IDENTITY, BELIEFS, AND POLITICAL CONFLICT*

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We present a theory of identity politics that builds on two ideas. First, when policy conflict renders a certain social divide—economic or cultural—salient, a voter identifies with her economic or cultural group. Second, the voter slants her beliefs towards the stereotype of the group she identifies with. We obtain three implications. First, voters' beliefs are polarized along the distinctive features of salient groups. Second, if the salience of cultural policies increases, cultural conflict rises, redistributive conflict falls, and polarization becomes more correlated across issues. Third, economic shocks hurting conservative voters may trigger a switch to cultural identity, causing these voters to demand less redistribution. We discuss U.S. survey evidence in light of these implications.

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I. Introduction

In the last decade, the political systems of the US and of other advanced democracies have undergone a momentous change. Economic conflict over redistribution has weakened, while conflict over cultural issues such as immigration, race, and abortion has strengthened. Consider Figure I, constructed using data from the American National Election Surveys (ANES). We create an index of the demand for redistribution as the first principal component of two questions on public spending. We construct an index of the demand for progressive cultural policies from opinions on immigration, race relations, and abortion. To control for shifting party positions, we estimate the residuals of both variables after conditioning on the respondent's party affiliation, interacted with wave fixed effects. Results are similar in the raw data, and when considering political independents only (see the Online Appendix). Panel A reports the variance of these variables between 1996 and 2016. After 2008, disagreement over cultural policies has sharply increased, while disagreement over redistribution has, if anything, declined.

Figure I

Panel B shows that something else has changed: preferences over redistribution have become more correlated with those on cultural policy. In 2008, a progressive cultural outlook was positively correlated with more support for redistribution, but this connection more than doubled in 2016. Wu (2020) documents similar patterns using a large dataset on US college freshmen.

These trends cannot be explained by better sorting of extremists into parties (e.g. Klein 2020). Rather, they indicate population-wide changes in voter demands: cultural conflict has intensified and has become more correlated with conflict on redistribution. Another driver of increasing polarization may be growing partisan divisions and hatred (e.g. Gentzkow 2016). This mechanism likely plays a role, but it cannot easily explain why redistributive conflict—a historically partisan issue—has not itself become more intense and why these changes are also

observed among political independents. Why have cultural divisions increased? Why has redistributive conflict not risen despite growing income inequality?

This paper shows that these questions can be fruitfully addressed by studying how social identities influence voters' behavior. The basic idea is that when voters abandon their class identity and redefine themselves in terms of their moral or religious values, the latter become more important to explain their beliefs in several domains. Based on social psychology (Tajfel and Turner 1979; Turner et al. 1987), we build a model of this phenomenon resting on two pillars.

First, voters can identify with their income group, upper vs. lower class, or with their cultural group, social progressives vs. conservatives. At any point in time, voters identify with the groups that are most salient, formalized as those having the strongest policy conflict. When class conflict is stronger, voters identify with their class. When cultural conflict is stronger, they identify with their cultural group.

Second, identity causes voters to slant their beliefs towards the stereotypical views of their group. In psychology, this phenomenon is called belief polarization (Mackie 1986). It occurs because voters overweight the distinctive opinions of group members, or those of group-linked experts and media. Kahan (2015) shows that cultural identities polarize risk perceptions about environmental issues, abortion, and gun control. We formalize group-stereotyped beliefs by adapting the model in Bordalo et al. (2016), and then study its implications for politics.

Our setup features two policy instruments: a distortionary income tax financing a public good and a "cultural policy" that we interpret as civil rights or control of immigration. A voter is described by two traits: expected future income and cultural progressiveness. Richer voters desire a lower tax, due to their higher tax burden. More progressive voters want a more liberal cultural policy and also a higher tax, because they like the public good more. Culture reflects deep-seated values such as moral universalism or religiosity, which shape beliefs across different domains (Haidt 2012; Enke, Rodriguez-Padilla, and Zimmerman 2020). Based on her personal traits, a voter belongs to an income class, upper or lower, and to a cultural group,

progressive or conservative, and she can identify with either.

We obtain three main insights. First, identity creates belief distortions that polarize ingroup-outgroup conflict along the currently salient dimension. Under class identity, lower-class voters are too pessimistic about their future income, and vice-versa for upper-class voters. These belief distortions boost redistributive conflict. Under cultural identity, progressive voters become even more progressive, and vice-versa for conservatives. This boosts cultural conflict. Perceived polarization is also larger than with rational voters: society is divided into "us vs. them". Thus, identity can shed light on belief distortions in politics and predicts that beliefs are shaped by the changing salience of cultural, economic, or political groups (Alesina, Stantcheva, and Miano 2018; Alesina, Stantcheva, and Teso 2018; Kahan 2015; Westfall et al. 2015).

Second, if the welfare relevance of cultural policy increases, due for instance to a large inflow of immigrants, identity switches from class to culture. As this happens, culture becomes a stronger driver of policy views. In line with Figure I, then, views over cultural policy become: (i) more polarized, and (ii) more correlated with views over redistribution. Critically, by obfuscating class differences, cultural identity also dampens redistributive conflict. This can explain why the latter is stable or declining after 2008 despite growing income inequality. Using ANES data, we show that—consistent with our theory—disagreement between upper-and lower-class voters on redistribution has sharply declined over the last two decades.

Third, economic shocks that boost conflict among cultural groups can also trigger a shift to cultural identity. We offer two examples: skill-biased technical change and globalization. If these shocks hurt less educated and hence more conservative voters, and benefit more educated and hence more progressive voters, they make cultural cleavages more salient and can induce a switch to cultural identity. As a result, economic losers become more socially and fiscally conservative. This is consistent with the evidence in Autor et al. (2020) and Colantone and Stanig (2017), who show that losses from international trade foster support for right-wing parties.

We relate to recent work on the influence of moral universalism and fairness on policy preferences (Enke, Rodriguez-Padilla, and Zimmerman 2020; Stantcheva 2021). In our paper, the importance of cultural factors is time varying. Norris and Inglehart (2019) stress the growing importance of cultural divisions. Frank (2004) vividly describes the "cultural backlash" in Kansas, a state that was Democratic in the past and then became culturally and fiscally conservative. Relative to this work, we show that the cultural divide can be amplified by specific economic shocks due to trade or technology. We also connect to recent research explaining the rise of populism as a reaction to economic distress (Guriev and Papaioannou 2020).

Murphy and Shleifer (2004), Glaeser (2005), and Wu (2020) explain changing voter beliefs based on political supply. Politicians attract voters by catering to their cultural views, and persuade them on issues they are less focused on, such as redistribution. One challenge for this approach is to explain why persuasion should work with economic losers. Our model offers a rationale: specific economic shocks have made cultural identity more salient. More broadly, cultural conflict has become more important relative to redistribution in several countries with different party systems, but subject to similar globalization and technology trends (Goodhart 2017; Evans and Mellon 2016; Guriev and Papaioannou 2020). This phenomenon points to a role of demand factors.

We also contribute to a growing literature on identity in economics. Akerlof and Kranton (2000) develop the first economic model where identity changes the payoffs of certain actions. They do not consider beliefs. The seminal paper by Shayo (2009) introduces identity in political economy. Grossman and Helpman (2021) study how views over trade policy are affected by social identities. In these papers, voters obtain utility from the welfare of their group – which affects their policy demands – and identify either with their narrow class or the broader nation. In our model identity affects beliefs, which allows us to relate to the evidence on voters' misperceptions (Flynn, Nyhan, and Reifler 2017; Achen and Bartels 2016; Johnston, Lavine, and Federico 2017; Stantcheva 2021). In addition, the groups we consider—class- and

culture-based—are heterogeneous. Thus, identity switches do not cause social integration or disintegration, but rather a realignment of voters into different social partitions.¹

A tradition in political science, started by Key (1955), studies electoral realignments (e.g., Sundquist 1983; Mayhew 2004). This work focuses on the US and seeks to explain lasting changes in party positions and in the composition of party supporters. We endogenize these realignments, abstracting from parties and their leaders.

The paper proceeds as follows. Section III discusses the social psychology of identity and presents our model of beliefs. Section III studies the causes of identity switches, how they affect beliefs and equilibrium policy. Section IV derives testable predictions on changes in policy preferences. Section V illustrates the mechanism of our theory using US survey data and assesses alternative explanations for the same facts. Section VI concludes. The Online Appendix contains mathematical proofs and details of the data analysis.

II. THE SOCIAL PSYCHOLOGY OF IDENTITY AND STEREOTYPES

The "Social Identity Perspective", the leading theory of identity and intergroup relations, combines Social Identity Theory (SIT, Tajfel and Tuner, 1979), and Self Categorization Theory (SCT, Turner et al. 1987; Hogg and Abrams 1988). We discuss the psychology of identity, its connection to beliefs, and our formalization of belief distortions.

II.A. Identity Formation

According to SCT, identity is a form of self-categorization, that leads people to perceive society through the lens of a group they belong to. Each person belongs to many groups: income class, religion, nation, etc., but he/she does not necessarily identify with all of them at the same time. Identity in fact depends on which social partition is salient (e.g., Hogg and Abrams 1988). For instance, at a football match one's own team is the salient group:

¹Bénabou and Tirole (2016) offer a different approach in which identity reflects beliefs about oneself, and beliefs adjust to improve self-image and own welfare, taking anticipatory utility into account.

it captures the cleavage of that moment, so it affects individual behavior more than other groups do. When participating in a union strike, though, the same person may identify with the lower class, and assimilate his/her behavior to it. In these examples identities are flighty, but political and social identities can be highly persistent when conflict-creating shocks are long lasting, or due to persistent messaging by politicians and the media.

Which cleavage is salient depends on the so called "meta contrast ratio." A person identifies with a group of people who are: (i) similar to him/her, but also and crucially (ii) highly dissimilar from, or in conflict with, the outgroup (Oakes 1987). For instance, at a football match, the group of "team supporters" is more salient than that of "football lovers" because it reflects the cleavage of the moment. Similarly, during a strike the "lower class" is more salient than the broader group of "economic producers."

This idea naturally applies to politics. A shock, like a police officer killing a black person, renders a social partition salient, in this case that between those who believe that racial discrimination is significant and those who believe that the law has been enforced. Many people identify as members of either group. How does this affect beliefs and behavior?

II.B. Stereotyped Beliefs and Depersonalization

According to SIT and SCT, identity causes perceptions of self and others to be tainted by group features (see also Sherif 1936; Festinger 1950). Experiments on groups of objects by Tajfel and Wilkes (1963) and subsequent work in social settings (Haslam and Turner 1992) show that this occurs via two effects.

