

Bad Democracy Traps

Gabriele Gratton Barton E. Lee Hasin Yousaf*

[Latest version here](#)

First version: February 6, 2024

February 17, 2024

Abstract

We study how political culture affects a democracy's ability to pursue ambitious and risky policy agendas. We conceptualize a democracy's political culture as voters' possibly misspecified beliefs about the quality of the political class and of the country's institutions. Within a standard model of political agency, political culture drives both voters' choice of whether to elect politicians who propose ambitious agendas and politicians' behavior once elected. We propose the concept of a *cultural equilibrium*, capturing the idea that stable cultures must be consistent with long-term observations of political outcomes. Therefore, in our model, reality constrains culture, but we show that culture can persist despite institutional changes. Negative cultures can trap democracy and positive cultures allow democracy to outperform with respect to the true quality of its political class. We explore and confirm the empirical relevance of our feedback mechanism in an online survey experiment.

*Gratton: UNSW Business School, UNSW Sydney. Email: g.gratton@unsw.edu.au. Lee: Dept. of Management, Technology, and Economics, ETH Zurich. Email: bartonlee@ethz.ch. Yousaf: UNSW Business School, UNSW Sydney. Email: h.yousaf@unsw.edu.au. We thank Arash Taheri for excellent research assistance. We are also grateful to Kathryn Baragwanath, Nathan Canen, Daniel Devine, Pauline Grosjean, Richard Holden, Marc Jacob, Federico Masera, Erik Snowberg, and Allison Stashko for useful comments. Gratton is the recipient of an Australian Research Council Future Fellowship (FT210100176). Lee is an Affiliate Fellow at the Stigler Center at Chicago Booth.

1 Introduction

Addressing the long-term interests of citizens sometimes requires governments to adopt ambitious and risky policy agendas. In practice, however, there is substantial variation in the extent to which different democracies achieve this (Jacobs, 2016).¹ One view argues that this variation stems from differences in the quality of democratic institutions (North, 1990). Because politicians are accountable to voters, government action focuses on policies that can bring about tangible results in time for the next election.² Worse institutions, such as shorter electoral cycles, unreliable media, and opaque bureaucracies, cause a democratic political “myopia” (Alesina and Tabellini, 1990; Besley and Prat, 2006; Gratton and Morelli, 2022; Gratton, Guiso, Michelacci and Morelli, 2021; Nordhaus, 1975; Rogoff, 1987). Politicians avoid ambitious promises and long-term policy agendas that offer large but uncertain results, such as plans to tackle the root cause of climate change (Battaglini and Harstad, 2016, 2020). Instead, they prefer to pander to voters’ short-term interests, appeal to narrow interest groups, or only promise “pork barrel” to informed constituencies (Canes-Wrone, Herron and Shotts, 2001; Coate and Morris, 1995; Fernandez and Rodrik, 1991; Grossman and Helpman, 1994, 1996; Leblanc, Snyder and Tripathi, 2000; Maskin and Tirole, 2004). According to this view, lower quality institutions induce “bad democracies” that serve narrow, short-term interests rather than improving the long-term welfare of the polity as a whole.

Recent literature in economics and political science argues that what separates “good” and “bad” democracy is more than just institutional differences (Putnam, Leonardi and Nanetti, 1992). Democracy thrives in societies that inherit a positive *political culture*: long-term societal characteristics, such as the amount of human and social capital, the quality of its civil society, and the trust citizens have in politicians and bureaucrats (Algan and Cahuc, 2010, 2013; Algan, Cahuc and Sangnier, 2016; Becker and Voth, 2023; Giuliano and Wacziarg, 2020; Knack and Keefer, 1997; Zak and Knack, 2001). Positive political cultures enable democracy to overcome the forces that induce political myopia, and target long-term, global challenges such as tackling climate change (Ostrom, 1998). Perhaps because voters are more willing to trust politicians who promise ambitious policies and, in turn,

¹For example, according to the 2024 Climate Change Performance Index, Denmark and Norway scored highly in their climate policies while other democracies, such as Italy and Argentina, scored poorly (Burck et al., 2023, Section 2.4).

²The argument that electoral accountability distorts policymaking is in, e.g., Ashworth and Bueno de Mesquita (2014); Ashworth, Bueno de Mesquita and Friedenberg (2017); Callander and Raiha (2017); Li and Zhou (2023); for a review, see also Ashworth (2012). Prat (2005) and Ashworth, Bueno de Mesquita and Friedenberg (2017) argue that political accountability may also hinder voter’s ability to select better politicians.

politicians are more willing to try to deliver on such promises (Becker, Boeckh, Hainz and Woessmann, 2016). In contrast, democracy works poorly in societies that inherit negative cultures. According to this view, long-past institutions that shaped a society’s political culture determine whether a good democracy thrives or succumbs to short-term special interests.

These institutional and cultural views of the working of democracy naturally complement each other. On the one hand, inherited political cultures, shaped by long-past institutions, inform voters’ behavior and politicians’ choices within current institutional settings. On the other hand, as past institutions shaped the inherited culture, so the working of current institutions is bound to change today’s political culture. Therefore, both culture and institutions drive the functioning of democracy and affect each other.³

We propose a simple framework to conceptualize this interaction and build insights into when voters will trust politicians who promise ambitious agendas. We do so within a standard political accountability model. We model political culture as the voters’ (possibly misspecified) beliefs that: (i) politicians can be trusted and (ii) institutions of accountability are effective and transparent. While our characterization of political culture only captures two elements of the voters’ culture, it focuses on the cultural aspects that most directly matter for political accountability.⁴ In our framework, the voters’ political culture determines both voters’ behavior and politicians’ choices, and therefore the working of democratic institutions and the outcome of the political process. At the same time, long-term observations of average aggregate political and economic outcomes—which are in part determined by the true quality of institutions—inform the voters’ political culture. We show how this stylized framework can be used to identify stable cultural equilibria. We use this model to gain insights into when the cultural or institutional view may prevail, i.e., when the inherited political culture determines the functioning of democratic institutions or, on the contrary, the quality of current institutions determines political outcomes and, in turn, the prevalent political culture. Collectively, in our framework reality constrains culture, determining which cultures may be stable. Yet, sometimes culture itself trumps reality. In some cases, a high quality political class and transparent institutions are shackled by the voter’s negative political culture—a *bad democracy trap*, where

³As we discuss later, this connection is studied by, among others, Bisin and Verdier (2023), Besley and Persson (2019), and Acemoglu and Robinson (2021), who focus on related but different conceptualization of the aspects of culture that affect the functioning of institutions.

⁴As we discuss later, our belief-based approach to culture departs from Bisin and Verdier’s (2023) characterization of culture as preferences (see also Besley, 2020; Bisin and Verdier, 2001). Our equilibrium concept also features (Bayesian) learning; in this sense, our conception of culture aligns more closely with Alesina and Angeletos (2005); Fernández (2013); Fogli and Veldkamp (2011); Piketty (1995). For an alternative approach that builds on an anthropological conception of culture, see Acemoglu and Robinson (2021).

voters shun politicians who promise ambitious policies. In other cases, the voter's positive political culture leads a sufficiently transparent democracy to over-perform relative to the true quality of its political class—a well-functioning but *wishful thinking democracy*, where voters trust politicians who promise ambitious agendas and these politicians try to deliver on their promises. Our framework also allow us to highlight why different elements of political culture (trust in politicians and belief about the effectiveness and transparency of institutions) may work together in escaping a bad democracy trap and how information about political outcomes may shape the voters' political culture. We therefore design an online survey experiment to provide evidence for this key mechanism within our theory. Our results support the idea that, as in our model, information regarding average aggregate political outcomes can shape voters' political culture.

A preview of our theory. In our model, a voter ('he') must choose between two candidates ('she'). One candidate is ambitious: she promises—but cannot commit—to trying to carry out an ambitious (and risky) agenda. The other candidate is not ambitious: if elected, she carries out a default (and risk-free) policy agenda. In expectation, the voter prefers a government that tries to carry out an ambitious agenda. Yet, she prefers the non-ambitious candidate if the ambitious candidate is sure not to try to carry out her agenda. The ambitious candidate may be dishonest, in which case she may prefer not to try to carry out her agenda and divert a share of resources to private interests. In contrast, an honest candidate always tries to carry out the ambitious agenda. The voter cannot observe if the ambitious candidate is honest and the prior probability of an honest candidate measures the *quality* of the polity's political class. However, if he elects the ambitious candidate, the voter observes the outcome of her ambitious agenda with probability increasing in the *transparency* of the polity's institutions. Electoral accountability may serve to discipline dishonest candidates because they benefit from a reputation for honesty.

We add a novel ingredient into this otherwise-standard framework: the voter's *political culture*. We conceive the voter's political culture as his (possibly misspecified) prior belief about two aspects of the political environment: (i) the quality of the political class, and (ii) the transparency of democratic institutions. Candidates, on the other hand, have correct information about the political environment and *also* know the voter's political culture. Therefore, a candidate's strategy uses information about the true political environment as well as the voter's political culture. In contrast, the voter's strategy only uses their political culture. Importantly, this means that the voter is oblivious to *both* his political culture being possibly misspecified *and* candidates knowing the true political environment.

We devise our solution concept in two steps. First, contingent on a political culture, we extend the definition of perfect Bayesian equilibrium to our setup. The voter’s strategy is optimal given his expectation of the candidate’s sequentially rational strategy. The voter forms this expectation contingent on his political culture and under the understanding that candidates also hold the same political culture. In reality, however, candidates have correct information about the political environment. Hence, a dishonest candidate’s equilibrium strategy may not coincide with the voter’s equilibrium expectation of it. Yet, the voter’s political culture—even if misspecified—affects the dishonest candidate’s reputation and, hence, the candidate’s incentive to try to carry out the agenda.

Second, we refine our equilibrium concept to select cultures that are “stable.” Intuitively, our *cultural equilibrium* captures the idea that a political culture is unlikely to persist if voters frequently observe outcomes that their culture would not predict. Therefore, we require that the voter’s political culture is consistent with long-run average observations of equilibrium political outcomes.⁵ While this constrains the voter’s culture, we show that a misspecified political culture can nonetheless be stable and that a political environment can give rise to multiple stable political cultures. In this sense, our model allows us to conceptualize when culture determines the working of democracy and when instead institutions drive political outcomes and shape culture.

Only two types of cultural equilibria exist. If the voter’s political culture is sufficiently negative, then he never chooses the ambitious candidate. Such negative cultures are stable, but may bear no connection to the true political environment: they may survive even when the true quality of the political class and transparency of institutions are sufficiently positive such that—were the voter to know the true political environment—they would prefer to choose the ambitious candidate. This is a *bad democracy trap*: the voter’s political culture (*not* the true political environment) shackles democracy and hinders progress on ambitious policy agendas. Although we describe our model within a static setting, we view it as capturing a richer dynamic model in a reduced-form way. From this viewpoint, bad democracy traps are “absorbing states” that are more likely to be reached when the voter has a more negative political culture.

If instead the voter’s political culture is sufficiently positive, the voter always chooses the ambitious candidate. In such a cultural equilibrium, the voter’s political culture is constrained by reality: the true quality of institutions. It arises only if the true transparency of the institutions is indeed sufficiently high and correctly reflected in the voter’s political culture. Therefore, high quality institutions are necessary but not sufficient for

⁵Implicitly, this captures the idea that cultural change occurs only when the political equilibrium produces hard and verifiable evidence contradicting expectations based on the prevalent political culture.

a good democracy. Yet, in equilibrium, the voter's culture may systematically under- or over-estimate the quality of the political class and still be consistent with the observed long-run average success rate of the candidate's agenda. In extreme cases, this equilibrium arises even if, were the voter to know the true quality of the political class, he would never choose the ambitious candidate. This gives rise to a *wishful thinking democracy*: the voter's overly positive belief in the quality of the political class (and *not* the true quality) enables democracy to make progress toward an ambitious policy agenda.

Our framework also highlights the limitations of reforms that aim to improve democratic institutions. If the inherited political culture is sufficiently negative, improvements in the transparency of institutions may fail to have any effect as the polity remains trapped in a bad democracy. However, if the voter's culture is sufficiently positive, institutional changes drive political outcomes and, in turn, shape voters' political culture. In this sense, the benefits of institutional reforms can only be realized when the inherited political culture is sufficiently positive. Therefore, from a positive perspective, our theory implies that cultural differences persist despite positive changes in institutions precisely because negative cultures trap democracies.

Our mechanism at play. Our results echo concerns, expressed by many political leaders, that their democracy may under-perform because of the low expectations their citizens place in the quality of their political human capital and institutions. For example, Italian Prime Minister Mario Draghi, asking Parliament to vote confidence in his government's ambitious agenda of reforms, highlighted the disparity between Italians' perception of their own democracy and its real quality:⁶

"We are a great power, economically and culturally. I have often been surprised and a bit hurt, in these years, noticing how often others' opinions of our country are better than our own. We must be prouder, more just, and generous towards our country. And recognize the many excellences, the deep richness of our social capital and of our civil society that others envy."

Our mechanism, as well as Prime Minister Draghi's speech, suggests that if voters were informed of true observations of the ability of their institutions and political class to deliver long-term welfare, then they would change their culture and, as a result, the quality of their democracy. That is, cultural changes require information about political out-

⁶Our translation. XVIII LEGISLATURA, *Resoconto stenografico dell'Assemblea, Seduta n. 458 di mercoledì 17 febbraio 2021*, <https://www.camera.it/leg18/410?idSeduta=0458&tipo=stenografico> (retrieved October 29, 2023).

comes. Our model offers insights into the conditions required for real outcomes to change political culture enough to, in turn, affect political outcomes.

