Party Nationalization and Institutions

Scott Morgenstern   University of Pittsburgh
Stephen M. Swindle   Lee University
Andrea Castagnola   University of Pittsburgh

Party nationalization has two distinct components: the first is based on the degree of homogeneity in the geographic distribution of a party's vote, and the other is defined by the degree to which national events are reflected in the change in a party's electoral support in all regions of the country. In spite of literature tying the static/distributional and the dynamic components together, we show theoretically and empirically that there is a nonnecessary link between them. We then use a seemingly unrelated regression analysis on 60 parties across 28 countries to show that while the executive system (presidentialism vs. parliamentarism) drives an explanation of the dynamic levels of nationalization, the electoral system explains much of the variance in the static/distributional aspect of the phenomenon.

Among its long-lasting impacts, Schattschneider's *The Semisovereign People: A Realist's View of Democracy in America* (1960) generated a keen interest in party and party system nationalization. While most of the early work on the territorial structuring of electoral politics focused on the United States and Great Britain, recent work has begun to expand the geographic scope of this issue. For example, Chhibber and Kollman (2004) compare the United States with India and Canada, Caramani (2000, 2004) explores Europe, and Jones and Mainwaring (2003) consider the topic with a Latin American focus. The subject has aroused what has now been almost a half-century of interest, because nationalization both reflects a country's political cleavages and realignments, and it influences such critical aspects of politics as the ways governments target spending, the representation of important social groups, and the relations between executives and legislatures (Claggett, Flanigan, and Zingale 1984; Katz 1973a; Kawato 1987; Rose and Urwin 1975; Stokes 1967).

Schattschneider's descendents have since identified two dimensions of nationalization. The first dimension considers the degree to which there is an equal distribution of party votes across different districts (or other subnational electoral units) at a single point in time—what some have referred to as vote homogeneity (Caramani 2000, 2004; Jones and Mainwaring 2003), but what we term *static/distributional* nationalization. That is, static/distributional nationalization measures the consistency of a party's support across a country at a particular point in time. It therefore measures the degree to which a party has broad appeal across the nation. A second dimension, what we term *dynamic* nationalization, considers the degree to which a party's vote in the various districts changes uniformly across time (Brady, D'Onofrio, and Fiorina 2000; Claggett, Flanigan, and Zingale 1983; Katz 1973a; Kawato 1987; Schattschneider 1960; Stokes 1965, 1967). As such, dynamic nationalization presumably contrasts systems where national political events influence electoral change (thus yielding changes in a party's support that are similar in all districts) with those where local factors are eterminant (which should yield dissimilar movements across districts).

Although there are two distinctive meanings of the term *nationalization*, little research to date has considered the theoretical and empirical relations between them, especially in a comparative context.[1] Our objectives in this paper, then, are to build a comparative database of the two dimensions of nationalization, to develop a set of systematic theoretical

---

[1]Caramani (2004) is a partial exception. He discusses the two dimensions, but focuses his work on just one.

expectations of their independence and relationship, and to test an empirical model that explains the wide variation in the levels of the two dimensions.

Our explanatory models grow from the idea that, since the dimensions of nationalization are unrelated theoretically and (almost) unrelated empirically, they must reflect different causal models. Previous research has sometimes distinguished between the two types of nationalization, but there are no models that explain a party or country's position along the two scales simultaneously. Building on literature related to one aspect or the other of nationalization, (Cain, Ferejohn, and Fiorina 1987; Carey and Shugart 1995; Chhibber and Kollman 2004; Claggett, Flanigan, and Zingale 1984; Grofman and Lijphart 1986; Katz 1973a; Kawato 1987; Morgenstern and Swindle 2005; Stokes 1965, 1967), we hypothesize that different institutional variables drive the two scales. In particular, while we expect the regime type (presidentialism vs. parliamentarism)—but not the electoral system—to drive dynamic nationalization, the reverse should be true for static/distributional nationalization. The specific hypotheses we test are, first, that parliamentarism will increase dynamic nationalization but have no effect on static/distributional nationalization, and second, that proportional representation systems will push parties higher on the static/distributional scale and have no effect on dynamic nationalization.

In order to discuss and test these hypotheses, this paper first unpacks the terminology to provide a more thorough discussion of the definitions, measurement, and interpretations of the static/distributional and dynamic dimensions of nationalization. That section concludes by using the two dimensions to generate a typology of party types. In the second section we detail our hypotheses about the electoral system, the executive system, and several other variables suggested in the literature. The third section discusses our dataset and how we operationalize our independent variables and the two dimensions of nationalization. Here we explain and argue in favor of Morgenstern and Potthoff's components of variance model to measure the two aspects of nationalization. We then apply the model to 73 legislative parties across 28 countries to demonstrate empirically the utility of our typology and to show the plausibility of our hypotheses. Given the two distinct dependent variables, we use section four to build a seemingly unrelated regression model to test our hypothesis about different institutions driving the two aspects of nationalization. While this study is focused on the causes of nationalization, the fifth section summarizes and concludes by presenting the

implications of our findings for studies concerned with the effects of nationalization. Finally, the three appendices detail the components of variance model, display estimates for the individual cases, and discuss some of the problems inherent in the more standard operationalization techniques of nationalization.

Defining the Two Dimensions of Nationalization

The first dimension of nationalization considers the degree to which there is a homogenous distribution of party votes across different districts at a single point in time. Studying nationalization from this static/distributional perspective, Caramani (2000) measures the concept as the standard deviation of party returns across districts and then divides this number by the party's average level of support (the coefficient of variation).[2] Jones and Mainwaring argue that the GINI coefficient is a better alternative. A small standard deviation or GINI coefficient would imply that the party has consistent support across the country, which in the vernacular of these authors would imply a nationalized party.[3]

Rose and Urwin (1975) first identified some of the profound impacts that static/distributional nationalization can have on a political system. They note, in particular, that geographically narrow parties are frequently accompanied by separatist goals, whereas parties with broad geographic support will tend to have an integrating impact on the state and thus provide for a level of political stability that would be absent without their presence. The literature suggests other impacts, as well. Among these, Jones and Mainwaring follow Schattschneider (1960) in arguing that where (static/distributional) nationalization is high, "national factors may be more important in forging bonds between voters and parties" (2003, 143). They also hypothesize that the degree of (static/distributional) nationalization should affect how parties target public funds. Finally, they suggest that nationalized parties should be more unified. The level of nationalization, therefore, should correlate with different aspects of legislative politics

---

[2]In later work, Caramani (2004) discusses several other measures, including some that account for the number of districts or party size.

[3]Jones and Mainwaring actually use one minus the Gini coefficient to calculate their "Party National Score." A party thus is more nationalized as this score increases.

including, as Amorim Neto and Santos (2001) contend, party discipline.

In situations where static/distributional nationalization is low—i.e., voting percentages across electoral districts are heterogeneous—conceptual understanding of this dimension of nationalization is straightforward. A lack of static/distributional nationalization implies the presence and expression of differences in local electoral politics. Low static/distributional nationalization, therefore, must imply either heterogeneous district characteristics and/or that the candidates running in those districts provide distinctive appeals. Varied voter expression, regardless of its origins, therefore, should yield different party behavior and thus is an important indicator of variance in the representative process. As we will explain later, it is our expectation that electoral rules, in particular the distinction between single-member district plurality contests and proportional representation, will largely determine whether voters can express these differences.

In contrast to situations of low static/distributional nationalization, Katz (1973), Rose and Urwin (1975), and others have identified the central conceptual and empirical problems associated with interpreting high levels of static/distributional nationalization. Specifically, homogeneity in voting patterns across districts may, but does not necessarily, imply homogeneity of populations in those districts. On the one hand, homogeneous vote totals could imply similar mixes of people in the different districts: a labor-based party, for example, would expect to win a similar proportion of voters in all regions if workers were dispersed evenly across the country. Alternatively, similar patterns of electoral support could imply that a party utilizes a heterogeneous electoral strategy to attract different types of voters, perhaps mobilizing voters by social issues in one district and economic issues in another. Homogeneous vote percentages across districts, in sum, are not very telling without a further discussion of the source of that homogeneity.

Dynamic nationalization, by contrast, is concerned with whether a party's vote in the various districts rises or falls in a consistent manner across elections. In other words, regardless of the spread of a party's vote across the districts (static/distributional nationalization), the concern of dynamic nationalization is the consistency of the change in a party's fortunes across the nation. The presumption here is that when national forces drive elections, a party should gain or lose a similar percentage of the vote in all districts. This thesis has led most analysts to focus on the uniformity of "swings" or "trends" in the district vote (Brady 1985; Brady, D'Onofrio, and Fiorina 2000; Kawato 1987), though others have applied alternative methodologies (Stokes 1965, 1967; Claggett, Flanigan, and Zingale 1983; Katz 1973a).

Dynamic nationalization is tied to political outputs somewhat different from those of its static/distributional cousin. Schattschneider was the first to express interest in the lack of a national focus in public policy that resulted from noncohesive parties, a concern that led to Stokes's work comparing the heterogeneity of district movements in the United States and the United Kingdom. These authors argued that U.S. voters were motivated by local events and candidates, thus yielding a diversity of movements in the parties' support between elections and incentives for legislators to focus disproportionately on local "pork" at the expense of national policy. This presumption of legislators' focus on local concerns has also driven studies about the inner workings of representation, the relationship between legislators and party leaders, and the structure of the U.S. Congress (Cox and McCubbins 1993; Fenno 1978; Mayhew 1974a). The literature on incumbency advantage is also related, in that candidates are seen to build personal levels of support to shield themselves from national tides (Jacobson 1983; Mayhew 1974b).

