SYMPOSIUM

Social Networks in Comparative Perspective

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In a sense, the study of comparative politics is the study of the role that context plays in structuring behavior. Institutional contexts, such as the nature of the electoral system or the existence of an independent judiciary, drive differences in electoral outcomes or human rights across nations. Individual-level contextual factors such as norms, culture, or ethnic or religious identity can be determinative in understanding when social movements will likely flourish and which cleavages will lead to political parties or ethnic strife. Variation in context leads to variation in political outcomes and behavior across both peoples and nations, and provides comparative politics with its richness.

Context also leads to dissent among scholars as we engage in internecine methodological warfare over the best way to understand the complexity introduced through the inclusion of contextual factors in our theories and data (Mahoney and Goertz 2006). Quantitative approaches tend to look at issues broadly but shallowly, effectively averaging out complexity to make generalizations across cases. Qualitative approaches tend to look narrowly but deeply, yielding a weaker argument for generalization to other cases but a stronger one for truly understanding the determinants of behavior in a particular case. Because practitioners of each methodological school require substantial training to be successful, an insufficient commonality tends to exist between them, leading to less than ideal communication.

Social networks and a relational approach to comparative politics promise a way to bridge the gap between scholars and employ insights derived from deep qualitative study in cross-national, quantitative analysis. This connection is made possible by the focus on a core and often overlooked contextual factor: the role that the structure of interactions between actors plays in understanding the behavior of individual actors, and, therefore, in understanding aggregate behavior. As this form of context is universal—humans are by nature social—the use of social networks minimizes the traveling problem (Sartori 1970). Networks may vary in importance by substantive topic and spatiotemporal setting, but their conceptualization is clear and constant: ties to one's parents are ties to one's parents, whatever the relevance of the ties. In this article, I first discuss the use of social networks in general terms, focusing on the way in which relational analysis links the qualitative and the quantitative, as well as the individual-level and the aggregate. I then offer a series of four examples applying the use of relational approaches to core problems in comparative politics.[1]

Let me begin this general discussion with an important question: how might the promise offered by a relational approach be fulfilled? The key lies in identifying the appropriate level of analysis and the quality and availability of data given this level of analysis. To see how this process might work, it is helpful to first consider individual-level analysis of behavior. The goal is to understand the determinants of some choice or action, be it for whom or for what policy to vote, whether to turn out to vote or to protest, when or how much to alter a political opinion, and so on. There is a broad and growing empirical literature identifying the roles that one's social connections play in altering one's beliefs and behavior across a variety of political activities (e.g., Huckfeldt and Sprague 1995; Leighley 1990; McAdam 1988; Petersen 2001; Sinclair 2009). The causal pathways underlying the effect of network connections are varied and include direct influence (Friedkin and Johnsen 1999); information transmission (Huckfeldt 2001; Lohmann 1994; McClurg 2006); norms of fairness (Gould 1993); considerations of reputation (Gerber, Green, and Larimer 2008), credibility (Granovetter 1978), or legitimacy (Opp and Gern 1993); strategic complementarities (Marwell and Oliver 1993); resource coordination (Verba, Schlozman, and Brady 1995); and safety in numbers (Kuran 1991).

Although a few of these causal pathways (complementarities, information) particularly lend themselves to quantitative analysis (Jackson 2008), others (norms, legitimacy) require more case-specific knowledge for conceptualization and quantification. This knowledge can only come from a deep understanding of the sort of contextual factors that qualitative scholars have long identified as important. Thus, when attempting to map out the network connections among people in cases in which one can expect norms, culture, identity, or emotions to drive behavior both directly and indirectly via the behavior of others, qualitative scholarship is a necessity.

Once these connections are discerned, the tool of quantitative analysis becomes available. For example, one could include a simple measure of individual-level connectivity in cross-national regressions of comparative behavior. Given the strong dependence of behavior on network ties in the American context, even controlling for media effects (Mondak 1995), one would expect that connectivity would continue to be an important explanatory variable in the analysis of questions in comparative politics. This expectation assumes, of course, that networks have been constructed that are appropriate to the case in question. Casual discussion networks may be the appropriate data from which to draw the independent variable of connectivity when political opinion formation is the behavior in question, but the same networks may not be appropriate when considering an action such as protest, in which participants assume more personal risk. In such cases, the appropriate network to study may be strongly tied family and friends

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(McAdam 1988). Careful qualitative analysis is necessary to identify these important distinctions.