To provide evidence that this mechanism is at play, we conduct an online survey experiment on 3,000 U.S. citizens. In the survey experiment, we exogenously vary subjects' exposure to long-run average political outcomes from U.S. politicians. We verify that our novel treatment⁷ affects our subjects' political culture: their belief about whether U.S. politicians can be trusted to keep their promises, and about the ability of institutions to keep politicians accountable and provide voters with timely information about their behavior. Furthermore, we show that the exogenously induced changes in culture affect policy-specific measures of political culture: whether voters believe that politicians who promise specific policies will indeed carry them out and whether they will be timely informed of whether the policy was successful. In line with our key mechanism, the treatment only affects beliefs regarding policies that are more ambitious and aimed at long-term, global outcomes. From a normative perspective, these results also suggest that more frequent and precise information about average political outcomes may facilitate changes in political culture and perhaps lift democracies out of bad democracy traps (but also, conversely, precipitate wishful thinking democracies into more negative cultures).

Related literature. A long tradition within economics highlights the mutual causal connection between culture and political and economic outcomes.⁸ [Putnam, Leonardi and Nanetti \(1992\)](#), building on [Banfield's 1967](#) pioneering work, connect historical institutions to modern levels of "social capital", showing that inheriting greater social capital corresponds to a better functioning of democratic government. From then, a burgeoning literature has carefully documented that (i) political institutions sometimes affect culture and (ii) culture sometimes persists even as political institutions change (e.g. [Alesina, Giuliano and Nunn, 2013](#); [Becker and Woessmann, 2009](#); [Becker and Pascali, 2019](#); [Chinoy, Nunn, Sequeira and Stantcheva, 2023](#); [Grosjean, 2014](#); [Guiso, Sapienza and Zingales, 2016](#); [Nunn and Wantchekon, 2011](#); [Voigtländer and Voth, 2012](#)). These observations

⁷Similar to part of the trust omnibus treatment developed by [Kuziemko, Norton, Saez and Stantcheva \(2015\)](#) for their "follow-up" experiment (see their Appendix Figure 8), we provide subjects with information about the relative level of corruption in the United States, as measured by the Corruption Perceptions Index. However, unlike [Kuziemko et al.](#), we do not include an explicit priming treatment and instead our informational treatment adopts an "ask-tell" design: all subjects are asked to rank the U.S.'s level of corruption relative to other countries but only the treated group are provided the additional information about the true level of corruption (as well as information about whether their answer over- or under-estimated the true level and the difference between their estimate and the true level).

⁸The idea is at least implicit in the work of Adam Smith and Karl Marx. Max Weber and Antonio Gramsci are other major contributors to early theories connecting culture and economic phenomena. [Guiso, Sapienza and Zingales \(2006\)](#) offer a brief review of this historical literature.

generated a growing demand for theories that explain the joint development of cultural traits (in particular “civic culture”) and democratic institutions (e.g., [Besley and Persson, 2019](#); [Ticchi et al., 2013](#)). [Bisin and Verdier \(2023\)](#) study a model of the joint evolution of culture—intended as inherited preferences—and institutions. Their analysis yields new insights into the long-term connection between democratization and economic activity, showing that culture may mediate between political institutions and economic outcomes, ultimately determining whether processes of democratization are stable. [Besley \(2020\)](#) explicitly models civic culture’s evolution over time through a process of selection, highlighting the feedback between civic culture and state capacity.

We depart from this work on three dimensions. First, we take basic democratic institutions as a given and focus on cultural characteristics that may contribute to the actual functioning of democracy. In particular, we focus on the elements of a country’s political culture that most directly affect the agency problem inherent to representative democracy. Second, because our focus is on political agency rather than on economic activity, we conceptualize culture as beliefs (about the quality and honesty of the political class and the transparency of institutions of political accountability) rather than preferences. Third, because our conceptualization of culture focuses on beliefs, we naturally adopt a concept of long-term cultural evolution that focuses on belief consistency rather than on the selection of preferences that yield a greater relative payoff. These characteristics of our model allow us to more explicitly characterize what it means for culture or reality to dominate: culture dominates in the sense that political outcomes are *as if* the real parameters of the model are the voters’ misspecified beliefs about them; reality dominates when the political outcomes it generates force voters’ beliefs to match the real parameters. This characterization underpins a mechanism for cultural differences, perhaps formed before democracy, to persist even as political institutions converge to similar democratic settings. This happens precisely because inherited culture may shackle even well-designed democratic institutions into what we call a bad democracy trap.

[Guiso et al. \(2008\)](#) share with us the idea that negative beliefs about the trustworthiness of others may trap a society into a low trust equilibrium.⁹ We extend this idea to a model in which voters have beliefs over two dimensions (the trustworthiness of politicians and the quality of institutions of accountability) and study how the combination of beliefs and institutions determines outcomes that feed back into beliefs.

Our demand-side theory for why democracies may fail to achieve long-term and am-

⁹Other models of politics that feature belief traps include [Bueno de Mesquita and Dziuda \(2023\)](#); [Svolik \(2013\)](#).

bitious policy goals¹⁰ shares similarities with [Morelli, Nicolò and Roberti’s \(2021\)](#) view of populism as policy commitment: when voters do not trust politicians to act in their interests, they demand simple and easy-to-verify policies—even if such policies are inefficient (related ideas also appear in [Acemoglu, Egorov and Sonin, 2013](#); [Gratton and Lee, 2023](#)).¹¹ Our model offers new insights into the origins of the lack of trust and when this lack of trust may persist despite changes to institutions. Our mechanism for persistence shares similarities with models of democracy in which voters’ belief and expectations may be self-fulfilling ([Myerson, 2005](#); [Svolik, 2013](#)).

Closer to us, [Jacobs and Matthews \(2012\)](#), [Kuziemko, Norton, Saez and Stantcheva \(2015\)](#), and [Peyton \(2020\)](#) use survey experiments to study the relation between voters’ trust in politicians and government and their preferences over political platforms.¹² [Sapienza and Zingales \(2013\)](#) show that voters with lower trust may prefer platforms that differ from their true preferences. Like us, [Keefer, Scartascini and Vlaicu \(2022\)](#) argue that voters with lower trust prefer greater emphasis on transfers than on public good investments. Theoretically, we combine the idea that voters’ trust in politicians affects their preferences over platforms with a mechanism through which policy outcomes affect voters’ trust in politicians. Empirically, we use a survey experiment to provide evidence for this mechanism.

2 A model of democracy and political culture

In this section we present a stylized theoretical framework that captures the key intuition connecting voters’ political culture and the ability of representative democracies to deliver ambitious long-term policies. Our analysis allows for voters to hold misspecified beliefs about the quality of the country’s political human capital and institutions. Together, these beliefs form a *political culture*. We define a *culturally contingent equilibrium* as the result of the strategic interaction of voters and politicians, conditional on the voters’ political culture. We then impose that for a political culture to be stable, observers (e.g., the voters) who hold this political culture must be able to reconcile long-term average political and economic outcomes with the predictions of an equilibrium contingent on that culture. We call this a *cultural equilibrium*.

We begin this section by setting up the model in its essential ingredients. We then

¹⁰Examples of supply-side theories include: [Caselli and Morelli \(2004\)](#); [Hall \(2019\)](#); [Thomsen \(2017\)](#).

¹¹Beyond trust in politicians, voters may prefer politicians that promise inefficient policies for other reasons (see, e.g., [Dal Bó, Dal Bó and Eyster, 2018](#); [Mattozzi and Snowberg, 2018](#)).

¹²For a recent survey of the political science literature on trust and political outcomes, see [Devine \(forthcoming\)](#).

discuss how to interpret some of these ingredients and define our concepts of political culture, culturally contingent equilibrium, and cultural equilibrium. Finally, we characterize the equilibria of the game.

2.1 Setup and interpretation

Setup. A voter chooses between two candidates: D and A . If the voter chooses candidate D , the candidate will carry out a default policy agenda that yields to the voter a normalized payoff of 0. Candidate A says that she will *try* to carry out an ambitious agenda. The agenda requires a budget $\beta > 0$. If the candidate tries to carry out the agenda, she will succeed with probability $p \in (0, 1)$, carrying a benefit for the voter $\alpha : p\alpha > \beta$. However, if the voter chooses candidate A and the candidate does not try to carry out the agenda, the voter obtains no benefit but still loses the entire budget β . Therefore, the voter's payoff equals: $p\alpha - \beta$, if he chooses candidate A and the candidate tries to carry out the ambitious agenda; $-\beta$, if he chooses candidate A , but the candidate does not try to carry out the agenda; and 0 if he chooses candidate D .

Candidate A is either *honest*, $\theta = 1$, or *dishonest*, $\theta = 0$, with $\pi := \Pr(\theta = 1)$. An honest candidate always tries to carry out the agenda. A dishonest candidate strategically chooses whether to carry out the agenda. The choice to try to carry out the agenda is the candidate's private information. However, by the time of the end of the candidate's mandate, with probability $\tau \in (0, 1)$ the voter learns whether the agenda is successful. He uses this information to form a posterior belief μ that the candidate is honest.

If a dishonest candidate does not try to carry out her agenda, she diverts to private or special interests a fraction $f > 0$ of the budget. However, the candidate also cares about the voter's posterior belief μ . In particular, the candidate's payoff is given by $f\beta + r\mu$ if she does not try to carry out the agenda and $r\mu$ otherwise, where $r > 0$ captures the relative importance of reputation concerns.

Political culture. We wish to capture the idea that the voters' political culture may encompass misspecified beliefs about both the quality and honesty of the political class and the transparency of the country's institutions. To do this, we let the voter hold a prior belief $\hat{\pi}$ not necessarily equal to π and estimate the level of transparency $\hat{\tau}$ not necessarily equal to τ . We call the pair $(\hat{\pi}, \hat{\tau})$ the voter's *political culture*. In contrast, we assume that candidates have correct information about both the voter's political culture and the true values of π and τ . This last assumption captures the idea that members of the political elite know the true quality of the country's politicians and institutions *and* are aware of

the (possibly misspecified) expectations of the voters.

Interpretations. The parameter π captures the *quality* and honesty of the political class, which in turn is determined by both the cultural characteristics of the society and by the quality of the organizations and institutions that select and train political leaders, such as parties, associations, and educational institutions. The parameter τ captures the *transparency* with which voters can observe the results of policymaking, thereby keeping politicians accountable. It encompasses the effectiveness and timeliness of institutions and organizations that implement policies and monitor policymaking, such as the bureaucracy, the courts, and the media. The parameter r captures the relative importance of *reputational concerns*. These reputational concerns capture in a reduced form the idea that politicians may be held accountable if voters receive timely and transparent information about the results of policymaking.

In our model, only two agendas are possible. We interpret this as conceptualizing the distinction between two types of agendas. Default agendas are those for which there is sufficiently timely information on their progress and outcomes that voters can keep honest and dishonest politicians perfectly accountable, so that all politicians will indeed implement them. Therefore, electing a politician that promises such an agenda conveys no new information about the quality of the political class or the transparency of the polity's institutions. Ambitious agendas suffer from information asymmetries on whether politicians indeed put effort into carrying them out and their outcome is uncertain and hard to tell in the short time of a single electoral term. Therefore, voters can only imperfectly hold accountable politicians who promise such an agenda. Yet, electing such a politician may convey information about the quality of politicians and the transparency of the institutions. While our choice of only two possible agendas—one that allows the voter to learn and one that completely stops the voter's learning—is intentionally simplistic, we view it as approximating a richer stochastic dynamic process whereby the voter's learning speed and accuracy (and therefore cultural change) depends on his willingness to elect candidates with more ambitious agendas. Our result below on the existence of bad democracy traps corresponds to the existence of absorbing states where learning stops and which may be stochastically reached if outcomes are consistently negative so to induce the voter to have a sufficiently negative culture. Such states would be reached with greater probability if the true political environment is of lower quality or, all else equal, if the process begins with a more negative culture that is more likely to produce negative outcomes.

In our model, there is a constant supply of candidates who offer ambitious and default agendas. In practice, we view our model as being embedded in a Downsian framework:

when voters do not choose politicians who offer ambitious agendas, parties and candidates ultimately only offer default agendas; when voters do, parties and candidates only offer ambitious agendas.

2.2 Solution concept

Culturally contingent strategies. We define a culturally contingent strategy for the voter as a mapping $\sigma_V : [0, 1]^2 \rightarrow [0, 1]$ from his political culture $(\hat{\pi}, \hat{\tau})$ to a probability of choosing candidate A . Similarly, a culturally contingent strategy for a dishonest politician is a mapping $\sigma_P : [0, 1]^2 \times [0, 1]^2 \rightarrow [0, 1]$ from the voter's political culture $(\hat{\pi}, \hat{\tau})$ and the true parameters (π, τ) to a probability of trying to carry out the ambitious agenda. If the voter chooses candidate A (and after candidate A chooses her action), the voter will potentially observe information about the agenda's success. Let $\omega = 1$ (resp., $\omega = 0$) denote the event that the voter observes that the agenda was successful (resp., not successful) and let $\omega = \emptyset$ denote the event that the voter does not observe any information. The voter's culturally contingent belief is a mapping $\mu : \{\emptyset, 0, 1\} \times [0, 1]^2 \rightarrow [0, 1]$ from the voter's information about the agenda's success $\omega \in \{\emptyset, 0, 1\}$ and his political culture $(\hat{\pi}, \hat{\tau})$ to a probability that the candidate is honest: $\theta = 1$.

