynamics might have changed under the Biden administration; however, one straight-forward speculation is that trust in the federal government is now predictive of protective health behaviors, returning to the typical trust-behavior link found in other studies.

This analysis advances our understanding of the importance and limits of public trust in government—extending, and in some cases challenging, extant social science research. As prior research would suggest, we document that trust in government fell markedly during a mishandled public health crisis. Exploring an understudied aspect of political trust, we illustrate that trends in trust varied according to the level and type of government actor in view, with trust falling the most in entities that were either objectively underperforming or a focal point for citizens’ expectations. Finally, we clarify that trust in government is conducive to public health only to the extent that authorities’ guidance itself is well-founded. Although some prior research has acknowledged the limitations of trust in government in general, to our knowledge, we are the first to provide evidence that trust in government during a public health crisis is not an unmitigated good.

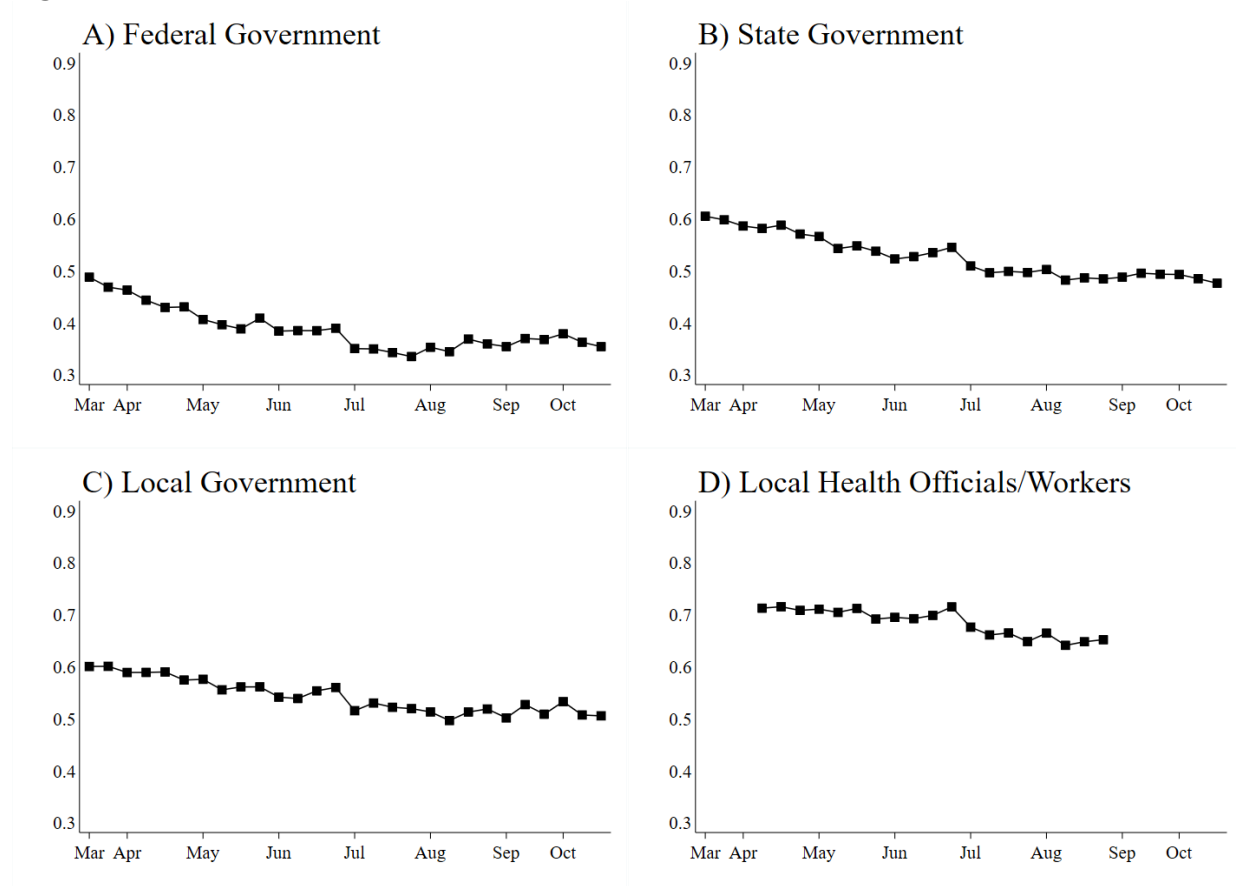
References

- Bangerter, Adrian, Franciska Krings, Audrey Mouton, Ingrid Gilles, Eva G.T. Green, and Alain Clemence. 2012. "Longitudinal Investigation of Public Trust in Institutions Relative to the 2009 H1N1 Pandemic in Switzerland." *Plos One* 7(11): e49806.
- Bol, Damien, Marco Giani, André Blais, and Peter John Loewen. 2020. "The Effect of COVID-19 Lockdowns on Political Support: Some Good News for Democracy?" *European Journal of Political Research* 60(2): 497-505.
- Brodeur, Abel, Idaliya Grigoryeva, and Lamis Kattan. 2021. "Stay-at-Home Orders, Social Distancing, and Trust." *Journal of Population Economics* 34: 1321-1354.
- Chanley, Virginia A., Thomas J. Rudolph, and Wendy M. Rahn. 2000. "The Origins and Consequences of Public Trust in Government: A Time Series Analysis." *Public Opinion Quarterly* 64: 239-256.
- CDC. 2021. Guidance for Wearing Masks: Help Slow the Spread of COVID-19. Available at: <https://www.cdc.gov/coronavirus/2019-ncov/prevent-getting-sick/cloth-face-cover-guidance.html>. Accessed on March 1, 2021.
