

Ideological Constraint and the Quality of Governance in New and Established Democracies

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Abstract

The effectiveness of electoral accountability as a mechanism of citizen control in democracies has in the past been judged unfavorably, owing to the apparently low capacity of voters to organize their political beliefs in consistent ways—a concept known as ideological constraint. This paper suggests that such concerns are misplaced. I demonstrate that even though the quality of governance in new democracies is lower than in established democracies, this is not the result of an absence of opinion constraint among these countries' voting publics. This paper also contributes a new methodology for measuring ideological constraint across multiple survey items, based upon the statistical technique of latent class analysis, that is especially suited for comparative research. The technique is applied to attitudes on economic and social policy issues using survey data from two large, cross-national public opinion studies. Results indicate that political belief systems in new democracies are just as coherent as those in established democracies. Low constraint is therefore not an impediment to accountability and governance.

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The independence of individual minds may be greater, or it may be less: unbounded it cannot be. Thus the question is, not to know whether any intellectual authority exists in the ages of democracy, but simply where it resides and by what standard it is to be measured.

Democracy In America
ALEXIS DE TOCQUEVILLE (1840)

1 Introduction

Decades of public opinion research has found that there is little coherent structure in the political attitudes of most individuals. Scholars are divided, however, as to the substantive and normative implications of this finding. What difference does it make if people’s opinions about politics are inconsistent and do not conform to common patterns in predictable ways?

The concern has been most acute with respect to the effectiveness of democracy as a political system. It is not just that individuals have differing degrees of support for democratic norms and values, but moreover that individuals fail to coalesce around specific sets of policy preferences *within* the democratic system. Many have interpreted this finding as revealing widespread confusion and ignorance among voters, hence casting doubt upon any pretense of democracy to truly be government “by the people”. Feldman (2003, 478), for example, has written:

If political attitudes are not generally structured by any common ideology, how do political leaders communicate with the public? ...Politics doesn’t seem to “work” without some structure that allows broad sets of policies to somehow go together. And democratic representation may depend on people having some understanding of that structure.

Tomz and Sniderman (2005, 1) express a nearly identical sentiment:

A lack of constraint in mass belief systems—if there indeed is an absence of constraint—raises deep problems for democratic politics. It is not merely a matter of individual citizens being unable to coordinate their positions on political issues. A lack of constraint, more fundamentally, signifies a lack of a shared understanding. If citizens’ preferences about politics are idiosyncratic, the positions they take over a range of issues will have no more coherence than a deck of cards scattered at random on a floor. So far as this is so, it is not obvious what electoral representation can mean.

Indeed, the idea that opinion constraint is important for democracy by far predates modern survey methodology. In 1840, de Tocqueville wrote in *Democracy in America* (p. 146),

...without such common belief no society can prosper,—say, rather, no society can exist; for without ideas held in common, there is no common action, and without common action there may still be men, but there is no social body.

Yet despite these worries, democratic political institutions continue to spread around the world, and, as demonstrated by Przeworski et al. (2000), even minimally prosperous democracies do not fail.¹

Is belief system constraint actually important for governance? Existing studies of constraint have focused on only a small number of advanced democracies, and therefore have had insufficient variation in the dependent variable—quality of governance—to determine whether it makes any difference if constraint is high or low. But, worldwide, democracies actually do vary significantly in terms of their quality of governance. In particular, new (or “partial”²) democracies exhibit significantly lower levels of “political capital,” defined by Gerring et al. (2005, 328) as encompassing “various measures of the relative health of a polity—for example, bureaucratic capacity, low levels of corruption, political consensus, stability, legitimacy, trust, the wisdom and farsightedness of political leaders, and so forth.” As a result, “electoral pressures exerted in younger democracies have a weaker or different effect on political accountability than in older democracies” (Keefer, 2005, 4). To test the effects of low constraint, constraint must be examined in comparative perspective.

Moreover, absent any temporal or cross-national comparison of levels of constraint, it is not clear how constraint in *individual* countries should even be calibrated. When scholars such as Tomz and Sniderman (2005, 1) say that constraint in the United States, for example, is “extremely low,” by what standard is this judgment being made? If it is only that constraint is lower than what was expected, then this is not an appropriate criterion, as the United States is a highly functional democracy. If effective governance depends on constraint, then what may appear to researchers to be “low” levels of constraint must in fact be *sufficiently high*, regardless of researchers’ expectations.

Once we examine constraint comparatively, we can see whether, as “low” as ideological constraint may seem in the advanced democracies, it is even more minimal in new democracies. There are good reasons to expect this to be so, as many of the primary factors that increase belief system constraint—exposure to elite political discourse, increased political sophistication, and stronger partisan or ideological attachments (Converse, 1964; Barton and Parsons, 1977; Norpoth and Lodge, 1985; Zaller, 1992; Tomz and Sniderman, 2005)—should take time to develop in new democracies. The hypothesized mechanism linking constraint and governance, then, is that when countries democratize, voters’ belief systems are initially under-organized, which impedes representation and accountability, and results in poor policymaking and inefficient economic and social outcomes.

In this paper, I test the hypothesis that constraint matters for governance by comparing levels of constraint between new and established democracies. I do so by analyzing survey data from two global public opinion studies—the World Values Survey and Pew Global Attitudes Project—that ask an identical series of questions in a wide range of democracies and autocracies worldwide.³ In Section 2, I review the leading theories of why constrained political belief systems may—or may not—be important for governance. I also discuss how these theories have attempted to accommodate evidence that constraint is surprisingly min-

¹A closely related issue, over which similar concerns have been raised, is the apparent lack of political knowledge and interest in politics demonstrated by most voters; see Sekhon (2004).

²See Epstein et al. (2006).

³It is worth noting that more rigorous testing and validation of some of the country-level peculiarities in cross-national survey data is still in its early stages (Berinsky and Tucker, 2003; King et al., 2004).

imal in the advanced democracies. Section 3 describes the variation in policy performance between new and established democracies, and shows that the poor policy record of most new democracies can be traced back to patterns of patronage and clientelism that hinder electoral accountability. But is variation in political capital associated with variation in levels of constraint? To determine the extent to which new and established democracies actually differ in terms of their ideological context, in Section 4, I develop a new method for measuring opinion constraint that is appropriate and reliable for cross-national research. My technique is based upon the statistical technique of latent class analysis, and the concept of information entropy. Fitting a latent class model to selected survey questions provides an approximation of the underlying distribution of belief systems in a given population. The relative entropy of this distribution with respect to a null independence model is then a measure of how diffuse or clustered voters' political belief systems are, and hence provides the measure of opinion constraint. Finally, in Section 5, applying this method produces the unexpected result that levels of constraint are *nearly identical* between all types of democracy, and at all durations of democratic regimes. These findings should reassure those who worry about what it means for democracy that voters do not, by and large, organize their political beliefs in consistent ways.

2 Reconciling “Low” Constraint and Democratic Performance

Historically, there have been two ways to define constraint: at the individual level and at the mass level. Converse (1964) termed these “dynamic” and “static” constraint, respectively. Constraint at the individual level refers to the strength of the logical and psychological associations among ideas within each individual's political belief system. Of greater relevance to this paper is the concept of mass constraint, which Converse (1964, 207) defined as “the success we would have in predicting, given initial knowledge that an individual holds a specified attitude, that he holds certain further ideas and attitudes.” This sort of predictive ability can only be assessed once the public's overall belief system structure has been determined, because it is only by looking at patterns of attitudes held by many individuals that inferences can be drawn about what holders of a particular attitude are likely to think about other issues.⁴ Every individual has their own set of political opinions and beliefs. What is interesting is if and when many people have more or less the *same* sets of beliefs. To the extent that this occurs, we call it “constraint”.

In established democracies, electoral institutions serve to hold politicians accountable, despite voters' apparently low levels of belief system organization. Elections bring legislator actions in line with aggregate voter preferences (Powell, 2000; Canes-Wrone, Brady and Cohen, 2002; Erikson, MacKuen and Stimson, 2002), and election outcomes are tied in predictable ways to macroeconomic performance (Lewis-Beck, 1988; Anderson, 2000; Lewis-Beck and Paldam, 2000; Lewis-Beck and Stegmaier, 2000).

⁴Note that if there do exist dominant belief systems in a given population, then individuals whose personal beliefs conform to these societally dominant beliefs are sometimes said to be “constrained” while those whose ideas do not match the dominant pattern are said to be “unconstrained”. But if there are no dominant mass opinion patterns, then it makes no sense to speak of “constrained” individuals in “unconstrained” societies.

Explanations for why low opinion constraint and sustained democratic governance have not, in practice, turned out to be inconsistent, fall into three general groups. The first set of explanations consists of theoretical refinements to the original intuition that coherent attitudes about political issues must be held by most voters in order for democratic accountability to function. Some researchers have argued that it is not attitudes *per se* which need be structured at the mass level, so long as voters possess more fundamental systems of abstract *values* from which decisions about particular political matters may be derived, as needed (Rokeach, 1973; Peffley and Hurwitz, 1985; Feldman, 1988). Other research in this vein stands beside the necessity of organized political beliefs, but contends that it is sufficient, as evidence reveals to be the case, for constraint to be high among political elites and the highly politically sophisticated, within issue domains, and in the presence of partisan or ideological cues (Converse, 1964; Norpoth and Lodge, 1985; Lupia, 1994; Bartle, 2000; Tomz and Sniderman, 2005). However, none of these studies *test* whether constraint is essential to democracy; they only *assume* it as the motivation for their analysis.