Culturally contingent equilibrium. A *culturally contingent equilibrium* captures how the voter's and candidate's behavior are shaped by the voter's political culture. It captures the idea that agents such as voters and candidates play sequentially rational strategies and form beliefs regarding individual politicians' honesty using Bayes' rule. Therefore, contingent on a given voter's culture, our solution concept is perfect Bayesian equilibrium. However, our definition makes explicit the idea that the voter is playing as if his political culture is indeed reflecting the true parameters of the game. That is, he believes that a dishonest candidate chooses σ_P to maximize

$$U(\sigma_P; \hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}, \mu) := \sigma_P \left(r \left((1 - \hat{\tau}) \mu(\emptyset; \hat{\pi}, \hat{\tau}) + \hat{\tau} p \mu(1; \hat{\pi}, \hat{\tau}) + \hat{\tau} (1 - p) \mu(0; \hat{\pi}, \hat{\tau}) \right) \right) \\ + (1 - \sigma_P) \left(f\beta + r \left((1 - \hat{\tau}) \mu(\emptyset; \hat{\pi}, \hat{\tau}) + \hat{\tau} \mu(0; \hat{\pi}, \hat{\tau}) \right) \right).$$

In contrast, the candidate's equilibrium play is optimal given the true parameters of the game *and* the voter's actual beliefs. That is, a dishonest candidate chooses σ_P to maximize

$$U(\sigma_P; \hat{\pi}, \hat{\tau}, \pi, \tau, \mu) := \sigma_P \left(r \left((1 - \tau) \mu(\emptyset; \hat{\pi}, \hat{\tau}) + \tau p \mu(1; \hat{\pi}, \hat{\tau}) + \tau (1 - p) \mu(0; \hat{\pi}, \hat{\tau}) \right) \right) \\ + (1 - \sigma_P) \left(f\beta + r \left((1 - \tau) \mu(\emptyset; \hat{\pi}, \hat{\tau}) + \tau \mu(0; \hat{\pi}, \hat{\tau}) \right) \right).$$

For ease of exposition of our key results, we make the simplifying assumption that the voter chooses candidate A when indifferent.¹³

Definition 1 (Culturally contingent equilibrium). *A culturally contingent assessment*

$$\Sigma^*(\hat{\pi}, \hat{\tau}, \pi, \tau) := (\sigma_V^*(\hat{\pi}, \hat{\tau}), \sigma_P^*(\hat{\pi}, \hat{\tau}, \pi, \tau), \{\mu^*(\omega; \hat{\pi}, \hat{\tau})\}_{\omega \in \{\emptyset, 0, 1\}})$$

is an equilibrium contingent on culture $(\hat{\pi}, \hat{\tau})$ if

1. the voter's strategy is optimal given his political culture and what he expects the candidate to play: $\sigma_V^*(\hat{\pi}, \hat{\tau}) = 1$ if $\alpha p(\hat{\pi} + (1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) \geq \beta$ and $\sigma_V^*(\hat{\pi}, \hat{\tau}) = 0$ otherwise;
2. the voter expects the candidate to play optimally given his political culture: $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) \in \arg \max_{\sigma_P} U(\sigma_P; \hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}, \mu)$;
3. the candidate plays optimally given the true parameters of the game and what he expects the voter to believe: $\sigma_P^*(\hat{\pi}, \hat{\tau}, \pi, \tau) \in \arg \max_{\sigma_P} U(\sigma_P; \hat{\pi}, \hat{\tau}, \pi, \tau, \mu)$;
4. the voter forms beliefs using Bayes rule and what he expects the candidate to play given his political culture: $\{\mu^*(\omega; \hat{\pi}, \hat{\tau})\}_{\omega \in \{\emptyset, 0, 1\}}$ is derived using Bayes' rule from $(\hat{\pi}, \hat{\tau})$ and $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})$.

Notice that Conditions 1 and 2 in Definition 1 encompass the idea that when the voter chooses, he expects dishonest candidates to behave as if they also believe that the true parameters are $\hat{\pi}$ and $\hat{\tau}$. Instead, Condition 3 says that when a dishonest candidate chooses, she knows the true parameters π and τ , but reasons that the voter will form beliefs based on his own political culture. Finally, Condition 4 says that when the voter in fact forms his posterior beliefs, he bases them on his own political culture and reasoning that his observation have been generated by candidates who also share the same culture.

Cultural equilibrium. We want to characterize how the voter's long-term political culture is endogenously determined by equilibrium behavior. Our solution concept is designed to capture the idea that the long-run evolution of the voter's culture must be consistent with long-run average observations about the behavior of politicians and the success of policies *and* equilibrium strategies. That is, we say that a political culture is consistent with the true parameters of the game and equilibrium play if the voter

¹³This assumption is only relevant for a knife-edge case and is inconsequential for our main insights because our focus is on the conditions that induce democracies to never elect candidates who propose ambitious agendas, even when this may not be efficient.

is able to rationalize the average observations of past outcomes using his political culture. In the language of [Dekel, Fudenberg and Levine \(2004\)](#), we focus on *self-confirming equilibria*. In particular, in our context, a political culture is consistent with true priors (π, τ) and equilibrium play if two conditions are met.¹⁴ First, because the voter observes the success rate¹⁵ of ambitious agendas, S , the voter's prediction of the success rate using his political culture, $S(\pi^*, \tau^*, \pi^*, \tau^*)$, must coincide with the true success rate: $S = S(\pi^*, \tau^*, \pi, \tau) = S(\pi^*, \tau^*, \pi^*, \tau^*)$. Second, because with probability τ the voter observes whether a candidate's ambitious agenda is successful or not, the voter must learn the true transparency, τ , whenever she chooses candidate A with positive probability.

Definition 2 (Cultural consistency). *A political culture (π^*, τ^*) is consistent with true priors (π, τ) and equilibrium play $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ if $S(\pi^*, \tau^*, \pi^*, \tau^*) = S(\pi^*, \tau^*, \pi, \tau)$ and, whenever $\sigma_V^*(\pi^*, \tau^*) > 0$, $\tau^* = \tau$.*

Definition 3 (Cultural equilibrium). *An assessment $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ and culture (π^*, τ^*) are a cultural equilibrium if $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ is an equilibrium contingent on (π^*, τ^*) and (π^*, τ^*) is consistent with (π, τ) and $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$.*

2.3 How culture determines behavior

We begin by describing how the voter updates his beliefs regarding a politician's honesty using Bayes' rule and his assessment regarding the candidate's equilibrium strategy σ_P^* , $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})$, based on his political culture $(\hat{\pi}, \hat{\tau})$:

$$\mu^*(1; \hat{\pi}, \hat{\tau}) = \mu(1; \hat{\pi}, \hat{\tau} \mid \sigma_P^*) := \frac{p\hat{\pi}}{p\hat{\pi} + p(1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})}; \quad (1)$$

$$\begin{aligned} \mu^*(0; \hat{\pi}, \hat{\tau}) &= \mu(0; \hat{\pi}, \hat{\tau} \mid \sigma_P^*) \\ &:= \frac{(1 - p)\hat{\pi}}{(1 - p)\hat{\pi} + (1 - \hat{\pi})((1 - p)\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) + (1 - \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}))}); \end{aligned} \quad (2)$$

$$\mu^*(\emptyset; \hat{\pi}, \hat{\tau}) = \mu(\emptyset; \hat{\pi}, \hat{\tau} \mid \sigma_P^*) := \hat{\pi}. \quad (3)$$

We can now study the tradeoff faced by a dishonest candidate. On the one hand, not trying to carry out her ambitious agenda allows her to divert resources equal to $f\beta$ to her own private interests. On the other hand, trying to carry out the agenda may increase

¹⁴These two conditions correspond to Part (iii) of [Dekel, Fudenberg and Levine's](#) self-confirming equilibrium definition; however, our model is an extensive-form game.

¹⁵I.e., the probability that an ambitious agenda is successfully carried out, conditional on equilibrium play.

her reputation because, with probability $p\tau$,¹⁶ the voter will learn that the agenda was successful by the end of the candidate's mandate. Therefore, the candidate prefers to try to carry out the agenda if the reputational gain induced by a success,

$$\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*) := r(\mu(1; \hat{\pi}, \hat{\tau} \mid \sigma_P^*) - \mu(0; \hat{\pi}, \hat{\tau} \mid \sigma_P^*))$$

is sufficiently large.

Two features of the reputational gain are particularly noteworthy. First, it depends on the voter's political culture and how this shapes his expectations about a dishonest candidate's equilibrium strategy. Second, it decreases in the voter's expectation that a dishonest candidate tries to carry out her agenda, $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})$, which need not equal the actual behavior $\sigma_P^*(\hat{\pi}, \hat{\tau}, \pi, \tau)$.

To analyze this tradeoff, it is most useful to begin with the voter's perspective on what the candidate chooses to do in equilibrium (Point 2 in Definition 1). The voter believes that his culture reflects the true values of π and τ so that the voter's and the candidate's priors are the same. Therefore, the voter believes that he is correctly anticipating the behavior of the candidate. The voter reasons that if a dishonest candidate were to try to carry out the agenda with certainty, then the candidate would have to expect the voter to not update his beliefs about the candidate's honesty after observing a success, i.e., $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*) = 0$: there would be no reputational gain. It follows that the voter must believe that in equilibrium a dishonest candidate will try to carry out her agenda with probability strictly less than 1. The voter also reasons that if instead the dishonest candidate would never try, then it must be that the value of $f\beta$ is greater than the expected reputational gain at its maximum level, i.e., $f\beta \geq \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 0)$. This is summarized Lemma 1. All proofs are in Appendix A.

Lemma 1 (The voter's perspective). *In any culturally contingent equilibrium, if $f\beta \geq \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 0)$, the voter expects that a dishonest candidate does not try to carry out her agenda. Otherwise, he expects that a dishonest candidate tries to carry out her agenda with probability $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) \in (0, 1)$ that solves $f\beta = \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*)$.*

However, the voter's political culture may not reflect the true values of π and τ . The candidate is aware of this. Therefore, when choosing whether to try, she can take advantage of the voter's incorrect expectations of the behavior of dishonest candidates. In particular, the voter's expectations reflect his view that his culture is correct, so that also the candi-

¹⁶The candidate is concerned with the voter's posterior beliefs, which are based on the voter's culture $(\hat{\pi}, \hat{\tau})$. However, she correctly anticipates the probability, τ , that the voter will observe whether the agenda is successful.

date should have the same priors. This means that the reputational gain for the candidate are determined by Lemma 1. However, in contrast with the standard equilibrium logic, the actual strategy of the candidate does not affect how the voter forms his beliefs, so that while the equilibrium reputational gain may be based on the voter's expectation that the candidate is mixing, the candidate will generically either strictly prefer to try or strictly prefer not to try.

Lemma 2 (The candidate's perspective). *If $f\beta > \tau p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*)$, then a dishonest candidate does not try to carry out her agenda; if $f\beta < \tau p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*)$, then a dishonest candidate tries to carry out her agenda; and if $f\beta = \tau p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*)$, then a dishonest candidate is indifferent and tries to carry out her agenda with probability in $[0, 1]$.*

We now turn to the problem faced by a voter with political culture $(\hat{\pi}, \hat{\tau})$. By backward induction, the voter expects (perhaps erroneously) that candidate A will try to carry out her ambitious agenda if she is honest or, if dishonest, with probability $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})$. Therefore, the voter prefers candidate A when the total probability of success of the ambitious agenda $p[\hat{\pi} + (1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})]$ is sufficiently large.

Lemma 3 (Whether the voter chooses candidate A). *In any culturally contingent equilibrium, the voter chooses candidate A if and only if*

$$\alpha p(\hat{\pi} + (1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) \geq \beta \quad (4)$$

We now characterize the set of equilibria contingent on each voter's political culture $(\hat{\pi}, \hat{\tau})$. Proposition 1 says that a sufficiently positive culture—one that sees the political class as sufficiently honest and the institutions as sufficiently transparent—induces the voter to choose candidate A with strictly positive probability. For this to be the case, the voter needs to expect (perhaps erroneously) a dishonest candidate to try to carry out her agenda with sufficiently high probability:

$$\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) \geq \bar{\sigma}_P(\hat{\pi}) := \frac{\beta/\alpha p - \hat{\pi}}{1 - \hat{\pi}}.$$

Note that when the voter's belief about the quality of the political class $\hat{\pi}$ is sufficiently large so that $\hat{\pi} > \beta/\alpha p$, the voter optimally chooses candidate A even if she were to expect a dishonest candidate never to try to carry out her agenda. In contrast, more negative cultures induce the voter to never choose candidate A .

Proposition 1 (Culturally contingent equilibrium). *In any equilibrium contingent on culture $(\hat{\pi}, \hat{\tau})$, the voter chooses candidate A if and only if $\hat{\pi} \geq \beta/\alpha p$ or $\hat{\tau}\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \bar{\sigma}_P) \geq f\beta$, and a dishonest candidate behaves according to Lemma 2.*

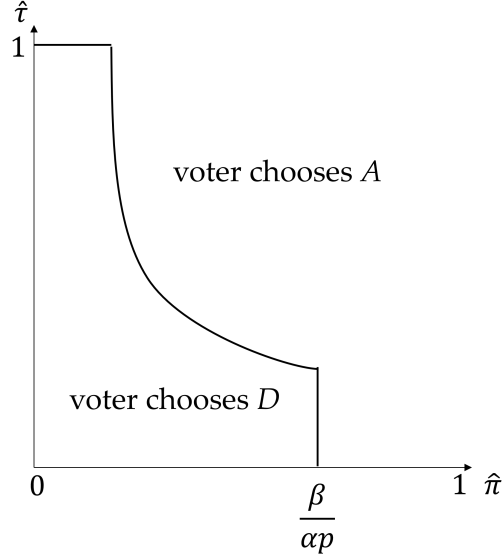


Figure 1: How political cultures map into the voter’s choice.

