

## The Emergence and Diffusion of Institutional Forms

by

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Modern sociology pioneered the study of institutions as a system of interrelated constraints. The view of institutions as humanly devised constraints on social action has served as a foundational idea for virtually all sociological research. Institutions as constraints specify the limits of legitimate action and provide the structure of incentives within which individuals and organizations pursue their strategic moves. However, sociology's mainstream studies assume the existence of institutional structures while focusing attention to the analysis of the *effect* of specific institutional arrangements on outcomes at the individual and group levels. What is new in the new institutionalism in sociology is the aim to study the emergence, diffusion and transformation of institutional arrangements. The purpose of this essay is to adumbrate just how the new institutionalism in sociology has sought to do this.

Our procedure will be to refer mainly to studies that issue from the approach of comparative institutional analysis in which we are directly engaged, rather than attempt a more complete review of the variety of new institutionalisms in sociology (for that purpose see POWELL and DIMAGGIO [1991] or BRINTON and NEE [1998]). The comparative institutional analysis approach we employ seeks inspiration from Max Weber who pioneered the application of rational action theory to the analysis of institutional emergence and diffusion. In Weber's causal story, agents act according to mental models shaped by cultural beliefs that encompass conceptions of self-interest that are culturally bound by ideology and religion. This is seen in Weber's classic account of the diffusion of rational capitalist practices and institutional arrangements. WEBER's [1952] *Protestant Ethic and the Spirit of Capitalism* exemplifies an early application of rational action theory to the explanation of institutional emergence and diffusion. Within the institutional environment of religious differentiation in the wake of the Protestant Reformation in the West, ascetic Protestantism gave rise to culturally specific motives that inspired the rationalist spirit of modern capitalism.

The renewed interest in context-bound conceptions of rationality wherein rational action is grounded in cultural belief and relational structures integrates the idea of choice-within-constraints with the tradition of macroscopic study of institutions in sociology (NEE [1998]). This neoclassical turn enables sociology to strengthen its position as a discipline focused on explaining large-scale

societal transformations, from the role of the state in developing economies (EVANS [1995]) to the institutional changes taking place in China's market transition (for a review see NEE and MATTHEWS [1996]). Without an explicit action theory, sociology faces insurmountable difficulties in moving beyond the conceptual framework of comparative statics imparted by its founder, Emile Durkheim. DURKHEIM [1895/1958] argued that sociology's status as a distinctive and autonomous science rested on a methodological holism wherein "a social fact can be explained only by another fact." This claim all but ruled out the causal significance of actors – whether at the individual or corporate levels. In the absence of actors macroscopic analysis of institutions lacks a theoretical framework specifying causal mechanisms capable of explaining institutional change.

We begin by considering models of rationality that provide a microfoundation for comparative institutional analysis which departs from the assumption of complete information and unlimited calculating power posited by neoclassical economics. We make use of a context-bound conception of rationality – rational action embedded in social and cultural contexts – to outline arguments in two domains of institutional analysis: the emergence of informal norms and the way they combine with formal constraints to shape organizational performance; and how cultural understandings shape the diffusion of organizational forms.

### *1. A Microfoundation for Comparative Institutional Analysis*

The concept of context-bound rationality focuses attention on integrating accounts of rational action to an analysis of the institutional context of social and economic action. Context-bound rationality adopts a "thick" view of rationality as opposed to a "thin" account of rationality. The "thin" account of rationality depends on an abstract account of goals motivated by self-interest rooted in utilities or preferences, and posits utility maximizing as the mode of reasoning for actors. According to this, actors calculate costs and benefits of alternative courses of action in selecting the most efficient means to an end. A context-bound rationality views action as stemming from choices made by actors according to costs and benefits embedded in the institutional environment. Culturally organized perceptions, beliefs, and commitments matter in understanding choices made within institutional constraints.

The no-smoking rule in public places illustrates the usefulness of a context-bound understanding of rationality in explaining institutional emergence and change. Increasing awareness of the health risks posed by smoking led first to informal norms governing the behavior of smokers among non-smokers, as in the expectation that smokers ought to step outside for smoking so as not to impose a negative externality on non-smokers in closed rooms. But as an informal norm, the effectiveness of such a solution abates outside the private

setting of mutual acquaintances. Informal norms are costly to enforce in public spaces without the backing of formal rules enforced by third party sanctions. The emergence of formal no-smoking rules, and their rapid diffusion, was promoted by professionals armed with theories and evidence supporting claims of dire negative externalities imposed on non-smokers by smokers. These concerns found fertile soil in the American cultural context, where fervent social movements seeking to root out personal vices maintain the heritage of ascetic Protestantism.