In sum, measures of dynamic nationalization provide information about the extent to which districts respond in similar ways to a common stimulus. This is particularly useful information for comparisons of parties both across time and across national borders, because the degree of uniformity in district-level response should reveal differences in party organization and strategy. Specifically, we can infer that, when a party's support moves in a parallel form across districts as it does in many countries, national factors must play an important role in the elections. The interpretation of the impact of national factors would necessarily be different where the change of a party's support in one district is uncorrelated with the direction and magnitude of change in other districts.

Still, there are important caveats. Katz (1973) and Brady, D'Onofrio, and Fiorina (2000), for example, have argued that national policy could have different impacts in different types of districts. A trade policy, for example, could be harmful to Democrats in some districts and helpful in others, thus producing inconsistent district swings (and thus low dynamic nationalization). A related concern is that low dynamic nationalization could be the result of differences in the characteristics of the candidates or of the districts.

That is, while differences in candidate style or qualities could lower the dynamic nationalization score, so too could differences in the types or preferences of the voters in the districts.

As with the static/distributional scale, these complications muddy interpretation of the dynamic nationalization scale, especially at the high end. At the low end of the scale, where there is great variety in how different districts respond to new elections, it must be the case that populations have heterogeneous demands and/or that there are significant differences in how voters in different districts see the parties responding to those demands. Thus, regardless of its causes, low dynamic nationalization implies that a party has failed to unify districts. High dynamic nationalization, by contrast, could come about from two different scenarios. First, a high level of dynamic nationalization could result from similar districts responding in a similar fashion to singular national stimuli. Alternatively, it could result from a party successfully selling different views to different populations. High dynamic nationalization, then, may tell us about the success of a party in keeping support in different districts, but it is not clear whether that support comes from locally targeted or national policies. Still, even if a party gains popularity for different reasons in different areas, consistency in the movement of support levels around the country reveals electoral ties among the regions. When the fates of a party's members rise and fall together, the legislators and other members of the party will have interests in collaborating to support party goals. In sum, although it evades easy interpretation, the level of dynamic nationalization reveals much about the strategies and organization of parties.

Combining the Two Dimensions: A Typology of Party Types

While much of the existing literature hints at similar causes and effects for the two types of nationalization, we question the assumption that a straightforward linear relationship exists between them. Consequently, we suggest a categorization scheme that recognizes the distinctiveness of these two dimensions. A simple division of the two dimensions yields a 2 × 2 table of four ideal types, which are portrayed in Table 1. A party that scores high on both scales is a *nationalized* party, and one that scores low on both measures we term *locally focused*. A party that has different levels of support across the country (low static/distributional nationalization) but sees that support moving consistently between elections (high

TABLE 1   Party Types
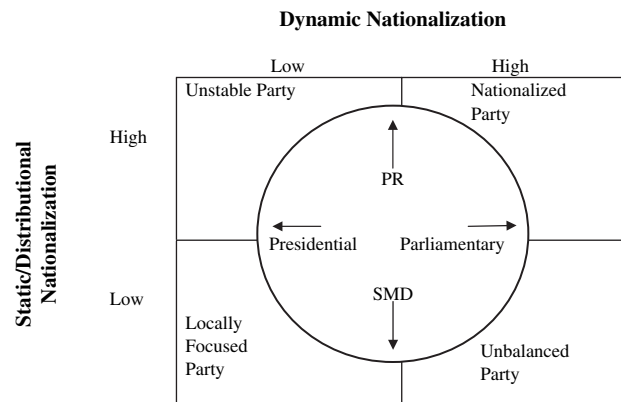
dynamic nationalization), we term an *unbalanced* party. The final category (high dynamic and low static/distributional nationalization) we term *unstable*, because it is unlikely to sustain that combination of traits over time.[4] In the table we overlay the typology with our primary independent variables of interest, the executive and the electoral systems. As we explain in more detail below, we expect the electoral system to affect the vertical position of parties in the table, while the parliamentary/presidential distinction should determine the horizontal position.

Before explicating these hypotheses, we first provide a brief consideration of behavioral expectations in order to assist with the intuition regarding the distinctions among the nationalization types. These ideal-type descriptions, of course, do not attempt to account for variations within the quadrants. This is an important caveat, because parties that lie close to one or another axis (as our empirical analysis shows that many do) may not be well described by the ideal type. As parties move towards the extremes of the categories, however, we should expect clear differences in behavior.

First, an ideal-typical *nationalized* party has homogeneous support across the nation with faceless legislative campaigners who refrain from local politicking. The expectation is that these parties will attract similar voters (middle class, minority, workers, etc.) in the various districts based on campaigns that

[4]Low dynamic nationalization, by definition, implies inconsistent movement in district support. A party that begins with consistent support across districts (high static/distributional nationalization), then, is not likely to sustain that position if dynamic nationalization is low. We empirically evaluated this issue and found that there was more movement in the static/distributional scores between elections in these cases than for other parties.

are organized at the national level. Legislative candidates in such systems should be relatively unknown, as voters will focus their attention on executive candidates and party platforms rather than legislators. As we noted above, critics referring to what we term static/distributional nationalization have suggested that homogeneous support could also emerge through using region- or district-specific strategies, which would require relatively personalistic and autonomous candidates, to capture a similar percentage of heterogeneously distributed voters each year. For our two-dimensional concept, the emergence of a *nationalized* party in the context of district heterogeneity would also require that national politics and policy have a homogeneous impact on the party's support in all districts. This complex combination of heterogeneous districts, independent candidates, and consistent patterns of voter reactions seems unlikely.

Though *locally focused* parties will take positions on important national issues, they will construct their political strategies based on the exigencies of local constituencies. Campaigns for *locally focused* parties, then, will emphasize district issues and the candidates' personal qualities and experience. Further, legislators of such parties will demand more control over political resources essential to their electoral success than would legislators representing *nationalized* parties. This may additionally imply that legislators in *locally focused* parties will put more effort into their constituency service than will legislators serving in nationally focused parties.[5]

Unbalanced parties have unequal levels of support in the various districts, but the fate of these parties in any election is reflected similarly in all districts. As perhaps typified by the British case, though a party's base level of support across districts may begin at disparate levels due to significant district heterogeneity, the high salience of national issues may cause the party's vote share to rise and fall at similar rates across the districts.

Finally, the odd combination of consistent support among districts but variable changes across elections that define *unstable* parties must reflect localized electioneering in the context of one or more electoral contests that produced relatively homogeneous support. That consistent support level could be the result of heightened but fleeting national salience of particular issues, such as might occur in response to national referenda on constitutional reforms, economic reforms, or controversial leaders. This party type, however, is unstable because either the low dynamic nationalization would lead them towards the *locally focused* category or the limited role of localism would lead the party towards the *nationalized* box. Of course, though the ideal type defines stark distinctions among categories, empirically the differences are more of degree. Some parties will maintain a combination of relatively homogeneous geographic support with some amount of local focus.

Explaining Nationalization

While using different terminology and rarely distinguishing between the two types, multiple studies have focused on institutional variables to explain cross-country differences in nationalization. Three variables have taken particular prominence in these studies: the executive system, electoral systems, and federalism. First, contrasting the United States and the United Kingdom, Schattschneider argued, and Stokes (1965, 1967) and Cain, Ferejohn, and Fiorina (1984, 1987) empirically confirmed, that the executive system—presidentialism versus parliamentarism—largely determined the level of what we have termed dynamic nationalization.[6] In addition, a multitude of studies suggest that electoral systems affect outcomes related to nationalization. Carey and Shugart (1995), for example, argue that closed-list proportional representation with controlled party nominations, particularly in the presence of a large district magnitude, will generate a more nationally focused policy strategy than would systems that encourage legislators to "cultivate a personal vote." And finally, an emerging literature has focused on the impacts of federalism. In their exemplary case study of four single-member district countries, Chhibber and Kollman (2004) argue that specific features of federalism explain why parties in some countries develop national constituencies, while others are relegated to provincial support status.

Though insightful, these studies have failed to adequately differentiate the impact of these institutional

---

[5]Though nationally focused parties may still have an incentive to serve local constituents, their interest in doing so is for their collective benefit rather than for the benefit of an individual legislator.

[6]Cain, Ferejohn, and Fiorina's (1984, 1987) dependent variable, the "personal vote," is closely related (theoretically) to our concept of dynamic nationalization. In his prescriptive document written for the American Political Science Association (1950), Schattschneider and his colleagues do not use the term nationalization, but his premise is similar to that in *The Semisovereign People*, in which the "nationalization of politics," a concept that encompasses both of our dimensions of nationalization, plays a central role.

variables on the two dimensions of nationalization that we identify. If dynamic and static/distributional nationalization are indeed distinct dimensions, then they require separate sets of independent variables to explain them. As we detail below, we expect that the static/distributional dimension will be dictated by the electoral system, but that the dynamic dimension will be primarily driven by regime type. In addition, we expect federalism to affect both types of nationalization, with the strength of its impact depending on the distribution and heterogeneity of the population. We also consider, but largely reject, several other potential explanatory variables, including the age of parties, ideological positions, and governing experience.

Executive Systems: Presidential Versus Parliamentary Regimes

As suggested by Stokes (1964, 1967), Cain, Ferejohn, and Fiorina (1987), and Morgenstern and Swindle (2005), the regime variable will impact dynamic nationalization because, the electoral fates of executive and legislative candidates are so intricately intertwined in parliamentary systems. The responsibility for selecting the executive bonds a party's legislators in parliamentary systems much more tightly than in systems where the branches are independent. Consequently, party labels tend to be much stronger in parliamentary systems and voters, therefore, will be more likely to respond to national party appeals than to local or candidate-specific appeals. Parliamentary systems, in short, will be more nationalized on the dynamic dimension, corresponding to a rightward movement in Table 1.