First, people stereotype groups by exaggerating differences between ingroups and outgroups. In the previous example, those who believe that the police are biased against minorities stereotype the other group as "racist", while the skeptics stereotype the others as "radicals." Society is divided into "us vs. them." Second, identity causes the individual to "depersonalize", namely to move her beliefs closer to the stereotypical group member. McGarty et al. (1992) define the stereotype as the group's most representative type: "...the less a

person differs from ingroup members and the more he or she differs from outgroup members, the more representative he or she is of the ingroup." The stereotype is not necessarily the modal or average group trait, it must be distinctive relative to the outgroup. Thus, depersonalization creates the phenomenon of "group polarization", whereby group members hold a more extreme position on an issue than their individually expressed positions (e.g., Mackie 1986). In the example of the police officer, even moderate people slant their beliefs towards either left-wing radicalism or racism, at least to some extent, enhancing conflict.

Experiments using the "minimal group paradigm" found that even arbitrary groups affect individual behavior when they are made salient (Tajfel et al. 1971). SIT holds that, beyond affecting beliefs, identity can also yield positive self-esteem if one identifies with a high-status group. Some experiments document ingroup favoritism, which can be viewed as enhancing group status. Existing political economy models of identity are centrally built on this ingredient (e.g., Shayo 2009). To highlight the new implications of our mechanism, we abstract from this effect. Status cannot be the sole driver of identity, because individuals often identify with underdog groups.²

II.C. Formalizing Distorted Beliefs

We depart from a standard political economy setup because voters' beliefs and political preferences are malleable, and change based on the salient social identity. To see how this works, consider a voter evaluating a particular policy, such as opening to immigration or extending civil rights. The voter has a database of information in her memory, captured by the pdf $z\left(\tilde{\psi}\left|\psi\right.\right)$, where ψ denotes the mean of $\tilde{\psi}$ for that particular voter. A specific value $\tilde{\psi}$ captures an outcome associated with the policy (e.g. how many crimes are committed by immigrants or benefits of diversity), or a certain value judgment (e.g. altruistic attitudes towards domestics or also foreigners). High values of $\tilde{\psi}$ favor a progressive policy, low values favor a conservative

²There is debate on whether it is always the case that group identity leads to ingroup bias (e.g., Hinkle and Brown 1990). Ingroup bias tends to arise when discrimination is a group norm but not otherwise. A belief-based mechanism like ours can arguably generate such effect.

policy. Parameter ψ reflects the voter's core beliefs, namely her summary assessment of the pros and cons of the policy. Voters with higher ψ are more progressive.

There is a cdf $H(\psi)$ of voters, who are partitioned into two groups: the social conservatives, who have $\psi < \widehat{\psi}$, and the social progressives, with $\psi > \widehat{\psi}$. The threshold $\widehat{\psi}$ is historically given. A voter identifies herself with one or the other group, depending on her type. Here we take group identity as given. We endogenize it in Section III.

In standard political economy models, where voters are rational, the voter aggregates all the information and evaluates the policy at ψ . In our model, instead, the voter's identity cues her to retrieve facts or values that are stereotypical of her own group, downplaying the rest.

We formalize this process following Bordalo et al. (2016, BCGS henceforth): a person identified with group G overweights the trait that is relatively more frequent in this group compared to outgroup \overline{G} .³ As in McGarty et al. (1992), the stereotype is distinctive of the group, but not necessarily frequent.

Denote by $z^{\theta}\left(\tilde{\psi}|\psi,G\right)$ the distorted beliefs of a voter of type ψ when she identifies with group G. Following BCGS (2016), this is given by:

$$z^{\theta} \left(\tilde{\psi} | \psi, G \right) \propto z \left(\tilde{\psi} | \psi \right) \left[\frac{z^{\theta} \left(\tilde{\psi} | \overline{\psi}_{G}, G \right)}{z^{\theta} \left(\tilde{\psi} | \overline{\psi}_{\overline{G}}, \overline{G} \right)} \right]^{\chi}, \tag{1}$$

where $\overline{\psi}_G \equiv \mathbb{E}\left[\psi|G\right]$ is the core belief of the average member of G. The likelihood ratio in Equation (1) captures the overweighting of facts or opinions $\tilde{\psi}$ that are more frequently held by the average member of group G compared to \overline{G} . Parameter $\chi \geq 0$ captures the degree of overweighting.⁴

³This model accounts for observed belief distortions in social domains, as shown by BCGS (2016), but also for beliefs in macro and finance (Gennaioli and Shleifer 2018). Closer to the current setting, BCGS (2019) show that gender stereotypes influence self-confidence. When assessing own ability, people are too optimistic/pessimistic in domains of knowledge where their gender has a competitive advantage/disadvantage.

⁴In the BCGS model the likelihood ratio is defined using the distributions of $\widetilde{\psi}$ in groups G and \overline{G} . To obtain these, one should aggregate a family of individual distributions $z^{\theta}\left(\widetilde{\psi}|\psi,G\right)$, which is intractable. To simplify, we capture each group using the belief distribution for its average type. This assumption preserves the idea that stereotypes magnify average group differences, and yields convenient closed form solutions.

Relative to BCGS (2016), Equation (1) makes two innovations. First, the stereotypical opinions of social groups also affect a voter's beliefs about the world, not just her beliefs about others. Thus, group beliefs emerge as a fixed point: the beliefs about the world of average group members are distorted by the stereotypical opinions of groups; group stereotypes, in turn, reflect the distorted beliefs of group members. Second, the group G through which social reality is perceived depends on identity, which we make endogenous in the next section.

The fixed point problem that jointly determines the beliefs of average groups members and group stereotypes proves tractable if $z\left(\tilde{\psi}\left|\psi\right.\right)$ is Gaussian.

PROPOSITION 1. If $\chi < \frac{1}{2}$ the fixed point for average group beliefs exists, it is unique and stable. Let $\theta \equiv \frac{\chi}{1-2\chi} > 0$. Identification with group G distorts the beliefs of voter ψ as follows:

$$\psi_G^{\theta} = \psi + \theta \left(\overline{\psi}_G - \overline{\psi}_{\overline{G}} \right). \tag{2}$$

If $\theta = 0$, beliefs are rational and identity plays no role. If $\theta > 0$, identity distorts beliefs away from their core ψ . Identification with the conservatives cues the voter to think about the risks of progressive policies, so she becomes even more conservative. Identification with the progressives cues her to think about the benefits of progressive policies, so she becomes even more progressive.

Equation (2) is consistent with the evidence in Kahan (2015), showing that people with different religious or political orientations exhibit sharp factual disagreement over natural selection and climate change, even if they are knowledgeable about science. He proposes a theory of "identity protective cognition", whereby individuals appraise information in a way that buttresses beliefs associated with their ingroup.

Beliefs can also be distorted by identification with political parties. In this case, party positions cue partisan voters to retrieve party stereotypes. Our model is not inconsistent with this possibility, but here we focus on social groups. This can explain political realignments

that weaken preexisting party affiliations and that also occur for nonpartisan voters.

Equation (2) also sheds light on priming effects. A long-standing tradition in studies of mass opinion holds that individual beliefs change when a political or socioeconomic group is primed (Zaller 1992; Janky 2018; Han and Wackman 2017). Equation (2) disciplines these effects: if priming works through identity, it distorts beliefs in the direction of observed disagreement between ingroups and outgroups $(\overline{\psi}_G^{\theta} - \overline{\psi}_{\overline{G}}^{\theta})$. Priming effects are then predictably heterogeneous because they cue voters to focus on the different groups to which they belong.

These priming effects are different from learning, whereby a voter combines information with prior beliefs. When the voter is primed, she is not provided with new information, but recalls factual and value considerations associated with the primed group. In particular, as we show in the next section, when the voter is primed with a new social identity, she changes her beliefs in the direction of overweighting the distinctive ingroup traits.

Recent research documents pervasive voter misperceptions. Relative to right-wing respondents, left-wing respondents perceive lower social mobility (Alesina, Stantcheva, and Teso 2018), larger inequality (Gimpelson and Treisman 2018), a lower number of immigrants (Grigorieff, Roth, and Ubfal 2020), and perceive immigrants as having worse features than natives (Alesina, Stantcheva, and Miano 2018). Future work may study whether these misperceptions are determined by, and change with, prevailing social or political identities.

One key implication of Equation (2) concerns group polarization.

COROLLARY 1. When all voters identify with groups G and \overline{G} , disagreement among average

⁵Equation (2) can in fact be rewritten as $\psi_G^{\theta} = \psi + \left(\frac{\theta}{1+\theta}\right) \left(\overline{\psi}_G^{\theta} - \overline{\psi}_{\overline{G}}^{\theta}\right)$.

⁶In Alesina, Stantcheva, and Miano (2018), demand for redistribution increases when subjects are provided with pessimistic information about mobility, but this effect is only present for left-wing respondents. Kuziemko et al. (2015) shows that informing poor people about their income rank in society increases their demand for inheritance taxes. These findings are consistent with Equation (2) if one views the treatment as priming class identity.

group members is amplified relative to disagreement in rational beliefs. Formally,

$$\overline{\psi}_G^{\theta} - \overline{\psi}_{\overline{G}}^{\theta} = \left(\overline{\psi}_G - \overline{\psi}_{\overline{G}}\right)(1+2\theta) \geq \overline{\psi}_G - \overline{\psi}_{\overline{G}}.$$

Identity boosts polarization by activating stereotypes. When we endogenize identity, this result proves important to account for growing cultural conflict in Figure I. We assume the selective recall parameter θ to be exogenous. But if political leaders or social media disseminate stereotypes, these more readily come to mind— θ increases—causing more polarization.

Our model also implies that perceived polarization is greater than actual polarization. Consider the beliefs held in society about the distorted beliefs $z^{\theta}\left(\tilde{\psi} \mid \overline{\psi}_{G}, G\right)$ of the average member of G, namely the second-order beliefs about $\overline{\psi}_{G}$. Due to stereotypes, group-distinctive traits are overweighted as in (1), yielding the result below.