Beyond the individual level, attention to the properties of behavioral spread in a network can help translate these insights to the aggregate level. Scholars in this tradition detail how the degree of behavioral spread depends on such network characteristics as clustering, path length, connectivity, and the number of weak ties (e.g., Centola and Macy 2007; Fowler 2005; Gould 1993; Marwell and Oliver 1993; Rolfe 2005; Siegel 2009). A mapped-out network of relations allows one to employ these theoretical insights to produce predictions about how a population of individuals within such a network will behave, given a particular distribution of individual incentives and a particular causal pathway driving changes in individual behavior. For example, a network with many weak ties (Granovetter 1973) is likely to more effectively distribute information, allowing individuals to update policy beliefs, than to encourage a risky collective action that relies on individual attention to norms of fairness or legitimacy (Centola and Macy 2007; Siegel 2009). We would therefore expect a network with many weak ties to have more of an effect in the aggregate on opinion formation than on risky mass participation. Given network data, one can test these predictions by looking at the substantive effect of the aforementioned network characteristics on aggregate behavior in regression analysis.

As can be seen, relational studies connect across several levels of analysis. Individual-level data on discussion partners or movement ties can be used both to make predictions on behavior at the individual level and to form a picture of network structure at the aggregate level. These structures are in turn predictors of aggregate-level behavior (Siegel 2009). That networks link levels of analysis implies their potential for addressing new questions. If one found, for example, that weak ties tend to be determinative in individual opinion, but that support for a political party is strongest in regions in which few weak ties are present, these findings would suggest that different causal mechanisms lie behind support for a political party, spurring further research.

A fair criticism of this approach is its data-intensiveness. This approach may translate well to industrialized democracies, but even years of careful study in areas in which security is more of an issue are unlikely to produce much more than group-level information (Petersen 2001). Without individual-level connectivity data, one cannot include connectivity as an individual-level variable in a cross-national regression.

Network analysis, however, is flexible enough to produce additional insights even when data are comparatively poor. At the individual level, it may still be possible to discern the network of elite interconnectivity, given structured interactions within the halls of power. These data can provide for the same analysis described previously, although only for an unrepresentative subset of the population. Given the influence of elites in these settings, however, the insight derived from such network analysis might still be sufficient to make broad predictions.

At the aggregate level, knowledge of every tie in the network is not necessary to determine the general type of the network. Siegel (2009) offers four such network types: small world, opinion leader, village, and hierarchy. Differences in expected aggregate behavior can be discerned across these types when knowledge is available only of the types themselves. Even when detailed network data are sparse, qualitative data on network type—for example, do opinion leaders drive behavior, or is there more equality of influence across the network?—can be employed to produce predictions. Siegel (forthcoming) illustrates this approach using Patel's (2005) ethnographic data to postdict the outcome of the January 2005 Iraqi legislative elections.

Thus, depending on data availability and the level of analysis of the research question, network analysis and a relational approach to political science can not only produce useful and novel insights into comparative politics, but also allow for productive collaborations between qualitative and quantitative scholars, taking advantage of the techniques and insights of each. The remainder of this article illustrates this potential in a series of examples drawn from core problems in comparative politics.

CIVIC CULTURE, DEMOCRACY, AND DEMOCRATIC PERFORMANCE

The first example of the potential of the relational approach is one in which a persuasive case has already been made for the inclusion of relational factors: the role of civic culture in enabling democracy and delivering favorable democratic performance (Gibson 2001). In his seminal work, Putnam (1993) uses elite and mass surveys, detailed case studies, and historical analysis to posit that the difference in performance between the regional governments of northern and southern Italy lies in the superior degree of social capital present in the North.

This combination of quantitative and qualitative research, while raising additional questions (Tarrow 1996), provides a generalizable explanation for differences in democratic performance. That is, given two otherwise identical cases, Putnam's theory implies that the case that exhibits the most social capital will possess the better democratic performance. This falsifiable claim requires the efforts of both quantitative and qualitative scholars to test and also yields spillover claims. Social capital is fundamentally a relational concept that is at least partially independent of the system of government in place. Presumably, systems exhibiting greater social capital will have an easier time democratizing and will experience more successful democratic transitions.

This claim is also testable, but it requires an understanding of the relevant networks for democratization, which in turn requires an understanding of the causal path that translates social capital to democratization. Do strong friendship ties build legitimacy for group decision making? If so, networks driven by opinion leaders should produce less of the relevant social capital. Or does social capital aid in coordination, smoothing the transition? If so, the opposite conclusion on opinion leaders may be true. Regardless, a relational approach seems essential to understanding opinion formation in groups, implying that this approach is also essential to understanding the development of civic culture and its role in promoting democracy.

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SOCIAL MOVEMENTS

A second area of comparative politics in which a relational approach has already been applied to positive effect is that of social movements. Participation in a movement is a frequently risky action that depends fundamentally on the behavior of others. Kuran (1991) and Lohmann (1994) describe two different causal pathways that lead to a strong role of interdependence in decision making that determines whether or not participation in a social movement rises to a level sufficient to induce change in the government. Both authors illustrate their theories with the Eastern European revolutions of 1989. Although these authors largely focus on an individual's response to aggregate behavior, explicit consideration of social networks can be added to the core dynamic of their models. For instance, Siegel (2009; forthcoming) explores the idea of participation in costly collective actions within networks in contexts both with and without the sort of repression that nascent movements often elicit.