Intuitively, if the voter’s political culture is such that the voter believes that politicians are honest with very high probability ($\hat{\pi} \geq \beta/\alpha p$), then the voter chooses candidate *A*. He does so independently of what he expects dishonest candidates to do, and therefore independently of his belief in the transparency of institutions that would keep dishonest politicians accountable. Otherwise, whether the voter is willing to choose candidate *A* depends on both his belief about the honesty of candidates and what he expects dishonest candidates to do. Therefore, his choice depends also on his belief in the transparency of institutions that may hold dishonest politicians accountable. It is useful to solve the last condition in Proposition 1 to highlight that the voter’s confidence in the quality and honesty of the political class and his confidence in the transparency of institutions have a complementary relationship in generating his trust in candidate *A*:

$$\hat{\tau}\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \bar{\sigma}_P) \geq f\beta \iff \hat{\pi}\hat{\tau} \geq \frac{f}{r}(\beta/\alpha p)^2 \frac{(\alpha - \beta)}{(1 - \frac{\beta}{\alpha p})}.$$

Figure 1 shows the set of political cultures for which the voter chooses candidate *A* in the culturally contingent equilibrium and the set for which the voter chooses candidate *D*.

2.4 Stable cultures and bad democracy traps

Proposition 1 says that a voter with a very positive political culture would choose a candidate who promises an ambitious agenda. In turn, the voter expects to see ambitious

agendas to succeed with probability

$$S(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) = p(\hat{\pi} + (1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) \geq \frac{\beta}{\alpha}.$$

Furthermore, the voter expects to be able to verify whether the agenda was successful within the time of a single political mandate with probability $\hat{\tau}$. However, if the true value of τ is such that $f\beta > \tau p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*)$, then, by Lemma 2, a dishonest candidate would not try to carry out her agenda. In turn, this means that the actual success rate observed by voters is $S(\hat{\pi}, \hat{\tau}, \pi, \tau) = p\pi$, and the probability that the voter will observe whether a policy is successful within the time of a mandate is τ . Both these values will generically be different from the voter's expectations. It is therefore unlikely that such a culture could persist in time, as generations of voters would be confronted with hard evidence that their polity is not performing as their culture would predict. Proposition 2 says that in fact this cannot be a cultural equilibrium. In particular, it says that positive cultures are self-confirming only when they correctly anticipate the true value of τ . In contrast, negative cultures are always self-confirming, and induce the voter to never choose candidates who promise ambitious agendas independently of the true values of π and τ .

Proposition 2 (Cultural equilibrium). *There exists only two types of cultural equilibria:*

1. *For any political culture (π^*, τ^*) such that $\tau^* p\mathcal{R}(\pi^*, \tau^* \mid \bar{\sigma}_P(\pi^*)) < f\beta$ and $\pi^* < \beta/\alpha p$, there exists a cultural equilibrium $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ for all true quality of the political class and transparency of the institutions (π, τ) . In this equilibrium, the voter does not choose candidate A. The polity does not successfully carry out ambitious agendas.*
2. *For any political culture (π^*, τ^*) such that either $\tau^* p\mathcal{R}(\pi^*, \tau^* \mid \bar{\sigma}_P(\pi^*)) \geq f\beta$ or $\pi^* \geq \beta/\alpha p$, there exists a cultural equilibrium $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ if and only if the true transparency of the institutions is $\tau = \tau^*$ and the true quality of the political class is such that*
 - (a) *if $\tau^* p\mathcal{R}(\pi^*, \tau^* \mid 0) \geq f\beta$, then $\pi \leq \pi^* + (1 - \pi^*)\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)$;*
 - (b) *otherwise, $\pi = \pi^*$.*

In this equilibrium, the voter chooses candidate A and a dishonest candidate tries to carry out her agenda with probability

$$1 - \frac{1 - \pi^*}{1 - \pi} (1 - \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)) \in [0, 1). \quad (5)$$

The polity successfully carries out ambitious agendas with probability

$$p(\pi^* + (1 - \pi^*) \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)). \quad (6)$$

The observation that negative cultures that induce the voter to choose candidate D are stable and self-confirming underlies the key message of our theory. Suppose that the voter's culture is negative so that $(\hat{\pi}, \hat{\tau})$ lies in the “voter chooses D ” region in Figure 1. In addition, suppose that the true values of (π, τ) are in fact larger and lie in the “voter chooses A ” region. Then Proposition 2 implies that in this case a negative but misspecified culture may persist. This culture induces a democracy that focuses on default, unambitious, short-term policies. It does so precisely because voters believe they live in a country of low-quality, dishonest politicians that cannot be held accountable by the country's weak and non-transparent institutions. Therefore, they prefer to vote for candidates who promise short-term, easily verifiable projects, rather than ambitious agendas of reform. Yet, the true quality of their political class is large enough, and their democratic institutions transparent enough, that effective accountability would indeed be possible and ambitious agendas would actually be carried out with large probability. It is the country's political culture, and not the true qualities of politicians and institutions, that causes this democracy to forever remain in this *bad democracy trap*. We make this idea more precise in the following Corollary.

Corollary 1 (Bad democracy trap). *Let the true quality of the political class and transparency of the institutions (π, τ) be such that $\pi > \beta/\alpha p$ or $\tau p \mathcal{R}(\pi, \tau \mid \bar{\sigma}_P(\pi)) > f\beta$. Any political culture $(\hat{\pi}, \hat{\tau})$ such that $\hat{\pi} < \beta/\alpha p$ and $\hat{\tau} p \mathcal{R}(\hat{\pi}, \hat{\tau} \mid \bar{\sigma}_P(\hat{\pi})) < f\beta$ induces an essentially unique cultural equilibrium with political culture $(\pi^*, \tau^*) = (\hat{\pi}, \hat{\tau})$; in this equilibrium, the voter never chooses candidate A and his payoff equals 0. However, there also exist cultural equilibria with political culture $(\pi^*, \tau^*) = (\hat{\pi}', \tau)$ such that $\hat{\pi}' > \beta/\alpha p$ or $\tau p \mathcal{R}(\hat{\pi}', \tau \mid \bar{\sigma}_P(\hat{\pi}')) > f\beta$. In these equilibria, the voter chooses candidate A and his payoff equals*

$$\alpha p(\hat{\pi}' + (1 - \hat{\pi}') \sigma_P^*(\hat{\pi}', \tau, \hat{\pi}', \tau)) - \beta > 0.$$

We can briefly return to Figure 1: any culture in the area in which the voter chooses D is, by Proposition 2, Point 1, stable, for any true values of (π, τ) . It is a bad democracy trap if the true values lie in the region in which the voter chooses A .

Point 2 in Proposition 2 specifies which stable and self-confirming cultures can induce the voter to choose candidate A . These cultures must be sufficiently positive and accurate in predicting the true transparency of the institutions, τ . However, the voter's political

culture may systematically underestimate or overestimate the quality of the country's politicians, π . In fact, whenever the condition in Point 1(a) is verified, the true value of π can equal any value between 0 and $\pi^* + (1 - \pi^*) \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) > \pi^*$. In equilibrium, the voter's (possibly misspecified) culture dictates the incentives for dishonest candidates so that they are, as he would predict, indifferent between trying to carry out their ambitious agendas or not. In addition, the voter correctly predicts the average success rate, so that his culture is stable. However, if his culture is misspecified, the voters will incorrectly predict what he cannot verify: he will predict that dishonest candidates carry out their agendas with probability $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)$ when instead they do so with probability

$$\sigma_P^*(\pi^*, \tau^*, \pi, \tau) = 1 - \frac{1 - \pi^*}{1 - \pi} (1 - \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)).$$

That is, the voter is correctly predicting the success rate of ambitious agendas, but he is not correctly deducing the process that is producing it. For example, in some cultural equilibria the voter correctly predicts a high success rate. His culture makes him believe that this is due to the high quality of the country's politicians so that there are very few dishonest politicians. However, in reality the high success rate is due to a larger number of dishonest politicians who are nonetheless induced to try to carry out their agendas with sufficiently large probability. In fact, in extreme cases the voter may be choosing candidate A in a democracy in which, were he to learn the true quality of the country's politicians π , he would avoid doing so for fear that dishonest candidates would too infrequently try to carry out their ambitious agendas.

Corollary 2 (Wishful thinking good democracy). *Let the true quality of the political class and transparency of the institutions (π, τ) be such that $\tau p \mathcal{R}(\pi, \tau \mid \bar{\sigma}_P(\pi)) < f\beta$ and $\pi < \beta/\alpha p$. Any political culture $(\hat{\pi}, \hat{\tau})$ such that $\hat{\tau} p \mathcal{R}(\hat{\pi}, \hat{\tau} \mid \bar{\sigma}_P(\hat{\pi})) > f\beta$, $\hat{\tau} = \tau$, and $\hat{\pi} \geq \pi$ induces a unique cultural equilibrium with political culture $(\pi^*, \tau^*) = (\hat{\pi}, \hat{\tau})$; in this equilibrium, the voter chooses candidate A and his payoff equals*

$$\alpha p (\hat{\pi} + (1 - \hat{\pi}) \sigma_P^*(\hat{\pi}, \tau, \hat{\pi}, \tau)) - \beta > 0.$$

However, there also exist an essentially unique cultural equilibria with political culture $(\pi^, \tau^*) = (\pi, \tau)$. In this equilibrium, the voter never chooses candidate A and his payoff equals 0.*

The results in Corollaries 1 and 2 say that, in our model, culture may trump reality in shaping political behavior and dictating the destiny of democracy. Some democracies may have high quality institutions and political human capital, and yet, according to Corollary 1, fail to deliver on ambitious agendas because their overly negative culture

traps them in a bad democracy. Others may have in fact good quality institutions, but, according to Corollary 2, outperform their political human capital because their overly positive political culture enables voters to delegate to politicians who propose risky but ambitious agendas. While culture may trump reality, our framework highlights that long-term observations constrain the role of culture, so that only some combinations of culture and behavior can be stable in equilibrium. Furthermore, when the condition in Point 2(a) in Proposition 2 fails, positive cultures fully reveal reality.

2.5 Empirical relevance

Our experimental setup in Section 3 aims to empirically verify the plausibility of the mechanism in our model connecting political and economic outcomes to changes in voters' political culture. Before turning to it, we now briefly discuss how our theoretical results help us gain insights into the relation between political culture and the working of democracies.

On the one hand, our results resonate with the cultural view of democracy, whereby *good institutions are not sufficient* to establish a good democracy. In our model, a sufficiently negative culture can trap democracy independently of the true quality of institutions. Negative cultures are therefore a driving historical force in determining the functioning (or lack thereof) of democracies. On the other hand, in our model *bad institutions are sufficient* to establish a bad democracy. In our model, sufficiently bad institutions of political accountability, τ , ultimately drive a country into a bad equilibrium, independently of what culture the country inherited¹⁷—that culture will bend to the hard evidence that the democracy is, in fact, bad. The joint implication of these two results is that a good democracy needs both good institutions of political accountability *and* a positive political culture.

However, our results also highlight that the connection between culture and institutions is more complex and challenge some common views and prejudices. In our wishful thinking good democracies, a positive culture combines with good institutions of accountability, τ , to deliver a good democracy even in the absence of high-quality politicians (i.e., even if π is low). Therefore, in our model, culture and institutions can completely drive political outcomes independently of the political human capital of the country. Empirically, suppose we observe two countries, B and G , with identical institutions of accountability. Country B is a bad democracy and Country G is a good one. Suppose also

¹⁷So long as voters does not believe they live in a society with exceptionally honest politicians, i.e., so long as $\hat{\pi} < \beta/\alpha p$.

that Country *G*'s culture posits that politicians are mostly honest, while country *B*'s voters are convinced to live among dishonest politicians. Prejudicial views may easily come to the conclusion that the differential political outcome is indeed driven by the inherent honesty or dishonesty of the two populations (or, perhaps, of only their respective politicians). Yet, our model rationalizes a view whereby Country *B*'s politicians are in fact on average more honest than Country *G*'s politicians. The difference in outcomes is driven by their inherited cultures: while Country *G*'s voters inherited the view that politicians can be trusted, Country *B*'s voters inherited the view that politicians cannot be trusted. The former's wishful thinking induces a good democracy despite largely dishonest politicians; the latter's negative culture traps their democracy despite a largely honest political class. The curse of Country *B*'s democracy is, to echo Prime Minister Draghi, its inability to recognize its own quality.

3 Experimental evidence

We explore the empirical relevance of our mechanism and theory in a pre-registered online survey experiment. The key idea that underpins our theory is that information about past political outcomes can affect voters' beliefs about the quality and honesty of politicians and the transparency of institutions: their political culture. For example, a voter who holds an overly positive political culture and is presented with feedback that informs her that past outcomes are, in fact, less positive, will update her political culture to be less positive. Our focus is on understanding whether this mechanism is empirically plausible.

3.1 Survey experiment

We now describe our survey experiment. We begin with an overview of the main structure. In the experiment, we first elicit subjects' preferences over a set of policies. In particular, we choose two policies that are *ambitious*: aimed at long-term and global outcomes. In contrast, the two other policies are aimed at short-term, local outcomes, and could be thought of as "pork" and more closely represent the *default* agenda of our model. We adopt an "ask-tell" survey design: we elicit subjects' beliefs about the level of corruption in the U.S. compared to a sample of other countries, and then randomly assign subjects to an information treatment about the true level of corruption. Finally, we test whether the treatment affects (i) subjects' trust in politicians and their view on the transparency of institutions—their political culture; and (ii) their policy-specific belief that a politician

who proposes such a policy is indeed going to try to implement it and subjects' policy-specific belief that they will become informed of the proposal's outcome. Our expectation is that the treatment should affect subjects' political culture in general, but that this effect should be stronger in their policy-specific beliefs about ambitious policies. Below we describe each of these stages of the experiment in greater detail.