- CDC Case Task Force. 2021. United States COVID-19 Cases and Deaths by State and Over Time. Available at: <https://data.cdc.gov/Case-Surveillance/United-States-COVID-19-Cases-and-Deaths-by-State-o/9mfq-cb36>. Accessed on December 20, 2020.
- Cook, Timothy E., and Paul Gronke. 2004. "The Skeptical American: Revisiting the Meanings of Trust in Government and Confidence in Institutions." *The Journal of Politics* 67(3): 784-803.
- Craig, Jessica. 2020. How The U.S. Ranks On COVID-19 Deaths Per Capita—And By Case Count. *National Public Radio*. August 5.
- Devine, Daniel, Jennifer Gaskell, and Will Jennings. 2020. "Trust and the Coronavirus Pandemic: What are the Consequences of and for Trust? An Early Review of the Literature." *Political Studies Review*. 19(2): 274-85. <https://doi.org/10.1177/1478929920948684>
- Dush, Claire M., Wendy D. Manning, Miranda N. Berrigan, and Rachel R. Hardeman. 2021. "Stress and Mental Health: A Focus on COVID-19 and Racial Trauma Stress." Forthcoming, *RSF: Russell Sage Foundation Journal of the Social Sciences*.
- Eichengreen, Barry, Orkun Saka, and Cevat Giray Aksoy. 2020. "The Political Scar of Epidemics. National Bureau of Economic Research." Working paper 27401. DOI 10.3386/w27401.
- Fancourt, Daisy, Andrew Steptoe, and Feifei Bu. 2020. "Trajectories of Anxiety and Depressive Symptoms During Enforced Isolation Due to COVID-19 in England: A Longitudinal Observational Study." *Lancet Psychiatry*. December 9.
- Freimuth, Vicki S., Don Musa, Karen Hilyard, Sandra Crouse Quinn, and Kevin Kim. 2014. "Trust During the Early Stages of the 2009 H1N1 Pandemic." *Journal of Health Communication* 19(3): 321-339.
- Goldberg, Dan, Rachel Roubein, and Alice Miranda Ollstein. 2020. "Red State Governors Reject Biden on Mask Orders." *Politico*. November 13.
- Goolsbee, Austan, Nicole Bei Luo, Roxanne Nesbitt, and Chad Syverson. 2020. "COVID-19 Lockdown Policies at the State and Local Level." University of Chicago, Becker Friedman Institute for Economics Working Paper No. 2020-116. [dx.doi.org/10.2139/ssrn.3682144](https://doi.org/10.2139/ssrn.3682144).
- Haffajee, Rebecca L., and Michelle M. Mello. 2020. "Thinking Globally, Acting Locally – The U.S. Response to Covid-19." *New England Journal of Medicine* 382(22): e75.
- Hetherington, Marc J., and Jason A. Husser. 2012. "How Trust Matters: The Changing Political Relevance of Political Trust." *American Journal of Political Science* 56(2): 312-325.