The second possible reason why low opinion constraint has not appeared to be harmful for democracy may be because the wrong standards are being utilized to assess the damage. Comparatively lower-constraint democracies may not revert to authoritarianism, but they do have lower levels of political capital, manifesting as lower levels of voter-legislator policy congruence, higher levels of corruption, poorer overall policy performance, lower levels of economic growth and life quality, more aggressive foreign policy, and so forth. Such undesirable conditions (by Western standards, at least) are all political outcomes that democratic governments are typically expected to be able to overcome, in part due to the ideological systems associated with democracy (Hermann and Kegley, 1995; Anderson, 2000; Powell, 2000; Canes-Wrone, Brady and Cohen, 2002; Keman, 2002; Keefer, 2005). If any of these outcomes were found to correlate with low levels of constraint, then that would count as evidence that constraint is indeed important for well-functioning democratic government.

The final possibility—and the one that is best supported by the evidence presented in this paper—is that the hypothesis that it is in general detrimental for democracy if a country’s voters have unconstrained belief systems is actually incorrect (Marcus, 1988). Schattschneider (1960, 131) takes issue with what he views as the unrealistic expectations placed upon voters by those who decry low constraint:

We become cynical about democracy because the public does not act the way the simplistic definition of democracy says that it should act.... The crisis here is not a crisis in democracy but a crisis in theory.

A reasonable alternate hypothesis offered by McClosky (1964, 377) is that,

The opinion has long prevailed that consensus is needed to achieve stability, but the converse may be the more correct formulation, *i.e.*, that so long as conditions remain stable, consensus is not required; it becomes essential only when social conditions are disorganized. Consensus may strengthen democratic viability, but its absence in an otherwise stable society need not be fatal or even particularly damaging.

By this logic, we should not be worried by studies that reveal voters to have low levels of opinion constraint unless those voters reside in countries that are already otherwise at risk of severe disruption.

3 Democratization and Political Capital

Full and partial democracies vary greatly both in terms of the quality of their political institutions, and the economic and social outcomes that policymakers within those institutions are able to produce. Empirical evidence consistently shows that a country's economic prosperity is primarily a function of its political and economic policies (Sachs and Warner, 1997; Temple, 1998; Barro, 1999; Collier and Gunning, 1999). The policies that politicians enact in democratic countries should presumably reflect citizens' interests and values. However, in many new democracies, prosperity has been hindered by official policies actively *harmful* to growth and development (Easterly and Levine, 1997; Englebert, 2000).

It would appear that unlike voters in advanced democracies, voters in new democracies have been unable or unwilling to use the threat of removal in a future election to induce effective political leadership.⁵ The breakdown in the accountability mechanism linking voters and politicians has much to do with the lack of political capital in these democracies, and in particular their tendency toward clientelism and patronage. As long as the voter-politician link is based on patronage, voters will “have little basis on which to judge candidates and to hold incumbent candidates accountable for poor performance” (Keefer, 2005, 6). As Kapstein (2004, 5) explains, “democratic consolidation requires the transformation of economic and political relations from a clientelistic to a contractual basis.”

Adserà, Boix and Payne (2003, 480) succinctly summarize the current state of our understanding of this problem.

Governmental performance hinges more on the way in which the linkage between voters and politicians is structured or institutionalized than on the constitutional framework in place. As of now, however, we do not have the right type of cross-national indicators to measure the extent to which politicians and voters are linked by clientelistic or any other kind of relationships... We need to explore what types of linkages connect politicians and voters in different countries and party systems as well as the ways in which they impair or increase government's accountability.

Comparing levels of ideological constraint across new and established democracies can help illuminate these voter-politician linkages. The dominant expectation in the literature on constraint is that low constraint should be associated with low political capital. Thus new democracies should have lower levels of constraint than established democracies. If, however, levels of ideological constraint are similar between new and established democracies, then this would suggest that voters' belief systems are *not* responsible for hindering accountability and good governance in new democracies—or at least no more so than in the advanced democracies—and that the culprit for a weak accountability mechanism in new democracies lies elsewhere.

3.1 Trends in economic and social outcomes by regime type

From a normative perspective, it can be argued that democracy is superior to non-democracy by definition: it guarantees certain rights and freedoms, provides for popular political rep-

⁵This runs contrary to many of the more optimistic claims touting democracy *alone* as a political and societal “cure-all”. Przeworski (1999) offers thoughtful commentary on this point.

resentation, protects minorities, formalizes systems of legal justice, and so forth. But for those who, like Przeworski et al. (2000), adopt a more “minimalist” view of democracy as an institutional framework that enables the peaceful alternation of political power through contested elections, the institutions themselves are normatively neutral. Instead, the key question becomes whether democracy produces economic growth and other measurable quality-of-life improvements; that is, whether democracy is good instrumentally, rather than intrinsically.

An initial look at general trends in four standard measures of a country’s economic progress and quality of life under democratic and autocratic regimes since 1970 reveals a consistent pattern of under-performance among countries that are any less than completely consolidated democracies (Figure 1).⁶ Following Epstein et al. (2006), I divide countries into “full” democracies, “partial” democracies, and autocracies according to their Polity IV ratings (Marshall and Jaggers, 2005). Polity scores capture a gradient of institutional and regime features, ranging from -10 for complete autocracies to +10 for complete democracies. I label countries with negative scores autocracies, countries from +1 to +7 partial democracies, and countries from +8 to +10 full democracies. To accentuate the differences in outcomes even among full democracies, I further subdivide this group into those scoring +10 versus those scoring only +8 or +9 (approximately two-thirds of full democracies score +10). Compared to all other regime types, the world’s most democratic countries—those scoring +10—are significantly wealthier, and the people living in these countries can expect longer lives, lower infant mortality, and higher adult literacy rates. Other full democracies are far less wealthy, and have worse outcomes on each of the other three measures. The falloff continues for partial democracies and autocracies.

Of course, the composition of each of these regime categories changes from year to year, as countries either democratize or backslide from full to partial democracy, or from partial democracy to autocracy. To obtain a complete picture of the effect of democracy, it is therefore necessary to examine trends in each variable for *individual* countries that undergo transitions to democracy. According to the Polity IV data set, from 1960 to 2000, 58 countries underwent a total of 75 transitions from autocracy to democracy. Of these, 42 countries (43 transitions) experienced five years of continual autocracy prior to the transition, and five years of continual democracy subsequent to the transition. As was apparent in Figure 1, each outcome improved steadily for decades, regardless of regime type. Figure 2 shows that, on average, democratic transitions do not accelerate this improvement.⁷ If anything, median GDP per capita appears to *decrease* slightly after a transition to democracy. It is interesting to note that autocracies that democratize already have higher GDP per capita, lower adult illiteracy, lower infant mortality, and higher life expectancy at the time of the transition, than do average autocracies. Democratizing countries are, in other words, already more similar to partial and full democracies than they are to other autocracies. But had these countries *not* democratized, this evidence indicates that the trend of each of these variables would have been no different in the ensuing five years.

⁶Data are from the World Bank (2005) *World Development Indicators* database. Missing values in the infant mortality and life expectancy time-series have been interpolated by country, as these variables vary extremely smoothly over time.

⁷Because these transitions occurred throughout a forty-year interval in which each indicator consistently trended either upward or downward, the trend is what is important here, not the scale of the vertical axis.