Preferences over policies. At the beginning of the survey, we ask subjects standard demographic questions and then elicit their preferences over four different policies:

1. *Transport.* Provide \$100 million of Federal funds to upgrade local transportation in your state;
2. *Local industries.* Provide \$20 million of Federal funds to support local industries and employment in your district.
3. *Peace in Middle East.* Renew Congress' efforts for a durable peace in the Middle East;
4. *Women's rights.* Renew Congress' effort into the advancement of women's rights in the developing world.

Policies 1 and 2 represent non-ambitious, default policies aimed at short-term, local objectives. Policies 3 and 4 represent ambitious policies aimed at uncertain, long-term, global objectives.

For each of these policies, we ask respondents how likely they are to agree or disagree¹⁸ with the statement: "I would LIKE this policy to be carried out."

Corruption beliefs and treatment. For all subjects, we elicit their belief in the level of corruption in the U.S.. We do this by first describing to subjects the Corruption Perception Index¹⁹ and then presenting them with context information about corruption levels in other non-U.S. countries. As shown in Figure 2a, we present subjects with level of corruption, on a scale of 0 (least corrupt) to 100 (extremely corrupt), as measured by the

¹⁸All our agree/disagree questions are on a 5-point Likert scale from Strongly Disagree to Strongly Agree.

¹⁹In particular, the text of our survey is: "Next you will see the levels of corruption for various non-U.S. countries. Please respond with your best estimate of corruption in the U.S.. The corruption level is measured by the Corruption Perceptions Index (CPI), which measures different forms of corruption in a country's public sector such as bribery, the diversion of public funds, and prevalence of officials using public office for private gain. The CPI is based on the perception of experts and business executives. It is the most widely used indicator of corruption worldwide. The CPI is a composite index, which combines 13 surveys and assessments of corruption that were collected by a variety of reputable institutions."

2020 Corruption Perception Index, in four countries: Tunisia, Spain, Uruguay, and Denmark. Subjects are asked to graphically place a marker to represent what they believe the U.S. corruption level is, compared to these other countries.

We then experimentally vary subjects' information about past outcomes by randomly assigning two-thirds of the subjects to the following information: (i) the actual level of U.S. corruption as measured by the 2020 Corruption Perception Index, (ii) whether they underestimated or overestimated the corruption level in United States; and (iii) the difference between their estimate and the actual level stated.²⁰ Figure 2b shows an example of the page shown to the treated group. Respondents who over-estimated corruption were shown a message saying: "You have overestimated corruption in the US by more than . . . points. In fact, the US compares favorably in the Corruption index compared to many other developed countries. For example, in 2020, the US had a lower corruption score than Italy, South Korea, and Argentina." Respondents who under-estimated corruption were shown a message saying: "You have underestimated corruption in the US by more than . . . points. In fact, the US compares poorly in the Corruption index compared to many other less developed countries. For example, in 2020, the US had a higher corruption score than the United Kingdom, Chile, and Bhutan." Notice that our treatment variable is directional: T_i equals 1 if the subject is treated and over-estimated the level of corruption, -1 if the subject is treated and underestimated the level of corruption, and 0 otherwise (i.e., untreated respondents and respondents who correctly answered the corruption levels).²¹

Post-treatment beliefs and policy preferences. Finally, we ask all subjects to respond to two series of questions. First, we ask them about their beliefs about the quality and honesty of politicians and the transparency of institutions. We do so by asking them how likely they are to agree or disagree with four questions. The first two pertain to the quality and honesty of politicians:

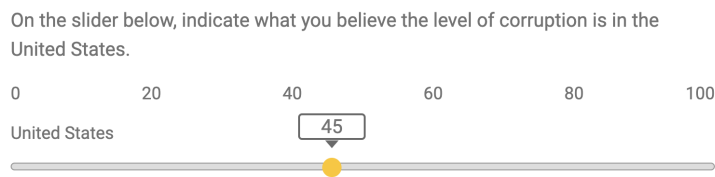
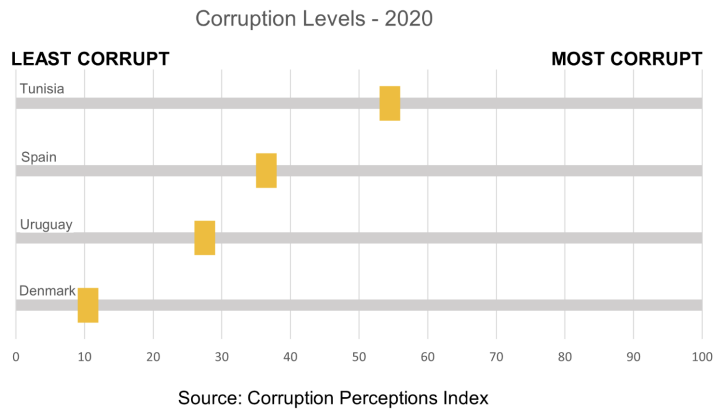
1. *Trust politicians.* We generally can trust politicians;
2. *Government self-interested.* People in government are too often interested in looking after themselves.

The last two pertain to the transparency of institutions:

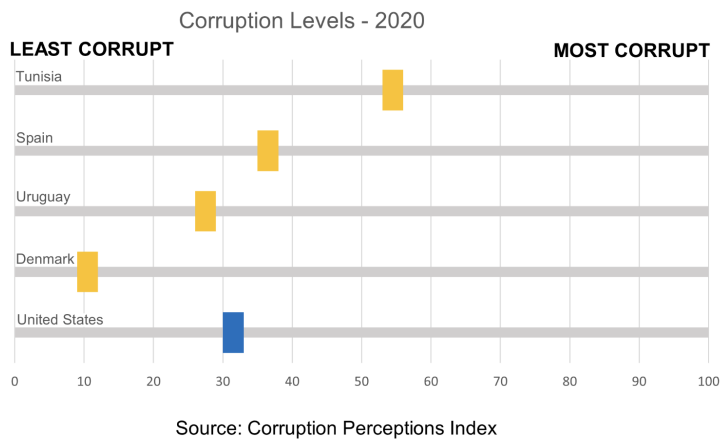
- 3 *Accountability Office good.* The U.S. Government Accountability Office does a good job in monitoring politicians;

²⁰We convey this information in intervals: more or less than 1, 2, 3, 4, 5, 10, 20, or 30 points.

²¹Only 19 treated respondents correctly answered the corruption levels.



(a) Eliciting subjects corruption beliefs.



Your guess of corruption in the US was **too high**.

You have **overestimated** corruption in the US by more than 10 points. In fact, the US compares favorably in the Corruption index compared to many other developed countries. For example, in 2020, **the US had a lower corruption score** than Italy, South Korea, and Argentina.

Your answer: 45 points. Correct answer: 33 points.

(b) Treatment if subject overestimated corruption.

Figure 2: Ask-tell survey design.

4 *Media helps*. In general, the media helps voters keep politicians accountable.

We then ask policy-specific questions. For each policy, we ask again whether they “would LIKE this policy to be carried out” and whether they are “likely to agree” with four statements:

1. “A politician who SAYS they want to carry out this policy would actually TRY to;”
2. “A politician who TRIES to carry out this policy would be ABLE to;”
3. “It would be easy for me to obtain timely information (including from media and other sources) on the progress of this policy;”
4. “I would support a politician who says they want to carry out this policy. ”

Fielding the survey and descriptive statistics. Our survey experiment²² was fielded in August 2022, with $N = 3,113$ subjects.²³ It was programmed and designed in Qualtrics, and the survey link was distributed by *Bilendi & Respondi* to a nationally representative panel of respondents. Participation in the survey was voluntary and required subjects to confirm that they were U.S. citizen and over the age of 18. Subjects were financially compensated for their time, with the payment process being handled by *Bilendi & Respondi*.

3.2 Analysis and results

Our results are broadly suggestive that the mechanism underpinning our theory can be activated even in a simple setting in which subjects are exposed to a single indicator of the quality of political outcomes in their country.

Treatment effect on political culture. We first verify that being exposed to actual information on the level of corruption in the U.S. induces subjects to revise their political culture. To do this, we estimate

$$A_i = \beta_0 + \beta_1 T_i + \beta_2 G_i + X_i' \Gamma + u_i, \quad (7)$$

where A_i is subject i 's agreement to one of the statements on the quality and honesty of politicians or the transparency of the institutions as detailed in Section 3.1. The treatment

²²Data collection approved under the UNSW Humans Research Advisory Panel (HREAP) HC210761 and carried out as outlined in pre-registration AEARCTR-0009008, available on the AEA website at <https://www.socialscienceregistry.org/trials/9008>.

²³Including a small pilot with sample size 170. There was no change to the survey between the pilot and the main wave.

Table 1: Treatment effect on political culture.

| VARIABLES | (1) Trust politicians | (2) Government self-interested | (3) Accountability Office good | (4) Media helps |
|-------------------|-----------------------------|--------------------------------------|--------------------------------------|-----------------------|
| Treatment | 0.112*** (0.030) | -0.171*** (0.028) | 0.227*** (0.031) | 0.031 (0.039) |
| Corruption belief | -0.014*** (0.001) | 0.012*** (0.001) | -0.012*** (0.001) | -0.010*** (0.001) |
| Observations | 2,981 | 2,981 | 2,980 | 2,980 |
| R-squared | 0.107 | 0.077 | 0.081 | 0.067 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 2.105 | 4.157 | 2.373 | 2.666 |

Notes: OLS estimates of (7). The dependent variables in Columns (1)–(4) are responses to post-treatment beliefs (Section 3.1): Trust politicians, Government self-interested, Accountability Office good, Media helps. The main independent variable is Treatment. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

variable T_i equals 1 if the subject is treated and over-estimated the level of corruption, -1 if the subject is treated and underestimated the level of corruption, and 0 otherwise (i.e., untreated respondents and respondents who correctly answered the corruption levels). Since respondents’ belief about corruption in the United States is likely correlated with their policy choices, we explicitly control for their subject i ’s estimate of the level of corruption G_i . Finally, X is a vector of demographic controls.

We are interested in the effect that treatment has on the subjects’ political culture: the coefficient β_1 . In particular, we expect those subjects who had overestimated (respectively, underestimated) corruption and have been treated to have, on average, more negative (respectively, positive) political cultures than the control group. Therefore, the underlying identifying assumption is that, conditional on corruption beliefs G_i , our treated population is, before treatment, identical in distribution to the control population. Since we perform an experiment where we randomly assign information treatment to a subset of individuals, we can be confident that experimental variation in trust is uncorrelated with the unobserved factors. However, we also verify this assumption empirically (see Table B.2 in Appendix B).

Table 1 presents the results of OLS estimations of (7).²⁴ Our treatment is successful

²⁴For all our estimations, we report here estimates including our vector of controls. Appendix B replicates all our tables without controls. All the results are qualitatively and quantitatively very similar.

Table 2: Treatment effect on policy-specific beliefs: “A politician who SAYS they want to carry out this policy would actually TRY to.”

| VARIABLES | (1) Transport | (2) Local industries | (3) Peace in M.E. | (4) Women’s rights |
|-------------------|----------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.010 (0.030) | 0.050 (0.031) | 0.067** (0.032) | 0.063* (0.033) |
| Corruption belief | -0.003*** (0.001) | -0.005*** (0.001) | -0.003*** (0.001) | -0.003*** (0.001) |
| Pre-Treat support | 0.342*** (0.019) | 0.335*** (0.020) | 0.376*** (0.020) | 0.363*** (0.018) |
| Observations | 2,702 | 2,639 | 2,609 | 2,648 |
| R-squared | 0.167 | 0.154 | 0.158 | 0.175 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 3.478 | 3.460 | 3.273 | 3.315 |

Notes: OLS estimates of Equation (8). The dependent variables in Columns (1)–(4) are agreement with statement: “A politician who SAYS they want to carry out this policy would actually TRY to” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

in changing the level of trust in politicians and the transparency of governmental institutions of political accountability, but does not statistically significantly change subjects’ beliefs on the ability of media to keep politicians accountable. The magnitude of the effects are significant. For example, treating subjects with overly negative political cultures (those who over-estimated corruption) improves their view that politicians can be trusted by an amount comparable to an average 8.6 difference in their estimate of corruption in our graphical question. The effect on subjects’ agreement with the view that people in government often look after themselves or that institutions keep politicians accountable is even larger: about the size of a 15.5 and 19.2 difference in their estimate of corruption, respectively. Said otherwise, our treatment is associated with more positive beliefs on politicians and institutions comparable to the difference between a subject who believes the U.S. to be more corrupt than Uruguay and one that believes the U.S. to be less corrupt than Denmark. Summarizing, the results are clearly suggestive that information regarding past political outcomes of corruption changes subjects’ perception about the quality and honesty of politicians and their belief on the transparency of (official) institutions of political accountability.