- Hetherington, Marc J., and Thomas J. Rudolph. 2015. *Why Washington Won't Work*. University of Chicago Press.
- Ipsos. 2021. Axios/Ipsos Coronavirus Index. Available at: <https://www.ipsos.com/en-us/news-polls/axios-ipsos-coronavirus-index>. Accessed on December 20, 2020.
- James, Sarah, Caroline Tervo, and Theda Skokpol. 2021. "Institutional Capacities, Partisan Divisions, and Federal Tensions in U.S. Responses to the Covid-19 Pandemic." Forthcoming, *RSF: Russell Sage Foundation Journal of the Social Sciences*.
- Jennings, M. Kent. 1998. "Political Trust and the Roots of Devolution." In *Trust and Governance*, Valerie Braithwaite and Margaret Levi, eds. New York: Russell Sage Foundation.
- Kennedy, Bernice Roberts, Christopher Clomus Mathis, and Angela K. Woods. 2007. "African Americans and Their Distrust of the Health Care System: Healthcare for Diverse Populations." *Journal of Cultural Diversity* 14(2): 56-60.
- Kettle, Donald F. 2020. "States Divided: The Implications of American Federalism for COVID-19." *Public Administration Review* 80(4): 595-602.
- Lee, Yunsoo, and Hindy Lauer Schachter. 2018. "Exploring the Relationship between Trust in Government and Citizen Participation." *International Journal of Public Administration* 42(5).
- Levi, Margaret, and Laura Stoker. 2000. "Political Trust and Trustworthiness." *Annual Review of Political Science* 3: 475-507.
- Lyons, Jeffrey, and William P. Jaeger. 2014. "Who Do Voters Blame for Policy Failure? Information and the Partisan Assignment of Blame." *State Politics & Policy Quarterly* 14(3): 321-341.
- Malhotra, Neil, and Alexander G. Kuo. 2008. "Attributing Blame: The Public's Response to Hurricane Katrina." *The Journal of Politics* 70(1): 120-135.
- Mallinson, Daniel J. 2020. "Cooperation and Conflict in State and Local Innovation During COVID-19." *The American Review of Public Administration* 50(6-7).
- Mansbridge, Jane. 1997. "Social and Cultural Causes of Dissatisfaction with U.S. Government." In *Why People Don't Trust Government*, Joseph S. Nye, Jr., Philip D. Zelikow, and David C. King, eds. Cambridge, MA: Harvard University Press.
- Nicholls, Keith, and J. Steven Picou. 2012. "The Impact of Hurricane Katrina on Trust in Government." *Social Science Quarterly* 94(2): 344-361.
- Pears, Emily, and Emily Sydnor. 2021. "COVID-19 and the Culture of American Federalism." Forthcoming, *RSF: Russell Sage Foundation Journal of the Social Sciences*.