Without the inclusion of social networks, extant work often fails to identify the strong causal pathways that underlie aggregate behavior and is thus potentially subject to selection bias (Siegel 2009). The inclusion of networks requires a combination of qualitative and quantitative approaches, as seen in McAdam's (1988) study of Mississippi's Freedom Summer. Doing so allows us to address important questions such as the relationship between repression and dissent (c.f. Davenport 2007), which fundamentally relies on not only one's own response to repression, but also one's response to others' repression and one's response to others' responses.

SOCIAL CLEAVAGES, PARTY SYSTEMS, AND CIVIL STRIFE

Though very different substantively, the literatures on the development of party systems and the potential for civil strife are both predicated on the importance of the structure of the cleavages present in society. Parties are organizations intended to represent the interests of one or more segments of the population, as distinguished by membership in one or more social cleavages, and strife often occurs across the boundaries of cleavages. Yet, conceptions of individual identity and the cleavages they spawn, including race, ethnicity, and gender, are fluid and socially constructed (e.g., Smedley 2001; McCall and Dasgupta 2007). Relational approaches are thus a natural fit, delineating the social pathways across which identity formation occurs (Block and Siegel 2008).

A better understanding of the social determinants of identity formation would endogenize the nature of the cleavages in society. In terms of party systems, not only would the relative sizes of identity groups affect which groups agglomerate into parties (Posner 2005), but party membership could feed back into identity choice, leading to variation in party strength over time. In terms of civil strife, group identity could shift with migratory patterns and the concomitant alteration in network structure, producing changes over time in the degree to which ethnic enclaves are differentiated from the dominant group, which in turn could produce different aggregate outcomes under systems of persecution. For example, immigration might produce dispersed enclaves of a particular ethnic group. With insufficient numbers or ties to the local power structure, the more successful immigrants would be those who were able to forge new network connections to those outside their group and assimilate into the population. However, should immigration increase, more options would become available. Assimilation could continue with more equal cultural exchange, or the ethnic group could be present in sufficient numbers to attain its own power base. This latter possibility would increase incentives for in-group social identification and differentiation from the dominant group. Which outcome occurred would depend on the complex interplay of cultures and institutions defining the distribution of economic and political opportunities for the immigrants. The nature of individual relationships determines the significance of social cleavages, which in turn helps dictate the likelihood of civil strife in the aggregate.

LEGISLATIVE BEHAVIOR AND GOVERNMENT FORMATION

As a final example, consider networks encompassing a smaller set of individuals that describe the connections and interactions between members of legislative bodies. In recent years, scholars have mapped out the networks connecting members of the American Congress and have begun using these data to describe how these individuals introduce and pass legislation (Cho and Fowler 2010). While co-sponsorship data of the sort used to create networks in Congress may not be as easily available in parliamentary systems, for instance, this lack of data does not imply that other forms of networks are not in place, or that these networks do not play a role in legislative behavior. For example, if elites in government tend to come from a small number of schools—such as Oxbridge in the United Kingdom—friendship and associative networks may be discerned via qualitative analysis, and the network constructed may be used in quantitative analysis of legislative effectiveness.

Parliamentary systems offer further opportunities for network analysis. The government-formation process involves coalition building among parties representing a diverse set of interests. With multiple parties in play, decision making can become quite complicated. Among other factors, party leaders require information about other leaders' interests and willingness to bargain to form the most beneficial coalitions. This information is likely to be differentially available across parties, and which information is accessible depends in part on prior interactions between the parties' leaders. Under this logic, both electoral and pre-electoral (Golder 2006) coalitions should be more likely to form among parties connected through prior network ties, all else being equal. Discernment of prior networks requires qualitative analysis, but the prediction is falsifiable and can be tested quantitatively.

CONCLUSION

These four examples are only a sampling of the ways in which a relational approach to comparative politics might prove useful in addressing core questions in the subfield. However, they do indicate the wealth of questions in comparative politics that are amenable to a relational approach and provide new pathways for productive collaboration between scholars trained in qualitative and quantitative methodologies and

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those studying behavior at the individual and aggregate levels. Qualitative scholarship has produced significant information on context, and these data can be mined to elicit network connections, or at least network types. For instance, interviews that suggest that most influence lies with a handful of individuals point to a potential opinion leader network, while interviews in which people refer largely only to members of their own group point to a potential village network (Siegel 2009). At the same time, quantitative scholarship can use these relational data to draw conclusions across cases. Similarly, individual-level information on network ties can be used to develop and test aggregate-level hypotheses on the effect of network structure. This sort of cross-fertilization can only be a boon for the discipline. ■

NOTE

1. Franzese and Hays (2008) offer a complementary analysis of interdependence in comparative politics and examples in comparative political economy.

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