A similar logic tying regime type to the static/distributional dimension, however, does not exist. Regardless of whether a system is presidential or parliamentary, parties could develop local bases of support and may or may not develop national constituencies. Parties operating within both constitutional frameworks face the same challenges in spreading their support across the nation, and neither system gives parties special incentives to develop particular spatial patterns. At an inductive level, the parties' similarly heterogeneous support in the United States and the United Kingdom supports this idea. Further, there are multiple examples of countries that comingle some parties exhibiting localized bases of support with other parties supported by wider (nationalized) constituencies (e.g., Canada, Argentina, Germany, and Great Britain).

Electoral Systems: SMD Plurality versus Proportional Representation

The electoral system, in contrast, should have significant impacts on the static/distributional dimension of nationalization but little impact on dynamic nationalization. In particular, single-member district (SMD) plurality systems should decrease static/distributional nationalization relative to proportional representation systems, corresponding to a vertical movement in Table 1. This expectation is generated from both the direct effect of the mechanical translation of votes into seats in SMD systems as well as through several indirect impacts on the nature of electoral districts associated with SMD systems. In terms of the direct effect, since a plurality is required to win the seat in SMD systems, parties may avoid spending the resources (good candidates, costs, and effort) to compete where they have little chance of winning. In proportional representation (PR) systems, by contrast, wasted vote-winning opportunities are costly, because it takes far fewer votes to win a legislative seat.[7] Therefore, we expect static/distributional nationalization to be lower in SMD systems (yielding downward movement in Table 1), where strenuously competing in all districts is less likely, than in PR electoral environments.

In addition to this direct effect, SMD systems should also generate indirect impacts on static/distributional nationalization through their influence on district characteristics, a parties' campaign coordination problems, and candidate qualities. First, SMD systems carve up a polity into much smaller pieces, thus allowing greater differentiation among districts. In short, the smaller the geographic region of a district the more likely the district is to encompass a more homogeneous group of people. This, in turn should increase the likelihood that a district is distinct from those around it. Consequently, in SMD systems—where districts are smaller and more numerous– static/distributional nationalization should decrease. In addition, since there are many fewer electoral boundaries under PR systems, the parties' coordination of campaign strategies should be much easier. The much-reduced number of districts also helps party leaders with quality control, because only the top few slots on the lists carry much electoral weight. In contrast, party leaders operating in SMD systems have to deal with scores or hundreds of candidates, each running an individual campaign. Finally, the number

[7]For example, it takes less than 2% of the vote to win a seat in Brazil's São Paulo district.

of districts should also affect static/distributional nationalization through its effect on the candidates. In short, more districts should yield greater variability in terms of candidate qualities, which again should increase the distinctiveness of electoral districts and decrease static/distributional nationalization.

We do not expect the electoral system variable to have a strong impact on the dynamic dimension of nationalization. A campaign that "lifts all boats" seems equally likely in proportional representation and first-past-the-post systems, once the executive system is held constant. This expectation diverges from Carey and Shugart's work on the "incentives to cultivate a personal vote," which predicts a greater impact of localism (and hence a low level of dynamic nationalization) for systems that employ single-member districts (at least relative to high-magnitude closed list systems). The degree of personal vote seeking, however, is dependent on the legislators' relationship with the executive. Relative to district-level concerns, campaigns in the United Kingdom, for example, place much more emphasis on the party and prime-ministerial candidate than is common in the United States. It may be the case that single-member districts (or other electoral systems that Carey and Shugart hypothesize as increasing the incentives to cultivate a personal vote) when combined with presidentialism would harm dynamic nationalization, but we expect that the executive system is the more important variable.

Federalism

Our third institutional variable of interest is federalism. Our expectation is that decentralized political structures (federalist) should yield political differentiation (non–nationalized politics), because political administrative (de)centralization should have a direct and positive impact on political party (de)centralization. Unlike the previous two variables, which we predicted would affect only one dimension of nationalization, we expect federalism to impact both dimensions. In the dynamic case, federalism should generate variable responsiveness to national forces in the districts (lower nationalization), because local politicians will have the interest in and capability of reacting to local events and issues. In unitary systems, national decision makers can more easily mandate local political strategy, thus reducing local variation in response (or increasing dynamic nationalization). On the static/distributional dimension, federalism should have an impact through the development and manifestation of the heterogeneity of the

districts' preferences. First, because federalism is often the result of divergent regional interests (based on the level of urbanization, ethnicity, or localized economic concerns), it should be correlated with static/distribution nationalization, even if the relationship is not causal.[8] Second, even if a country's regions were not divided by socioeconomic or sociopolitical variables, federalism should breed politicians with ties to a region who have interests in differentiating themselves from the party. Unitary systems should reduce such independence, and by imposing more uniform campaigns, they would reduce static/distributional nationalization.

Ethnic Fractionalization

Next, while not a central focus of our study, we test Cox's (1997) hypotheses about the interactive relation of electoral and sociodemographic variables in explaining political outcomes. Cox combines the "restrictiveness" of the electoral system with ethnic fractionalization to predict the number of parties. His suggestive study leads us to consider the independent and interactive effect of ethnic fractionalization. The independent part of the argument rests on the assumption that ethnic groups are geographically concentrated and have interests distinct from other sectors of society. As was the case with federalism, we expect ethnic fractionalization to affect both dimensions of nationalization. Geographically concentrated groups should both increase the distinctiveness of local electoral units (lower static/distributional nationalization) as well as create discontinuities in the response of local regions to national electoral forces (lower dynamic nationalization). Our hypothesis, therefore, is that, as ethnic fractionalization increases, both static/distributional and dynamic nationalization should decline.

The Interaction of Federalism and Ethnic Fractionalization

One of the underlying philosophies of federal systems is the recognition and protection of subnational groups. It would not be surprising then to expect that federal electoral systems would allow for these disparate interests to be expressed in national elections. Consequently, though either of these two considerations on its own may be sufficient to reduce

---

[8]Agricultural regions, for example, should be expected to vote in ways distinctive from those of industrial centers where local elites have the independence to fashion regional campaigns.

the level of nationalization, in combination their impacts should be magnified. The logic here is that a heterogeneous population constrained by strong centralizing institutions may be incapable of politically expressing those differences, and a homogeneous population with the freedom to express differences may simply have no incentive to do so. However, a heterogeneous population that is given the political opportunity to express those preferences will surely do so. We thus include an interaction term in our model to capture this effect.

Democratic or Party Age

We derive our next hypothesis from Mainwaring and Zoco's (2007) study about the impact of time on democratic experience. Like Caramani (2000), they contend that over time parties should work to spread their support across the nation. The hypothesis, then, is that more mature democracies should have higher static/distributional nationalization scores. An alternative hypothesis is that the age of the party rather than the age of the democracy should have more impact. Still, given that some new parties gain widespread support, and some older parties consolidate their support bases in limited geographic regions, we are not convinced that this will be a telling variable. For similar reasons, we do not expect democratic or party age to affect dynamic nationalization.

Intracountry Hypotheses

While we are primarily interested in how institutions are distinctive among countries, our estimation technique differentiates among a country's parties and thus allows two other types of tests. First, the degree to which there are intracountry distinctions shows the overall importance of the institutional variables. That is, if all of a country's parties sport similar nationalization scores, then the institutional variables must be determinant, and vice versa. Second, the intracountry differences, if important, allow for testing of noninstitutional (and nonstructural) determinants of nationalization.

Perhaps because the extant literature focuses on party systems rather than parties, or because there is a lack of potential variables with unambiguous expectations, there are few suggested hypotheses about the sources of intracountry differences. Four variables do present themselves for testing. First, more centrist parties could be more nationalized on the static/distributional scale because they should have a broader and more homogeneous appeal. Centrists,

however, could be more appealing to some geographic constituencies than others (perhaps urban rather than rural). At the same time, parties identified with a more ideologically extreme position could have a regional geographic base, or they might garner geographically homogeneous support, especially if their appeal is more closely aligned with income distribution than rural-urban divides or ethnic divisions. Ideology, in sum, offers only ambiguous expectations with regard to static/distributional nationalization, and for similar reasons we do not expect a strong correlation of this variable with dynamic nationalization. The second variable that might distinguish intracountry parties is the responsibility for the executive branch. If elections are referenda on the parties holding the prime minister's or the president's office, then in-parties should have high dynamic nationalization scores. Opposition parties, however, can also generate high dynamic nationalization scores, perhaps signaling prospective views of their potential leadership. Third, as noted above, previous literature suggests that a party's age could affect at least static/distributional nationalization, but that hypothesis lacks a strong theoretical basis. Finally, it may be necessary for a party to win broad support (correlated with static/distributional nationalization) to win a national election, but some smaller opposition parties can also develop a national following. Still, the size of the parties should matter to both aspects of nationalization, because small shifts in the national vote can appear as very great changes relative to a small party. Thus while there are no strong expectations about the relation of party size to either type of nationalization, it is necessary to control for size in empirical tests.