The idea of context-bound rationality is well adapted to the needs of comparative institutional analysis. It assumes limited cognitive ability on the part of actors and interprets rationality as a product of institutional processes that are path dependent and implanted in historical and cultural contexts of particular institutional environments. Context-bound rationality assumes that actors are "intendedly rational, but only limitedly so" (SIMON [1957, xxiv]). Although actors meliorate rather than maximize, individual and corporate actors are purposive in the sense that self-interest and incentives matter. However, purposive action frequently results in outcomes that are unintended by actors because institutions give rise to strategic interactions in which outcomes are shaped relationally. Adaptations based on unintended consequences of action that result in success or rewards also fall within the purview of context-bound rationality.

Game theory builds on the idea of choice-within-constraints to analyze multi-person decision problems. Because of this, it can be extended to model the strategic interactions of actors in specific institutional arrangements. As exemplified by the well-known prisoner's dilemma game, the rules of the game specify the constraints insofar as they set the parameters of choice confronted by the prisoners. As with the prisoner's dilemma game, the institutional logic of other social institutions can be examined by means of game theory in order to formulate predictions about the outcome of choices made within institutional constraints. Comparative institutional analysis has employed game theory as an analytical tool to model the dynamics of choices within institutional constraints. Recent examples of this range from the erosion of political commitment in reforming state socialism (NEE and LIAN [1994]) to the analysis of principal-agent relations among Genoese and Maghribi traders in the late medieval period (GREIF [1998]).

## *2. How Formal and Informal Constraints Combine*

Economic analyses emphasize the role of formal rules of the game – i.e., contract, property right, law, and regulation – in the governance of economics and economic organization. Recently economic new institutionalists have acknowledged the importance of informal constraints such as customs, informal norms, and conventions embedded in social networks (NORTH [1990]).

Although economics and sociology concur on the importance of both formal and informal constraints, what is not well understood is the nature of the relationship between the two. Formal rules are produced and enforced by organizations such as the state, which has a comparative advantage in solving the free rider problem. Informal norms are implicit or explicit rules of expected behavior that embody the interests and preferences of members of a close-knit group or a community. Unlike formal rules, the monitoring of informal norms is intrinsic to the social relationship, and enforcement occurs informally as a by-product of social interaction.

A theory of how formal and informal constraints combine is crucial for explaining the variation in the performance of organizations. No organization can rely only on the formal rules of the game to coordinate the conjoint action of its members. Informal norms embedded in social networks within the organizations coordinate much of the practical activity of all organizations. Hence, the quality of performance in an organization is to a large extent shaped by the manner in which the informal norms combine with the formal rules of the game. The emergence of opposition norms embedded in subgroups in an organization can result in demoralization and factionalism, as in the US military during the final years of the Vietnam War. On the other hand, the rise of informal norms supporting the goals of the organization can lower the cost of monitoring and enforcement of formal rules of the game. This results in a higher level of organizational performance.

Social actors jointly produce and uphold norms to capture the gains of cooperation (NEE and INGRAM [1998]). This proposition opens the way to specifying the relationship between informal and formal constraints. The proposition assumes that norms embody interests and preferences, which can only be realized by means of collective action. Norms are ideas that arise from the problem-solving activities of human beings in their strivings to improve their chances for success – the attainment of rewards – through cooperation. They arise through trial and error in a process of group adaptation and are adopted by members of a group when they result in success. Informal norms diffuse across groups through a process of mimicking or imitation. Because of this, the emergence of informal norms occurs through a variety of mechanisms. They can result from purposive collective action as well as the unintended consequences of trial-and-error experimentation. Whether members of a group are individually rewarded governs the selection of a norm.

The relationship between formal and informal norms will be closely coupled when the formal rules of an organization are perceived to be in line with the preferences and interests of actors in subgroups. The close coupling of informal norms and formal rules is what promotes high performance in organizations and economies. When the informal and formal rules of the game are closely coupled, they are mutually reinforcing. This is seen in the correspondence between informal norms and formal rules of fair business practices in developed market economies. Consumers can rely on a higher than expected level of

trustworthiness even though government prosecution for bilking customers through dishonest accounting procedures is relatively uncommon. It is also illustrated in the case of research universities in the close coupling between formal review procedures gauging and rewarding research productivity and the informal norm of "publish or perish." When informal and formal norms are closely coupled, it is often difficult to demarcate the boundaries between informal and formal social control. Close coupling of informal and formal constraints results in lower transaction costs because monitoring and enforcement can be accomplished informally. The cost of social rewards to achieve conformity to norms is low because it is produced spontaneously in the course of social interactions in networks of personal relations. By contrast, the greater the reliance on formal sanctions the higher the transaction costs involved in maintaining compliance.