- Raifman, Julia, Kristen Nocka, David Jones, Jacob Bor, Sarah Lipson, Jonathan Jay, and Philip Chan. 2020. COVID-19 US State Policy Database. Available at: www.tinyurl.com/statepolicies. Accessed on December 20, 2020.
- Robinson, Scott E., Joseph T. Ripberger, Kuhika Gupta, Jennifer A. Ross, Andrew S. Fox, Hank C. Jenkins-Smith, and Carol L. Silva. 2021. "The Relevance and Operations of Political Trust in the COVID-19 Pandemic." *Public Administration Review* 81(6): 1110-1119.
- Rutledge, Paul E. 2020. "Trump, COVID-19, and the War on Expertise." *The American Review of Public Administration* 50(6-7): 505-511.
- Scholz, John T., and Mark Lubell. 1998. "Trust and Taxpaying: Testing the Heuristic Approach to Collective Action." *American Journal of Political Science* 42(2): 398-417.
- Schraff, Dominik. 2021. "Political Trust During the Covid-19 Pandemic: Rally Around the Flag or Lockdown Effects?" *European Journal of Political Research* 60(4): 1007-1017.

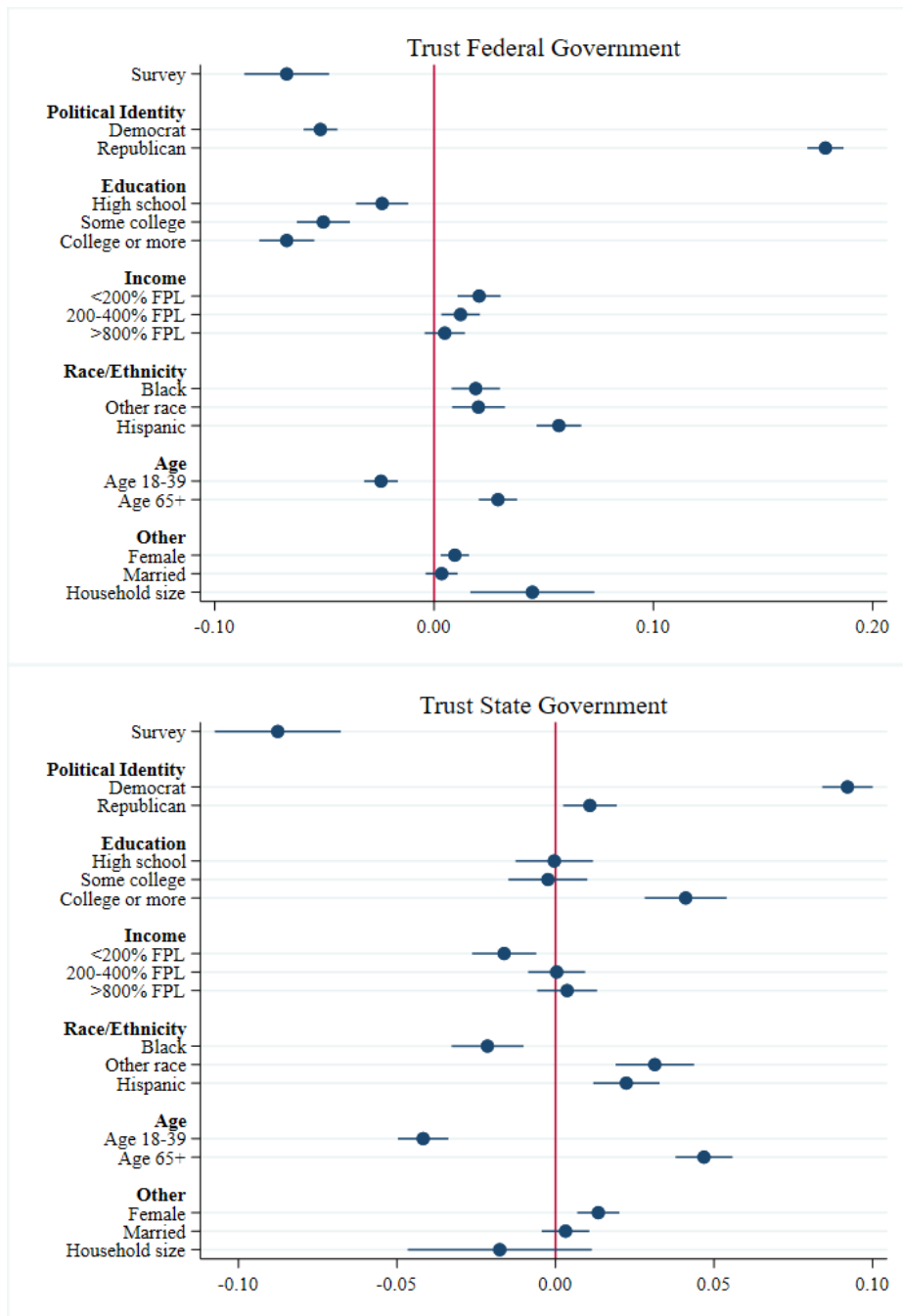
- Siegrist, Michael, and Alexandra Zingg. 2014. "The Role of Public Trust During Pandemics: Implications for Crisis Communication." *European Psychologist* 19(1): 23-32.
- Stevenson, Betsey, and Justin Wolfers. 2011. "Trust in Public Institutions over the Business Cycle." *American Economic Review* 101(3): 281-287.
- Thaler, Michael, Levi Boxell, David Y. Yang, Jacob Conway, Matthew Gentzkow, and Hunt Allcott. 2020. "Polarization and Public Health: Partisan Differences in Social Distancing." Paper presented at the annual meeting of the American Political Science Association.
- US Department of Health and Human Services. 2021. Prior HHS Poverty Guidelines and Federal Register References. Available at: <https://aspe.hhs.gov/prior-hhs-poverty-guidelines-and-federal-register-references>. Accessed on December 20, 2020.
- White, Easton R., and Laurent Hebert-Dufresne. 2020. "State-Level Variation of Initial COVID-19 Dynamics in the United States: The Role of Local Government Interventions." <https://doi.org/10.1101/2020.04.14.20065318>.
- Wolak, Jennifer. 2000. "Why Do People Trust Their State Government?" *State Politics & Policy Quarterly* 20(3): 313-329.
- Xiong et al. 2020. "Impact of COVID-19 Pandemic on Mental Health in the General Population: A Systematic Review." *Journal of Affective Disorders* 277: 55-64.
- Yamey, Gavin, and Gregg Gonsalves. 2020. "Donald Trump: A Political Determinant of COVID-19." *BMJ* 369. doi: <https://doi.org/10.1136/bmj.m1643>.