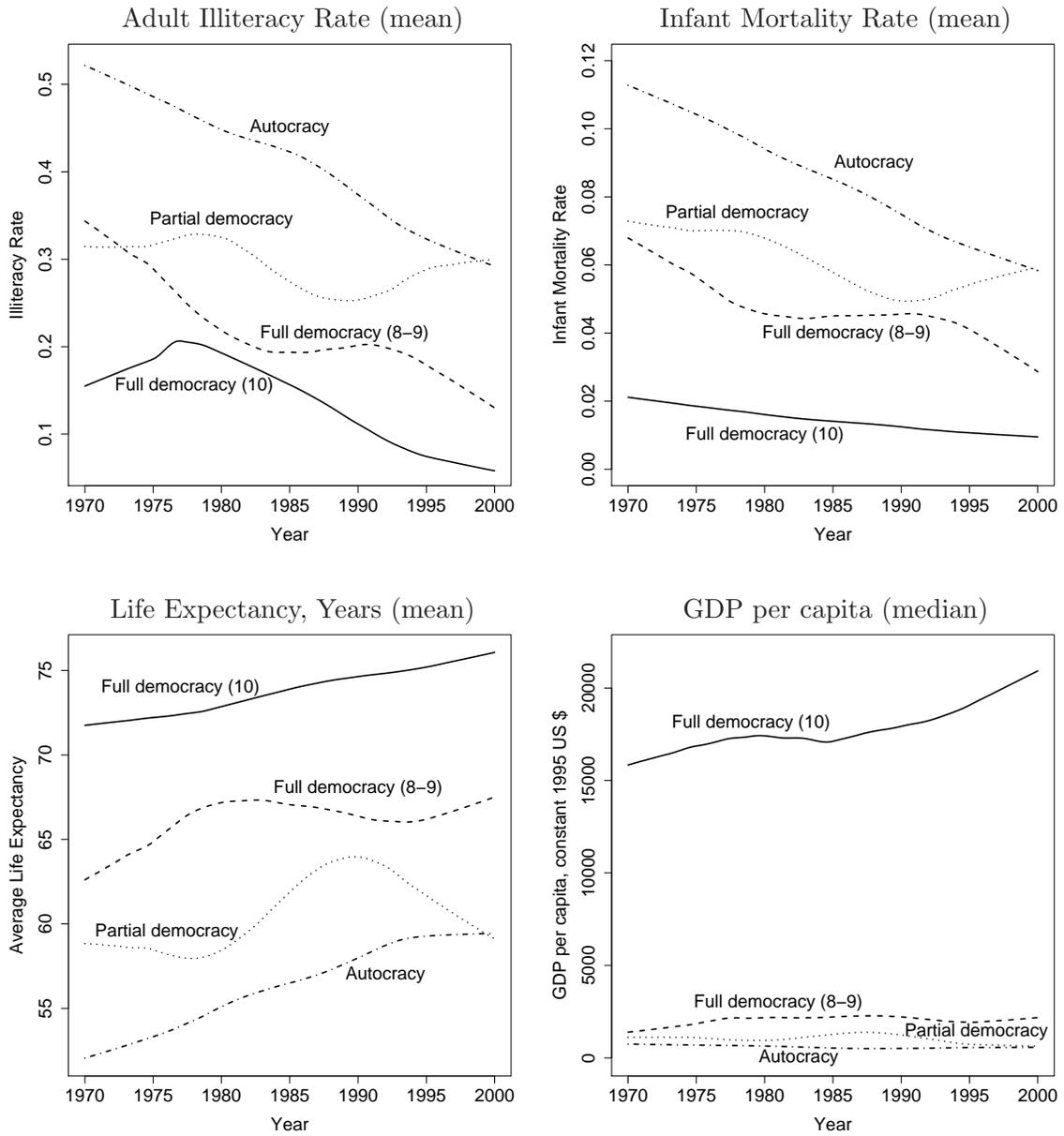


Figure 1: *Loess-smoothed yearly trends in four quality-of-life measures for four groups of democracies and non-democracies, according to their Polity scores. Full democracies are subdivided into those scoring a “perfect” +10 and those scoring an +8 or +9.*

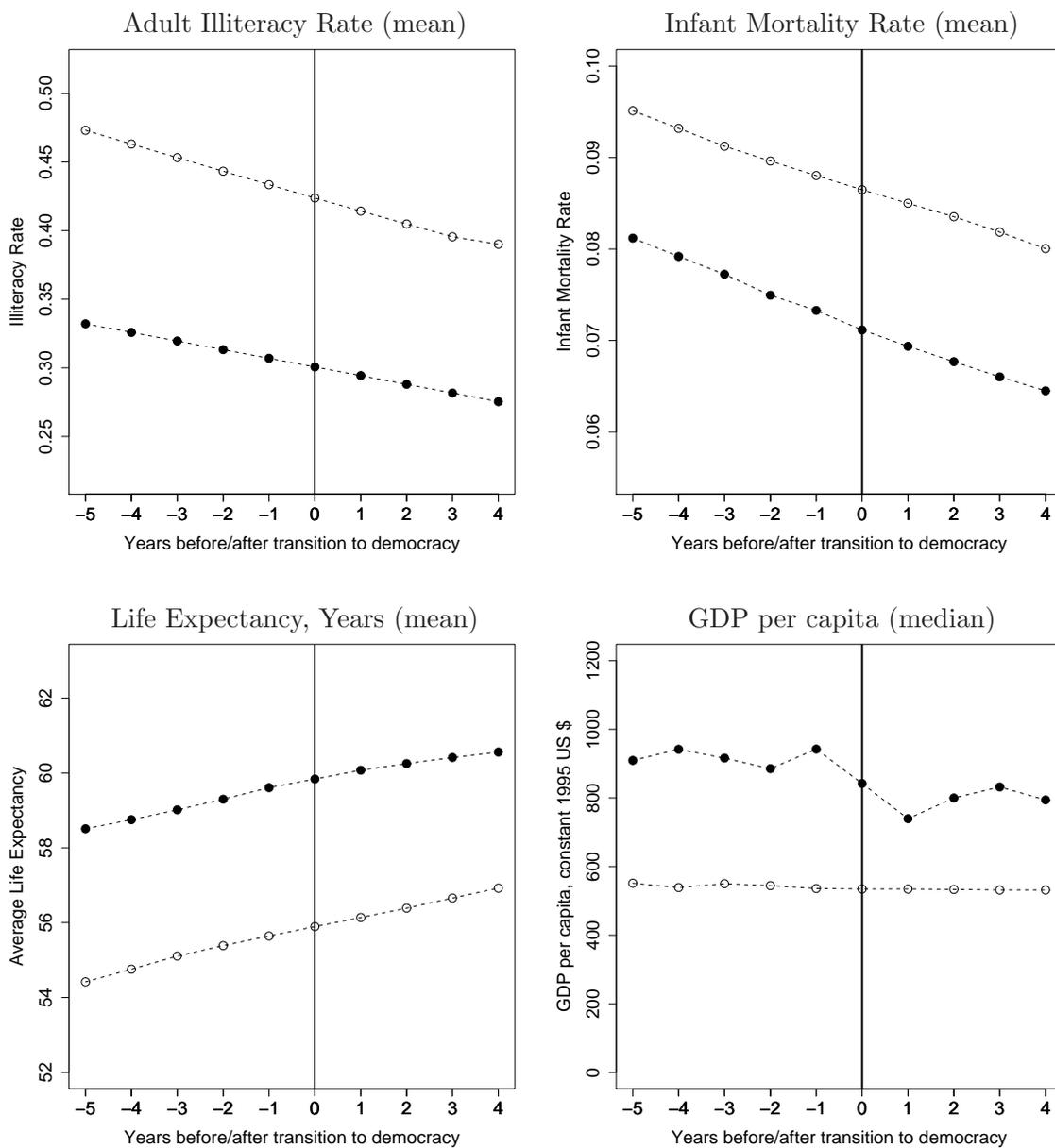


Figure 2: Trends in quality-of-life measures for 43 democratizing countries (\bullet), for five years before and after each country's transition to democracy. The year in which a country becomes democratic, denoted by a vertical bar, is labeled year 0. For comparison purposes, open circles (\circ) represent typical values of each variable for autocracies that did not transition to democracy, over the same 10-year intervals.

3.2 The effects of democratization

The first rigorous econometric tests of the effects of democracy on growth produced results that were ambiguous and often conflicting (Przeworski and Limongi, 1993; Barro, 1999). Depending on the sample frame, the model specification, and various other methodological differences, some studies found that democracies were superior to autocracies in promoting economic growth, while others found just the opposite, and still others found no significant difference between the two types of political regimes.

More recent work has refined the analyses in these early studies by focusing on potential mechanisms through which democratic institutions could *indirectly* promote economic growth. Democracy, it is argued, increases a country's "human capital" and "political capital" in ways that autocracies can and do not. Baum and Lake (2003), for example, find no direct effect of democracy on growth, yet argue that democratic institutions lead to growth through the intermediate step of governmental intervention to improve public health in poor democracies, and educational access and quality in wealthier democracies. Tavares and Wacziarg (2001) and Pinto and Timmons (2005) similarly demonstrate how democracy and political competition lead to increases in human capital that are conducive for growth.

According to the human capital hypothesis, the reason why public spending is higher under democracies than autocracies is because the threat of electoral accountability makes it risky for elected politicians to refuse the demands of the voting public. As Baum and Lake (2003, 337) explain, "because it is easier to replace politicians in more democratic than autocratic regimes, the political system is more responsive to popular demands." Democracy provides incentives to elected politicians to satisfy the voting public. Following this logic, Stasavage (2005) shows that democratic competition has resulted in increased funding of primary education in new African democracies, even despite those countries' weak political institutions. By this theory of democracy, politicians who do not give voters the leadership that they want do not get reelected.

Yet it is an oversimplification to claim that because a country has democratic institutions, it necessarily also has well-functioning mechanisms of accountability. Some of the deviation from ideal levels of accountability is due to the difficulty voters face in assigning politicians responsibility for a diverse set of policy decisions and outcomes; a feature common to all political institutions (Powell and Whitten, 1993). But even this presumes, not necessarily correctly, that voters would be knowledgeable enough to match their political preferences to their voting behavior, if not for these institutional barriers (Adserà, Boix and Payne, 2003). Other potential reasons why elections alone may not induce linkages between voter preferences and legislative outcomes include noncompetitive or unstable party systems, limited reeligibility for incumbent officeholders, a weak opposition party or parties, and an ineffectual news media (Manin, Przeworski and Stokes, 1999, 46-49).