When the formal rules are at odds with the preferences and interests of subgroups in an organization, a decoupling of the informal norms and practical activities on the one hand, and the formal rules on the other hand will occur. This is a common state of affair in complex organizations such as schools and government agencies. As John MEYER and Brian ROWAN [1977, 358] observe, decoupling "enables organizations to maintain standardized, legitimating, formal structures, while their activities vary in response to practical considerations." For certain types of organizations for whose output there is not a competitive market, formal organizational rules will be largely ceremonial, designed to satisfy external constituents that provide the organization with legitimacy. Independent of this ceremonial formal structure, informal norms arise to guide the day-to-day business of the organization.

Informal norms evolve into "opposition norms" if institutions and organizational sanctions are weak relative to contradicting group interests. Opposition norms encourage collective action directly resisting formal rules. In the cities of the US, compliance with opposition norms personifies what it means to be a minority. Those who fail to conform to opposition norms are ridiculed and taunted by their peers. Elsewhere too, when the organizational leadership and formal rules are perceived to be in conflict with the interests and preferences of actors in subgroups, informal norms opposing formal rules will emerge to "bend the bars of the iron cage" of the formal organizational rules. In Russia, widespread refusal to pay taxes by individuals and firms is an example of an opposition norm operating at the societal level. Opposition norms have the most negative implication for performance. To the extent opposition norms become locked-in to entrenched networks, they are path dependent and give rise to a culture of opposition. The Sicilian mafia is an example of how securely established opposition norms embedded in social networks can be. The mafia's organizational structure is based on kinship and quasi-kinship ties and its rules are informal. Concerted efforts by the Italian state to extirpate it have all failed. Opposition norms can persist even after changes in the formal rules of the game that provoked their emergence. This is clearly evident in

Russia where opposition norms born in closing decades of the Soviet Union are still rife despite regime change, subverting efforts to institute a modern market economy.

### *3. Institutional Analyses of Diffusion*

Economic analyses of diffusion (for example, of new technology) generally develop a choice-theoretic account of how actors maximize utility by investing or adopting at the right time. There are a variety of models in which the timing of adoption rests on the costs of adjustment versus foregone profits, the competitive consequences of adopting late versus the declining price of the innovation, and possible positive externalities producing bandwagon behavior (for a review see REINGANUM [1989]). Underlying these ideas is the notion that the firm-specific consequences of adoption are in some fashion calculable.

Sociology begins at the other end, treating decision-making by an isolated actor as uninformed and indeterminate. What is most salient about the decision to innovate is that it requires a leap into the dark: A farmer does not know how well hybrid corn will stand up to drought a year or two from now; IBM does not know the implications of a licensing agreement with Microsoft until the PC market has emerged. Where innovation is involved, decision-makers have limited resources because they cannot consult their own experience.

Uncertainty about the consequences of innovations may lead potential adopters to consult the choices and experiences of others. Organizations can imitate success elsewhere to the extent that it is infeasible or costly to engage in explicit problem-solving. Since the organization cannot learn from its own experience, it learns from the experiences of others.

But where the costs and benefits of an innovation are firm specific, a naive strategy of imitation is also problematic. If firms face different competitive situations or possess different internal resources relevant to the innovation, knowledge of each other's choices may provide little useful information. And even where conditions are homogeneous, the evidence that others provide is often mixed and indeterminate. For example, consider the imprecision of deciding whether to provide stock options to top executives based on the overall performance of competitors.<sup>1</sup>

Because such uncertainties permeate the choice-set of corporate actors, the decision to innovate is contingent upon how features of the larger social and institutional context simplify and organize diffusion processes. This insight has

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<sup>1</sup> Of course, some adoption decisions are more clear-cut than others. The technological innovations that economists often study may be more easily assessed than the internal organizational arrangements that sociologists focus on – though ethnographic accounts of the development of new technologies suggest great ambiguity (THOMAS [1994]). Or ingenious decision-makers may develop effective strategies of experimentation that reduce the uncertainty of innovation.

led research on diffusion in a variety of directions. Analyses focusing on the effect of the *social context* investigate the structure of communication networks, contrast diffusion carried by the mass media versus personal contact, and examine the attributes that differentiate leaders from followers (for a review see STRANG and SOULE [1998]).<sup>2</sup>

Analyses of the *institutional context* emphasize the role of cultural understandings in determining what diffuses and what fails to spread. STRANG and MEYER [1993] argue that "theorization" (defined as the identification of abstract categories and cause-effect relationships) accelerates diffusion. Theories and models channel diffusion by identifying broad classes of situations as comparable, motivating particular practices and strategies as effective and replicable, and legitimating the adoption of novel activities vis-a-vis interested audiences and potential opponents.