Data and Operationalization

Our conceptions of the dependent variables require that we collect legislative electoral returns at the district level across time, differentiated by party. We have collected these data for 73 parties in 28 countries. We tested all parties that won at least 10% of the vote, although, we eliminated 13 cases where we have multiple results for a single party to avoid biasing our regression analysis.[9] The dataset includes

[9]The raw data and other information is available at http://www.pitt.edu/~smorgens/. Some of this data is also available from Dawn Brancati's Constituency-Level Elections (CLE) Dataset. http://www.cle.wustl.edu or on the CD that accompanies Caramani (2000).

cases from Europe, Asia, the Americas, and the Pacific, thus providing wide variance with regard to the two primary independent variables: executive type (38% presidential) and electoral systems (32% single-member districts).[10] Further, the cases offer a full range of values with respect to our other independent variables of interest, ethnic heterogeneity, federalism, and the age of parties and democracy.

The Dependent Variables

While there are a number of alternatives for operationalizing the two aspects of nationalization (see Appendix C for a critique), we follow Morgenstern and Potthoff (M&P 2005) in using a components of variance model (or equivalently a multilevel regression with random effects) based on Stokes's early work to calculate the two aspects of nationalization.[11] We detail the specific model in Appendix A, and here cull the Morgenstern and Potthoff paper to provide a rather simple example to explain the intuition behind the model. The hypothetical example displayed in Table 2 envisions one party in each of two countries (C1 and C2), both of which have three electoral districts (D1-D3) and two electoral years (Y1 and Y2).

To capture the static/distributional element of nationalization we want to consider the range of values in the rows: to what degree are the results similar across districts? For the dynamic element, we are interested in the consistency of district movement across years: to what degree do the districts move with a common magnitude? The key to the model is to account for these issues simultaneously.[12]

With regard to the dynamic effect, country C1 would be perfectly nationalized, since the party lost exactly 10 points in each district. In other words, since there is no difference in the magnitude of the change for the three districts between the two elections, forces at the national level must be driving

TABLE 2   Examples: Support for Party 1

District	Country C1			Country C2		
	Y1	Y2	Avg	Y1	Y2	Avg
D1	59	49	54	59	43	51
D2	53	43	48	53	49	51
D3	47	37	42	47	37	42
Avg	53	43	48	53	43	48

the election. In country C2, by contrast, local politics plays some role, because, while the average vote loss is the same for the two countries, the districts do not all drop by the same amount in C2.[13] The components of variance model would thus return a zero value for the dynamic nationalization in C1, but a positive value for C2. In this paper we have reversed the scales and transformed these values to z-scores based on the median of the scales to yield more intuitive values.[14] As such, larger values imply more (dynamically) nationalized parties.

The static/distributional effect (what M&P call district-heterogeneity) is based on the differences in the average values that the party won across districts. For C1 it can be calculated as the variance of the column of averages (54, 48, and 42), which yields a value of 36. As M&P explain, the square root of this value (6) is the standard deviation of the average electoral returns across districts. For C2 the calculations must also take into account the nonzero residual, so the static/distributional scores are different for the two countries. Specifically, since part of the distributional differentiation is the result of the dynamic effect in C2, the model would return a value suggesting that the party in C2 is more nationalized on the static/distributional dimension. For exposition purposes, we again reversed and standardized the

---

[10]These and other summary statistics refer to the 60 cases in the regression analysis, not the 73 cases in the graph.

[11]As M&P (2005) explain, this type of model has not gained much use in political science, but is quite common in medical and engineering applications. They explain the model and apply it by using a SAS function, but it can also be run in STATA using the xtmixed command (see Mustillo and Mustillo 2008). We provide a sample SAS command at our Web site (http://www.pitt.edu/~smorgens/) and the STATA command at the end of Appendix A.

[12]The model also accounts for volatility, which M&P define as the magnitude of the average change between the two (or more) election years. M&P use what Stokes interpreted as the "national" component as their estimate of volatility.

[13]In using the residual as a measure of the dynamic effect, we recognize that, in addition to capturing variance that we have attributed to local factors, we are also capturing nonsystematic variance associated with the other two components of variance (volatility and static/distributional nationalization). Even so, the magnitude of this residual variance does account for the localism in electoral returns; thus these residuals are a telling measure of dynamic nationalization. In one sense we are assuming that the nonsystematic variance attributable to the included components is random, and thus the residual is variance attributable to local factors plus a constant.

[14]We used the median due to the skew in the data. Specifically the formula is $[(x_{iv} - \tilde{x})/\tilde{x}]*(-1)$. The transformation has no bearing on the results. The raw value of the dynamic nationalization score for C2 is 18; using the sample median of 9.12, this would yield a z score of -0.97.

M&P scale so that larger numbers imply greater static/distributional nationalization.

Under this model, as long as there are at least three parties in a country, there is no necessary relationship among the intracountry scores for either type of nationalization results. Where there are just two parties, however, the results are necessarily identical, and thus we have just one entry for the United States and Chile (the latter of which is based on analysis of the two stable coalitions). For each case, we ran the analysis on the longest possible set of elections in which district borders did not change. As noted, for the cases where we had several sets of elections with consistent borders (e.g., the United States, the United Kingdom, Canada, and Japan), we calculated more than one set of statistics for our descriptive tables, though we used only one set in our regressions (hence the difference between 73 cases and only 60 observations for the regressions). In most cases we required that the analysis include at least three consecutive elections, but in a few countries (e.g., Canada and New Zealand) that redistrict frequently or that have only recently held elections under a new system (i.e., Japan), we ran the analysis on two consecutive elections. As Appendix A details, we also calculated separate results for the proportional representation (PR) and single-member district (SMD) elections for those countries that employ two-tiered systems (Japan and Germany).[15] Finally, for the single-member district countries it was necessary to eliminate those districts that did not have consistent competition patterns. For the United States, therefore, the analysis uses just the districts where both the Democrats and the Republicans competed in each year during the decade of interest.

The Independent Variables

The operationalization of our central independent variables—regime type, electoral system, and federalism—is straightforward. We measure regime type with dummy variables for *parliamentarism* and *semipresidentialism*. The dataset includes 37 parliamentary cases, 4 semipresidential cases, and 19 parties operating under presidentialism. To probe the electoral system effects, we tested several alternative specifications. The models we display below employ a dummy variable for parties operating in countries that use *single-member districts* (which is the case for 19 of our 60 parties). While we do not display the

alternative results, we do test and discuss alternatives to the single-member district dummy in terms of the number of electoral districts and a variety of coding schemes for the personal vote. And finally, we also operationalize *federalism* as a simple dummy, based on the discussion above. The data indicate that 11 of 28 federal countries, or 22 of our 60 parties, operate in federal systems.[16]

As noted, we are also interested in the impact of ethnic heterogeneity, which we capture through Krain's (1997) index. In our sample, the mean value is 0.21, the minimum value (.01) is found in Japan and Portugal, and the maximum is India's 0.84. The scale is skewed to the left, and the index is correlated with our institutional variables: we therefore transformed the index into squared z-scores in our regressions.

Next, in order to test the hypotheses about political maturation, we calculated the age of the political parties and the number of years from the initiation of democracy in the given country to the beginning of the time series in the analysis.[17] In the cases where changing names and coalition partners complicated the analysis of the age of political parties, we tested alternative specifications, including the age of the party since democratization for those cases where the party is older than the democracy.

In addition to party age, we also operationalized several other variables that test explanations for variance in the nationalization scores among a country's parties. We measured governing experience with a dummy variable for parties that had controlled the presidency or, for parliamentary systems, the prime minister's office at least once during the period under investigation.[18] We also considered coding for cabinet membership, but this is ambiguous for presidential systems, and we lacked information for some countries and some time periods. Then, to test for whether a party was centrist or ideologically extreme, we used a combination of legislator surveys (Alcantara Sáez n.d.) and a survey of country experts (Huber and Inglehart 1995). We scored parties based on their ideological distance from the country's mean score, after combining the two data sources based on the countries where the coverage overlapped. Finally, we

---

[15]Mexico also uses a two-tiered system, but because voters have just one vote and PR seats are compensatory, we used only the single-member district data.

[16]We coded Spain with the ambiguous score of 0.5, because different data alternatively suggest that it could be coded as either federal or unitary. Changing this score to either 0 or 1 has no important effect on the results.

[17]We also tested the log of these values.

[18]Because there are just two competitors and hence just one party in the analysis, we coded governing experience with a 1 for the United States and Chile.

measured the size of parties as the average vote total across districts for the last year in the analysis. In the empirical analysis we include only parties that gained an average of at least 10% of the vote, but even with this subset we require attention to the size variable, because the impact of the other variables should be magnified in small parties.

Estimates for the Two Components of Nationalization

Figure 1 (and Appendix Table A1) displays the results of our estimation technique.[19] The sample yields a mean dynamic z-score of -1.1 and a mean static/distributional z-score of -0.2. Among the parties with the lowest dynamic nationalization z-scores are India's Congress Party (-11.1), Canada's Progressive Conservatives (-5.8), the United States' parties in the 1980s (-4.6), and Japan's LDP (-4.7). At the high end were Japan's JCP (0.9), Norway's Christian Democrats (0.9), and the Netherlands' People's Party (0.8), plus, when using the PR data, Germany's CDU/CSU (0.8) as well as its SDP (0.7). For static/distributional nationalization, the estimates contrast some of the parties in particular time periods in the United Kingdom, the United States, Japan, Portugal, and Canada (with scores between -2.0 and -3.1), with one or more parties from Brazil, Denmark, Iceland, Japan, Norway, Portugal, Sweden, and Uruguay (values ranging from 0.6 to 0.8).