COROLLARY 2. Denote by $\widehat{\psi}_G^{\theta}$ and $\widehat{\psi}_{\overline{G}}^{\theta}$ the perceived mean positions of the average group members. Group stereotypes imply:

$$\widehat{\psi}_{G}^{\theta} - \widehat{\psi}_{\overline{G}}^{\theta} = \left(\overline{\psi}_{G}^{\theta} - \overline{\psi}_{\overline{G}}^{\theta}\right) \left(\frac{1 + 4\theta}{1 + 2\theta}\right) \ge \overline{\psi}_{G}^{\theta} - \overline{\psi}_{\overline{G}}^{\theta}.$$

When thinking about the progressives, people overweight their stereotypical members, who are very progressive. When thinking about the conservatives, their stereotypical extreme members are overweighted. Hence, perceived disagreement exceeds actual disagreement. This effect is not due to identity per se: even if a voter is not identified with any social group, she will have an exaggerated perception of polarization if she is subject to stereotypical thinking.

There is a large literature measuring perceived and affective polarization among US parties. Westfall et al. (2015) and BCGS (2016) show that US voters exaggerate differences in the policy views of Democrats and Republicans. These exaggerations are held by all voters, including the non politically affiliated ones, which is consistent with Corollary 2. Bordalo,

Tabellini, and Yang (2020) offer intriguing new evidence: the gap between perceived and actual polarization is especially large in those policy issues that are more salient and in which there is more actual disagreement. This is a direct implication of our model when identity is endogenized.

Gentzkow (2016) shows that in the US perceived polarization and distrust of political rivals has increased more than actual divergence in policy views. As we show in Proposition 4, our model can account for this effect as the result of a shift from economic to cultural identity. Ahler (2018) shows that correcting misperceptions about the out-party also reduces affective polarization. Druckman and Levendusky (2019) show that affective polarization is boosted by retrieval of extreme party stereotypes, again consistent with our model.

In the current example, identity distorts beliefs and value judgments regarding the general effects of a policy, say immigration. Identity can also distort a voter's perception of her own situation, such as her income rank in society or exposure to foreign competition. When forming beliefs about these aspects, the voter overweights the facts or opinions that are more frequently held in her group compared to the outgroup, as in Equation (1). A voter identifying with the losers from trade retrieves examples of workers similar to her who lost their job due to foreign competition, increasing her demand for trade protection. Similarly, a voter identified with the lower class retrieves her group's distinctive beliefs of economic backwardness, so she becomes too pessimistic about her future income. Consistent with this view, Stantcheva (2021) shows that US Republicans (Democrats) overestimate (underestimate) their income rank in society. Of course, misperceptions of own economic status may also be due to other factors. For instance, Cruces, Perez-Truglia, and Tetaz (2013) document that Buenos Aires residents misperceive their current income on the basis of local conditions. Voters from rich neighborhoods underestimate their income rank relative to voters from poor neighborhoods, as if each voter uses the local income distribution as a reference. Our point is that when class conflict becomes salient, many individuals identify with their class, so class-based misperceptions become prevalent.

III. IDENTITY AND POLITICAL CONFLICT

We study a simple model of conflict over redistribution and cultural policy, in which voters can identify with their economic class or cultural group. We show that if cultural conflict becomes more salient, where salience is formalized in a precise way, voters switch from class to cultural identity and their beliefs change accordingly. This, in turn, changes equilibrium policies.

III.A. The Model

There are two policies. The first is a proportional income tax $\tau \geq 0$ that finances a public good. It entails quadratic distortions, $-\frac{\varphi}{2}\tau^2$, $\varphi > 0$, that reduce aggregate income. The second is cultural policy q. It captures domains mainly based on values, rather than on material interests, such as abortion, civil rights, race relations and immigration. Larger q indicates a more liberal stance (e.g., more extensive civil rights or immigration). Our conclusions also hold if we allow preferences over immigration to depend on income, provided the dependence is weaker than that on culture, consistent with the evidence in Card, Dustmann, and Ian (2012).

There is a set of measure one of voters who differ in their expected relative income, ε , and their cultural traits, ψ . A voter type is summarized by vector (ψ, ε) , which is distributed in society according to the normal cdf $H(\psi, \varepsilon)$, with mean (0,0), unit standard deviations and correlation coefficient ρ .

The policy evaluations of a voter depend on three sources of uncertainty. The first one is about the effects of q. Preferences over q follow the quadratic loss $\frac{1}{2}\left(q-\tilde{\psi}\right)^2$. $\tilde{\psi}$ is the voter's preferred policy, which is Gaussian with voter-specific mean ψ . Higher ψ stands for more socially progressive culture and hence higher preferred q. We assume that income and social progressiveness are nonnegatively correlated, $0 \le \rho < 1$. This is realistic because more

educated people are both richer and more culturally progressive.⁷

Second, voters are uncertain about their tax burden because their income $1+\tilde{\varepsilon}$ is stochastic. $\tilde{\varepsilon}$ is Gaussian with voter-specific mean ε . Thus, a rational voter of type ε expects to earn $1+\varepsilon$. Beliefs about $\tilde{\varepsilon}$ capture beliefs over future relative income, and higher ε implies a higher tax burden.

Third, voters are uncertain about the benefit of the public good g. Its marginal utility $\tilde{\nu}$ is also Gaussian with expected value $\nu + \beta \psi$. Since ψ has zero population mean, the average marginal value of g is $\nu > 1$. Parameter $\beta \in (0,1)$ reflects the influence of culture on preferences for the public good. The distribution of $\tilde{\nu}$ differs from that of $\tilde{\psi}$, because these beliefs refer to different policies.

The key point here is that the voter's culture, embodied in ψ , systematically affects her preferences over q and τ . One important cultural trait is moral universalism (Haidt 2012). More universalistic people apply their value system to socially more-distant individuals (Tabellini 2008; Enke, Rodriguez-Padilla, and Zimmerman 2021). Thus, they are more progressive on civil rights or immigration, but they also trust the government more and they and are more favorable to redistribution (Enke, Rodriguez-Padilla, and Zimmerman 2020; Haidt 2012). Another relevant trait is religiosity. More religious people are more conservative on civil rights, featuring lower $\tilde{\psi}$, and they also trust the government less (Enke, Rodriguez-Padilla, and Zimmerman 2021), which reduces $\tilde{\nu}$. Culture can also reflect fairness norms, which affect preferences over tax policy (Stantcheva 2021) and attitudes towards minorities. These traits do not need to be independent from each other. Enke, Rodriguez-Padilla, and Zimmerman

⁷Consistent with this notion, in the ANES data used in Figure I and Section V, if one regresses the demand for progressive policies defined in Figure I on wave fixed effects and income one obtains (omitting estimates for fixed effects):

$$culture = -0.7672^{***} + 0.0736^{***}income.$$

$$(0.0447) (0.0119)$$

But when the same dependent variable is regressed on wave fixed effects, income and education one obtains:

$$culture = -1.079^{***} - 0.0021 \\ income + 0.1301^{***} \\ education. \\ (0.0486)$$

The Online Appendix provides details on variable definitions.

(2021) show that religiosity is negatively correlated with universalism. What matters for us is that they affect voters' views over q and τ .

Since ε has zero mean in the population, aggregate income is 1. Thus, the quantity of g is equal to the tax rate τ . The expected utility of the rational voter (ε, ψ) is, up to an additive constant:

$$W^{\varepsilon\psi}(\tau,q) = (1+\varepsilon)(1-\tau) - \frac{\varphi}{2}\tau^2 + (\nu + \beta\psi)\tau - \frac{\kappa}{2}(q-\psi)^2, \tag{3}$$

where superscript $\varepsilon \psi$ denotes the voter's type and $\kappa > 0$ captures the weight attached to policy q. Neglecting nonnegativity constraints, the rational bliss point of voter (ε, ψ) is:

$$\tau^{\varepsilon\psi} = \frac{(\nu + \beta\psi) - (1 + \varepsilon)}{\varphi}, \qquad q^{\varepsilon\psi} = \psi. \tag{4}$$

More-progressive voters (higher ψ) demand more redistribution and a more liberal cultural policy. Richer voters (higher ε) demand less redistribution because of their greater tax burden.

The socially optimal policy maximizes aggregate rational welfare:

$$\int W^{\varepsilon\psi}(\tau,q) dH(\varepsilon,\psi) d\varepsilon d\psi.$$

Given linear private and public consumption, and given the assumed normal cdf $H(\varepsilon, \psi)$, the socially optimal policies are:

$$\tau^{\circ} = \frac{\nu - 1}{\varphi}, \qquad q^{\circ} = 0. \tag{5}$$

Equation (4) shows that policy disagreement combines two underlying conflicts. One is the rich vs poor conflict over taxes, captured by expected relative income ε . The second is cultural conflict, captured by ψ , which affects the evaluation of both redistributive and cultural policies. As emphasized by Sundquist (1983), major realignments in American politics have occurred when the main parties shifted their positions along the economic and cultural divides. We endogenize these realignments as the product of voters' changing identities across economic and cultural groups.

III.B.Endogenous Identity

1. Groups. Social groups are defined based on income ε and culture ψ . With respect to culture, a voter can either be socially conservative, $SC \equiv \{\psi | \psi < \widehat{\psi}\}$, or progressive, $SP \equiv \left\{ \psi | \psi \geq \widehat{\psi} \right\}$, where $\widehat{\psi}$ is historically given. With respect to income, voters belong to the upper class $U \equiv \{\varepsilon \mid \varepsilon \geq \widehat{\varepsilon}\}$ or to the lower class $L \equiv \{\varepsilon \mid \varepsilon < \widehat{\varepsilon}\}$, where $\widehat{\varepsilon}$ is again historically given. Hence, there are four groups, indexed by G = L, U, SC, SP. Each group is summarized by the average traits of its members, $(\overline{\varepsilon}_G, \overline{\psi}_G)$, regardless of their social identity. Thus, $(\overline{\varepsilon}_L, \overline{\psi}_L)$ denote the average expected income and progressiveness of the lower class, and the average traits of the other groups are similarly defined. Note that, provided correlation is not full ($\rho < 1$), all cultural and economic partitions overlap: each economic class contains both progressive and conservative voters, each cultural group contains both upper- and lower-class voters. If ψ and ε are positively correlated, these groups differ in both income and culture, irrespective of the dimension that defines them. Bivariate normality of $H(\varepsilon, \psi)$ implies:

$$\overline{\varepsilon}_{SP} - \overline{\varepsilon}_{SC} = \rho \left(\overline{\psi}_{SP} - \overline{\psi}_{SC} \right), \tag{6}$$

$$\overline{\varepsilon}_{SP} - \overline{\varepsilon}_{SC} = \rho \left(\overline{\psi}_{SP} - \overline{\psi}_{SC} \right), \qquad (6)$$

$$\overline{\psi}_{U} - \overline{\psi}_{L} = \rho \left(\overline{\varepsilon}_{U} - \overline{\varepsilon}_{L} \right). \qquad (7)$$