In sum, for accountability to be an even minimally effective force in new democracies, those countries' political systems must possess some measure of *political* capital. As Gerring et al. (2005) and others point out, however, accumulating democratic political capital and improving the quality of governance requires time. Voters and elites must learn how to operate within the new democratic system, and the institutions themselves must develop a certain level of predictability, professionalism, and legitimacy.

Evidence suggests that when an autocracy first transitions to democracy, there is at most a slight improvement in economic growth (Rodrik and Wacziarg, 2005). But in the longer run, given gains in human and political capital, “democracies tend to outperform other types of polity” (Pettersson, 2004, 2). The challenge for countries undergoing democratization, then, is to achieve these benefits quickly. This requires policymakers to allocate state resources wisely, and voters to support these policy decisions. When political capital is lacking, and clientelism and patronage dominate policymaking, governments will allocate resources inefficiently; under-providing non-targeted goods, over-providing targeted goods, and engaging in rent-seeking (Keefer, 2005). Even though this pattern of political patronage may increase quality-of-life measures enough to have secondary effects on growth, these gains will remain suboptimal, and proceed at a very slow pace.

4 Measuring Belief System Constraint

In order to test the hypothesis that ideological constraint is a component of political capital that correlates with regime type, in this section, I develop and lay out a justification for a new measure of ideological constraint that is specifically designed for cross-national analyses of belief systems. This measure, based upon the statistical technique of latent class analysis, permits the multivariate analysis of survey items, and is superior to existing correlational and entropic measures of constraint. I then apply this measure in Section 5.

4.1 Operational difficulties with Converse’s definition

The definition of mass constraint given by Converse (1964) does not immediately suggest a means to operationalize the notion so that it may be quantified. What most researchers, including Converse, have done to measure constraint is to calculate bivariate correlations between pairs of attitude items on public opinion surveys.⁸ This solution has undeniable methodological appeal, as it is easy to estimate, easy to interpret, and easy to communicate. However, it ignores the multivariate nature of belief systems, and in so doing, drastically underutilizes the wealth of information provided by survey respondents. (It also requires that questions have responses that are meaningfully ordered; a less important but still unnecessarily restrictive obstacle to analysis.) A survey that asks, say, ten attitude questions provides respondents ample opportunity to agree on some items and disagree on others. But multi-item patterns of partial agreement between respondents are undetectable to the analyst who simply picks out pairs of questions to estimate correlation coefficients. As Darcy and Aigner (1980, 160) note,

A lack of association among items, in a sample of individuals, does not indicate that *particular individuals* in the population do not connect the items in some fashion.... A matrix of associations can examine the extent to which all individuals share the same ideological perspective, but it fails to measure structure if subgroups of individuals are operating from different perspectives.

⁸The correlation coefficients used are typically those designed for analysis of categorical data; not Pearson product-moment correlation coefficients. For example, Converse (1964) calculates tau-gamma coefficients and Tomz and Sniderman (2005) calculate tau-b coefficients.

Research designs based on pairwise correlations may be entirely sufficient for analysts who have a specific theoretical justification for comparing constraint between particular pairs of beliefs in various issue domains. But correlational methods are insufficient for assessing the overall level of constraint in a population across a wider array of political issues.

When two survey items are highly correlated, it reveals high levels of attitude constraint; but when two survey items are *not* correlated, it could be because the items are independent, or because people share consensus opinions (meaning that survey responses have low variance), or both. The standard usage of correlation statistics to measure constraint has led researchers to associate both independence and consensus with low “static” constraint, even though this does not strictly follow from Converse’s definition. Under consensus, it is quite possible to predict peoples’ beliefs on some issues given knowledge of their beliefs on other issues, and consensus can exist even if certain pairs of questions are statistically independent. Nonetheless, it is understood in nearly all of the literature on belief system constraint that neither consensus nor independence should be considered high constraint.⁹ Constraint implies that there is both variation *within* individual opinion items, and covariation *across* multiple opinion items.

4.2 Abstracting mass belief systems

To measure constraint, let us begin with an abstract conceptualization of public opinion about politics as a multidimensional distribution of attitudes across a given population. If we knew what the distribution of political beliefs looked like, we could follow Converse’s logic quite literally: choose (either arbitrarily or guided by theory) any attitude or combination of attitudes, and calculate the probability—conditional on these chosen attitudes—of observing any other combination of attitudes. A population that had highly constrained belief systems would be revealed by consistently very high and very low values of these conditional probabilities, across many different sets of conditioning and outcome attitudes. It would, in other words, be made up of pockets of high-density combinations of beliefs shared by many individuals in the population. A low-constraint population, on the other hand, would be comprised of people with highly dissimilar sets of political attitudes, manifesting as a mostly diffuse opinion “space” with few high-density areas.¹⁰ Calculating conditional probabilities in a low-constraint population would produce the result that knowledge of some attitudes is not very informative about knowledge of other attitudes.

Note that populations with a significant degree of consensus across a given series of political attitudes will also demonstrate clustering. But voters may share consensus on issues without it necessarily being the case that their holding a certain view on one issue increases the probability that they will hold some other view on a different issue. Therefore, to distinguish high-constraint populations from high-consensus populations, the appropriate measure is how different a population’s distribution of belief systems is from a hypothetical distribution in which beliefs on various issues are mutually independent. This is a point to which I return, below.

Of course, the “true” distribution of political beliefs in any group of individuals is unknown, as is the dimensionality of that distribution. However, we may attempt to approx-

⁹A notable exception is Barton and Parsons (1977).

¹⁰Similar reasoning is employed by Martin (2002, 865).

imate this distribution using responses given to survey questions about political attitudes. The accuracy of this “revealed” distribution will depend upon the questions asked, as well as if the correct model is applied to the responses to those questions. It will also suffer some unavoidable distortion from the measurement error present in all survey items (Achen, 1975), and from the probabilistic nature of individuals’ responses to survey questions (Zaller, 1992).

4.3 Approximating the distribution of political beliefs

Finite mixture models are a class of statistical models that have proven particularly useful for (among other things) approximating empirically the functional form of unknown distributions from observed data. The mixture model approach assumes that the generating distribution for the observed data can be “reconstructed” as a weighted sum of a finite number of component distributions for which the functional form *is* known (Everitt and Hand, 1981; McLachlan and Peel, 2000). The choice of component distributions is left to the researcher, but typically depends on known characteristics of the observed data: are they continuous or discrete, ordered or unordered, and so forth. Once this decision has been made, estimation of the model consists of estimating all of the parameters of the component distributions, as well as a vector of “mixing” proportions—summing to one—that represent the weights assigned to each component.

Latent class models are a type of finite mixture model that are appropriate for modeling the distribution of responses to public opinion surveys, where both the observed data and the assumed component distributions are joint (multivariate) multinomial distributions of discrete categorical variables.¹¹ Such distributions are typically expressed as multi-way cross-classification tables over the observed (or “manifest”) variables.¹² This is precisely the form taken by most public opinion survey data. The key distributional assumption in the latent class model is that any confounding among the manifest variables can be explained by stratifying the observed cross-classification table by an unobserved latent categorical variable with a discrete number of outcome categories. The component distributions, then, are cross-classification tables within which all of the manifest variables are independent; an assumption known as “conditional” or “local” independence.

The number of latent classes—that is, the number of component distributions—is unknown and (as with any finite mixture model) must be assumed by the analyst prior to estimating the latent class model. This choice is typically either guided by theory, or made with reference to parsimony criteria that minimize the number of parameters estimated with respect to the quality of the model’s fit to the data.¹³

¹¹The technique of latent class analysis was first set forth by Lazarsfeld (1950) under the name latent structure analysis. Hagenaars and McCutcheon (2002) provide a broad and useful overview of recent advances in latent class modeling. Chapter 13 in Agresti (2002) makes the connection between latent class models and finite mixture models explicit. Other applications of latent class models in political science include Fleishman (1986); Feick (1989); Weakliem (1995); Hill and Kriesi (2001*a*); and Hill and Kriesi (2001*b*).

¹²Latent class models can be modified to accommodate manifest and latent variables that are either ordered or unordered, but in this paper only the classical latent class model that treats both types of variables as unordered will be used.

¹³The two most widely used parsimony measures are the Bayesian information criterion (BIC) (Schwartz, 1978) and Akaike (1973) information criterion (AIC). Both are penalized likelihood functions; preferred

The values estimated by the latent class model to parameterize the component cross-classification tables are the conditional probabilities of observing each of the outcomes on the manifest variables, given membership in each class. For the analysis of opinion surveys, the manifest variables are any set of questions chosen by the researcher. With a sufficient number of latent classes, the model, once estimated, provides a useful approximation of the underlying distribution of belief system patterns across those manifest variables.