The data support our hypotheses and substantiate some earlier studies. Foremost, the distribution of the data suggests that the cases do separate on two rather than one dimension; the correlation coefficient between the two dimensions is only 0.27. Further, the graph symbols indicate that, by and large, the electoral and executive systems explain these dimensions, since the presidential cases cluster on the left of the graph and most of the SMD cases are in the bottom half. The parties from the presidential SMD cases (Mexico and the United States), for example, fall into the *locally focused* box, while most parties operating under parliamentary systems with PR electoral rules are in the *nationalized* category. Other cases also meet expectations; Japan's LDP (1976–90), for example, operated under a personalistic SNTV electoral system, with its scores leading to a *locally focused* label. Further, the results clearly differentiate the U.K. and U.S. cases in ways consistent with

FIGURE 1   Static/Distributional vs. Dynamic Nationalization
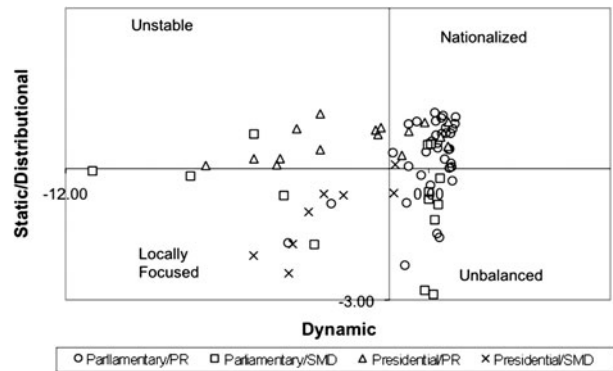
discussions by Schattschneider (*American Political Science Review* 1950), Stokes (1967), and Cain, Ferejohn, and Fiorina (1987). There are significant exceptions, however, such as the Canadian Progressive Conservatives (measured either in 1953–65 or 1988–93) and India's National Congress Party, which garner very low dynamic scores in spite of parliamentarism. But in distinguishing Canada and India from the other parliamentary single-member district systems, the UK, the results are consistent with our hypotheses about decentralized politics and ethnic heterogeneity. Finally, there are many parties that fall close to one or both axes, and some countries do have parties with significantly divergent scores, perhaps suggesting that other variables can counteract the pulls of our primary institutional variables of interest.

Multivariate Tests

In order to test the explanations for the two nationalization dimensions, we employ a seemingly unrelated regression (SUR) model.[20] This generalized least-squares model has two important virtues: it allows us to test both dimensions simultaneously with a similar set of independent variables, and it takes advantage of a possible tie between the two

---

[19]As the purpose of this figure is to show the wide range in the variables without regard to over-time statistical dependencies, it includes data on different time periods for several cases (e.g., the United States) that are excluded in the regression analysis.

[20]The structure of the data also suggests that the regression should cluster the observations by country. The standard seemingly unrelated regression (sureg) command in STATA does not permit clustering, and thus we used "mysureg," a maximum-likelihood estimator, available from http://www.stata-press.com/data/ml2.html. The results are substantively the same as the standard "sureg" command, but the former does not provide the full range of summary statistics. The tables that follow, therefore, report results from the standard "sureg" package.

dependent variables to improve efficiency (see Greene 1997; Zellner 1962). In our case, though our two dependent variables are presumed independent of one another, since they measure two different dimensions of electoral dynamics and we are interested in testing the impact of many of the same explanatory variables on both dependents, we must consider the possibility of correlation among the error terms that would be derived from separate regressions. Our tests of separate OLS models (with robust standard errors due to heteroskedastic errors) did uncover correlated residuals, thus justifying the use of an SUR model.

The SUR models (Table 3) give strong support for our expectation that different institutions drive the two types of nationalization. The first set of models includes an identical set of explanatory variables for both types of nationalization. As explained above, these variables include the two institutions of interest (electoral systems and the executive system), federalism, ethnic heterogeneity, and the party's size as a control. That model finds that the executive system is statistically significant only when explaining dynamic nationalization and that the electoral system is influential only for the static/distributional aspect of nationalization. Substantively, the regression predicts that parliamentary systems will have dynamic nationalization scores about 70% of a standard deviation above presidential systems, while countries that use single-member districts will have static/distributional nationalization scores about 60% of a standard deviation lower than those that use proportional representation.

Though the nationalization scores for one party have no necessary relationship with others in the same country as long as there are more than two competitors, to allay any concerns with dependency, Model 2 (equations 3 and 4) tests the hypotheses on country averages. That model yields substantively similar results; that is, the same variables are significant and most have similar magnitudes.

These results are more clearly shown in Figure 2, which charts the predicted values for the two dimensions of nationalization under different institutional frameworks based on Model 1. The first set of bars shows the predictions for static nationalization. Varying the executive system yields no noticeable difference in the height of the first set of bars, but changing from single member districts to proportional representation moves the predictions dramatically. The second set of bars shows that moving from a presidential to a parliamentary system has a large effect on dynamic nationalization, but that changing

TABLE 3   SUR Model Results
Dependent Variables: Static/Distributional and Dynamic Nationalization Scores

| | Model 1 | | | | Model 2 | | | |
| | Static/Distributional (1) | | Dynamic (2) | | Static/Distributional (3) | | Dynamic (4) | |
	Coefficient	SE	Coefficient	SE	Coefficient	SE	Coefficient	SE
Parliamentary	−0.15	.21	1.69	.50**	−0.15	.27	1.44	.55**
Semi-presidential	−0.03	.40	0.94	.95	−0.09	.51	1.45	1.24
SMD	−0.52	.24**	−0.31	.56	−0.68	.29**	−0.21	.70
Average Vote	−0.03	.01**	−0.04	.02**	−0.03	.01**	−0.09	.03**
Federal	−0.19	.30	−0.04	.72	−0.23	.41	−0.11	.99
Ethnic Fractionalization	0.24	.30	−1.32	.73	0.27	.40	−1.36	.97
Ethnic * Federal	−0.21	.32	−0.03	.77	−0.17	.41	−0.08	1.01
Extremism	−0.14	.11	−0.03	.26				
Governing experience	0.10	.20	0.41	.48				
Party age since democratization	0.00	.00	−0.01	.01				
Constant	1.40	.50**	0.68	1.20	1.11	.61*	2.15	1.48
N	60		60		28		28	
R² adj	0.49		0.62		.53		.74	

**p ≤ .05; *p ≤ .1.

FIGURE 2   Simulations (Assumed federal system
for parties that have participated in a
government; other variables set at
sample mean)
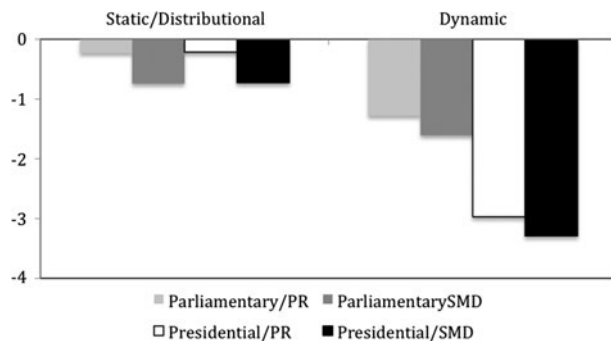
between the two electoral system types has only a small impact.

The weakness of the electoral system variable in explaining dynamic nationalization supports Morgenstern and Swindle's finding, but it contradicts, in part, a significant body of literature based on Carey and Shugart's (1995) well-regarded article on the "incentives to cultivate the personal vote." We, therefore, ran several tests to confirm the robustness of these results. First, we tested for other specifications of the electoral system variable, changing from our dummy variable to a scaled score based on Carey and Shugart's hypotheses. These results paralleled our findings of the SMD dummy, with significance for static/distributional nationalization but insignificance for dynamic nationalization.[21] We then tested the impact of the number of districts and found that the log of this number supported the idea that cutting the country into more pieces yields greater heterogeneity in a party's electoral support (lower static/distributional nationalization) but had no significant effect on dynamic nationalization. Finally, we tested for the impact of the electoral system on subsets of the data, looking alternately at the presidential and parliamentary cases (Table 4). The electoral system proved inconsequential for dynamic nationalization in the presidential systems, but did yield a statistically significant impact for the parliamentary cases. Substantively, however, the coefficient (-0.77) is not large, implying a change of less than one-third of a

standard deviation. In sum, while dynamic nationalization is an imperfect proxy for the personal vote, this result suggests that the electoral system is insufficient to explain the degree of localism in elections.

As noted, we also tested several other hypotheses derived from the literature. First, the models offer limited support for the impact of ethnic fractionalization and federalism. Figures 3 and 4 use CLARIFY to illustrate the expected value of the two types of nationalization while varying federalism (and our other variables of interest) and holding the ethnic heterogeneity variable constant at its mean.[22] A test of the hypothesis that the linear combination of federalism and ethnic heterogeneity does not equal zero does not approach standard levels of significance for either dimension of nationalization, though the graphs do suggest that federalism tends to reduce static nationalization somewhat.[23] Perhaps this effect is masked by the strong pull of the regime variables, because federalism does appear as a significant (negative) factor on both nationalization dimensions if we run the model only on the presidential cases (Table 4). Tests on the parliamentary cases are even more ambiguous, as the federalism variable has a negative but statistically insignificant coefficient for the static/distributional component but a positive and marginally significant coefficient for the dynamic dimension.[24] Figures 5–6 highlight the effects of federalism for the model using just the presidential cases. The graphs suggest, first, that the effect of federalism on the dynamic dimension is much larger than on the static/distributional dimension. Second, they indicate that the estimates are more precise for the federal cases, perhaps suggesting that, while federalism pushes countries away from nationalization (on both dimensions), the absence of federalism does not predetermine the level of nationalization.

In sum, the tests on federalism suggest one of two interpretations. First, federalism has a negative impact on one or both dimensions of nationalization, but there is not enough data to generate precise results. Or, second, though federalism is important once the analysis is limited to a particular type of executive system, the distinction between presidential and parliamentary systems is so large that it swamps

---

[21]We still prefer the SMD variable, because these results were sensitive to particular specifications of the variable. Other specifications pointed in the expected direction but proved statistically insignificant.