Table 3: Treatment effect on policy-specific beliefs: “It would be easy for me to obtain timely information (including from media and other sources) on the progress of this policy.”

| VARIABLES | (1) Transport | (2) Local industries | (3) Peace in M.E. | (4) Women’s rights |
|-------------------|----------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.020 (0.035) | 0.040 (0.035) | 0.097*** (0.037) | 0.102*** (0.037) |
| Corruption belief | -0.003*** (0.001) | -0.002 (0.001) | -0.003** (0.001) | -0.001 (0.001) |
| Pre-Treat support | 0.313*** (0.020) | 0.351*** (0.021) | 0.274*** (0.023) | 0.351*** (0.019) |
| Observations | 2,647 | 2,585 | 2,586 | 2,607 |
| R-squared | 0.126 | 0.142 | 0.089 | 0.156 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 3.209 | 3.155 | 2.998 | 3.062 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “It would be easy for me to obtain timely information (including from media and other sources) on the progress of this policy” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Treatment effect on policy-specific beliefs. Our theory is based on the idea that the voters’ political culture should affect how they see the likelihood that ambitious agendas will be carried out and if they will get to know about it. However, changes in their political culture should not affect the same views on default policies that target short-term, local, interests. To test this hypothesis, for each policy and each of the policy-specific statements, we estimate

$$A_i = \beta_0 + \beta_1 T_i + \beta_2 G_i + \beta_3 P_i + X_i' \Gamma + u_i, \quad (8)$$

where A_i is subject i ’s agreement with the policy-specific statement, and P_i is subject i ’s pre-treatment stated preference for the policy.

We are interested in the treatment effect β_1 under the identifying assumption that, conditional on pre-treatment policy preferences and corruption beliefs, treated and control populations are the same in distribution.

Tables 2 and 3 show, respectively, the results of OLS estimations of (8) for the two questions: (i) “A politician who SAYS they want to carry out this policy would actually TRY to”; and (ii) “It would be easy for me to obtain timely information (including from

media and other sources) on the progress of this policy". The idea underpinning our theory is that for these two questions we expect β_1 to be positive for the ambitious policies and zero for the default policies. The results are broadly suggestive that this is indeed the case. In particular, our treatment has a positive and significant effect on subjects' view that politicians who say they would renew Congress' efforts for a durable peace in the Middle East would, in fact, try to do so if elected. The effect is of similar size for the other ambitious policy (renew Congress' effort into the advancement of women's rights in the developing world). In contrast, the effect is not significant for the two default policies, and indeed precisely estimated around 0 for local transports. To give a sense of the magnitude of the effect on the ambitious policies, it is comparable to more than 20 points difference in subjects' estimate of corruption. These results suggest that, as in our theory, past political outcomes can change the political culture of voters, and in particular how much they trust that politicians who promise ambitious agendas are actually going to try to pursue them.

The evidence is even stronger for the other component of the subjects' political culture: the belief that it would be easy for the subject to obtain timely information (including from media and other sources) on the progress of the proposed policy. Again, we observe large and significant treatment effects for our two ambitious policies, but close to no effect at all for the two default policies.

No change in policy preferences or feasibility. One possible drawback of our experimental design is that treatments may induce subjects to update their views on other dimensions that matter for ambitious agendas. In particular, upon observing past political outcomes, subjects may change their views on whether they would like to see a specific policy implemented or whether policies are feasible—perhaps, in a less corrupt country it is easier to implement a specific policy. In this case then some of the results we have discussed so far could be more than subjects' political culture being updated. To check for this possibility, we report in Tables 4 and 5, respectively, the results of OLS estimations of (8) where the dependent variable is subjects' post-treatment agreement with: (i) "I would LIKE this policy to be carried out"; and (ii) "A politician who TRIES to carry out this policy would be ABLE to". There is no evidence that our treatment changes subjects' preferences for ambitious policies nor their beliefs about their feasibility.

Support for ambitious politicians. We would also like to verify that our treatment is sufficiently powerful in changing subjects' political culture that it changes their view on whether they would "support a politician who says they want to carry out this policy."

Table 4: Treatment effect on policy preferences.

| VARIABLES | (1) Transport | (2) Local industries | (3) Peace in M.E. | (4) Women’s rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.014 (0.024) | 0.000 (0.024) | -0.021 (0.025) | 0.009 (0.024) |
| Corruption belief | -0.001 (0.001) | 0.000 (0.001) | -0.001 (0.001) | -0.001 (0.001) |
| Pre-Treat support | 0.783*** (0.014) | 0.750*** (0.015) | 0.726*** (0.016) | 0.772*** (0.014) |
| Observations | 2,716 | 2,648 | 2,641 | 2,680 |
| R-squared | 0.604 | 0.559 | 0.512 | 0.620 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 3.671 | 3.652 | 3.698 | 3.706 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “I would LIKE this policy to be carried out” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

We then estimate (8) where the dependent variable is subjects’ agreement with this statement (Table 6). Unfortunately, while our treatment seems to successfully change our subjects’ stated views on whether politicians who propose ambitious agendas would indeed attempt to carry them out and could be held accountable for it, support for these politicians does not change significantly (though the sign of the effect is in the expected direction).

4 Conclusions

We studied a stylized theoretical framework highlighting how a society’s political culture affects the functioning of democratic institutions. We focused on two traits of a political culture that directly relate to the agency problem in representative politics: voters’ beliefs that that politicians who promise ambitious agendas can be trusted to actually try to pursue them; and voters’ beliefs that institutions of accountability can help them verify whether ambitious agendas are successful before politicians can run for reelection.

Our theoretical framework includes both elements that allow culture to affect political outcomes and elements that constrain culture to converge towards correct representa-

Table 5: Treatment effect on policy feasibility.

| VARIABLES | (1) Transport | (2) Local industries | (3) Peace in M.E. | (4) Women’s rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.036 (0.033) | 0.058* (0.032) | 0.027 (0.036) | 0.059 (0.036) |
| Corruption belief | -0.001 (0.001) | -0.001 (0.001) | 0.003** (0.001) | 0.002 (0.001) |
| Pre-Treat support | 0.310*** (0.020) | 0.325*** (0.020) | 0.349*** (0.022) | 0.348*** (0.019) |
| Observations | 2,690 | 2,621 | 2,614 | 2,649 |
| R-squared | 0.132 | 0.143 | 0.136 | 0.159 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 3.162 | 3.185 | 2.750 | 2.956 |

Notes: OLS estimates of Equation 8. The dependent variables in Columns (1)–(4) are agreement with statement: “A politician who TRIES to carry out this policy would be ABLE to” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

tions of the true political environment. We exploit these two mechanism to identify when culture can persist and drive political outcomes despite institutional changes—or, on the contrary, when institutional change drives political outcomes and changes culture.

Within this framework, voters’ political culture may dictate political outcomes: a sufficiently negative culture may induce a bad democracy trap whereby voters behave *as if* their politicians and institutions are of low quality, even when in fact these are of high quality. We posit that in the long run such a culture survives because voters do not observe information contradicting their beliefs. Thus, key to our theory is that voters’ beliefs—i.e., their political culture—can change as a result of observing outcomes inconsistent with it. We explore the empirical relevance of this mechanism of cultural selection with a large survey experiment we conducted on U.S. voters. Our empirical results suggest this mechanism is at play in voters’ mind: information about past political corruption in the U.S. that does not match voters’ expectations changes their perception about both the quality of the U.S. political class and of its institutions of accountability.

From a positive perspective, our theory yields a negative view on the prospect of cultural change: bad democracy traps represents cultural equilibria that self-reinforce negative views on a society’s ability to tackle ambitious goals. From a normative perspective, our theory and results also offer hopes. In fact, even short-lived shocks that pull a soci-

Table 6: Treatment effect on support for ambitious politicians.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women's Rights |
|-------------------|----------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.014 (0.027) | 0.012 (0.027) | 0.022 (0.027) | 0.013 (0.027) |
| Corruption belief | -0.002*** (0.001) | -0.001 (0.001) | -0.002** (0.001) | -0.002** (0.001) |
| Pre-Treat support | 0.621*** (0.016) | 0.612*** (0.017) | 0.587*** (0.017) | 0.654*** (0.015) |
| Observations | 2,672 | 2,612 | 2,599 | 2,654 |
| R-squared | 0.434 | 0.411 | 0.379 | 0.486 |
| Controls | Yes | Yes | Yes | Yes |
| Mean | 3.522 | 3.515 | 3.488 | 3.494 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “I would support a politician who says they want to carry out this policy.” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

ety temporarily out of a bad democracy trap may induce long-lasting cultural changes: if voters observe that political outcomes are better than their culture predicts, they may, as in our experiment, immediately update their political culture to a new stable level outside the trap.

More broadly, our results suggest that democracy’s success may depend on voters’ beliefs about the quality of the political class and the quality of institutions that are, in some cases, self-reinforcing. This may contribute to resolve some tensions in empirical studies on the evolution of values and beliefs among citizens of democracies (e.g., [Besley and Persson, 2019](#); [Mounk, 2018](#)). In our theory, depending on initial conditions, different democracies may evolve (culturally and institutionally) in different directions. In some democracies with sufficiently positive cultures, successive generations of voters may in time learn that democracy suits their society even better than their ancestors believed, reinforcing their society’s belief in democracy. In others with more negative cultures or worse political class or institutions of accountability, voters may become increasingly doubtful of the value of democracy, with younger generations perhaps preferring other forms of government that, in their opinion, may be more capable of taking decisive action towards ambitious goals. In this latter case, crises that expose democracy’s inability to deliver on ambitious goals may increase demand for more authoritarian forms of gov-

ernment.

References

- Acemoglu, Daron and James A Robinson**, “Culture, institutions and social equilibria: A framework,” Technical Report, National Bureau of Economic Research 2021.
- Acemoglu, Daron, Georgy Egorov, and Konstantin Sonin**, “A political theory of populism,” *The quarterly journal of economics*, 2013, 128 (2), 771–805.
- Alesina, Alberto and George-Marios Angeletos**, “Fairness and redistribution,” *American economic review*, 2005, 95 (4), 960–980.
- Alesina, Alberto and Guido Tabellini**, “A positive theory of fiscal deficits and government debt,” *The review of economic studies*, 1990, 57 (3), 403–414.
- Alesina, Alberto, Paola Giuliano, and Nathan Nunn**, “On the origins of gender roles: Women and the plough,” *The quarterly journal of economics*, 2013, 128 (2), 469–530.
- Algan, Yann and Pierre Cahuc**, “Inherited trust and growth,” *American Economic Review*, 2010, 100 (5), 2060–2092.
- Algan, Yann and Pierre Cahuc**, “Trust and growth,” *Annu. Rev. Econ.*, 2013, 5 (1), 521–549.
- Algan, Yann, Pierre Cahuc, and Marc Sangnier**, “Trust and the welfare state: The twin peaks curve,” *The Economic Journal*, 2016, 126 (593), 861–883.
- Ashworth, Scott**, “Electoral accountability: Recent theoretical and empirical work,” *Annual Review of Political Science*, 2012, 15, 183–201.
- Ashworth, Scott and Ethan Bueno de Mesquita**, “Is voter competence good for voters?: Information, rationality, and democratic performance,” *American Political Science Review*, 2014, 108 (3), 565–587.
- Ashworth, Scott, Ethan Bueno de Mesquita, and Amanda Friedenberg**, “Accountability and information in elections,” *American Economic Journal: Microeconomics*, 2017, 9 (2), 95–138.
- Banfield, Edward C**, *The moral basis of a backward society.*, Free Press, 1967.
- Battaglini, Marco and Bård Harstad**, “Participation and duration of environmental agreements,” *Journal of Political Economy*, 2016, 124 (1), 160–204.
- Battaglini, Marco and Bård Harstad**, “The political economy of weak treaties,” *Journal of Political Economy*, 2020, 128 (2), 544–590.
- Becker, Sascha O and Hans-Joachim Voth**, “From the Death of God to the Rise of Hitler,” Technical Report 2023.
- Becker, Sascha O and Ludger Woessmann**, “Was Weber wrong? A human capital theory of Protestant economic history,” *The quarterly journal of economics*, 2009, 124 (2), 531–596.
- Becker, Sascha O and Luigi Pascali**, “Religion, division of labor, and conflict: Anti-semitism in germany over 600 years,” *American Economic Review*, 2019, 109 (5), 1764–1804.
- Becker, Sascha O, Katrin Boeckh, Christa Hainz, and Ludger Woessmann**, “The empire is dead, long live the empire! Long-run persistence of trust and corruption in the bureaucracy,” *The Economic Journal*, 2016, 126 (590), 40–74.
- Besley, Timothy**, “State capacity, reciprocity, and the social contract,” *Econometrica*, 2020, 88 (4), 1307–1335.