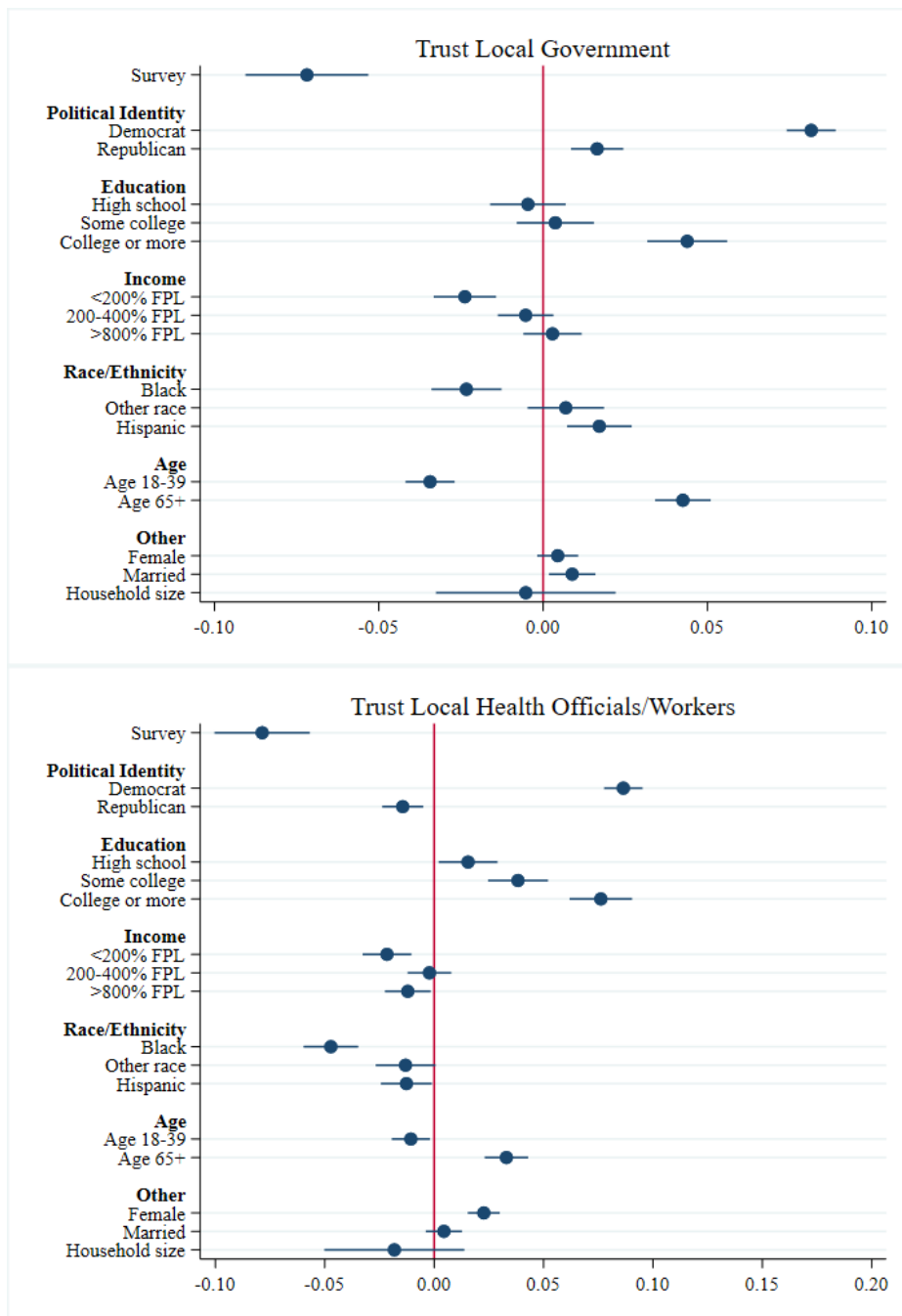
Figure 1. Trends in Trust Over Time



Source: Authors' calculations based on Surveys 2 through 29 of the 2020 Axios/Ipsos Coronavirus Poll (administered March 20 to October 26, 2020). N=29,671. Trust is measured on a continuous scale from 0 to 1, with 0 representing no trust at all in the institution to look out for you and your family, and 1 representing a great deal of trust. Vertical axis measures the weighted mean; x-axis displays week of interview. All analyses use Axios/Ipsos survey weights.

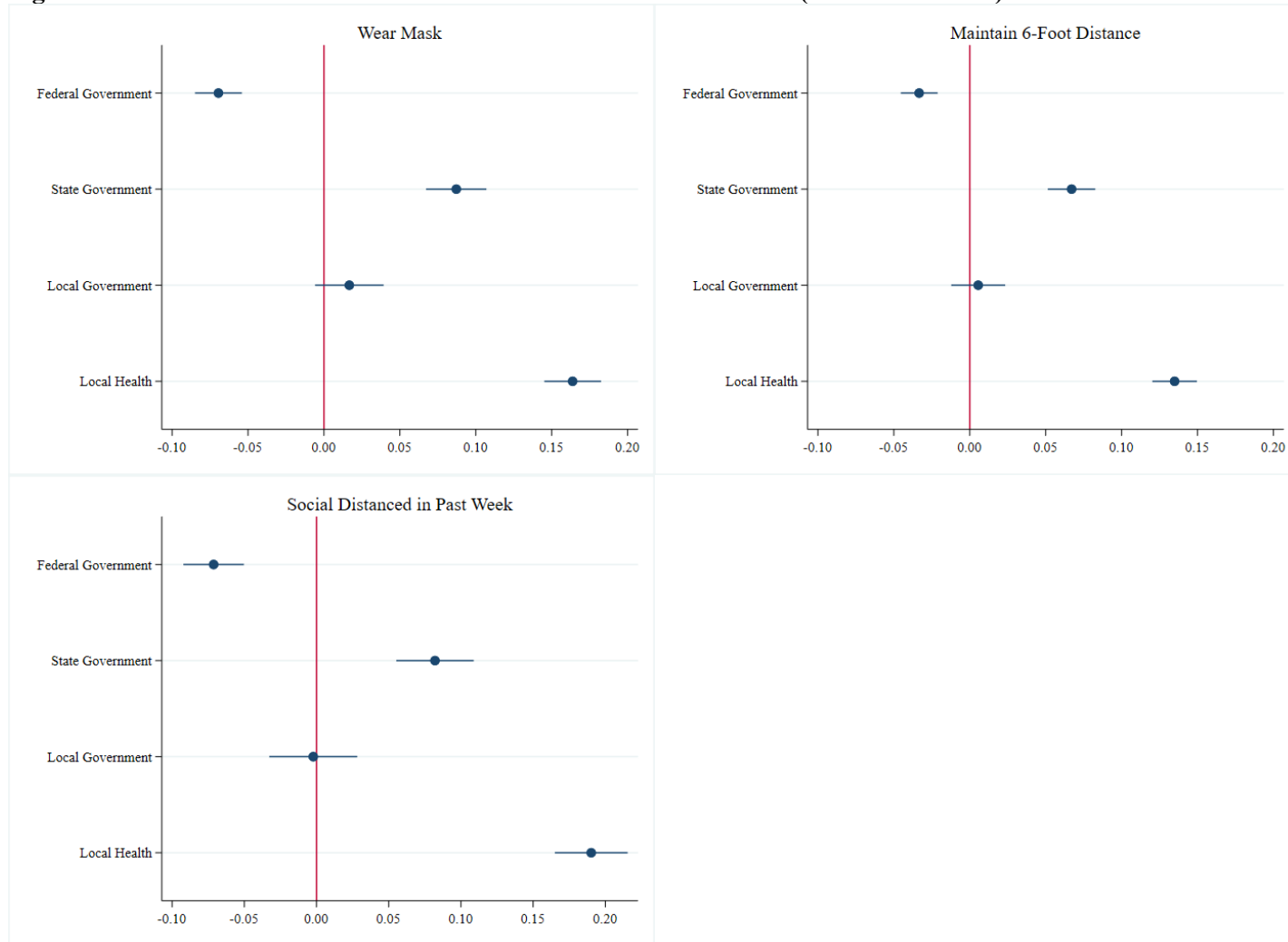
Figure 2. Association between Time, Socio-Demographic Characteristics, and Trust (Coefficient Plots)