If $\rho > 0$, the progressives are richer than the conservatives, and the upper class is more progressive than the lower class. Of course, since $\rho < 1$, cultural groups mostly differ along culture, $\overline{\psi}_{SP} - \overline{\psi}_{SC} > \overline{\varepsilon}_{SP} - \overline{\varepsilon}_{SC}$ and economic classes along income, $\overline{\varepsilon}_U - \overline{\varepsilon}_L > \overline{\psi}_U - \overline{\psi}_L$. We make the following reasonable assumption:

$$\rho < \left(\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L}\right) < \frac{1}{\rho},\tag{A1}$$

which implies that income differences are larger between classes than between cultural groups, $\overline{\varepsilon}_U - \overline{\varepsilon}_L > \overline{\varepsilon}_{SP} - \overline{\varepsilon}_{SC}$, and vice versa for cultural differences, $\overline{\psi}_{SP} - \overline{\psi}_{SC} > \overline{\psi}_U - \overline{\psi}_L$.⁸

2. Metacontrast and Identity. We assume that there are only two groups with which a voter can identify: her economic group or her cultural group, but not both. For instance, a poor and conservative voter ($\varepsilon < \widehat{\varepsilon}$, $\psi < \widehat{\psi}$) can only identify either with the lower class or with the conservatives, but not with the narrow group of poor and conservative voters. In Online Appendix 3 we allow for narrower social partitions, which in turn allow a voter to identify with her narrower two-dimensional group. The analysis is more complicated, but our main results continue to hold, as we discuss below.

How is a voter's identity determined? As discussed in Section II, identity maximizes: (i) similarity between oneself and the ingroups, and (ii) conflict between the ingroups and the outgroups. This tradeoff shapes which social partition, either economic or cultural, is more salient. To emphasize group conflict, which is important in politics, we focus on criterion (ii), subject to the constraint that the voter can only identify with her income class or cultural group, because she is naturally more similar to them than to the outgroups. As a result, all voters identify along the dimension, be it class or culture, that maximizes group conflict. Below we discuss what happens if identity reflects a full tradeoff between criteria (i) and (ii).

Let \overline{G} denote the complement of G. Conflict between groups G and \overline{G} is measured by the welfare loss that the average member of G experiences when moving from her ideal policy (τ^G, q^G) to the bliss point of the average outgroup, $(\tau^{\overline{G}}, q^{\overline{G}})$:

$$C\left(G,\overline{G}\right) = W^{G}\left(\tau^{G}, q^{G}\right) - W^{G}\left(\tau^{\overline{G}}, q^{\overline{G}}\right). \tag{8}$$

⁸In what follows, we discuss the implications of whether $\overline{\psi}_{SP} - \overline{\psi}_{SC} \leq \overline{\varepsilon}_U - \overline{\varepsilon}_L$. Given that $H(\psi, \varepsilon)$ is normal with mean zero and unit variances, it can be shown that, if $\hat{\varepsilon}$ and $\hat{\psi}$ have the same sign, then

$$\overline{\psi}_{SP} - \overline{\psi}_{SC} \gtrapprox \overline{\varepsilon}_U - \overline{\varepsilon}_L \quad \text{as} \quad |\hat{\psi}| \ \geqq \ |\hat{\varepsilon}|$$

See Schivardi, Sette, and Tabellini (2020) for a proof in a different context.

The definition uses rational bliss points, but little changes if we use stereotyped bliss points. Using (3) and (4), the Online Appendix proves that conflict is measured by:

$$C\left(G,\overline{G}\right) = (\overline{\varepsilon}_G - \overline{\varepsilon}_{\overline{G}})^2 + (\beta^2 + \widehat{\kappa})(\overline{\psi}_G - \overline{\psi}_{\overline{G}})^2 - 2\beta(\overline{\varepsilon}_G - \overline{\varepsilon}_{\overline{G}})(\overline{\psi}_G - \overline{\psi}_{\overline{G}}). \tag{9}$$

The term $(\overline{\varepsilon}_G - \overline{\varepsilon}_{\overline{G}})$ captures economic conflict, the term $(\overline{\psi}_G - \overline{\psi}_{\overline{G}})$ captures cultural conflict. Thus, the conflict between two groups (economic or cultural) is larger if their average types differ more in income and culture. Positive correlation between culture and income tends to dampen redistributive and hence overall conflict, as captured by the last term. The weight attached to cultural conflict increases with the importance of culture for the valuation of public spending, β , and with the relative importance of cultural policy $\widehat{\kappa} \equiv \kappa \varphi$. In turn, $\widehat{\kappa}$ increases in the welfare weight κ of cultural policy and in tax distortions φ . If φ rises, everyone prefers lower taxes, reducing the salience of redistributive conflict.

Equation (9) is symmetric, $C(G, \overline{G}) = C(\overline{G}, G)$. Thus, if conflict between economic classes is larger than conflict between cultural groups, C(U, L) > C(SP, SC), all voters identify with their economic class. Otherwise, they identify with their cultural group. Define:

$$\widehat{\alpha} \equiv \frac{(1 - \beta \rho)^2 - (\beta - \rho)^2 \left(\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L}\right)^2}{\left(\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L}\right)^2 - \rho^2}.$$
(10)

We then prove:

PROPOSITION 2. Everyone identifies with their cultural group if $\hat{\kappa} > \hat{\alpha}$ and with their economic class if $\hat{\kappa} < \hat{\alpha}$. If $\beta \leq \rho \frac{1+\rho^2}{1+\rho^4}$ we have that: (i) $\hat{\alpha} > 0$, (ii) $\hat{\alpha}$ is strictly decreasing in $\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L}$; (iii) $\hat{\alpha}$ is strictly decreasing in ρ if $\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L} > 1$.

If $\hat{\alpha} < 0$ identity is always cultural. If $\hat{\alpha} > 0$ identity can be either economic or cultural depending on parameters. To focus on this case, which is more interesting, we impose the

sufficient condition $\beta \leq \rho \frac{1+\rho^2}{1+\rho^4}$.

Identity is shaped by three forces. First, cultural identity is more likely to dominate when the importance of cultural policy relative to taxes, $\hat{\kappa}$, increases. Higher welfare weight κ of cultural policy, triggered for instance by a large inflow of immigrants or by episodes of minority discrimination, brings cultural issues top of mind relative to redistribution, promoting cultural identity. A similar effect is created by higher tax distortions φ , caused for instance by tax competition among countries, which reduce conflict over taxes.

Second, cultural identity is more likely to dominate when differences among cultural groups are large relative to those among economic groups—namely when $\frac{\overline{\psi}_{SP}-\overline{\psi}_{SC}}{\overline{\varepsilon}_U-\overline{\varepsilon}_L}$ is high. By (A1), higher income inequality $\overline{\varepsilon}_U - \overline{\varepsilon}_L$ between classes increases class conflict over all policies, making class identity more likely. Stronger cultural divisions $\overline{\psi}_{SP} - \overline{\psi}_{SC}$ increase cultural conflict and reduce class cohesion, making cultural identity more likely. In an 1893 letter, Friedrich Engels argued that class struggle proved difficult in the US because of deep ethnic cleavages within the working class. This is consistent with the idea that strong cultural divisions (large $\overline{\psi}_{SP} - \overline{\psi}_{SC}$) hinder class identity. Similarly, expansion of high education may enhance cultural conflict between progressive elites and the rest of society (i.e. increase $\overline{\psi}_{SP} - \overline{\psi}_{SC}$), promoting cultural identity (Fukuyama 2018).

Third, the correlation ρ between income and progressiveness also plays an important role. Higher ρ promotes cultural identity if $\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L} > 1$, otherwise it promotes class identity. The intuition is simple. When ρ is higher, cultural groups disagree more over redistribution and economic classes disagree more over cultural policy. Thus, higher ρ increases policy conflict among both cultural and economic groups. This effect, however, is more pronounced for the groups that are more divided. Cultural groups are more divided than economic classes if and only if $\frac{\overline{\psi}_{SP} - \overline{\psi}_{SC}}{\overline{\varepsilon}_U - \overline{\varepsilon}_L} > 1$, so in this case higher ρ promotes cultural identity.

Skill-biased technical change is a shock that may increase ρ , because it impoverishes less-educated and hence more-conservative workers (Autor 2019). Online Appendix 2 formalizes this argument by assuming that a voter's skill endowment is positively correlated with her

progressiveness ψ . We show that, if technical change determines a higher remuneration of skilled labor, income and culture become more positively correlated. This, in turn, may induce voters to switch to cultural identity, even if the shock increases income inequality.

Globalization is another possible driver of higher ρ if losers from globalization are disproportionately conservative, which may again be due to their lower education. Online Appendix 2 formalizes this argument by assuming that the labor endowment of progressive voters is more tied to the export sector than that of conservative voters. As globalization determines a higher remuneration of labor in the export sector and a lower one in the import sector, the correlation between income and culture increases, which can again promote cultural identity.

We mentioned the possibility that voters may identify with narrower groups. Online Appendix 3 shows that the main message of Proposition 2 holds also if voters can identify with their finer economic and cultural group. This means, for instance, that a voter with $\varepsilon \leq \widehat{\varepsilon}$ and $\psi \leq \widehat{\psi}$ can identify with the group of lower-class and socially conservative people (L, SC). Two main results emerge from this analysis. First, narrow identity is often not chosen, even if available. The intuition is that it tends to reduce conflict relative to broader cultural or economic groups. The narrower group is closer to the voter, but less salient.¹¹

The second result is that, even if some voters may choose narrow identity under some conditions, the key qualitative implications of Proposition 2 still hold. In particular, it remains true that an increase in $\hat{\kappa}$ promotes cultural identity. This may occur because voters switch from their class to their narrow group, rather than from class to culture. However, because the narrow group is also defined along cultural values, it remains true that culture becomes

⁹As discussed by Autor, Dorn, and Hanson (2016), exposure to import competition in the US and other industrial countries has primarily hurt low-skilled workers. And as shown in footnote 7, education is positively correlated with the demand for progressive cultural policies.

¹⁰As shown in a previous version, trade shocks can induce a switch to cultural identity by creating trade policy conflict. If conservatives are more exposed to trade than progressives while economic classes are equally exposed, then trade shocks can intensify trade policy conflict between cultural groups, favoring a switch to cultural identity.