- Besley, Timothy and Andrea Prat**, “Handcuffs for the grabbing hand? Media capture and government accountability,” *American economic review*, 2006, 96 (3), 720–736.
- Besley, Timothy and Torsten Persson**, “Democratic values and institutions,” *American Economic Review: Insights*, 2019, 1 (1), 59–76.
- Bisin, Alberto and Thierry Verdier**, “The economics of cultural transmission and the dynamics of preferences,” *Journal of Economic theory*, 2001, 97 (2), 298–319.
- Bisin, Alberto and Thierry Verdier**, “On the Joint Evolution of Culture and Political Institutions: Elites and Civil Society,” *Journal of Political Economy*, 2023.
- Bueno de Mesquita, Ethan and Wioletta Dziuda**, “Partisan Traps,” Technical Report, National Bureau of Economic Research 2023.
- Burck, Jan, Uhlich Thea, Bals Christoph, Höhne Niklas, and Nascrimiento Leonardo**, “Climate Change Performance Index 2024,” *Technical Report*. Url: <https://ccpi.org/download/climate-change-performance-index-2024/>, 2023.
- Callander, Steven and Davin Raiha**, “Durable policy, political accountability, and active waste,” *Quarterly Journal of Political Science*, 2017, 12 (1), 59–97.
- Canes-Wrone, Brandice, Michael C Herron, and Kenneth W Shotts**, “Leadership and pandering: A theory of executive policymaking,” *American Journal of Political Science*, 2001, pp. 532–550.
- Caselli, Francesco and Massimo Morelli**, “Bad politicians,” *Journal of public economics*, 2004, 88 (3-4), 759–782.
- Chinoy, Sahil, Nathan Nunn, Sandra Sequeira, and Stefanie Stantcheva**, “Zero-sum thinking and the roots of US political divides,” *Preprint at https://scholar.harvard.edu/files/stantcheva/files/zero_sum_us_political_divides.pdf*, 2023.
- Coate, Stephen and Stephen Morris**, “On the form of transfers to special interests,” *Journal of political Economy*, 1995, 103 (6), 1210–1235.
- Dal Bó, Ernesto, Pedro Dal Bó, and Erik Eyster**, “The demand for bad policy when voters underappreciate equilibrium effects,” *The Review of Economic Studies*, 2018, 85 (2), 964–998.
- Dekel, Eddie, Drew Fudenberg, and David K Levine**, “Learning to play Bayesian games,” *Games and Economic Behavior*, 2004, 46 (2), 282–303.
- Devine, Daniel**, “Does Political Trust Matter? A Meta-analysis on the Consequences of Trust,” *Political Behavior*, forthcoming.
- Fernández, Raquel**, “Cultural change as learning: The evolution of female labor force participation over a century,” *American Economic Review*, 2013, 103 (1), 472–500.
- Fernandez, Raquel and Dani Rodrik**, “Resistance to reform: Status quo bias in the presence of individual-specific uncertainty,” *The American economic review*, 1991, pp. 1146–1155.
- Fogli, Alessandra and Laura Veldkamp**, “Nature or nurture? Learning and the geography of female labor force participation,” *Econometrica*, 2011, 79 (4), 1103–1138.
- Giuliano, Paola and Romain Wacziarg**, “Who voted for Trump? Populism and social capital,” Technical Report, National Bureau of Economic Research 2020.
- Gratton, Gabriele and Barton E Lee**, “Drain the Swamp: A Theory of Anti-Elite Populism,” *UNSW Economics Working Paper 2023-02*, 2023.

- Gratton, Gabriele and Massimo Morelli**, "Optimal Checks and Balances Under Policy Uncertainty," *International Economic Review*, 2022, 63 (2), 549–569.
- Gratton, Gabriele, Luigi Guiso, Claudio Michelacci, and Massimo Morelli**, "From Weber to Kafka: Political instability and the overproduction of laws," *American Economic Review*, 2021, 111 (9), 2964–3003.
- Grosjean, Pauline**, "A history of violence: The culture of honor and homicide in the US South," *Journal of the European Economic Association*, 2014, 12 (5), 1285–1316.
- Grossman, Gene M and Elhanan Helpman**, "Protection for Sale," *The American Economic Review*, 1994, pp. 833–850.
- Grossman, Gene M and Elhanan Helpman**, "Electoral competition and special interest politics," *The review of economic studies*, 1996, 63 (2), 265–286.
- Guiso, Luigi, Paola Sapienza, and Luigi Zingales**, "Does culture affect economic outcomes?," *Journal of Economic perspectives*, 2006, 20 (2), 23–48.
- Guiso, Luigi, Paola Sapienza, and Luigi Zingales**, "Social capital as good culture," *Journal of the European Economic Association*, 2008, 6 (2-3), 295–320.
- Guiso, Luigi, Paola Sapienza, and Luigi Zingales**, "Long-term persistence," *Journal of the European Economic Association*, 2016, 14 (6), 1401–1436.
- Hall, Andrew B**, *Who wants to run?: How the devaluing of political office drives polarization*, University of Chicago Press, 2019.
- Jacobs, Alan M**, "Policy making for the long term in advanced democracies," *Annual Review of Political Science*, 2016, 19, 433–454.
- Jacobs, Alan M and J Scott Matthews**, "Why do citizens discount the future? Public opinion and the timing of policy consequences," *British Journal of Political Science*, 2012, 42 (4), 903–935.
- Keefer, Philip, Carlos Scartascini, and Razvan Vlaicu**, "Demand-side determinants of public spending allocations: Voter trust, risk and time preferences," *Journal of Public Economics*, 2022, 206, 104579.
- Knack, Stephen and Philip Keefer**, "Does social capital have an economic payoff? A cross-country investigation," *The Quarterly journal of economics*, 1997, 112 (4), 1251–1288.
- Kuziemko, Ilyana, Michael I Norton, Emmanuel Saez, and Stefanie Stantcheva**, "How elastic are preferences for redistribution? Evidence from randomized survey experiments," *American Economic Review*, 2015, 105 (4), 1478–1508.
- Leblanc, William, James M Snyder, Jr, and Micky Tripathi**, "Majority-rule bargaining and the under provision of public investment goods," *Journal of Public Economics*, 2000, 75 (1), 21–47.
- Li, Fei and Jidong Zhou**, "A Model of Sequential Crisis Management," *American Economic Journal: Microeconomics*, 2023, 15 (4), 319–349.
- Maskin, Eric and Jean Tirole**, "The politician and the judge: Accountability in government," *American Economic Review*, 2004, 94 (4), 1034–1054.
- Mattozzi, Andrea and Erik Snowberg**, "The right type of legislator: A theory of taxation and representation," *Journal of Public Economics*, 2018, 159, 54–65.

- Morelli, Massimo, Antonio Nicolò, and Paolo Roberti**, "A commitment theory of populism," Technical Report 2021.
- Mounk, Yascha**, *The People vs. Democracy: Why Our Freedom Is in Danger and How to Save It*, Harvard University Press, 2018.
- Myerson, Roger B.**, "Federalism and Incentives for Success of Democracy," *Quarterly Journal of Political Science*, 2005, 1 (1), 3–23.
- Nordhaus, William D.**, "The political business cycle," *The review of economic studies*, 1975, 42 (2), 169–190.
- North, Douglass C.**, *Institutions, institutional change and economic performance*, Cambridge University Press, 1990.
- Nunn, Nathan and Leonard Wantchekon**, "American Economic Association," *The American Economic Review*, 2011, 101 (7), 3221–3252.
- Ostrom, Elinor**, "A behavioral approach to the rational choice theory of collective action: Presidential address, American Political Science Association, 1997," *American political science review*, 1998, 92 (1), 1–22.
- Peyton, Kyle**, "Does trust in government increase support for redistribution? Evidence from randomized survey experiments," *American Political Science Review*, 2020, 114 (2), 596–602.
- Piketty, Thomas**, "Social mobility and redistributive politics," *The Quarterly journal of economics*, 1995, 110 (3), 551–584.
- Prat, Andrea**, "The wrong kind of transparency," *American economic review*, 2005, 95 (3), 862–877.
- Putnam, Robert D, Robert Leonardi, and Rafaella Y Nanetti**, *Making democracy work: Civic traditions in modern Italy*, Princeton university press, 1992.
- Rogoff, Kenneth S.**, "Equilibrium political budget cycles," 1987.
- Sapienza, Paola and Luigi Zingales**, "Economic experts versus average Americans," *American Economic Review*, 2013, 103 (3), 636–642.
- Svolik, Milan W.**, "Learning to love democracy: Electoral accountability and the success of democracy," *American Journal of Political Science*, 2013, 57 (3), 685–702.
- Thomsen, Danielle M.**, *Opting out of Congress: Partisan polarization and the decline of moderate candidates*, Cambridge University Press, 2017.
- Ticchi, Davide, Thierry Verdier, and Andrea Vindigni**, "Democracy, dictatorship and the cultural transmission of political values," Technical Report 2013.
- Voigtländer, Nico and Hans-Joachim Voth**, "Persecution perpetuated: the medieval origins of anti-Semitic violence in Nazi Germany," *The Quarterly Journal of Economics*, 2012, 127 (3), 1339–1392.
- Zak, Paul J and Stephen Knack**, "Trust and growth," *The economic journal*, 2001, 111 (470), 295–321.

Appendix

A Omitted proofs

We begin by establishing the following auxiliary lemma.

Lemma A.1. *For any $\hat{\pi}, \hat{\tau}$, the function $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma)$ is continuous in σ , decreasing in σ , and $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 1) = 0$.*

Proof. Because $\mu(1; \hat{\pi}, \hat{\tau} \mid \sigma)$ and $\mu(0; \hat{\pi}, \hat{\tau} \mid \sigma)$ are continuous in σ , it is immediate that $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma)$ is also continuous in σ . Furthermore,

$$\frac{\partial[\mu(1; \hat{\pi}, \hat{\tau} \mid \sigma) - \mu(0; \hat{\pi}, \hat{\tau} \mid \sigma)]}{\partial \sigma} = \frac{-(1 - \hat{\pi})\hat{\pi}(1 - p(\hat{\pi}(1 - \sigma) + \sigma))(2 - \hat{\pi}(1 - \sigma) - \sigma)}{(\hat{\pi} + (1 - \hat{\pi})\sigma)^2(1 - p(\hat{\pi} + \sigma(1 - \hat{\pi})))^2} < 0;$$

hence, $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma)$ is decreasing in σ . Finally, observe that $\mu(1; \hat{\pi}, \hat{\tau} \mid 1) = \mu(0; \hat{\pi}, \hat{\tau} \mid 1)$ and, hence, $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 1) = 0$. \square

Proof of Lemma 1. The voter expects that it is optimal for the dishonest candidate to try to carry out her agenda if and only if

$$\begin{aligned} & f\beta + r((1 - \hat{\tau})\mu(\emptyset; \hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) + \hat{\tau}\mu(0; \hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}))) \\ & \geq r((1 - \hat{\tau})\mu(\emptyset; \hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) + \hat{\tau}p\mu(1; \hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) \\ & \quad + \hat{\tau}(1 - p)\mu(0; \hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}))) \\ \iff & f\beta \geq \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})) \end{aligned} \tag{A.1}$$

If $f\beta \geq \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 0)$, then the voter expects that $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) = 0$ to be sequentially rational for the dishonest candidate (Part 2 of Definition 1). Furthermore, by Lemma A.1, $f\beta > \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma)$ for any $\sigma > 0$. Therefore, for any $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) > 0$, it is uniquely optimal for the dishonest politician to not try to carry out her agenda—which contradicts sequential rationality of $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})$.

If $f\beta < \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 0)$, then it is immediate that $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) = 0$ is not sequentially rational for the dishonest candidate. Similarly, $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) = 1$ violates sequential rationality because $\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 1) = 0$ (Lemma A.1) and, hence, $f\beta > 0 = \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid 1)$. It follows from the Intermediate Value Theorem and Lemma A.1 that there is a unique value $\sigma' \in (0, 1)$ such that $f\beta = \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \sigma')$. Therefore, by Part 2 of Definition 1, $\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) = \sigma'$. \square

Proof of Lemma 2. Follows immediately from the sequential rationality of the dishonest candidate's strategy $\sigma_P^*(\hat{\pi}, \hat{\tau}, \pi, \tau)$ (Part 3 of Definition 1) and (A.1) from within the proof of Lemma 1. \square

Proof of Lemma 3. Follows immediately from the sequential rationality of the voter (Part 1 of Definition 1). \square

Proof of Proposition 1. By Lemma 3, the voter chooses candidate A if and only if $\alpha p[\hat{\pi} + (1 - \hat{\pi})\sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau})] \geq \beta$. This inequality is satisfied if and only if $\hat{\pi} \geq \beta/\alpha p$ or

$$\hat{\pi} < \beta/\alpha p \quad \text{and} \quad \sigma_P^*(\hat{\pi}, \hat{\tau}, \hat{\pi}, \hat{\tau}) \geq \frac{\beta/\alpha p - \hat{\pi}}{1 - \hat{\pi}} \equiv \bar{\sigma}(\hat{\pi}). \quad (\text{A.2})$$

Notice that in (A.2), $\bar{\sigma}(\hat{\pi}) > 0$. Therefore, (A.2) is satisfied if and only if $\hat{\pi} < \beta/\alpha p$ and

$$f\beta \leq \hat{\tau}p\mathcal{R}(\hat{\pi}, \hat{\tau} \mid \bar{\sigma}(\hat{\pi})),$$

which follows from Lemma 1 and Lemma A.1. A dishonest candidate then behaves according to Lemma 2. \square

Proof of Proposition 2. Part 1: This follows immediately from Proposition 1 and Definitions 2 and 3.

Part 2: Suppose (π^*, τ^*) such that either

$$\tau^*p\mathcal{R}(\pi^*, \tau^* \mid \bar{\sigma}_P(\pi^*)) \geq f\beta \quad \text{or} \quad \pi^* \geq \beta/\alpha p. \quad (\text{A.3})$$

We begin by proving the forward direction. In addition to (A.3), suppose that $\Sigma^*(\pi^*, \tau^*, \pi, \tau)$ is a cultural equilibrium. By Proposition 1, the voter chooses candidate A . Therefore, applying Definition 2, it must be that $\tau^* = \tau$ and $S(\pi^*, \tau^*, \pi^*, \tau^*) = S(\pi^*, \tau^*, \pi, \tau)$, i.e.,

$$\sigma_P^*(\pi^*, \tau^*, \pi, \tau) = 1 - \frac{1 - \pi^*}{1 - \pi} (1 - \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)) \quad (\text{A.4})$$

and the success rate is given by (6). If $\tau^*p\mathcal{R}(\pi^*, \tau^* \mid 0) \geq f\beta$, then, by Lemma 1, the voter's political culture and expectation of the dishonest candidate's strategy are such that $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) = \sigma' \in [0, 1)$ with $\tau^*p\mathcal{R}(\pi^*, \tau^* \mid \sigma') = f\beta$. However, because $\tau^* = \tau$, this implies that the dishonest candidate is indifferent between trying and not trying (Lemma 2)—any strategy $\sigma_P^*(\pi^*, \tau^*, \pi, \tau) \in [0, 1]$ is sequentially rational strategy for the

dishonest candidate. However, for the cultural equilibrium to be sustained, (A.4) must be contained in $[0, 1]$. Because $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) \in [0, 1]$, it is immediate that (A.4) is no larger than 1. (A.4) is no smaller than 0 if and only if

$$\pi \leq \pi^* + (1 - \pi^*) \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*),$$

as required.