Source: Authors' calculations based on Surveys 2 through 29 of the 2020 Axios/Ipsos Coronavirus Poll (administered March 20 to October 26, 2020). Each figure presents point estimates and 95% confidence intervals from a different regression. Trust is measured on a continuous scale from 0 to 1, with 0 representing no trust at all in the institution to look out for you and your family, and 1 representing a great deal of trust. All regressions also include state-level pandemic severity and policy responses and state fixed effects and use Axios/Ipsos survey weights. The variables "Independent" party ID, "Less than high school" educational attainment, "Income 400-800% FPL," "White, non-Hispanic" race, and "Age 40-64" are omitted as base categories. See Appendix Table 3 for full regression results.

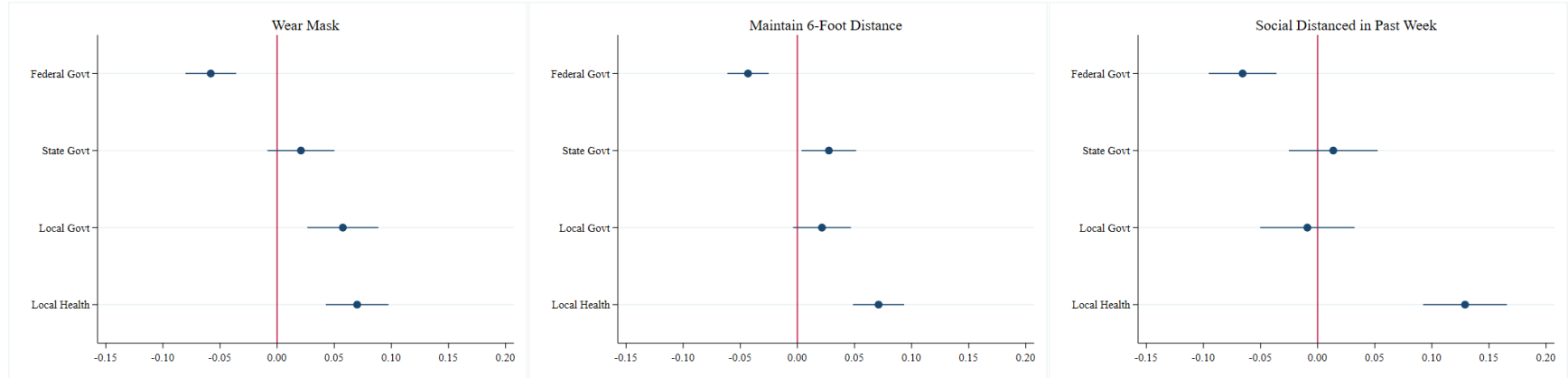
Figure 3. Association between Trust and Protective Health Behaviors (Coefficient Plots)



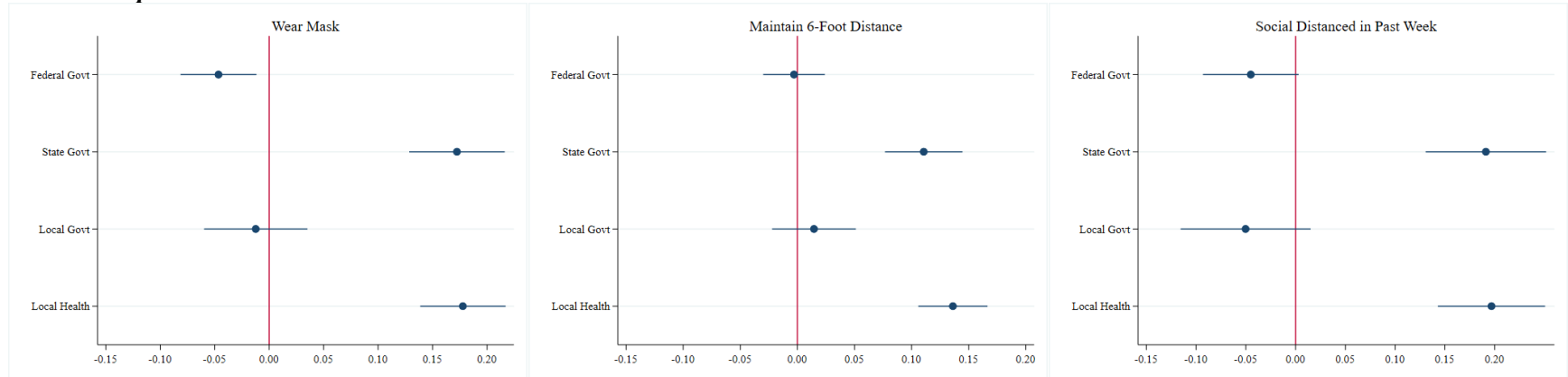
Source: Authors' calculations based on Surveys 5 through 23 of the 2020 Axios/Ipsos Coronavirus Poll (administered April 10 to August 31, 2020). Each figure presents point estimates and 95% confidence intervals from a different regression. Trust is measured on a continuous scale from 0 to 1, with 0 representing no trust at all in the institution to look out for you and your family, and 1 representing a great deal of trust. All regressions also include each socio-demographic characteristics, state pandemic severity (logged case rate and logged death rate), state pandemic policy responses (mask mandate, business reopening, and stay at home order), state fixed effects, survey fixed effects and use Axios/Ipsos survey weights. See Appendix Table 14 for full regression results.