It is important not to reify the constituent distributions in the latent class model. Depending upon the population and survey items under investigation, belief systems may demonstrate greater or lesser degrees of clustering, and it is possible that these clusters will coincide with the latent classes. When this occurs, the latent classes can be seen as representing theoretically meaningful ideological groups. In general, however, each latent class will not necessarily correspond to one cluster of respondents, and indeed this is what occurs in the models I fit below. The clustering turns out to be so minimal that the survey respondents are not strongly partitioned by the constituent distributions of the latent class model. Hence I explicitly refrain from giving the latent classes ideological “labels”. Either way, the object of primary interest in this study is the shape of the distribution rather than the particular issue alignment of each country’s electorate.

4.4 Latent class model notation and estimation

Survey data are the answers given by respondents $i = 1 \dots N$ to questions $j = 1 \dots J$. Each question j has a finite number of unordered responses, K_j , which may vary by question (hence the indexing by j). Denote as Y_{ijk} the observed data, such that $Y_{ijk} = 1$ if respondent i gives the k th response to the j th question, and $Y_{ijk} = 0$ otherwise. The class-conditional response probabilities to be estimated, denoted π_{jkr} , are the probabilities that individuals in class r give the k th response to the j th question. Therefore, for each question, within each class, $\sum_k \pi_{jkr} = 1$.

Following the local independence assumption, the joint probability of an individual i giving any particular set of responses on the manifest variables, assuming they belong to class r , is

$$f(Y_i; \pi_r) = \prod_{j=1}^J \prod_{k=1}^{K_j} (\pi_{jkr})^{Y_{ijk}}. \quad (1)$$

Let p_r denote the R mixing proportions— R being specified prior to estimating the model—such that $\sum_r p_r = 1$. Then the probability density function across all classes is

$$\Pr(Y_i | \pi, p) = \sum_{r=1}^R p_r \prod_{j=1}^J \prod_{k=1}^{K_j} (\pi_{jkr})^{Y_{ijk}}. \quad (2)$$

models minimize values of the BIC and/or AIC. The BIC is more appropriate for latent class models of the sort utilized in this paper because of their relative simplicity (Lin and Dayton, 1997). It is also standard to calculate χ^2 and likelihood ratio chi-square (G^2) goodness of fit statistics for the observed versus predicted cell counts, but the distributional assumptions for these measures are not met if many cells contain zero observations.

The parameters of the latent class model, p_r and π_{jkr} , may be estimated by maximizing the log-likelihood function

$$\ln L = \sum_{i=1}^N \ln \sum_{r=1}^R p_r \prod_{j=1}^J \prod_{k=1}^{K_j} (\pi_{jkr})^{Y_{ijk}}. \quad (3)$$

This function is identical in form to the standard finite mixture model log-likelihood.¹⁴

In this manner, the latent class model produces a fully parameterized probability distribution function that approximates the “true” unknown distribution of belief systems in a given population.

4.5 Constraint as relative entropy

If constraint is low, then there is minimal confounding present among the observed survey items, and hence individuals’ beliefs on various survey items will be nearly mutually independent. In this case, a latent class model with only one component ($R = 1$) will fit the data well, as local independence has been achieved without needing to further stratify the observed cross-classification table.¹⁵ This model represents the “null” hypothesis of zero constraint. As populations increase in constraint, there will be greater clustering of survey responses, and thus greater covariation between responses to multiple survey questions. A latent class model with two or more components ($R > 1$) will be able to account, at least in part, for this confounding, and will thus provide a superior fit to the data. Constraint can therefore be assessed by comparing the multi-component fit to the single-component fit. The greater the difference between these two distributions, the higher the constraint in the population, across the survey questions selected for analysis.

A measure for the “distance” between two random variables is the Kullback-Leibler divergence (Kullback and Leibler, 1951). If $P(i)$ is the probability density function estimated by the multi-class latent class model, and $Q(i)$ is the “null” independence model, then the K-L divergence from P to Q is defined

$$D_{KL}(P||Q) = \sum_i P(i) [\log P(i) - \log Q(i)]. \quad (4)$$

Here, i indexes the cells of the observed cross-classification table of survey variables. Larger values of D_{KL} reveal greater constraint. D_{KL} is minimized at zero when the multi-class model is equal to the independence model; that is, when $P(i) = Q(i)$. The K-L divergence is also known as “relative entropy”.

Relative entropy (Eq. 4) is related to the measure of entropy previously suggested by Darcy and Aigner (1980) and Martin (1999, 2002) to measure belief system constraint. In information theory, entropy is a measure of the dispersion of information in a signal or event (Shannon, 1948), and is expressed in units called *bits* or *nats*.¹⁶ Formally, for a discrete

¹⁴All latent class models in this paper are estimated using the poLCA statistical package (Linzer and Lewis, 2006), implemented in R 2.3.1 (R Development Core Team, 2006).

¹⁵This model is also equivalent to a loglinear independence model (Goodman, 1970).

¹⁶Gill (2005) applies entropy analysis to vote choice, and provides a more complete discussion of the relevance of information theory to political behavior.

random variable distributed with a proportion of cases $P(i)$ in each of a finite number of categories, entropy is defined deterministically as

$$H = - \sum_i P(i) \log P(i). \quad (5)$$

Entropy is therefore minimized at zero when all cases are in the same category (i.e., there is zero dispersion), and maximized when cases are dispersed evenly across all categories.

Using the entropy of the observed cross-classification table as a measure of ideological constraint, however, has significant theoretical and methodological shortcomings. First, the entropy of the observed table is simply a linear transformation of the relative entropy from the observed table to a hypothetical *uniform* distribution (this result is given in Appendix A). This means that the implicit “null” model is equiprobability, and hence the measure is unable to distinguish between constraint and consensus. Recall that in contrast, the “null” model when applying the *relative* entropy measure (Eq. 4) is mutual independence among the observed survey questions. Equiprobability is only one special case of mutual independence.

Second, because the entropy measure is deterministic, it will be idiosyncratic to each sample and produce biased estimates of the underlying population entropy.¹⁷ The size of this discrepancy will vary depending on the size of the sample, and can become fairly large in small samples. It will also increase with the number of cells in the observed cross-classification table, and with the actual dispersion of belief systems in a given population. The source of the bias is straightforward: when cells in the cross-classification table of the manifest variables contain no observations—a common occurrence when analyzing more than a handful of variables—then $P(i) = 0$ for those cells, and they are not counted in the entropy calculation of Eq. 5. Taken together, these sources of bias are problematic because it is the entropy of the *population*, not the sample, that—at least according to Darcy and Aigner (1980) and Martin (1999, 2002)—is the ultimate quantity of interest.

Even if we accepted the null hypothesis of equiprobability, the entropy measure (H) would still be unusable for cross-national research because of the fact that its bias varies with the sample size and the true population entropy. In global opinion studies that administer the same survey in multiple countries, sample sizes vary; the World Values Survey (Inglehart et al., 2004), for example, has country samples that range from 417 to 6025 respondents. And since our aim is to measure population entropy, it is troubling that samples drawn from populations that have very low constraint will seem far more constrained to the deterministic entropy measure than they actually are.

These properties can be demonstrated through Monte Carlo simulation. Assume hypothetical populations with high, moderate, and low levels of constraint, and two latent classes. Suppose that we observe a large table containing seven survey questions with three responses each (2187 cells), and a small table containing four questions with three responses each (81 cells).¹⁸ For each hypothetical population, I simulate random samples ranging in size from 100 to 5000 respondents. I then calculate the deterministic entropy, and the entropy of fitted latent class models with one through three latent classes (that is,

¹⁷See, for example, Schürmann (2004).

¹⁸The maximum entropy in any table is the log of the number of cells; here, it is $\ln(2187) = 7.69$ for the large table, and $\ln(81) = 4.39$ for the small table.