¹¹To see this, consider conservative and lower-class voters in (L, SC). Relative to the lower class L, the narrower group (L, SC) features lower income conflict because its outgroup contains some lower-class voters, the socially progressive ones. Relative to the conservatives SC, the narrower group (L, SC) features lower cultural conflict because its outgroup contains some conservative voters, the upper-class ones.

more important in shaping voters' beliefs. This preserves the gist of our results.

In our model identity switches occur suddenly and for everybody at the same time. This is an artifact of our assumptions. In a more general model where identity reflects a tradeoff between group contrast and similarity between the individual and the group average (as per criterion (i) above), the threshold for identity switches differs across individuals. As a result, the process of identity realignment triggered by growing $\hat{\kappa}$ is more gradual.¹²

III.C. Policy Preferences

How does identity affect policy preferences? As in Section II, identity distorts beliefs through stereotypes, but beliefs now concern income prospects, $\tilde{\varepsilon}$, and cultural views, $\tilde{\psi}$. This, in turn, affects preferences over τ and q. Let $(\varepsilon_G^{\theta}, \psi_G^{\theta})$ denote the perceived expected income and culture of voter (ε, ψ) if she identifies with group G. Let $\tau_G^{\varepsilon\psi}$ and $q_G^{\varepsilon\psi}$ denote her policy bliss points. Repeating the steps that led to Proposition 1 in Section II, and using (4), we have:

PROPOSITION 3. A voter (ε, ψ) identified with group G = SC, SP, U, L perceives her future expected income and her cultural trait to be:

$$\varepsilon_G^{\theta} = \varepsilon + \theta \left(\overline{\varepsilon}_G - \overline{\varepsilon}_{\overline{G}} \right), \tag{11}$$

$$\psi_G^{\theta} = \psi + \theta \left(\overline{\psi}_G - \overline{\psi}_{\overline{G}} \right). \tag{12}$$

 12 When identity also depends on a voter's similarity to her groups, some voters identify based on culture, others on class. It remains true, though, that higher salience of culture relative to income (higher $\hat{\kappa}$) favors cultural identity. But in this case, extreme voters along income and culture are more likely to change identity when a shock hits. Extreme voters feel intensely about both issues, so they readily switch to the most fitting identity. The formal analysis of that model can be found in a prior draft, available as CEPR Discussion paper 13390. We could also allow for heterogeneity in the propensity to identify with any social group (as if acquiring a social identity entailed a cost). In this case, identification with a group would be triggered only if group conflict is sufficiently large. If unidentified individuals behave rationally, the results remain very similar, as long as at least some voters are always identified in the dimension that maximizes group conflict.

The same voter's ideal policies are given by:

$$\tau_G^{\varepsilon\psi} = \tau^{\varepsilon\psi} + \theta \frac{\beta \left(\overline{\psi}_G - \overline{\psi}_{\overline{G}}\right) - (\overline{\varepsilon}_G - \overline{\varepsilon}_{\overline{G}})}{\varphi}, \tag{13}$$

$$q_G^{\varepsilon\psi} = q^{\varepsilon\psi} + \theta \left(\overline{\psi}_G - \overline{\psi}_{\overline{G}} \right). \tag{14}$$

The voter distorts her perceived future income and her cultural views by the belief difference between ingroups and outgroups. This, in turn, distorts her perception of the ideal policy. If the voter identifies with a group that is richer than the outgroup, her perceived tax burden is enhanced, otherwise it is dampened. If the voter identifies with a group that is more progressive than the outgroup, her perceived benefit from liberal cultural policies and universalistic redistribution is enhanced, otherwise it is dampened.

Consider a lower-class and conservative voter, $\varepsilon < \widehat{\varepsilon}$, $\psi < \widehat{\psi}$. Using the above result and Equations (6) and (7), if this voter identifies with the lower class her bliss points are:

$$\tau_L^{\varepsilon\psi} = \tau^{\varepsilon\psi} + \frac{\theta(1 - \beta\rho)(\overline{\varepsilon}_U - \overline{\varepsilon}_L)}{\varphi}, \qquad q_L^{\varepsilon\psi} = q^{\varepsilon\psi} - \rho\theta(\overline{\varepsilon}_U - \overline{\varepsilon}_L). \tag{15}$$

Given that $\beta \rho < 1$, the voter exaggerates her demand for redistribution, $\tau_L^{\varepsilon \psi} > \tau^{\varepsilon \psi}$, especially if income inequality among classes is strong. When thinking about herself, the poverty of her social group comes to mind. As evoked by Karl Marx, she feels part of an economically oppressed class, and this increases her demand for redistribution. Since $\rho > 0$, the lower class is on average conservative, so the voter also demands a stricter cultural policy $q_L^{\varepsilon \psi} < q^{\varepsilon \psi}$. Conservatism also dampens her demand for redistribution but, as we already saw, this effect is dominated because $\beta \rho < 1$.

Now suppose that cultural policy becomes salient. If the voter switches to conservative identity, her bliss points become:

$$\tau_{SC}^{\varepsilon\psi} = \tau^{\varepsilon\psi} - \frac{\theta(\beta - \rho)(\overline{\psi}_{SP} - \overline{\psi}_{SC})}{\varphi}, \qquad q_{SC}^{\varepsilon\psi} = q^{\varepsilon\psi} - \theta(\overline{\psi}_{SP} - \overline{\psi}_{SC}). \tag{16}$$

The voter's conservatism increases, due to (A1), so she is now even more opposed to liberal cultural policy, $q_{SC}^{\varepsilon\psi} < q_L^{\varepsilon\psi}$. She also demands less redistribution than before, $\tau_{SC}^{\varepsilon\psi} < \tau_L^{\varepsilon\psi}$. As the voter abandons class identity, two forces work in this direction. First, the voter is more optimistic about her future income. Second, she becomes more communitarian, which reduces her demand for universalistic redistribution.

This change in preferences may be caused by a shock that is barely related to redistribution, such as a salient conflict on abortion or a large inflow of immigrants from a different culture. Alesina, Stantcheva, and Miano (2018) find that making people think about immigrants reduces their support for redistribution, particularly if the respondent is less educated and right-wing. They argue that respondents are unwilling to redistribute towards foreigners. A different interpretation is that the treatment primes cultural identity in conservative and anti-immigrant subjects. If this is true, the treatment effect should be heterogeneous: conservative subjects should reduce their demand for redistribution while progressives may even increase it, because they are willing to redistribute in favor of immigrants.

III.D. Equilibrium Policy

We now study how identity affects equilibrium policy. As in standard models of probabilistic voting, two candidates commit to policy platforms ahead of the elections in order to maximize the probability of winning (cf. Persson and Tabellini 2000). We assume that all voters have the same degree of mobility across parties, so the equilibrium policy maximizes perceived utilitarian welfare. Let $W_d^{\varepsilon\psi}(\tau,q)$ denote the perceived expected utility of agent (ε,ψ) if she identifies based on dimension d, for $d=\tilde{\varepsilon},\tilde{\psi}$. The equilibrium policy is defined by:

$$(\tau^*, q^*) = \arg\max_{\tau, q} \int W_d^{\varepsilon\psi}(\tau, q) dH(\psi, \varepsilon), \quad \text{for } d = \tilde{\varepsilon}, \tilde{\psi}$$
 (17)

Suppose that everyone identifies based on class. Exploiting Proposition 3, the first-order

This is obviously true if $\beta > \rho$ but it is also true if $\beta < \rho$ because, by (A1), $(1 - \beta \rho)(\overline{\varepsilon}_U - \overline{\varepsilon}_L) > (1 - \beta \rho)\rho(\overline{\psi}_{SP} - \overline{\psi}_{SC})$ which is in turn larger than $(\rho - \beta)(\overline{\psi}_{SP} - \overline{\psi}_{SC})$ due to $\rho < 1$.

conditions of the problem imply:

$$\tau^* = \tau^{\circ} + \theta \frac{(1 - \beta \rho) (\overline{\varepsilon}_U - \overline{\varepsilon}_L) (\pi_L - \pi_U)}{\varphi}, \tag{18}$$

$$q^* = q^{\circ} - \theta \rho \left(\overline{\varepsilon}_U - \overline{\varepsilon}_L \right) (\pi_L - \pi_U), \tag{19}$$

where τ° and q° denote the socially optimal policies, and π_L , π_U denote the size of the upper and the lower class, respectively.

If $\theta = 0$, beliefs are rational and identity has no effect on equilibrium policy. When instead $\theta > 0$ identity matters. If $\hat{\varepsilon} > 0$, the lower class is the larger economic group, $\pi_L > \pi_U$. Thus, taxes are too high and, if $\rho > 0$, cultural policy is too conservative. These distortions increase with class inequality $(\bar{\varepsilon}_U - \bar{\varepsilon}_L)$. In Marxist theory, class consciousness is necessary for the poor majority to succeed. In a similar way, class identity causes lower-class voters to be more radical. Opportunistic politicians then accommodate their demands because the lower class is larger. If the lower class is more conservative, cultural policy is also too restrictive, for the same reason.

Suppose now that everyone identifies based on culture. Then we have:

$$\tau^* = \tau^{\circ} - \theta \frac{(\beta - \rho) (\bar{\psi}_{SP} - \bar{\psi}_{SC}) (\pi_{SC} - \pi_{SP})}{\varphi}, \qquad (20)$$

$$q^* = q^{\circ} - \theta (\bar{\psi}_{SP} - \bar{\psi}_{SC}) (\pi_{SC} - \pi_{SP}). \qquad (21)$$

$$q^* = q^\circ - \theta \left(\bar{\psi}_{SP} - \bar{\psi}_{SC} \right) (\pi_{SC} - \pi_{SP}). \tag{21}$$

Here too, if $\theta > 0$ the stereotypes of the larger group affect the equilibrium. If $\hat{\psi} > 0$, the conservative group is larger, $\pi_{SC} > \pi_{SP}$. Thus, cultural policy is too restrictive $(q^* < q^{\circ})$. If the average conservative demands lower spending $(\beta > \rho)$ taxes are too low, otherwise they are too high.

A switch from economic to cultural identity impacts (τ, q) in a way that depends on: (i) the relative severity of economic vs. cultural differences; (ii) the relative size of different groups. If $\hat{\varepsilon} = \hat{\psi} > 0$ income inequality and cultural conflict are commensurate, $\bar{\psi}_{SP} - \bar{\psi}_{SC} = \bar{\varepsilon}_U - \bar{\varepsilon}_L$ and the dominant groups have the same size $\pi_L = \pi_{SC} > \pi_U = \pi_{SP}$. In this case, a switch from class to culture always causes cultural policy to become more conservative and taxes to fall (the latter due to the fact that $1 - \beta \rho > \beta - \rho$).