Figure 4. Association between Trust and Protective Health Behaviors (Coefficient Plots), Separately by Partisanship

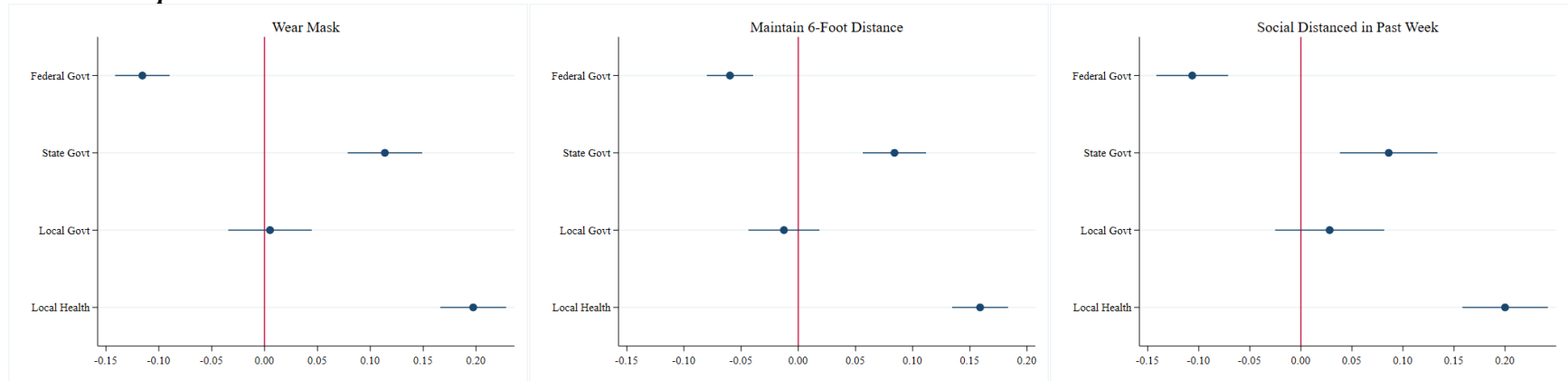
Panel A. Democrats



Panel B. Republicans



Panel C. Independents



Source: Authors' calculations based on Surveys 5 through 23 of the 2020 Axios/Ipsos Coronavirus Poll (administered April 10 to August 31, 2020). Each figure presents point estimates and 95% confidence intervals from a different regression. Trust is measured on a continuous scale from 0 to 1, with 0 representing no trust at all in the institution to look out for you and your family, and 1 representing a great deal of trust. All regressions also include each socio-demographic characteristics, state pandemic severity (logged case rate and logged death rate), state pandemic policy responses (mask mandate, business reopening, and stay at home order), state fixed effects, survey fixed effects and use Axios/Ipsos survey weights. See Appendix Table 17 for full regression results.

Table 1. Socio-Demographic Characteristics of Study Sample

	Mean (1)	Standard Deviation (2)	Minimum (3)	Maximum (4)
Panel A: Individual Socio-Demographics				
<i>Political Affiliation</i>				
Democrat	0.34	0.47	0.00	1.00
Republican	0.27	0.44	0.00	1.00
Independent	0.39	0.49	0.00	1.00
<i>Educational Attainment</i>				
Less than high school	0.11	0.31	0.00	1.00
High school	0.28	0.45	0.00	1.00
Some college	0.28	0.45	0.00	1.00
College or more	0.33	0.47	0.00	1.00
<i>Household Income</i>				
<200% poverty level	0.22	0.41	0.00	1.00
200-400% poverty level	0.25	0.44	0.00	1.00
400-800% poverty level	0.31	0.46	0.00	1.00
>800% poverty level	0.21	0.41	0.00	1.00
<i>Race/ethnicity</i>				
White, non-Hispanic	0.63	0.48	0.00	1.00
Black, non-Hispanic	0.12	0.32	0.00	1.00
Other, non-Hispanic	0.09	0.28	0.00	1.00
Hispanic	0.17	0.37	0.00	1.00
<i>Age</i>				
18-39	0.37	0.48	0.00	1.00
40-64	0.42	0.49	0.00	1.00
65+	0.21	0.41	0.00	1.00
Female	0.52	0.50	0.00	1.00
Married	0.56	0.50	0.00	1.00
Household Size	0.23	0.13	0.00	1.00
Panel B: State Severity & Policy Responses				
Logged death rate	0.24	0.28	-0.05	2.34
Logged case rate	2.78	0.92	-1.75	5.35
Mask mandate in effect	0.46	0.50	0.00	1.00
Business reopening in effect	0.57	0.50	0.00	1.00
Stay at home order in effect	0.32	0.47	0.00	1.00
Panel C: Outcome Variables				
Trust federal government	0.39	0.30	0.00	1.00
Trust state government	0.53	0.30	0.00	1.00
Trust local government	0.54	0.28	0.00	1.00
Trust local health officials/workers	0.68	0.27	0.00	1.00
Wear mask	0.77	0.31	0.00	1.00
Maintain 6-foot distance	0.81	0.24	0.00	1.00
Social distanced in past week	0.80	0.40	0.00	1.00
Observations	29,671			