[22]We also set "age since democracy" and "extremism" at their means and "head of coalition" at 1. "Ethnic fractionalization" is set at approximately 1.66, its average value for federalist presidential cases.

[23]The hypothesis test is based on the Stata "lincom" command.

[24]Models that include only the PR or SMD cases yield insignificant coefficients for federalism on both dimensions.

TABLE 4   SUR Model Results Dividing Sample by Regime Type
Dependent Variables: Static/Distributional and Dynamic Nationalization Scores

	Parliamentary Cases		Presidential Cases	
	Static/Distributional (5)	Dynamic(6)	Static/Distributional (7)	Dynamic(8)
SMD	−0.43*	−0.77*	−0.94**	0.72
Average Vote	−0.05**	−0.05**	−0.00	−0.06
Federal	−0.42	1.11*	−0.54**	−5.81**
Ethnic Fractionalization	0.43	−1.96	0.12	−1.20**
Ethnic * Federal	−0.45	0.14	−0.00	2.81**
Extremism	−0.06	−0.21	−0.10	−0.33
Governing experience	0.02	−0.01	0.15	1.50
Party age since democ.	−0.00	0.01	−0.01**	0.00
Constant	1.47**	2.94**	0.54**	0.75
N	37	37	19	19
R^2 adj	0.66	0.87	0.90	0.61

**p ≤ .05; * p ≤ .1.

the effect of political decentralization when considering all cases together.

The final part of the hypothesis concerning federalism tied the effect to the level of ethnic heterogeneity. While a test on the significance of the linear combination of the two variables fails, CLARIFY results (not shown) based on varying the level of ethnic heterogeneity do offer some evidence of the validity of the hypothesis (although, of course, the predictions have very large confidence intervals). For example, while the coefficient on ethnic heterogeneity actually suggests a positive correlation with static/distributional nationalization, when combined with federalism the impact is in the expected negative direction. For dynamic nationalization, federalism has little impact by itself, but shows an important (and expected negative) substantive impact when combined with ethnic heterogeneity.

Next, our tests for the impact of party or democratic maturation failed to show significant results. While Mainwaring and Zoco were interested in static/distributional nationalization, we could not confirm their findings. Like Caramani, they hypothesized that experience with democracy would lead parties to nationalize, but our tests on the full dataset returned no such results.[25] Further refuting their the-

ory, the model returned a negative coefficient when we applied it to just the presidential cases. Given this failure, we tested (as shown in the regression) for the impact of the parties' age rather than the age of democracy. The only significant relation under that specification, however, was one that was not previously theorized, a negative correlation of the variable with dynamic nationalization in the presidential cases. We must conclude, therefore, that, while some parties may nationalize (in terms of the distribution of their votes) with time, others consolidate on a more regional basis.

In most countries the parties' nationalization scores are quite similar, but the variation within some of the countries led us to test whether ideology or governing experience, in addition to party age, could explain part of the intracountry variation. Neither variable proved statistically significant in our tests, perhaps confirming our ambiguous expectations based on the idea that these variables provide different opportunities for different parties.[26]

To summarize, the results of our analysis confirm our primary hypotheses. After accounting for party size, the electoral system under which the parties operate is the most significant predictor of static/distributional nationalization, but it is the executive system that drives dynamic nationalization. Once again, the combination of these results reinforces

[25]There is a very high correlation (0.57) between parliamentarism and age of the parties since democratization. The tests on subsets of the cases (parliamentary or presidential), however, still showed no impact of the age variable. Model 2 in Table 3 leaves off the party age variable because the one observation per country is an average among parties. Democratic age is of less theoretical interest, yields a negative sign if included in that regression, and is so highly correlated with parliamentarism (0.61) that it reduces the latter variable to insignificance.

[26]The appendix table also suggests that there has been movement over time for some cases. In most cases this change has been slight, and we have, therefore, not explored the causes of this variance.

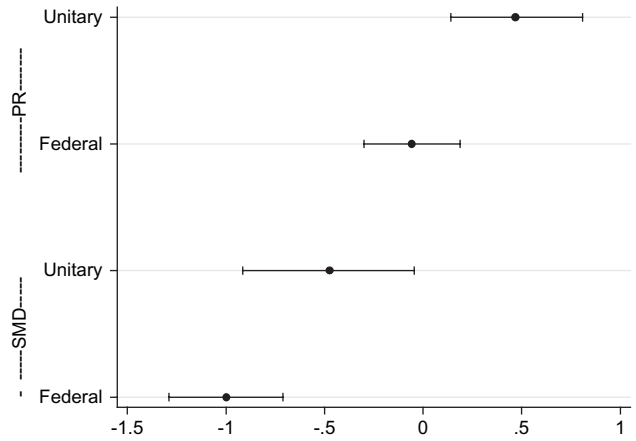FIGURE 3 Static/Distributional Predictions, Based on Regression 1

FIGURE 5 Static/Distributional Predictions, Based on Regression 7 (Presidential Cases)
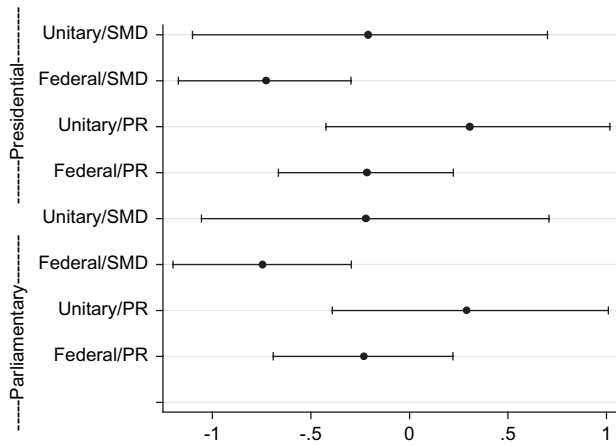
our argument that the two dimensions of nationalization are indeed independent.

Conclusion

At its base, party nationalization is a central component of representation. Nationalization, however, is multifaceted, and definitions have not converged. Moreover, as we have shown here, the two main conceptions of nationalization are not strongly correlated. We suggested, therefore, that based on the two aspects of nationalization, analyses should group parties into four types: *locally focused, unbalanced, unstable,* and *nationalized.*

In addition to exploring the theoretical and empirical independence of the two types of nation-

alization, we have demonstrated that these two types are influenced by different institutional factors. Our models showed that variations in static/distributional nationalization are primarily determined by the electoral system, while dynamic nationalization is strongly influenced by the executive type. Specifically, single-member districts reduce static/distributional nationalization, and parliamentarism increases dynamic nationalization. We also found limited evidence that federalism reduces both types of nationalization, but that effect is most noticeable among the presidential cases.

While this comparative study was motivated by Schattschneider's early studies, our exploration of the variance in the levels of the two types of nationalization does not go far enough. The next step is to

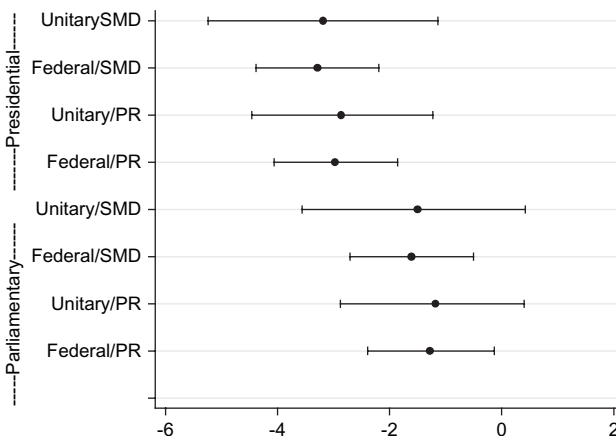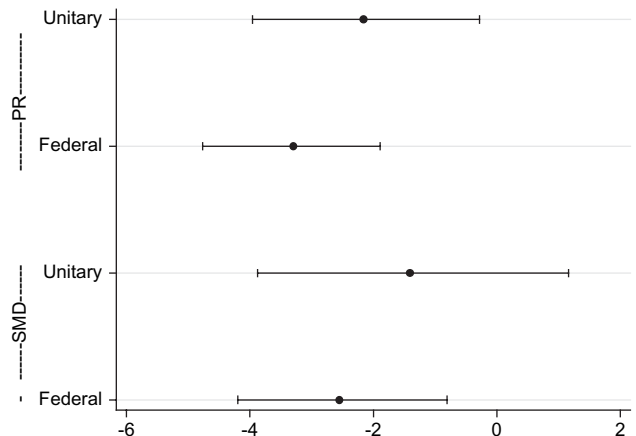FIGURE 4 Dynamic Predictions, Based on Regression 2

FIGURE 6 Dynamic Predictions, Based on Regression 8 (Presidential Cases)

explore the consequences of those differences for policy outcomes, electoral accountability, and democratic stability. Our four-way categorization scheme suggests, for example, that parties or coalitions characterized by the level of static/distributional nationalization that one study suggests would be propitious for democratic stability may also be characterized by a less-than-propitious level of dynamic nationalization. Purveyors of the nationalization literature, in sum, must be wary of the ways the term is used and the interaction of the two types of nationalization.