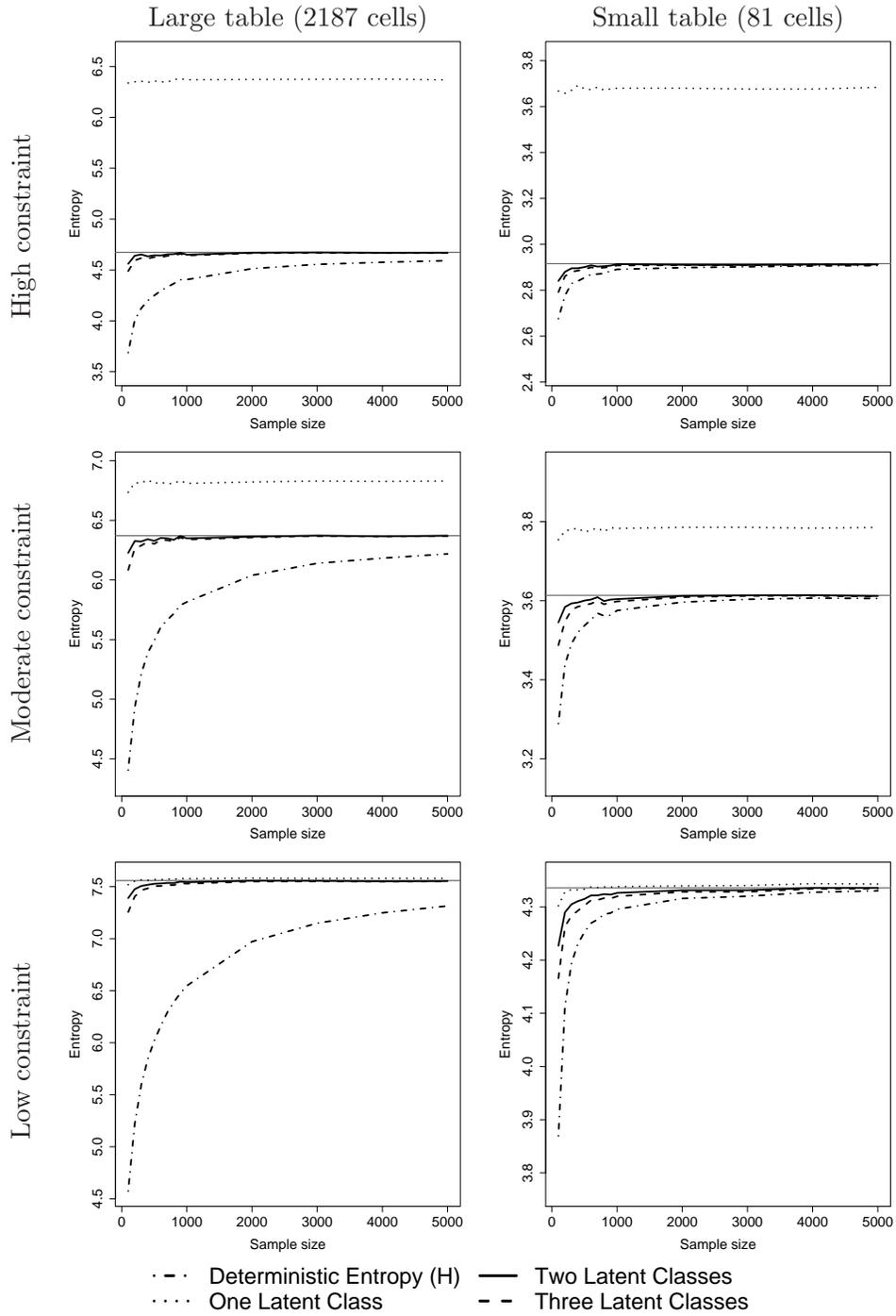


Figure 3: Monte Carlo simulation results. The entropy of a fitted latent class model with an appropriately selected number of latent classes gives an unbiased estimate of the population entropy, for all but the smallest sample sizes. The deterministic entropy measure is biased in small samples, in low-constraint populations, and when the number of cells in the cross-classification table is large. The horizontal gray line denotes the true entropy of the population distribution used to generate the sample data.

the K-L divergence from the fitted distribution to the uniform distribution). The bias in the deterministic entropy measure is immediately apparent (Figure 3). The two-class latent class model produces the most accurate estimates of the true entropy in the population, regardless of whether the observed cross-classification table is small or large. The three-class latent class model also performs extremely well, despite it being the “wrong” model. And, as expected, the one-class (independence) model overestimates the entropy in the presence of constraint, but provides a very good fit to the data in the absence of constraint.

To summarize, the proposed three-step method for measuring belief system constraint is:

1. Fit a multiple-component latent class model to a series of observed survey questions, to approximate the joint distribution of responses to those questions. Call this distribution $P(i)$.
2. Fit a one-component latent class model (i.e., a loglinear independence model) to the same survey responses. Call this “null” distribution $Q(i)$.
3. Use Eq. 4 to calculate the relative entropy (K-L divergence) from $P(i)$ to $Q(i)$.

Higher values of the relative entropy reveal greater constraint. Since relative entropy is measured in units that lack an obvious substantive interpretation, the concept is best applied for making comparisons across different populations or issue areas. Although results from such comparisons will be sensitive to prior methodological choices regarding question wording and selection of variables for analysis, this is no less the case for other existing correlational and entropic techniques for measuring constraint.

4.6 A brief illustration

To illustrate this method, I present a very limited example using data from the Pew Global Attitudes Project (2003), a cross-national public opinion survey fielded in 44 countries. Three questions on the survey asked respondents to rate their satisfaction with how well things were going in their country and in the world, and to describe their country’s current economic situation. Results from the United States (a full democracy), Argentina (a borderline partial-full democracy), and Ghana (a partial democracy) are given in Table 1. Also reported are predicted cell counts under the “null” independence model and the fitted multi-class latent class model. In each country, the two-class model fits the data significantly better than the one-class model, as indicated by the χ^2 statistics.

Respondents in Argentina are nearly unanimously dissatisfied; because of this consensus, the entropy of the fitted distribution is low, as is the relative entropy from the two-class model to the independence model. With little response variation within survey questions, and little covariation across questions, ideological constraint (relative entropy) in Argentina is the lowest of all three countries. Responses are more dispersed in the United States and Ghana, with clusters of respondents sharing both positive and negative views of their current situation. However, constraint in Ghana is higher than in the United States, as revealed by the greater improvement in fit over independence that the two-class model provides.

Lastly, note the difference between the number of belief clusters in each country and the number of fitted classes. Argentina has one large cluster of respondents, and the United States and Ghana each have one larger cluster and two smaller clusters. But in all three

Survey responses			Argentina			USA			Ghana		
Q7	Q9	Q12	Predicted			Predicted			Predicted		
			Obs.	R = 1	R = 2	Obs.	R = 1	R = 2	Obs.	R = 1	R = 2
1	1	1	0	0.0	0.0	17	4.0	13.2	23	3.2	16.4
1	1	2	2	0.0	1.9	112	46.5	108.5	59	23.4	65.9
1	1	3	6	0.7	6.1	38	44.3	48.0	5	12.2	4.9
1	1	4	2	1.9	2.0	8	13.1	5.3	1	5.4	0.9
1	2	1	0	0.1	0.0	20	18.6	24.9	7	10.1	13.2
1	2	2	2	0.3	1.3	228	216.7	231.1	71	74.7	63.4
1	2	3	5	5.7	6.1	165	206.5	147.8	15	39.0	14.7
1	2	4	8	16.2	7.5	23	61.2	32.2	4	17.1	5.7
2	1	1	0	0.3	0.2	4	5.0	3.1	5	7.1	5.8
2	1	2	3	1.1	3.9	31	58.6	32.5	34	52.4	32.7
2	1	3	25	19.4	23.3	27	55.9	26.3	10	27.4	11.7
2	1	4	40	54.6	40.6	7	16.6	7.1	6	12.0	4.9
2	2	1	3	2.6	2.7	10	23.4	9.8	8	22.7	7.6
2	2	2	4	9.5	4.0	224	273.1	223.0	154	167.5	156.0
2	2	3	155	165.2	155.5	337	260.3	344.8	136	87.5	134.8
2	2	4	489	466.3	488.8	130	77.1	123.4	62	38.5	61.6
N			744	744	744	1381	1381	1381	600	600	600
Log-likelihood				-855.4	-830.5		-3119.9	-3003.2		-1382.4	-1281.3
χ^2				168.3	1.2		279.5	11.1		285.7	8.5
Entropy					1.117			2.177			2.140
Relative entropy					0.033			0.082			0.165

Q7: Are you satisfied (1) or dissatisfied (2) with the way things are going in our country today?
 Q9: Are you satisfied (1) or dissatisfied (2) with the way things are going in the world right now?
 Q12: How would you describe the current economic situation in (survey country)—is it very good (1), somewhat good (2), somewhat bad (3) or very bad (4)?

Table 1: *Observed versus predicted cell counts for three survey questions in Argentina, the United States, and Ghana. Results from the “null” one-class model are labeled R = 1; results from the fitted two-class model are labeled R = 2.*

countries, the two-class model fits the data very well. This is a clear example of the latent classes not necessarily coinciding with the observed belief system clusters, as discussed above.

5 Constraint in Comparative Perspective

It is expected that individuals in all countries will demonstrate some measure of consistency in their responses to selected questions, resulting both from ideological beliefs and the logical connections between the questions.¹⁹ The question, then, is how strongly each of these two forces operate in various political contexts in different countries. The theoretical expectation that motivated much of the concern discussed at the outset of this paper is that established democracies will exhibit greater constraint, because ideological pressures from politicians

¹⁹These are the two primary “sources of constraint” originally set forth by Converse (1964, 209-213).

and parties are more clearly defined and have had more time to establish themselves. In new democracies, where these forces are weaker or do not (yet) exist, we should observe lower constraint—hence the worry. There is no theoretical prediction about how the logical sources of constraint should vary by political context. But we do expect that subgroups of people within each country that are more knowledgeable about political affairs will be more attuned to elite ideological discourse, and therefore possess more highly constrained belief systems (Converse, 1964; Zaller, 1992; Tomz and Sniderman, 2005).