For example, in the 1980s Japanese companies stunned US business with their success in penetrating US markets. But while this made it almost inevitable that Americans would look to Japan, it was not clear what lesson they could extract from Japan's competitive success. Should US managers become self-deprecating and thoughtful? Should the major industrials develop partnerships with banks and suppliers along the lines of the *keiretsu*? Should US government work to limit imports and shed its role as a global policeman? While Americans debated all these possibilities and more, some Japanese practices diffused to the US while others did not. In particular, US business developed a strong appetite for two managerial practices seen as major forces behind Japan's industrial success, quality circles and (somewhat later) total quality management.

Why did these practices and not others come to represent the fount of business success in the 1980s and the 1990s? Perhaps the best explanation is that they embodied a logic of worker participation and involvement that have long served as cultural ideals in US business (BARLEY and KUNDA [1992]). Quality circles rose popularity on the heels of the job redesign movement as a way of simultaneously increasing organizational productivity and commitment. The cultural belief motivating interest in quality circles was that empowered workers would be happier workers and happier workers make for better workers. Importantly, an extensive professional community of organizational change agents was already committed to these cultural assumptions.

Cultural beliefs drive endogenous processes within organizational populations as well as the diffusion of practices across populations. For example, public initiatives addressing gender, racial and other inequalities motivate much of the contemporary evolution of employment relations in the US (DONBIN et al. [1993]). Lawyers and human resource professionals translate public

<sup>2</sup> Recent work has carried these lines of research into organization studies. For example, Jerry DAVIS [1992] demonstrates the role of common board membership in speeding the spread of poison-pill defenses against hostile takeovers.

initiatives advancing rights of women and minorities into organizational policies that seek to reconcile individual rights and corporate objectives. In cross-societal research, HOFSTEDE [1980] identifies substantial variation in cultural assumptions concerning the primacy of the individual versus the group, appropriate relations between superiors and subordinates, and risk seeking versus risk avoidance. These orientations frame the different ways in which British, French, and US managers interpret and respond to organizational issues.

Two implications flow from the notion that diffusion processes are driven by cultural beliefs. First, cultural-bound interpretations accompanying and motivating diffusion transform the practice that diffuses. What spreads is not the concrete set of activities that exists elsewhere, but a theorized, cleaned up, and nativized cousin. For example, Americans misinterpreted Japanese "spontaneity" for voluntary membership, took the "quality control" out of "quality circles," and emphasized behavioral rather than technical implications.

Second, experts and professionals play a key role in the diffusion of new institutional forms. These socially legitimated experts identify the categories and regularities that make particular practices accessible as candidates for widespread diffusion. In the US quality movement, for example, organizational development specialists, applied psychologists, and organizational consultants were the carriers of quality programs. Quality programs could diffuse more rapidly because they could be assimilated to the techniques and competencies of an experienced population of organizational change agents.

Of course, these implications are not news to the economic profession. Economists since Adam Smith have played a crucial historical role in designing, explaining, and legitimating social arrangements. Their ability to apply theoretical logics argued from first principles means that contemporary economies and even social policies are not the simple product of trial and error. They also follow the scripts of economic theories, from Keynes to Friedman to Sachs.

#### 4. Conclusion

The new institutionalism in sociology integrates context-bound notions of rationality with sociology's tradition of macroscopic analysis of interrelated constraints. It employs a rational action theory that takes into account cultural beliefs. It assumes that self-interest cannot be understood apart from relational ties and concrete institutional arrangements. It also extends Weber's emphasis on comparative institutional analysis, a methodological tradition that examines the emergence, diffusion, and transformation of institutions as path-dependent change within specific historical and cultural settings.

Analytic tools such as game theory can be utilized to model the logic of institutional processes within a given set of constraints imposed by institutional arrangements. But explanation of the rules of the game and the focal points that



attract actors rests on the sort of institutional analysis provided by sociology. As examples, we outlined briefly the mechanisms involved in the emergence of informal norms and the manner in which they combine with formal rules to shape performance, and how "theorization" elaborates and codifies cultural beliefs in a way that accelerates the diffusion of institutional forms.

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