Acknowledgments

Appendix A

Components of Variance Model

The components of variance model employed to calculate the two aspects of nationalization is based on the following formula:

$$y_{ik} = \mu + A_k + B_i + C_{ik},$$

where y_{ik} is the party's vote in district i and time k. As Morgenstern and Potthoff explain, the model assumes that there are three sources of variance in district-level electoral data: across time (represented by A_k), across districts (represented by B_i), and a residual (represented by C_{ik}). The term μ could be taken to represent a party's "natural" vote, as the model calculates it as an "unweighted mean of the party's vote percentages across all districts and elections."

A statistical package (here, SAS) based on this model estimates variance components $\hat{\sigma}_A^2, \hat{\sigma}_B^2, \hat{\sigma}_C^2$ for each term (based on expected mean values of 0), which we interpret as measuring the homogeneity of a party's support over time or across districts. A larger $\hat{\sigma}_A^2$ for example, implies greater heterogeneity of a party's support across time.

Following Morgenstern and Potthoff, we interpret A_k as a measure of a party's volatility, as it captures the average change in a party's vote (averaged across districts). In this paper we are interested in B_i and C_{ik}. As noted, B_i measures the range of a party's support across districts, what Morgenstern and Potthoff call district heterogeneity and what we call static/distributional nationalization. Morgenstern and Potthoff argue that, since C_{ik} measures the variance unexplained by time or district factors, it can be attributed to district characteristics or candidate qualities. When it is large, local forces must be influential in the elections and thus, inversely, when it is small, national forces must take greater prominence. The inverse of C_{ik}, therefore, is our measure of dynamic nationalization.

As noted, this model is equivalent to a cross-sectional time-series model with random effects. The STATA command for the model is:

by partyid xtmixed votepercentage || _all: R.district || _all:R.year, var

Here partyid identifies the parties, and R. refers to random effects.

Appendix B

Party Estimates

Appendix TABLE A1   Static/Distributional and Dynamic Data

Country	Year	Party/Coalition	Dynamic	Static/Distributional	Exec	Smd/PR
Argentina	1991–99	Peronists (PJ)	−5.02	−0.31	Pres	PR
	1991–99	Radicals (UCR)	−5.78	−0.18		
Australia	1996–01	Liberal	0.00	−1.07	Parl	PR
	1996–01	Labour	0.31	−1.19		

Appendix Table A1 (Continued)

Country	Year	Party/Coalition	Dynamic	Static/Distributional	Exec	Smd/PR
Austria	1971–94	People's Party	0.69	0.04	Parl	PR
	1971–94	Socialists	0.66	0.03		
Bolivia	1985–97	ADN	−1.68	0.36	Pres	PR
	1985–97	MNR	−1.58	0.51		
Brazil	1990–98	PFL	−7.37	−0.33	Pres	PR
	1990–98	PMDB	−4.91	−0.17		
	1990–98	PT	−0.13	0.62		
Canada*	1953–65	Prog. Conserv	−7.87	−0.56	Parl	SMD
	1953–65	Liberals	−4.79	−0.99		
	1988–93	Prog. Conserv	−5.78	0.37		
	1988–93	Liberals	−3.78	−2.07		
Chile[a]	1989–97	Concer. or Rt	−4.36	0.48	Pres	PR
Colombia	1974–86	Conservatives	−0.89	−0.10		
	1974–86	Liberals	−3.58	0.02		
Denmark	1971–98	Liberals	0.73	0.39	Parl	PR
	1971–98	Social Dem	0.47	0.78		
France	1988–97	Right coalition	−0.67	−0.34	Semi	PR
	1988–97	Socialists	−1.18	−0.04		
Germany[b]	1980–87	CDU/CSU	0.76	−0.35	Parl	PR
	1980–87	CDU/CSU	0.69	−0.37		SMD
	1980–87	SDP	0.74	−0.28		PR
	1980–87	SDP	0.68	−0.38		SMD
Iceland	1959–95	Communists	0.20	0.84	Parl	PR
	1959–95	Independence	0.10	0.21		
	1959–95	Progressives	0.06	−0.76		
India	1991–04	National Cong.	−11.11	−0.44	Parl	SMD
Italy	1972–83	Christian Dem	0.53	−0.18	Parl	PR
	1972–83	Communists	0.78	−0.66		
Japan*[b]	1996–00	DPJ PR	−0.67	0.59	Parl	PR
	1996–00	JCP PR	0.89	0.74		
	1996–00	JCP	0.23	0.66		SMD
	1976–90	LDP	−4.65	−2.03		PR
	1996–00	LDP	0.30	0.06		PR
	1996–00	LDP	−3.22	−1.16		SMD
Mexico[c]	1997–00	PAN	−3.97	−1.35	Pres	SMD
	1997–00	PRD	−3.46	−0.95		
	1997–00	PRI	−1.11	−0.30		
Netherl.	1986–98	Christian Dem	0.24	0.34	Parl	PR
	1986–98	People's Party	0.79	0.49		
	1986–98	Socialists	0.43	0.38		
N.Zealand	1987–90	Liberal	−0.73	−1.15	Parl	SMD
	1987–90	National	0.20	−1.52		
Norway	1973–97	Conservative	0.57	0.39	Parl	PR
	1973–97	Christian Dem	0.87	0.60		
	1973–97	Socialists	0.30	0.17		
Portugal	1975–95	CDS/PSD	−0.79	−2.52	Parl	PR
	1975–95	Socialists	−0.39	0.64		
Spain	1982–96	Pop Alliance	−0.25	−0.54	Parl	PR
	1982–96	Socialists	−0.09	−0.02		
Sweden	1948–91	Moderates	0.42	0.73	Parl	PR
	1948–91	Social Dem	0.56	0.51		

Appendix TABLE A1 (Continued)

Country	Year	Party/Coalition	Dynamic	Static/Distributional	Exec	Smd/PR
U. Kingd*	1955–70	Conservatives	0.00	−0.91	Parl	SMD
	1974–79	Conservatives	0.38	−0.61		
	1983–87	Conservatives	0.28	−1.83		
	1955–70	Labour	−0.13	−3.08		
	1974–79	Labour	0.35	−1.91		
	1983–87	Labour	0.16	−3.17		
	1974–79	Liberals	0.07	0.15		
	1983–87	Liberals + SDP	−0.03	0.13		
U. States*ᵃ	1952–60	Dems or Reps	−1.15	−0.93	Pres	SMD
	1974–80	Dems or Reps	−5.79	−2.31		
	1984–90	Dems or Reps	−4.63	−2.70		
	1992–00	Dems or Reps	−4.49	−2.06		
US Senate*ᵃ	1996–02	Dems or Reps	−2.82	−0.98	Pres	SMD
Uruguay	1984–94	Broad Front	0.64	0.10	Pres	PR
	1984–94	Reds	0.65	0.63		
	1984–94	Whites	0.40	0.30		
Venezuela	1968–83	AD	−0.66	−0.59	Pres	PR
	1968–83	COPEI	−1.75	0.27		

*Regression analysis (Tables 3–4) uses only one time period per country unless there has been an electoral law change (as in Japan). Analysis thus includes just the 1984–90 data for the US House, the 1955–70 data for the UK, and the 1988–93 data for Canada. It also excludes the US Senate. The formula for transformation of the raw data is noted in Footnote 14. In applying that formula, this table uses the median of the cases that are included in the regression, not the median of the full sample.

ᵃWhere there are only two competitors, the results are identical for the two parties or coalitions. ᵇFor countries with two-tiered systems (Germany, Japan), results are displayed for both single member districts (SMD) and proportional representation (PR) districts. PR results for Japan are calculated using PR votes in the 300 SMD districts, and for Germany they are calculated using the PR data from the 248 constituencies. (The results change little if the data are aggregated to the 10 Länder.)

ᶜThough seats in Mexico are distributed based on two tiers, voters have just one vote and thus the results are based on the SMD results.

Appendix C

Alternative Measures of the Two Aspects of Nationalization

As M&P argue, alternative measures of nationalization are flawed, because they conflate the two types of nationalization and volatility. First, the coefficient of variation as proposed by Caramani, or the Gini index as used by Jones and Mainwaring (see also measures proposed by Rose 1984 and by Amorim and Santos 2001), evaluate the distribution of electoral results among districts without regard to changes over time. A similar problem undermines alternative measures of dynamic nationalization. The "swing," for example, measures the change in a district's vote across two elections. The standard deviation of the districts' swings for a country, then, provides a measure of the degree to which the districts are moving in concert. But in failing to account for other aspects of variance, it too produces a biased indicator.

To demonstrate the magnitude of the bias that these measures generate, consider the second country

(C2) from the example that we used in Table 2. Jones and Mainwaring would calculate a Gini coefficient for each of the two elections, yielding .05 and .06 for the two years.[27] Following their methodology, we subtract these values from 1 to yield a score of 0.95 for Year I and 0.94 for Year II; the calculations based on the averages yield a score of 0.96. This implies near perfect homogeneity, in spite of a 12-point spread of values in the two years, or 9 points when using the averages. Under Caramani's methodology, we would calculate the standard deviations of the columns and divide that value by the average vote. His index thus yields 0.11 and 0.14 for the two years, or a value of 0.13 based on the averages. Again, a zero indicates perfect homogeneity, so these very low numbers are deceiving. Alternatively, the M&P value for static/distributional nationalization provides a more reasonable estimate of the spread across the districts. The components of variance analysis return a value of 18, the square root (4.2) of which does

[27]As Jones and Mainwaring explain, STATA calculates Gini coefficients obtained from the "indec0" command.

allow for an intuitive grasp of that 9-point spread found in the column of averages.