We summarize this discussion in the following:

Proposition 4. Suppose that $\hat{\varepsilon}, \hat{\psi} > 0$.

- (i) Under class identity, $\tau^* > \tau^\circ$ and $q^* \leq q^\circ$, with strict inequality if $\rho > 0$.
- (ii) Under cultural identity, $q^* < q^{\circ}$, and $\tau^* \leq \tau^{\circ}$ as $\beta \geq \rho$.
- (iii) If in addition $\hat{\varepsilon} = \hat{\psi}$, a switch from class to cultural identity reduces both τ^* and q^* .

In our model candidates are opportunistic and follow changing voters' preferences. Suppose instead that candidates are partisan and have different policy platforms, as in Alesina (1987), with the right-wing candidate being culturally and fiscally conservative, and the opposite for the left-wing candidate. Then, a shift from class to culture reshuffles voters across parties. Conservative and lower-class voters, that voted for the left on the basis of their class, are now attracted by the culturally conservative right-wing party. Progressive and upper-class voters are instead attracted by the culturally progressive left-wing party. Piketty (2018) shows that after the 1960s similar mobility patterns have occurred in several Western democracies.

IV. EMPIRICAL PREDICTIONS

In this section we illustrate the key predictions of our model. As shown in Figure I, after 2008 disagreement over cultural policy has increased, disagreement over redistribution has remained constant or has declined, and views over cultural policy and redistribution have become more correlated. An identity switch from class to culture produces these effects. Let $\tau_d^{\varepsilon\psi}$, $q_d^{\varepsilon\psi}$ denote the bliss points of voter (ε, ψ) if she identifies on dimension $d = \tilde{\varepsilon}, \tilde{\psi}$.

PROPOSITION 5. Suppose that $\hat{\varepsilon} = \hat{\psi} > 0$. Then, an increase in κ triggering an identity switch from class to culture causes the following effects:

- (i) the variance of ideal cultural policies increases while the variance of ideal tax rates decreases: $Var\left(q_{\tilde{\ell}}^{\varepsilon\psi}\right) > Var(q_{\tilde{\varepsilon}}^{\varepsilon\psi})$ and $Var\left(\tau_{\tilde{\ell}}^{\varepsilon\psi}\right) < Var(\tau_{\tilde{\varepsilon}}^{\varepsilon\psi})$.
- (ii) the correlation coefficient between $\tau_d^{\varepsilon\psi}$ and $q_d^{\varepsilon\psi}$ increases. Under cultural identity this correlation coefficient is positive, but it may be negative under class identity.

When identity switches to culture, conflict over q intensifies because cultural beliefs polarize. Conflict over τ is subject to two effects. On the one hand, increased cultural polarization implies more disagreement over the perceived benefits of public spending. On the other hand, dampening of class conflicts reduces disagreement over the perceived tax burden. The second effect is stronger than the first if $\hat{\varepsilon} = \hat{\psi}$. Thus, disagreement over τ falls.

The switch to cultural identity also causes the cultural factor driving both q and τ to become more potent. Conservative voters increase their opposition to immigration and civil rights and become less favorable to redistribution. Progressive voters move in the opposite direction. As a result, the correlation between the demand for redistribution and that for open cultural policies increases.

Proposition 5 shows that an increase in the salience κ of cultural policy can parsimoniously account for Figure I. A version of our model with rational voters cannot do the same, because higher κ plays no role when $\theta = 0$. More generally, in the rational model no single shock can account for the facts, but a combination of shocks is needed. We return to this point in Section V, where we discuss other possible explanations of Figure I.

The preference changes of Proposition 5 are due to changing conflict among underlying social groups. To see this in detail, let τ_d^G , q_d^G denote the average bliss points of members of group G if they identify on dimension $d = \tilde{\varepsilon}, \tilde{\psi}$.

¹⁴In general, as shown in the proof, the second effect dominates, provided the lower class is sufficiently large relative to the socially conservative group, namely provided $\hat{\varepsilon}$ is not too small relative to $\hat{\psi}$.

Proposition 6. Suppose that $\hat{\varepsilon} = \hat{\psi} > 0$. Then, an increase in κ causing identity to switch from class to culture affects the policy preferences of different social groups as follows.

(i) Relative to the conservatives, the progressives become even more in favor of liberal cultural policies; if $\beta > \rho$, they also become even more in favor of high taxes:

$$q_{\tilde{\psi}}^{SP} - q_{\tilde{\psi}}^{SC} > q_{\tilde{\varepsilon}}^{SP} - q_{\tilde{\varepsilon}}^{SC} > 0$$
 (22)

$$\tau_{\tilde{\psi}}^{SP} - \tau_{\tilde{\psi}}^{SC} > \tau_{\tilde{\varepsilon}}^{SP} - \tau_{\tilde{\varepsilon}}^{SC} > 0 \text{ if } \beta > \rho.$$
(23)

(ii) Relative to the upper class, the lower class becomes even more opposed to liberal cultural policies; it also becomes less favorable to high taxes:

$$q_{\tilde{\eta}}^L - q_{\tilde{\eta}}^U < q_{\tilde{\varepsilon}}^L - q_{\tilde{\varepsilon}}^U < 0 \tag{24}$$

$$q_{\tilde{\psi}}^{L} - q_{\tilde{\psi}}^{U} < q_{\tilde{\varepsilon}}^{L} - q_{\tilde{\varepsilon}}^{U} < 0$$

$$\tau_{\tilde{\psi}}^{L} - \tau_{\tilde{\psi}}^{U} < \tau_{\tilde{\varepsilon}}^{L} - \tau_{\tilde{\varepsilon}}^{U}.$$

$$(24)$$

As voters switch to cultural identity, their cultural traits become exaggerated. Across cultural groups, the progressives become even more progressive and vice-versa for the conservatives. As a result, their conflict over cultural policy intensifies. Conflict over τ between cultural groups, $\tau_d^{SP} - \tau_d^{SC}$, also increases, provided that the influence of culture on redistributive preferences (i.e. β) is strong enough.

The opposite happens to perceived income differences between classes: lower-class voters feel less poor and upper-class voters less rich. Hence, their assessment of the tax burden becomes less divergent. In addition, the conservative majority of the lower class becomes more communitarian and demands less government spending, and vice-versa for the upper class. For both reasons, the lower class demands lower taxes than before, while the upper class does the opposite. Finally, the lower class becomes more supportive of conservative cultural policies, compared to the upper class. As a result, conflict over cultural policies between opposite income groups rises.

Going back to Proposition 5, the amplification of conflict over cultural policy among economic and cultural groups explains growing disagreement over q in the population as a whole. The reduction of redistributive conflict among income classes and its increase among cultural groups explains why overall disagreement over τ falls but preferences over τ and q become more correlated over time.

V. Comparing the Theory with the Data

We now present evidence from survey data consistent with the predictions discussed above.

The chain of causation in our model is:

salient issue \Longrightarrow group identity \Longrightarrow beliefs/policy preferences \Longrightarrow equilibrium policy.

The effect of an identity switch on the beliefs of voters depends on their economic and cultural traits. In turn, beliefs affect voters' policy preferences. To test this mechanism, one should ideally observe voters' identities, beliefs, and policy preferences. Unfortunately we do not observe identities or beliefs. As a result, we cannot rigorously test our mechanism.

Nevertheless, in this section we show that several patterns in the data are broadly consistent with our predictions, and cannot easily be accounted for by competing explanations. In the above chain of causation, the trigger of the trends is an increasing conflict among cultural groups. This could be due to greater importance of immigration and civil rights, κ , or to an economic shock hurting conservative voters (higher ρ). As identity switches from class to culture, voters' beliefs change and, by Propositions 5 and 6, we should observe the following: (i) an increase in cultural conflict (measured by the population variance of q and by disagreement over q among cultural groups), (ii) a decrease in redistributive conflict (measured by the population variance of τ and by disagreement over τ among classes), (iii) individual views on τ and q becoming more positively correlated in the population.

To see whether Figure I could be due to a switch to cultural identity, consider first whether

the salience of cultural conflict has increased in the last 20 years. Using data from a repeated Pew survey between 2001 and 2018, Figure II plots the share of respondents that report a certain issue as one of the three most important problems facing the US.

Figure II

The importance of race and immigration has soared from 2012 onwards, which coincides with the time in which the patterns of Figure I are most pronounced.¹⁵ In our model, this phenomenon corresponds to a higher welfare importance κ , and hence higher salience of cultural policy.¹⁶

A second natural step is to see whether a growing importance of cultural policies is associated with stronger cultural identity. We do not measure the strength of identification with cultural groups or with income classes. In ANES, however, respondents report "thermometer feelings" on how close they feel to certain groups. We use this information. Respondents are assigned to opposite economic classes based on a question on self-reported social class. They are assigned to opposite cultural groups based on their religiosity, a cultural trait that Enke, Rodriguez-Padilla, and Zimmerman (2021) have shown to be strongly (negatively) correlated with moral universalism. Online Appendix 4 provides more details on the definition of social class, religiosity and all other variables used in the analysis.

As a proxy for "affective class polarization", we take the difference between the thermometer of self-classified upper- and lower-class respondents towards: (i) unions and (ii) big

¹⁵To highlight long-term trends, we omit "the state of the economy" and "unemployment", which follow the business cycle (especially the Great Recession), and national security. Cultural issues were prominent also in the early 2000s. As emphasized by Abramowitz (2019), this is likely to reflect a continuing decline of the share of white voters over the eligible population, due to immigration from Asia and Latin America and a higher fertility of nonwhite. According to ANES data, (in 2016) nonwhites made up 39% of eligible voters under the age of 30, compared with only 17% of eligible voters over seventy" - Abramowitz (2019, chp 1).

¹⁶In our model there is only one cultural policy q, but the analysis is the same if there are several dimensions of cultural policy $q_1, ..., q_k$ whose bliss points are highly correlated because they are all driven by a voter's socially progressive or conservative stance ψ . If there is more than one cultural issue, parameter κ captures the average importance of these issues. In this case, a growing importance of several issues at the same time contibutes to a strong increase in κ .

businesses—two symbols of class identity. As a proxy for "affective cultural polarization", we take the difference between the thermometer of religious and secular respondents towards Christian fundamentalists and Catholics. To remove the confounding effect of identification with political parties, we use the estimated residuals of these feelings, after conditioning on dummies for party affiliation interacted with wave fixed effects (patterns are stronger or similar in the unconditional data and in the sample of political independents, as shown in the Online Appendix). Figure III plots these indices over time, together with their 95% confidence intervals.