Source: Authors' calculations based on Surveys 2 through 29 of the 2020 Axios/Ipsos Coronavirus Poll (administered March 20 to October 26, 2020). All analyses use Axios/Ipsos survey weights.

Table 2. Regression Results for How Trust Changes Over Time

	Federal government	State Government	Local Government	Local Health Officials/Workers
Spring Survey	-0.100*** (0.011)	-0.052*** (0.011)	-0.038*** (0.010)	-0.013 (0.011)
Summer Survey	-0.027***,+++ (0.009)	-0.044*** (0.009)	-0.039*** (0.009)	-0.062***,+++ (0.009)
Fall Survey	0.002+++ (0.010)	-0.008+++ (0.011)	0.001+++ (0.010)	-
Democrat	-0.052*** (0.004)	0.092*** (0.004)	0.082*** (0.004)	0.086*** (0.004)
Republican	0.178***,c (0.004)	0.011**,c (0.004)	0.016***,c (0.004)	-0.014***,c (0.005)
High school	-0.024*** (0.006)	-0.001 (0.006)	-0.005 (0.006)	0.016** (0.007)
Some college	-0.050*** (0.006)	-0.002 (0.006)	0.004 (0.006)	0.038*** (0.007)
College or more	-0.067*** (0.006)	0.041*** (0.007)	0.044*** (0.006)	0.076*** (0.007)
Income <200% FPL	0.021*** (0.005)	-0.016*** (0.005)	-0.024*** (0.005)	-0.022*** (0.006)
Income 200-400% FPL	0.013*** (0.004)	0.001 (0.005)	-0.005 (0.004)	-0.002 (0.005)
Income >800% FPL	0.005 (0.005)	0.004 (0.005)	0.003 (0.005)	-0.012** (0.005)
Black, non-Hispanic	0.019*** (0.006)	-0.022*** (0.006)	-0.023*** (0.005)	-0.047*** (0.006)
Other race, non- Hispanic	0.021*** (0.006)	0.031*** (0.006)	0.007 (0.006)	-0.013* (0.007)
Hispanic	0.057*** (0.005)	0.022*** (0.005)	0.017*** (0.005)	-0.013** (0.006)
Age 18-39	-0.025*** (0.004)	-0.042*** (0.004)	-0.035*** (0.004)	-0.011** (0.004)
Age 65+	0.029*** (0.004)	0.047*** (0.005)	0.043*** (0.004)	0.033*** (0.005)

Female	0.009*** (0.003)	0.013*** (0.003)	0.004 (0.003)	0.023*** (0.004)
Married	0.003 (0.004)	0.003 (0.004)	0.009** (0.004)	0.005 (0.004)
Household size	0.045*** (0.014)	-0.017 (0.015)	-0.005 (0.014)	-0.017 (0.016)
Logged Death Rate	0.008 (0.009)	-0.011 (0.009)	-0.011 (0.009)	-0.004 (0.011)
Logged Case Rate	-0.008** (0.003)	-0.006** (0.003)	-0.002 (0.003)	-0.002 (0.004)
Mask Mandate in Effect	0.000 (0.006)	-0.009 (0.006)	-0.004 (0.006)	-0.004 (0.006)
Business Reopening in Effect	0.012** (0.006)	-0.005 (0.006)	-0.004 (0.006)	-0.010 (0.006)
Stay at Home Order in Effect	0.003 (0.007)	-0.000 (0.007)	0.003 (0.007)	-0.002 (0.008)
N	29,176	29,188	29,178	19,667
Mean of Outcome	0.39	0.53	0.54	0.68

Source: Authors' calculations based on Surveys 2 through 29 of the 2020 Axios/Ipsos Coronavirus Poll (administered March 20 to October 26, 2020). Each column presents linear regression results from a different regression; column header indicates outcome variable. Trust is measured on a continuous scale from 0 to 1, with 0 representing no trust at all in the institution to look out for you and your family, and 1 representing a great deal of trust. All regressions also include state fixed effects and use Axios/Ipsos survey weights. The variables "Independent" party ID, "Less than high school" educational attainment, "Income 400-800% FPL," "White, non-Hispanic" race, and "Age 40-64" are omitted as base categories. Standard errors in parentheses.

* $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Coefficient for summer or fall survey is significantly different from that of spring survey with ⁺ $p < 0.10$, ⁺⁺ $p < 0.05$, ⁺⁺⁺ $p < 0.01$
Coefficient for Republican is significantly different from that of Democrat with ^a $p < 0.10$, ^b $p < 0.05$, ^c $p < 0.01$