We have one other concern with Jones and Mainwaring's treatment of the United States. Their results are calculated using the states as electoral districts, presumably summing all the votes for each party across all districts in a state, regardless of whether the two parties competed in the given districts. This necessarily reduces the district-level variance (this method yields, for the 1980s, a raw static/distributional value of 190 rather than about 30, or a z-score of about −1.7 instead of −0.6). If, moreover, the goal is to provide a picture of the parties' variegated support, this method is problematic. Across any decade, there are scores of districts where one of the parties did not compete in at least one election, and thus we considered just those districts where the two major parties competed in every included election. Excluding the districts where there was no competition in some years underestimates the degree of variance in a party's support, but this is a lesser sin than including those districts and overestimating that variance.

Finally, aside from the bias issues, other extant measures of dynamic nationalization are inapplicable across a wide variety of cases. As Morgenstern and Swindle argue, dynamic nationalization is tied to the debates on the "personal vote" (Cain, Ferejohn, and Fiorina 1987). As a result, much literature, particularly that focusing on the United States, uses other techniques to measure this concept or its cousin, the incumbency advantage (e.g., Alford and Brady 1988; Brady, D'Onofrio, and Fiorina 2000; Gelman and King 1990; Kawato 1987). Brady, D'Onofrio, and Fiorina for example, use midterm elections in a regression model to differentiate a national and local component of the vote. Unfortunately, this method is inapplicable for parliamentary systems or the many presidential systems that do not have midterm elections. Samuels (1999) has studied personal voting in Brazil, with the analyses focusing on the degree to which intrapartisan rivals receive similar levels of vote percentages (see also Cox and Rosenbluth (1994) on Japan and Bawn (1993) on Germany). These interesting studies, however, are applicable only to those few cases that employ voting systems with intrapartisan competition.

One recent addition to the literature by Aleman and Kellam (2008) does, however, have broad applicability and can, perhaps, deal with the bias issues. Like our model, these authors follow Stokes and use regression techniques to isolate the influence of local and national forces on nationalization, and they apply the model to multipartisan contexts. Their model provides measures akin to our dynamic nationalization and Morgenstern and Potthoff's volatility. As such, they have ignored what we have termed static nationalization. With modification, however, their innovative model suggests a plausible alternative.

References

Alcántara Sáez, Manuel. N.d. "Survey entitled "Elites Parlamentarias en América Latina" (PELA). Conducted by the Instituto Interuniversitario de Estudios de Iberoamérica y Portugal.

Aleman, Eduardo and Marisa Kellam. 2008. "The Nationalization of Electoral Change in the Americas." *Electoral Studies* 27 (2): 193–212.

Alford, John, and David Brady. 1988. "Partisan and Incumbent Advantages in U.S. House Elections, 1846–1986." Working Paper 11, Center for the Study of Institutions and Values. Rice University.

American Political Science Association, Committee on Political Parties. 1950. *Toward a More Responsible Two-Party System.* New York: Rinehart & Company, Inc.

Amorim Neto, Octavio, and Fabiano Santos. 2001. "The Executive Connection: Presidentially Defined Factions and Party Discipline in Brazil." *Party Politics* 7 (2): 213–34.

Bawn, Kathleen. 1993. "The Logic of Institutional Preferences: German Electoral Law as a Social Choice Outcome." *American Journal of Political Science* 37 (4): 965–89.

Brady, David. 1985. "A Reevaluation of Realignments in American Politics: Evidence from the House of Representatives." *American Political Science Review* 79 (1): 28–49.

Brady, David W., Robert D'Onofrio, and Morris P. Fiorina. 2000. "The Nationalization of Electoral Forces Revisited." In *Continuity and Change in House Elections*, eds. David W. Brady, John F. Cogan, and Morris P. Fiorina. Stanford, CA: Stanford University Press.

Brancati, Dawn. 2007. "Constituency-Level Elections (CLE) Dataset." New York. http://www.cle.wustl.edu.

Cain, Bruce, John Ferejohn, and Morris Fiorina. 1984. "The Constituency Service Basis of the Personal Vote for U.S. Representatives and British Members of Parliament." *American Political Science Review* 78 (1): 110–25.

Cain, Bruce, John Ferejohn, and Morris P. Fiorina. 1987. *The Personal Vote: Constituency Service and Electoral Independence.* Cambridge, MA: Harvard University Press.

Caramani, Daniele. 2000. *Elections in Western Europe since 1815: Electoral Results by Constituencies.* London: Macmillan Reference.

Caramani, Daniele. 2004. *The Nationalization of Politics.* Cambridge: Cambridge University Press.

Carey, John, and Matthew S. Shugart. 1995. "Incentives to Cultivate a Personal Vote: A Rank Ordering of Electoral Formulas." *Electoral Studies* 14 (4): 417–39.

Chhibber, Pradeep, and Ken Kollman. 2004. *The Formation of National Party Systems: Federalism and Party Competition in Canada, Great Britain, India, and the United States*. Princeton, NJ: Princeton University Press.

Claggett, William, William Flanigan, and Nancy Zingale. 1984. "Nationalization of the American Electorate." *American Political Science Review* 78 (1): 77–91.

Cox, Gary W., and Mathew D. McCubbins. 1993. *Legislative Leviathan: Party Government in the House*. Berkeley: University of California Press.

Cox, Gary W., and Frances Rosenbluth. 1994. "Reducing Nomination Errors: Factional Competition and Party Strategy in Japan." *Electoral Studies* 13 (1): 4–16.

Cox, Gary W. 1997. *Making Votes Count*. Cambridge: Cambridge University Press.

Fenno, Richard F. 1978. *Home Style: House Members in their Districts*. Boston: Little Brown.

Gelman, Andrew, and Gary King. 1990. "Estimating Incumbency Advantage without Bias." *American Journal of Political Science* 34 (4): 114–64.

Greene, William H. 1997. *Econometric Analysis*. Upper Saddle River, NJ: Prentice-Hall, Inc.

Grofman, Bernard, and Arend Lijphart, eds. 1986. *Electoral Laws and Their Political Consequences*. New York: Agathon Press.

Huber, John, and Ronald Inglehart. 1995. "Expert Interpretations of Party Space and Party Locations in 42 Societies." *Party Politics* 1 (January): 73–111.

Jacobson, Gary. 1983. *The Politics of Congressional Elections*. New York: Little Brown.

Jones, Mark P., and Scott Mainwaring. 2003. "The Nationalization of Parties and Party Systems: An Empirical Measure and an Application to the Americas." *Party Politics* 9: 139–66.

Katz, Richard. 1973a. "The Attribution of Variance in Electoral Returns: An Alternative Measurement Technique." *American Political Science Review* 67 (3): 817–28.

Katz, Richard. 1973b. "Rejoinder to 'Comment' by Stokes." *American Political Science Review* 67 (3): 832–34.

Kawato, Sadafumi. 1987. "Nationalization and Partisan Realignment in Congressional Elections." *American Political Science Review* 81 (4): 1235–50.

Krain, Matthew. 1997. "State-Sponsored Mass Murder: The Onset and Severity of Genocides and Politicides." *Journal of Conflict Resolution* 41 (3): 331–60.

Mainwaring, Scott, and Edurne Zoco. 2007. "Political Sequences and the Stabilization of Interparty Competition." *Party Politics* 13 (2): 155–78.

Mayhew, David. 1974a. "Congressional Elections: The Case of the Vanishing Marginals." *Polity* 7: 295–317.

Mayhew, David. 1974b. *Congress: The Electoral Connection*. New Haven, CT: Yale University Press.

Morgenstern, Scott, and Richard Potthoff. 2005. "The Components of Elections: District Heterogeneity, District-Time Effects, and Volatility." *Electoral Studies* 24 (1): 17–40.

Morgenstern, Scott, and Stephen M. Swindle. 2005. "Are Politics Local? An Analysis of Voting Patterns in 23 Democracies." *Comparative Political Studies* 38 (2): 143–70.

Mustillo, Thomas, and Sarah Mustillo. 2008. "Using Stata as a Computational Tool in a Relational Database Environment." North American Stata Users' Group Meeting, Chicago.

Rose, Richard, and Derek W. Urwin. 1975. *Regional Differentiation and Political Unity in Western Nations*. London: Sage Publications.

Rose, Richard. 1984. "Electoral Systems: A Question of Degree or of Principle." In *Choosing an Electoral System: Issues and Alternatives*, eds. Arend Lijphart and Bernard Grofman. New York: Praeger, 73–81.

Samuels, David. 1999. "Incentives to Cultivate a Party Vote in Candidate Centric Electoral Systems." *Comparative Political Studies* 32 (4): 487–518.

Schattschneider, E. E.. 1960. *The Semisovereign People: A Realist's View of Democracy in America*. New York: Holt, Rinehart and Winston.

Stokes, Donald. 1965. "A Variance Components Model of Political Effects." In *Mathematical Applications in Political Science*, eds. Claunch, J. M. Dallas: Southern Methodist University, 61–85.

Stokes, Donald. 1967. "Parties and the Nationalization of Electoral Forces." In *The American Party Systems: States of Political Development*, eds. Chambers, W. N. and W. D. Burnham. New York: Oxford University Press, 182–202.

Tomz, Michael, Jason Wittenberg, and Gary King. 2001. *Clarify: Software for Interpreting and Presenting Statistical Results*.

Zellner, A. 1962. "An Efficient Method of Estimating Seemingly Unrelated Regression Equations and Tests for Aggregation Bias." *Journal of the American Statistical Association* 57: 348–68.

Scott Morgenstern is associate professor of political science, University of Pittsburgh, Pittsburgh, PA 15260.

Stephen M. Swindle is associate professor of political science, Lee University, Cleveland, TN 37320.

Andrea Castagnola is Ph.D. candidate in political science, University of Pittsburgh, Pittsburgh, PA 15260.