If instead $\tau^* p\mathcal{R}(\pi^*, \tau^* | 0) < f\beta$, then, by Lemma 1, the voter's political culture and expectation of the dishonest candidate's strategy are such that $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) = 0$. However, because $\tau^* = \tau$, this implies that the dishonest candidate strictly prefers not to try (Lemma 2); that is, $\sigma_P^*(\pi^*, \tau^*, \pi, \tau) = 0$ is the only sequentially rational strategy for the dishonest candidate. Rearranging (A.4) implies $\pi^* = \pi$.

We now prove the backward direction. In addition to (A.3), suppose $\tau^* = \tau$ and the true quality of the political class satisfies (a) or (b). By (A.3) and Proposition 1, the voter chooses candidate A. Now if (a) holds, then

$$\tau^* p\mathcal{R}(\pi^*, \tau^* | 0) \geq f\beta \quad \text{and} \quad \pi \leq \pi^* + (1 - \pi^*) \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*).$$

By Lemma 1, the first inequality implies that the voter's political culture and expectation of the dishonest candidate's strategy are such that $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) = \sigma' \in [0, 1]$ with $\tau^* p\mathcal{R}(\pi^*, \tau^* | \sigma') = f\beta$. Because $\tau^* = \tau$, this also implies that the dishonest candidate is indifferent between trying and not trying (Lemma 2)—any strategy $\sigma_P^*(\pi^*, \tau^*, \pi, \tau) \in [0, 1]$ is sequentially rational strategy for the dishonest candidate. Therefore, setting $\sigma_P^*(\pi^*, \tau^*, \pi, \tau)$ equal to (5) is sequentially rational for the dishonest candidate and feasible so long as (5) is contained in $[0, 1]$, which is true because of the second inequality in (a). This also ensures that $S(\pi^*, \tau^*, \pi^*, \tau^*) = S(\pi^*, \tau^*, \pi, \tau)$, and we have a cultural equilibrium.

If instead (b) holds, then

$$\tau^* p\mathcal{R}(\pi^*, \tau^* | 0) < f\beta \quad \text{and} \quad \pi^* = \pi.$$

The first inequality implies that, by Lemma 1, the voter expects $\sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*) = 0$ and, since $\tau^* = \tau$, the dishonest candidate strictly prefers to not try (Lemma 2); therefore, $\sigma_P^*(\pi^*, \tau^*, \pi, \tau) = 0 = \sigma_P^*(\pi^*, \tau^*, \pi^*, \tau^*)$. Since the voter's political culture is correct, $(\pi^*, \tau^*) = (\pi, \tau)$, it is then immediate that a cultural equilibrium exists that satisfies the conditions described in the proposition. \square

B Additional tables and robustness checks

Table B.1: Summary statistics.

| Variable | (1) N | (2) Mean | (3) SD | (4) Min | (5) Max |
|-------------------------------------|----------|-------------|-----------|------------|------------|
| Trust politicians | 2,981 | 2.10 | 1.02 | 1 | 5 |
| Government Self-interested | 2,981 | 4.16 | 0.94 | 1 | 5 |
| Accountability Office good | 2,980 | 2.37 | 1.11 | 1 | 5 |
| Media helps | 2,980 | 2.67 | 1.32 | 1 | 5 |
| Pre-Treat support: Transport | 2,831 | 3.67 | 1.17 | 1 | 5 |
| Pre-Treat support: Local industries | 2,774 | 3.59 | 1.13 | 1 | 5 |
| Pre-Treat support: Peace in M.E. | 2,775 | 3.68 | 1.07 | 1 | 5 |
| Pre-Treat support: Women's rights | 2,819 | 3.75 | 1.23 | 1 | 5 |
| Treatment | 3,006 | 0.40 | 0.71 | -1 | 1 |
| Corruption beliefs | 2,986 | 56.05 | 24.72 | 0 | 100 |
| Male | 3,006 | 0.44 | 0.50 | 0 | 1 |
| White | 3,006 | 0.76 | 0.43 | 0 | 1 |
| Black | 3,006 | 0.10 | 0.29 | 0 | 1 |
| Hispanic | 3,006 | 0.06 | 0.23 | 0 | 1 |
| Other Race | 3,006 | 0.03 | 0.18 | 0 | 1 |
| Unemployed | 3,006 | 0.05 | 0.22 | 0 | 1 |
| College | 3,006 | 0.29 | 0.45 | 0 | 1 |
| Some college | 3,006 | 0.22 | 0.41 | 0 | 1 |
| Less than College | 3,006 | 0.30 | 0.46 | 0 | 1 |
| Income < 35,000 | 3,006 | 0.23 | 0.42 | 0 | 1 |
| Income 35-65,000 | 3,006 | 0.26 | 0.44 | 0 | 1 |
| Income 65-120,000 | 3,006 | 0.30 | 0.46 | 0 | 1 |
| Income 120-200,000 | 3,006 | 0.15 | 0.36 | 0 | 1 |
| Income > 200,000 | 3,006 | 0.02 | 0.15 | 0 | 1 |
| Married | 3,006 | 0.52 | 0.50 | 0 | 1 |

Table B.2: Testing for random assignment of treatment.

| | Untreated | Treated | Difference |
|-------------------------------------|------------------|------------------|-----------------|
| | Mean (SD) | Mean (SD) | Coeff. (SE) |
| Corruption beliefs | 55.97 (24.23) | 56.10 (24.98) | 0.13 (0.95) |
| Pre-Treat support: Transport | 3.69 (1.18) | 3.67 (1.16) | -0.03 (0.05) |
| Pre-Treat support: Local industries | 3.63 (1.11) | 3.57 (1.13) | -0.06 (0.04) |
| Pre-Treat support: Peace in M.E. | 3.66 (1.07) | 3.69 (1.07) | 0.03 (0.04) |
| Pre-Treat support: Women's rights | 3.75 (1.23) | 3.75 (1.23) | 0.00 (0.05) |
| Male | 0.44 (0.50) | 0.43 (0.50) | -0.01 (0.02) |
| White | 0.77 (0.42) | 0.76 (0.43) | 0.00 (0.02) |
| Black | 0.09 (0.29) | 0.10 (0.29) | 0.00 (0.01) |
| Hispanic | 0.06 (0.23) | 0.06 (0.23) | 0.00 (0.01) |
| Other Race/Ethnicity | 0.03 (0.17) | 0.03 (0.18) | 0.00 (0.01) |
| Unemployed | 0.05 (0.23) | 0.05 (0.22) | 0.00 (0.01) |
| Education: College degree | 0.30 (0.46) | 0.29 (0.45) | -0.01 (0.02) |
| Education: Some college | 0.21 (0.41) | 0.22 (0.42) | 0.01 (0.02) |
| Education: Less than college | 0.31 (0.46) | 0.30 (0.46) | -0.01 (0.02) |
| Income: < 35,000 | 0.24 (0.42) | 0.23 (0.42) | -0.01 (0.02) |
| Income: 35-65,000 | 0.25 (0.44) | 0.26 (0.44) | 0.01 (0.02) |
| Income: 65-120,000 | 0.29 (0.45) | 0.30 (0.46) | 0.01 (0.02) |
| Income: 120-250,000 | 0.16 (0.36) | 0.15 (0.36) | -0.01 (0.01) |
| Income: > 250,000 | 0.02 (0.14) | 0.02 (0.15) | 0.00 (0.01) |
| Married | 0.52 (0.50) | 0.52 (0.50) | 0.01 (0.02) |

Table B.3: Replica Table 1 without controls.

| VARIABLES | (1) Trust politicians | (2) Government self-interested | (3) Accountability Office good | (4) Media helps |
|-------------------|-----------------------------|--------------------------------------|--------------------------------------|-----------------------|
| Treatment | 0.120*** (0.030) | -0.180*** (0.028) | 0.231*** (0.032) | 0.037 (0.039) |
| Corruption belief | -0.013*** (0.001) | 0.011*** (0.001) | -0.012*** (0.001) | -0.010*** (0.001) |
| Observations | 2,981 | 2,981 | 2,980 | 2,980 |
| R-squared | 0.083 | 0.058 | 0.052 | 0.030 |
| Controls | No | No | No | No |
| Mean | 2.105 | 4.157 | 2.373 | 2.666 |

Notes: OLS estimates of (7). The dependent variables in Columns (1)–(4) are responses to post-treatment beliefs (Section 3.1): Trust politicians, Government self-interested, Accountability Office good, Media helps. The main independent variable is Treatment. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table B.4: Replica Table 2 without controls.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women’s Rights |
|-------------------|----------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.007 (0.030) | 0.047 (0.031) | 0.068** (0.031) | 0.063* (0.033) |
| Corruption belief | -0.003*** (0.001) | -0.005*** (0.001) | -0.003*** (0.001) | -0.003*** (0.001) |
| Pre-Treat support | 0.352*** (0.019) | 0.341*** (0.020) | 0.377*** (0.020) | 0.369*** (0.018) |
| Observations | 2,702 | 2,639 | 2,609 | 2,648 |
| R-squared | 0.159 | 0.144 | 0.151 | 0.168 |
| Controls | No | No | No | No |
| Mean | 3.478 | 3.460 | 3.273 | 3.315 |

Notes: OLS estimates of Equation (8). The dependent variables in Columns (1)–(4) are agreement with statement: “A politician who SAYS they want to carry out this policy would actually TRY to” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table B.5: Replica Table 3 without controls.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women's Rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.022 (0.035) | 0.038 (0.035) | 0.095*** (0.037) | 0.099*** (0.037) |
| Corruption belief | -0.002** (0.001) | -0.001 (0.001) | -0.002* (0.001) | -0.000 (0.001) |
| Pre-Treat support | 0.327*** (0.020) | 0.368*** (0.021) | 0.277*** (0.023) | 0.363*** (0.019) |
| Observations | 2,647 | 2,585 | 2,586 | 2,607 |
| R-squared | 0.112 | 0.126 | 0.066 | 0.135 |
| Controls | No | No | No | No |
| Mean | 3.209 | 3.155 | 2.998 | 3.062 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “It would be easy for me to obtain timely information (including from media and other sources) on the progress of this policy” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table B.6: Replica Table 4 without controls.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women's Rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.012 (0.024) | 0.001 (0.024) | -0.023 (0.025) | 0.014 (0.024) |
| Corruption belief | -0.001 (0.001) | 0.000 (0.001) | -0.001 (0.001) | -0.000 (0.001) |
| Pre-Treat support | 0.783*** (0.013) | 0.750*** (0.015) | 0.728*** (0.016) | 0.776*** (0.014) |
| Observations | 2,716 | 2,648 | 2,641 | 2,680 |
| R-squared | 0.601 | 0.557 | 0.507 | 0.616 |
| Controls | No | No | No | No |
| Mean | 3.671 | 3.652 | 3.698 | 3.706 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “I would LIKE this policy to be carried out.” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table B.7: Replica Table 5 without controls.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women's Rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.033 (0.033) | 0.053 (0.032) | 0.030 (0.037) | 0.059 (0.036) |
| Corruption belief | -0.000 (0.001) | -0.001 (0.001) | 0.004*** (0.001) | 0.003** (0.001) |
| Pre-Treat support | 0.324*** (0.020) | 0.340*** (0.020) | 0.349*** (0.022) | 0.359*** (0.018) |
| Observations | 2,690 | 2,621 | 2,614 | 2,649 |
| R-squared | 0.114 | 0.126 | 0.100 | 0.138 |
| Controls | No | No | No | No |
| Mean | 3.162 | 3.185 | 2.750 | 2.956 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “A politician who TRIES to carry out this policy would be ABLE to” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table B.8: Replica Table 6 without controls.

| VARIABLES | (1) Transport | (2) Local Industries | (3) Peace in M.E. | (4) Women's Rights |
|-------------------|---------------------|-------------------------|----------------------|-----------------------|
| Treatment | 0.015 (0.027) | 0.011 (0.027) | 0.020 (0.027) | 0.018 (0.027) |
| Corruption belief | -0.002** (0.001) | -0.001* (0.001) | -0.002** (0.001) | -0.001* (0.001) |
| Pre-Treat support | 0.623*** (0.016) | 0.612*** (0.016) | 0.590*** (0.017) | 0.659*** (0.014) |
| Observations | 2,672 | 2,612 | 2,599 | 2,654 |
| R-squared | 0.430 | 0.409 | 0.376 | 0.482 |
| Controls | No | No | No | No |
| Mean | 3.522 | 3.515 | 3.488 | 3.494 |

Notes: OLS estimates of (8). The dependent variables in Columns (1)–(4) are agreement with statement: “I would support a politician who says they want to carry out this policy” on a 1 to 5 scale for policies: Transport, Local industries, Peace in Middle East, and Women’s rights. The main independent variable is Treatment. All variables are defined in Section 3.1. Robust standard errors in parenthesis. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.