Figure III

In Panel (a), the upper class feels more distant from unions and closer to businesses compared to the lower class, but these class differences in feelings have shrunk and are not statistically significant in recent years, suggesting a reduction in affective class polarization. In Panel (b), religious respondents feel closer to Christian fundamentalists and Catholics than secular respondents, and these differences in feelings have diverged, suggesting a rise in affective cultural polarization. This is consistent with conflict cooling off among economic groups and heating up between religious and secular groups.

The third step in the above chain of causation is the change in beliefs and policy preferences. We have already shown in Proposition 5 that our model can account for the trends of Figure I. Here we ask whether these changes in policy preferences are tied to economic and cultural groups, as predicted by Proposition 6. A switch to cultural identity should dampen redistributive conflict among classes and enhance it among cultural groups (if $\beta > \rho$). It should also exacerbate cultural conflict among cultural groups as well as between classes. Figure IV reports the position over redistribution and cultural policies of respondents sorted into different income classes and cultural groups. The latter are defined again based on respondents' religiosity. Here too we condition on party affiliation interacted with wave fixed effects to control for shifting party positions (the trends are stronger or similar if we do not condition

on party affiliation or if we focus on political independents, see the Online Appendix).

Figure IV

The trends in group conflict are in line with our predictions. In a robustness exercise, we split respondents into two equally sized groups of "conservatives" and "progressives" based on the first principal component of four questions on the importance of traditional values. The trends of Figure IV are confirmed (see Figure A.7 in the Online Appendix).

Another way to detect voters' realignment into more acute cultural conflict is to use cluster analysis. We use the K-means algorithm to separate two clusters of voters in the bidimensional policy space defined by the demand for progressive cultural policies and redistribution. In the subperiod 2000–2008, the two emerging clusters are almost exclusively defined by pro- and anti-redistribution policy views. In the subperiod 2012–2016 the clusters identified by the algorithm feature two-dimensional conflict: one cluster is pro-redistribution and culturally progressive, the other is anti-redistribution and culturally conservative. Interestingly, during 2000–2008 cluster membership is predicted by income class but not by religiosity, while during 2012–2016 cluster membership is mostly predicted by religiosity (in the expected directions). This additional evidence, reported in Figure A,8, Table A.1 and Table A.2 in the Online Appendix, is consistent with the notion that the patterns in Figure I may be due to a growing importance of the cultural divide, which has influenced policy views in the cultural as well as economic domain.¹⁷

In sum, consistently with our model, a growing salience of cultural conflict has gone hand in hand with a convergence of feelings by social classes towards class-related groups, and with a divergence of feelings by religious/secular groups towards religious people. Moreover, and

¹⁷The cluster detection algorithm identifies groups in the population that feature the smallest within-group variance of policy views, which in the case of two groups is equivalent to maximizing cross-cluster differences. This notion is close, but not identical, to our conflict criterion in Equation (8). Thus, this exercise should not be interpreted as a test of the theory, even though the patterns are consistent with the occurrence of a cultural realignment, as the theory predicts.

as predicted by Proposition 6, opposite economic classes now disagree less over redistribution and more over cultural policies, while opposite cultural groups disagree more in both policy domains.

Consider alternative explanations of these facts, starting from a rational version of our model. If $\theta = 0$, the variance of bliss points over q coincides with the variance of culture ψ , σ_{ψ}^2 . Thus, a rational model must find an explanation for the growing disagreement over cultural policy in Figure I. We explain growing cultural disagreement through the growing salience of cultural policy κ , as in Figure II. In a rational model, the salience of cultural policy has no effect on polarization, although increased salience could be a by-product of higher cultural polarization σ_{ψ} .

Suppose that we take for granted an increase in cultural disagreement σ_{ψ} , due for instance to mass education or changes in gender roles (Fukuyama 2018). Is this consistent with the remaining facts? In the rational model, a rise in σ_{ψ} causes higher correlation between the bliss points for q and τ , accounting for the second fact of Figure I. The reason is that culture also shapes preferences over the public good through parameter $\beta > 0$. If progressive voters become more extreme, they want a more liberal cultural policy and more government spending, and vice versa for the conservatives. Hence, views on these policies become more tightly connected.

This intuition, though, suggests that growing cultural disagreement σ_{ψ} should also cause growing disagreement over redistribution, contrary to what we observe. This is because culturally extreme individuals also hold extreme views on τ . In particular, if preferences over q and τ are positively correlated (like in the ANES data from 2008 onward) and if $\theta = 0$, then an increase in σ_{ψ} should cause the variance of bliss points over τ to increase. Intuitively, a positive correlation between q and τ means that a voter's culture is an important determinant of her demand for redistribution. In this case, a rise in cultural polarization should also result in higher polarization over τ .¹⁸

Thus, an exogenous increase in cultural disagreement can explain the increased coherence ¹⁸Let R denote the correlation coefficient between the individual bliss points of q and τ , let σ_q and σ_{τ} be

of views over τ and q, but not why disagreement over τ has, if anything, decreased. In our model, a switch from class to cultural identity produces these patterns via two effects. First, it polarizes cultural preferences, which is akin to increasing σ_{ψ} . Second, it depolarizes class conflict, which is akin to reducing the variance of expected income, σ_{ε} . It is this second effect that reduces the variance of tax preferences in Proposition 5. Thus, the rational model needs a combination of shocks (to σ_{ψ} and to σ_{ε}) to account for the above facts. Our model only needs growing salience of cultural conflict.¹⁹

A second set of explanations for these facts emphasizes the role of political supply. One version stresses partisan sorting. The Democratic Party has become more progressive, the Republican Party more conservative, causing voters with more extreme cultural preferences to switch party allegiance (Gentzkow 2016; Klein 2020). This mechanism can explain the more coherent disagreement and increased cultural polarization between Republican and Democratic supporters, but it cannot alone explain changing policy preferences in the population at large.

Another version allows for persuasion by political leaders. Parties have differentiated their platforms on immigration and civil rights, to attract voters who feel strongly about these issues. Political leaders have then persuaded voters to follow their positions on issues that voters care less about, such as redistribution (Murphy and Shleifer 2004; Glaeser 2005). If messages by political leaders increased the salience of cultural conflict, favoring a switch to cultural identity, the endogenous transmission to policy preferences is fully consistent with the standard deviations of these bliss points. Using (4), we have:

$$R = \frac{\beta \sigma_{\psi} - \rho \sigma_{\varepsilon}}{\varphi \sigma_{\tau}}$$

$$\sigma_{\tau}^{2} = \frac{\beta^{2} \sigma_{\psi}^{2} + \sigma_{\varepsilon}^{2} - 2\beta \rho \sigma_{\psi} \sigma_{\varepsilon}}{\varphi^{2}}$$

which in turn imply: $\frac{\partial R}{\partial \sigma_q} = \frac{\beta(1-R^2)}{\varphi \sigma_{\tau}} > 0$ and $\frac{\partial \sigma_{\tau}}{\partial \sigma_q} = \frac{\beta R}{\varphi} > 0$ if R > 0.

19In the rational model, conflict over τ is also affected by other parameters. An increase in tax distortions, φ , or in the correlation ρ between ε and ψ , reduces the variance of ideal tax rates. But these changes also reduce the correlation of views over taxes and cultural policy—recall that income and cultural progressiveness have opposite effects on τ .

our model. It may also be possible that political leaders are able to directly persuade voters to take more extreme cultural views while moderating their demand for redistribution in a way that is unrelated to identity. However, the mechanism for how this persuasion may operate remains to be spelled out. Moreover, Figures I, III, and IV hold after controlling for time-varying effects of party affiliation and after considering only independent voters, while direct political persuasion should arguably mostly affect partisan voters.

Another distinctive prediction of our model is that economic shocks disproportionately hurting conservative voters should induce a switch to cultural identity. Thus, economic losers should become socially and fiscally conservative. In a rational model, instead, voters hit by economic shocks would demand more redistribution and would not change their views over cultural policy. Autor et al. (2020) and Colantone and Stanig (2017) show that, both in the US and in Europe, losses from international trade foster support for right-wing and conservative parties. Our model can account for this effect if, as shown in Online Appendix 2, losers from trade are disproportionately conservative. In this case, our model predicts that losers from trade also become more socially and fiscally conservative in their policy opinions. A previous version of this paper reported evidence from CCES survey data consistent with this prediction.

VI. CONCLUDING REMARKS

It is often argued that recent years have witnessed a rise in identity politics, intended as the growing importance of conflict over civil rights and minorities (Fukuyama 2018). We take a different perspective: current events underscore the role of cultural identities, but periods of class conflict have their own identity, too. As we suggest, at any given point in time voters perceive their social and political reality from the vantage point of the most salient group among the many latent ones to which they belong. We considered groups defined along economic and cultural traits, but regional, racial, or other groups are also possible. As political cleavages change, voters switch identity from their income class to their cultural, regional, or

racial group. These identity switches cause a realignment of voters' beliefs across all issues in which groups systematically differ, including issues that are barely related to the identity trigger itself.

We explored some key implications of this approach, but much more remains to be done. First and foremost, survey data, possibly combined with priming techniques, should be used to assess the link between identity and beliefs, which we did not explore here. This may also help shed light on the effects of fake or partial news, as well as on the role of digital media, such as Twitter or Facebook, that allow leaders to reach out to voters with emotional and symbolic messages that appeal to their identities.

We have focused on the consequences of a shift from class to cultural identity. But other important episodes in US political history can be interpreted as identity shifts in the opposite direction: from culture to class. One prominent example is the political realignment that took place in the late 1930s and 1940s in the US, and that pushed the Democratic Party to abandon its support for racial discrimination. As emphasized by Schickler (2016), this was the result of a grassroots movement initiated by the core groups that supported the New Deal. Industrial unions, African Americans and urban liberals in the North-East pushed for a fusion of class and race, in a joint defense of labor and civil rights. They did so out of the ideological left-wing conviction that racial division undermined class consciousness, but also because of expediency: the inflow of black immigrants from the South undermined the threat of strikes as black workers could be used as replacement in the workplace. Incorporating the blacks in the working class would remove this threat and strengthen the labor movement. ²⁰ In line with this, Calderon, Fouka, and Tabellini (2021) study US counties between 1940–1970 and show that where the inflow of black immigrants from the South was larger, the Democratic Party gained more votes and grassroots activism was strengthened.