Because Western standards are ultimately being used to judge the performance of democracies (a point noted above), I measure political opinion constraint based upon questions that reflect the left-right ideological perspective dominant in Western politics.²⁰ Of course, it is likely that in non-Western democracies, beliefs are constrained according to issues pertinent to political affairs unique to each country, which do not necessarily align with Western ideological systems. To the extent that this is the case—and it is purely an empirical question as to whether or not it is—the decision to analyze Western-style issue questions could seriously underestimate the amount of opinion constraint in non-Western countries.²¹ On the other hand, using a different set of survey items in each country would seriously lessen the cross-country comparability of measures of opinion constraint, which is the objective of this study. The fact remains that all existing cross-national survey programs are designed from a Western perspective and ask about issues and values relevant to a Western understanding of politics. Analyzing a consistent set of Western-style ideology questions in all countries worldwide may seem to “stack the deck” for the expected finding that established democracies will demonstrate greater belief system constraint, but it will also make it that much more remarkable if empirical testing reveals this not to be so.

5.1 Results from the World Values Survey

To investigate worldwide variation in ideological constraint, I begin by analyzing opinion data from the World Values Survey (Inglehart et al., 2004). The most recent round of the World Values Survey was fielded in the late 1990s and early 2000s, and included a series of four questions about domestic economic policy asked to respondents in 54 countries: 18 full democracies with +10 Polity scores, 12 full democracies with +8 or +9 Polity scores, 14 partial democracies, and 10 non-democracies.²² Each question instructed respondents

²⁰See McClosky and Zaller (1984, ch. 7).

²¹For example, Blaydes and Linzer (2006) demonstrate that there exists considerable amounts of opinion constraint among Muslims worldwide concerning societal norms about gender and religion. But that study did not necessarily expect those ideas to form the basis of a coherent *political* ideology (although there are reasons to believe that it might).

²²Countries are categorized by their Polity score in the year in which the survey was fielded. The +10 full democracies are Australia, Austria, Canada, Czech Republic, Finland, Iceland, Ireland, Italy, Japan, Lithuania, Netherlands, New Zealand, Norway, Spain, Switzerland, Great Britain, United States, and Uruguay. The +8 and +9 full democracies are Argentina, Brazil, Chile, Dominican Republic, France, Mexico, Peru, Philippines, Poland, Romania, South Africa, and South Korea. Partial democracies are Albania, Bangladesh, Armenia, Taiwan, El Salvador, Estonia, Georgia, Moldova, Russia, Turkey, Ukraine, Macedonia, Tanzania, Venezuela. Non-democracies are Azerbaijan, Belarus, China, Morocco, Singapore, Vietnam, Zimbabwe, Uganda, Serbia, and Montenegro.

to place themselves along a 10-point scale according to how much they agreed with either of a pair of statements:²³

1. *We need larger income differences as incentives for individual effort*, vs. *Incomes should be made more equal*.
2. *Private ownership of business and industry should be increased*, vs. *Government ownership of business and industry should be increased*.
3. *People should take more responsibility to provide for themselves*, vs. *The government should take more responsibility to ensure that everyone is provided for*.
4. *Competition is good. It stimulates people to work hard and develop new ideas*, vs. *Competition is harmful. It brings out the worst in people*.

These questions were selected because they 1) reveal respondents' views about how politics and government *should* function rather than evaluating how it *is* functioning; 2) are issues which legislators can control through policymaking and for which—in democracies—they can theoretically be held accountable for by voters at the polls; and 3) share the same issue domain (domestic economic policy), which, as previous research has shown, should reveal greater amounts of opinion constraint. On each item, the first statement is the expected conservative stance and the second statement is the expected liberal stance.

I apply the methods described in Section 4, using these four questions as the manifest variables, and a latent class model with three component distributions. Experimentation with different numbers of component distributions reveals that the relative entropy measure of constraint increases by a small amount with each additional latent class. This occurs because using more components in the model generates a closer fit to the data. But the goal is not to fit the data, *per se*; rather it is to approximate the underlying *distribution* of the data. For any number of latent classes beyond three, the relative ordering of countries from high to low constraint remained almost entirely unchanged.

The measure of constraint based upon the relative entropy produces the unexpected finding that full and partial democracies—and even non-democracies—are *nearly indistinguishable* in terms of the amount of opinion constraint evidenced in their population. This is true even when controlling for education level and self-reported ideological moderation/extremism (Figure 4). In the left panel, I have subdivided each country's population according to whether or not respondents reported having more than a secondary level of education, and estimated constraint within each group. For each country, I plot the constraint for the high education group against the constraint for the low education group. In the right panel, I repeat this for respondents with strong and weak ideological self-identification.²⁴ That most countries lie above the 45-degree line for both variables validates my methodology, as this result is in line with previous researchers' findings that more educated and more ideologically committed individuals exhibit greater belief system constraint.

²³These are WVS items E035, E036, E037, and E039, respectively.

²⁴The education question is WVS item X025 and the ideology question is WVS item E033. Ideology is asked as a ten-point left-right scale; I assign those who report a 4, 5, 6, or 7 into the "low ideology" group, and the remainder into the "high ideology" group. A few countries did not have enough respondents in one of the education or ideology subgroups to make the latent class model identified. For these countries, I have plotted the relative entropy across the entire sample on the 45-degree line.

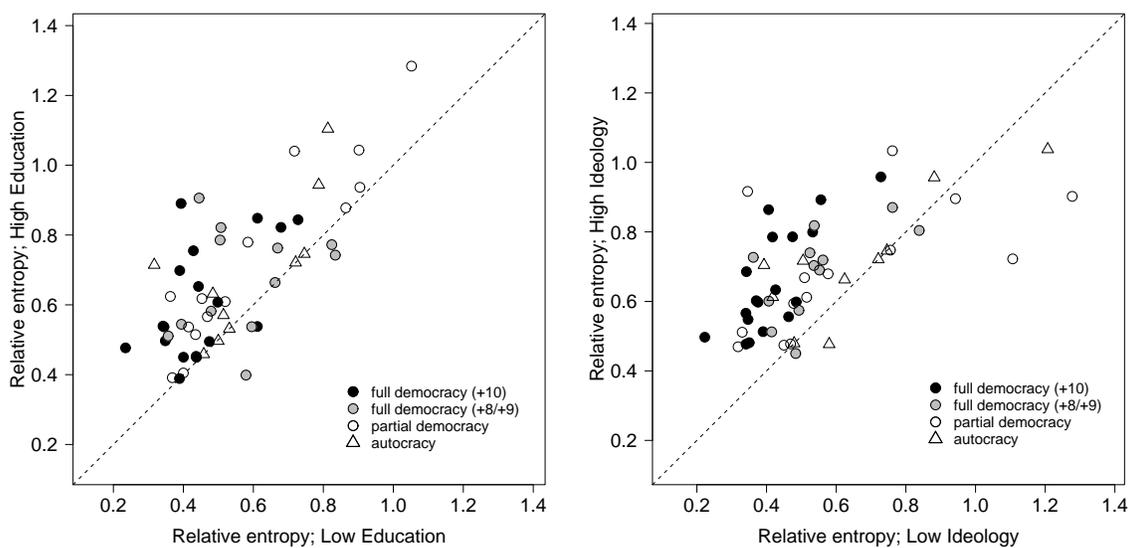


Figure 4: *Political opinion constraint among domestic economic issues in 56 countries in the WVS. Points represent the relative entropy among low-education vs. high-education respondents (left) and low-ideology self-identification vs. high-ideology self-identification respondents (right) in each country. Higher relative entropy indicates greater constraint.*

5.2 Results from the Pew Global Attitudes Project

The Pew Global Attitudes Project (GAP) was administered in 2002. In 39 of the 44 GAP study countries, a set of five questions was asked regarding globalization, social welfare policy, and immigration. I use these questions to investigate levels of opinion constraint in a different, and more varied, policy domain than the domestic economic issues covered by the WVS. The questions are:²⁵

1. *Do you think that globalization is a good or a bad thing?*
2. *Is it more important that everyone be free to pursue their life's goals without interference from the government, or that the government play an active role in society so as to guarantee that nobody is in need?*
3. *Do you agree or disagree that it is the responsibility of the government to take care of very poor people?*
4. *Do you agree or disagree that our way of life needs to be protected against foreign influence?*
5. *Do you agree or disagree that we should restrict and control entry of people into our country more than we do now?*

²⁵These are GAP items 33, 34, 37B, 37G, and 37I, respectively. Each question has four possible responses, except for the second question which has two possible responses.

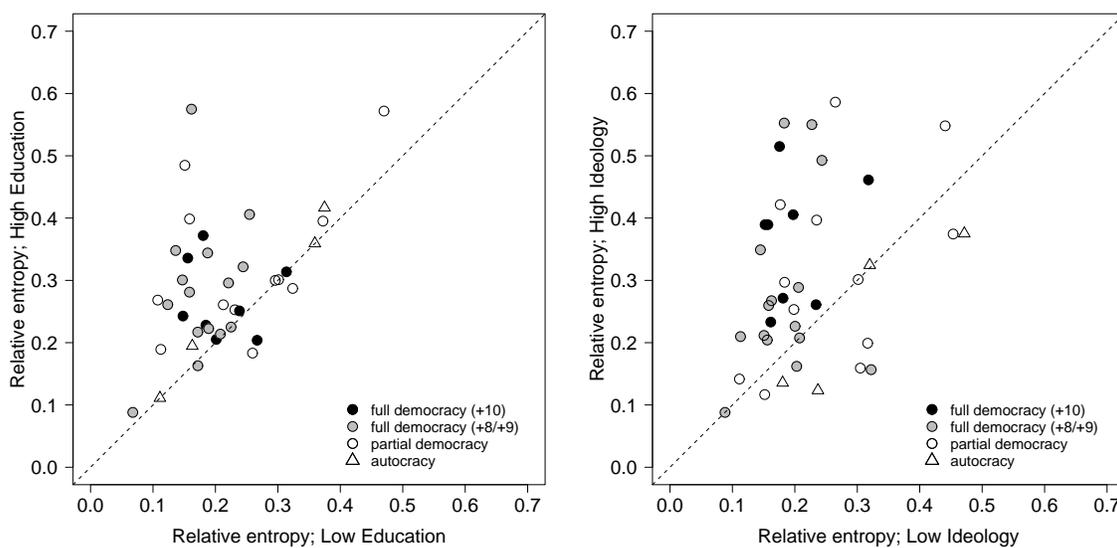


Figure 5: *Political opinion constraint among survey questions in 39 countries in the Pew Global Attitudes Project. Points represent the relative entropy among low-education vs. high-education respondents (left) and low-ideology self-identification vs. high-ideology self-identification respondents (right) in each country. Higher relative entropy indicates greater constraint.*

As before, these items were selected for analysis because they reveal respondents’ preferences towards specific political issues with implications for policy and legislator accountability. I again use a three-component model when applying the methods put forth in Section 4.

The results from the analysis of the GAP data, illustrated in Figure 5, match what was found in the WVS data: full and partial democracies have roughly identical levels of opinion constraint.²⁶ Subgroups of individuals who are more highly educated or more ideologically extreme tend to demonstrate greater amounts of opinion constraint.²⁷ And in general, constraint is lower across these questions—which span multiple, more loosely-connected policy domains—than it was across the economic policy questions from the WVS. Each of these findings reconfirm that the method is producing valid results.

²⁶The 39 GAP countries analyzed here include the +10 full democracies Canada, Czech Republic, Germany, Italy, Japan, Poland, Great Britain, and the United States; the +8 and +9 full democracies Argentina, Bolivia, Brazil, Bulgaria, France, Guatemala, India, Kenya, South Korea, Mexico, Peru, Philippines, Senegal, Slovakia, and South Africa; partial democracies Bangladesh, Ivory Coast, Ghana, Honduras, Indonesia, Mali, Nigeria, Russia, Tanzania, Turkey, Ukraine, and Venezuela; and non-democracies are Angola, Pakistan, Uganda, and Uzbekistan.

²⁷The education and ideology variables (GAP items 84 and 93, respectively) are coded as they were in the WVS analysis. In some countries, the GAP survey asked about party loyalties rather than ideological self-placement. For those cases, I coded respondents who identified with any party as “high” ideology, and respondents who had no party identification as “low” ideology.

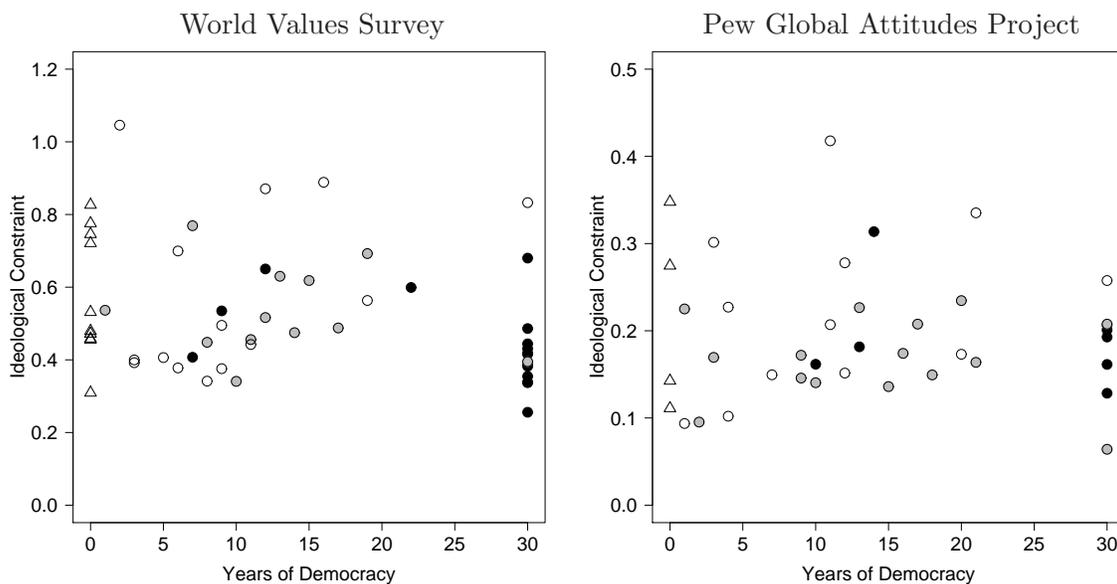


Figure 6: *Constraint versus duration of democratic regime. Each point represents one country, with regime type denoted as in Figures 4 and 5. Countries with 30 or more consecutive years of democracy are plotted at 30.*

5.3 Length of exposure to democracy

Political capital, following Gerring et al. (2005), is a function of both regime type *and* duration of exposure to democratic institutions. Thus I compare the measures of each country’s overall level of constraint, obtained from the above analyses of the WVS and GAP surveys, to the number of years each country has been democratic (Figure 6). There is no clear pattern of increasing constraint as voters spend more time living under democracy. Nor does constraint among only high-education or high-ideology respondents increase with exposure to democracy.²⁸ The long-lived, advanced Western democracies appear as a cluster of points in the lower-right hand corner of both plots, with levels of constraint just as low—or lower—than most other partial and full democracies.

The results presented here, based upon data from both the WVS and GAP studies, do not depend on the particular questions chosen for analysis. I experimented repeatedly with different combinations of survey questions from both studies, and the findings were consistent each time: there is no support for the theory that established democracies are more constrained ideologically than new democracies or non-democracies. And this is true even despite the fact that the questions selected for analysis fit solidly in a Western ideological framework. Indeed, the discovery of high constraint among many new and non-democracies raises a whole new set of questions about why individuals in these countries should demonstrate so much more constraint than those under democratic rule. Further theory is needed to explain this phenomenon.

²⁸Level of interest in politics or religion, which are both other possible sources of constraint, also fail to explain the pattern.

6 Conclusions

In this paper, I have presented the first broadly comparative analysis of ideological constraint across a large variety of democratic and non-democratic political regimes. I have also proposed a new technique for using survey data to measure mass opinion constraint cross-nationally. Applying this methodology, I find that constraint in the advanced democracies is no greater than constraint in the new, partial democracies. Constraint is therefore *not* associated with levels of political capital; hence nor does low constraint negatively impact quality of governance.

Previous researchers who have judged ideological constraint in the advanced democracies to be “low” have therefore been correct—but for the wrong reasons. Those who have sought to “reconcile” democratic governance with low levels of opinion constraint have assumed that constraint is an important feature of a well-functioning political system. But this paper shows that the well-functioning political systems of the established democracies operate with just as much (or less) mass opinion constraint as the less predictable political systems of the new and partial democracies.

The argument linking constraint and governance, therefore, can not be based on notions of sufficiency. For if this were the case, then by the evidence presented in this paper, emerging democracies—and even some non-democracies—would already possess sufficient levels of constraint for governance at a higher standard than what is actually observed. Nor can the argument be one of necessity. It would make no sense to claim that democracy suffers unless mass constraint achieves the level at which it is observed in established democracies, when the data clearly show that such levels have already been achieved (and in many cases, surpassed) by both new democracies and non-democracies. If opinion constraint is neither necessary nor sufficient for effective governance, then worrying about voters not demonstrating “enough” constraint for democracy to operate seems like a misguided theoretical approach.

None of this, however, changes the fact that the promise of democratic institutions to promote economic growth and political stability remains largely unfulfilled in many new democracies. Democratic theorists emphasize the importance of electoral accountability as the key mechanism for effective governance, and the normative concern regarding low constraint speaks to whether or not people know enough about politics to hold politicians accountable. These issues, in turn, are part of a broader debate over what democracy requires of its citizenry. Is “ideology-building” an essential component of “nation-building”? It may appear paradoxical, yet considering the results of my analysis, perhaps the problem is not insufficient constraint, but rather too much.

Appendix A

Let P denote the observed distribution of cases over the C cells of the cross-classification table of the manifest variables. Assume that Q is the uniform distribution over that same table, such that $Q(i) = 1/C$. Substituting into Eq. 4,

$$\begin{aligned} D_{KL}(P\|Q) &= \sum_i P(i) [\log P(i) - \log(1/C)] \\ &= \sum_i P(i) \log P(i) - \sum_i P(i) \log(1/C) \\ &= \sum_i P(i) \log P(i) + \sum_i P(i) \log C \\ &= \sum_i P(i) \log P(i) + \log C \\ &= \log C - H \end{aligned}$$

where H denotes the entropy (Eq. 5), and recognizing that $\sum_i P(i) = 1$.

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