We do not allow parties or politicians to shape identities. Yet political and group leaders

²⁰In the words of union leader John Brophy, quoted by Schickler (2016), "Behind every lynching is the figure of the labor exploiter, the man in the corporation who would deny labor its fundamental rights." The vote of African Americans was also pivotal in several key districts in the North East, and this too induced the Democratic Party to recognize African Americans as full-right members of the working class.

often play an important role in this, for instance by enhancing the salience of certain groups. Marxist thinkers such as Gramsci stressed the role of the Communist party and of intellectuals in fostering class awareness. Nation builders such as Bismarck used nationalism to mobilize support, and the Catholic Church promoted identity politics on the basis of religious values. Political leaders may also create new, party-based identities that supersede traditional social groups. Glaeser (2005) analyses how a leader can mobilize voters by spreading messages of hatred against a minority group. Glaeser, Ponzetto, and Shapiro (2015) discuss how a party can energize its supporters by taking more extreme positions. We think that our demand side approach may be useful to understand these and other supply side aspects. For instance, it may be easier to identify with politicians that impersonate group stereotypes. This implies that, when polarization is strong, the most successful politicians come from the tails, not the middle. Successful populists will then look similar to the unskilled and unexperienced labor market outsiders that voted them in office (see in particular Dal Bó et al. 2019).

A related set of questions concerns the evolution of party systems. When does a party represent a single identity group, and when does it instead act as an ensemble of heterogeneous social identities? The US Republican party seems to represent those on the right that identify along the income dimension, and the social conservatives that identify on culture, while the Democrats stand for the opposite groups in each dimension. But this has changed at times of major political realignments. How do party realignments interact with social identities, and how do political and social identities influence each other?

We believe that exploring these issues within the framework of identity theory opens up a new and exciting research agenda.

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Supplementary Material

An Online Appendix for this article can be found at The Quarterly Journal of Economics online.

DATA AVAILABILITY

Data and code replicating the figures and tables in this article can be found in Bonomi, Gennaioli, and Tabellini (2021) in the Harvard Dataverse, https://doi.org/10.7910/DVN/6COTQW.

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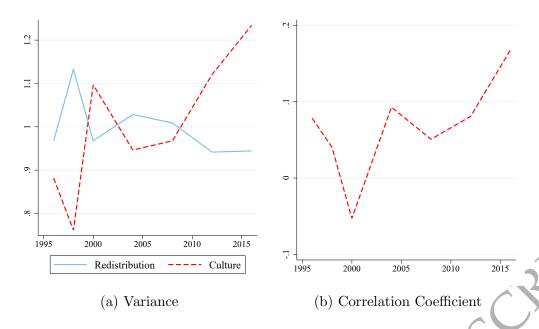


FIGURE I Population Moments

Notes. Panel (a) reports the variances of Redistribution and Culture. Panel (b) reports the Pearson correlation coefficient for these two measures. Redistribution is the first polychoric principal component of the following questions: (i) "Some people think the government should provide fewer services, even in areas such as health and education, in order to reduce spending. Other people feel that it is important for the government to provide many more services even if it means an increase in spending. Where would you place yourself on this scale?"; (ii) "Some people feel that the government in Washington should see to it that every person has a job and a good standard of living. Others think the government should just let each person get ahead on their own. Where would you place yourself on this scale?" Answers to these two questions are given on a seven-point scale. Culture is the first polychoric principal component of desired immigration levels, attitudes towards race relations and abortion policy. Below we report the corresponding questions. Immigration levels: "Do you think the number of immigrants from foreign countries who are permitted to come to the United States to live should be [1. increased a lot; 2. increased a little; 3. left the same as it is now; 4. decreased a little; 5. decreased a lot]?" Attitudes towards race are the difference between respondents' feelings towards black and white people. Feelings toward black (white) people: "How would you rate the following group: Blacks (Whites)", on a 0–100 scale, from coldest to warmest feelings. Abortion policy: "There has been some discussion about abortion during recent years. Which one of the opinions on this page best agrees with your view? [1. By law, abortion should never be permitted; 2. The law should permit abortion only in case of rape, incest, or when the woman's life is in danger; 3. The law should permit abortion for reasons other than rape, incest, or danger to the woman's life, but only after the need for the abortion has been clearly established; 4. By law, a woman should always be able to obtain an abortion as a matter of personal choice]." Both principal components (Redistribution and Culture) are computed on the pooled sample from 1996 to 2016, and based on polychoric correlations. Higher values correspond to more liberal views. Before computing the moments in Figure I, Redistribution and Culture are residualized on party identity, alone and interacted with wave fixed effects (more details in the Online Appendix). Residuals are standardized to have zero mean and unit variance across all waves. Estimates are weighted with survey weights. Source: ANES.

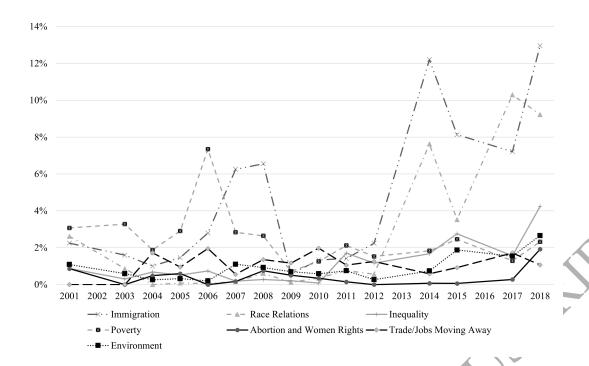
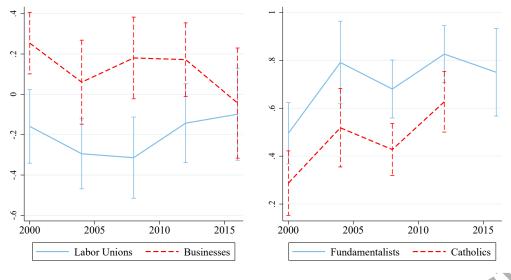


FIGURE II
Most Important Problem Facing The Country

Notes. The graph shows the share of respondents mentioning the selected issues among the top three most important problems facing the US. The analysis of the most important problem is based on the following question: "What do you think is the most important problem facing the country today? [Record up to three responses, in order of mention]." The question is open-ended, but in the public release of the PEW datasets answers have been classified in macro categories. Before constructing Figure II, categories "Abortion" and "Rights of Women Under Attack/Rolling Back" were aggregated in the macro category "Abortion and Women Rights." To highlight long-term trends, we omit "the state of the economy" and "unemployment", which follow the business cycle (especially the Great Recession), and national security. Estimates are weighted with survey weights. Source: Pew Research Center public data.



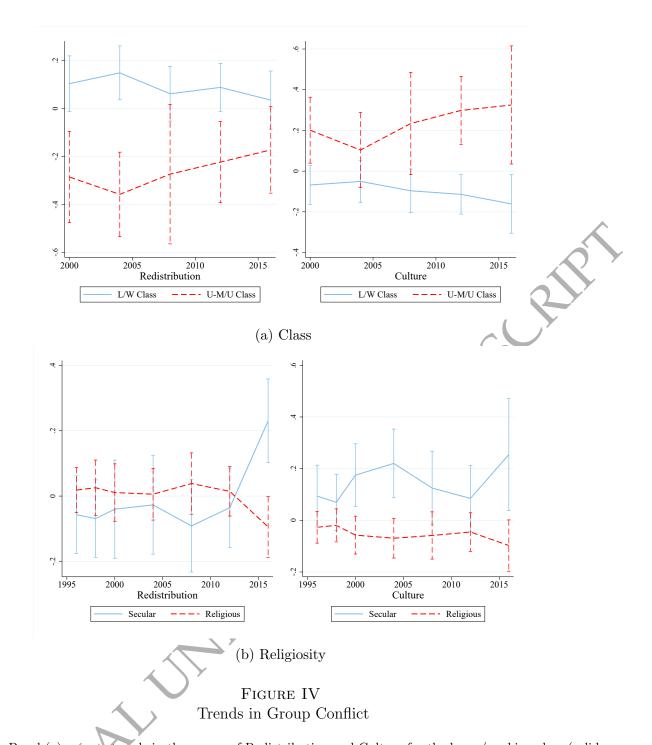
(a) Differences by Class

(b) Differences by Religiosity

FIGURE III
Social Groups and Feeling Thermometer

Notes. Panel (a) plots the differences in the mean feelings of the upper-middle/upper class vs lower/working class towards labor unions (solid line) and big business (dashed line), with 95% confidence intervals. Panel (b) plots the differences in the mean feelings of religious vs secular individuals towards Christian fundamentalists (solid line) and Catholics (dashed line), with 95% confidence intervals. Feelings towards each of the four groups are measured with questions of this kind: "How would you rate the following group: group X." Answers are on a 0–100 scale, from colder to warmer feelings. Before constructing Figure III, answers to the feeling thermometer questions are residualized on party identity, alone and interacted with wave fixed effects (more detail in the Online Appendix). Residuals are standardized to have zero mean and unit variance across all waves. Class is a self-reported variable with the following categories: Lower, Average Working, Working, Upper Working, Average Middle, Middle, Upper Middle, and Upper. Lower/working class (L/W Class) is obtained aggregating Lower, Average Working, Working and Upper Working (roughly 50% of the pooled sample); upper-middle/upper class (U-M/U class) is obtained aggregating Upper Middle and Upper (roughly 15% of the pooled sample). Religiosity is measured by the question "Do you consider Religion to be an important part of your life? [Yes; No]." Respondents answering "Yes" ("No") are classified as Religious (Secular). Estimates are weighted with survey weights. Source: ANES.





Notes. Panel (a) reports trends in the means of Redistribution and Culture for the lower/working class (solid line) and the upper-middle/upper class (dashed line), with 95% confidence intervals. Panel (b) reports trends in the means of Redistribution and Culture for secular (solid line) and religious individuals (dashed line), with 95% confidence intervals. Redistribution is the first polychoric principal component of two questions on government spending and government's role in seeing to citizens' jobs and living standards; Culture is the first polychoric principal component of desired immigration levels, attitudes towards race and abortion policy (see the note of Figure I for the specific questions). For Redistribution and Culture, higher values correspond to more liberal views. The two variables are residualized on party identity, alone and interacted with wave fixed effects. Residuals are standardized, with zero mean and unit variance across all waves. Class and religiosity are self-reported (see the note of Figure III). Estimates are weighted with survey weights. Source: ANES.