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- Riccio, James, Daniel Friedlander, and Stephen Freedman. 1994. *GAIN: Benefits, costs, and three-year impacts of a welfare-to-work program*. New York: MDRC.
- Riccio, James A., and A. Orenstein. 1996. Understanding best practices for operating welfare-to-work programs. *Evaluation Review* 20 (1): 3–28.
- Social Research and Demonstration Corporation (SRDC). 1996. *When work pays better than welfare: A summary of the self-sufficiency project's implementation, focus group, and initial 18-month impact reports*. Ottawa, Ontario: Social Research and Demonstration Corporation.
- Szanton, Peter L. 1991. The Remarkable "Quango": Knowledge, politics, and welfare reform. *Journal of Policy Analysis and Management* 10 (4): 590–602.
- Wallace, John, and David Long. 1987. *GAIN: Planning and early implementation*. New York: MDRC.
- Wiseman, Michael. 1991. Research and policy: An afterword for the symposium on the Family Support Act of 1988. *Journal of Policy Analysis and Management* 10 (4): 657–66.
- Wolffhagen, C. 1983. *Job search strategies: Lessons from the Louisville WIN laboratory project*. New York: MDRC.
- Zambrowski, Amy, and Anne Gordon. 1993. *Evaluation of the minority female single parent demonstration: Fifth-year impacts at CET*. New York: Rockefeller Foundation.

CHAPTER 8

The Making and Analysis of Public Policy: A Perspective on the Role of Social Science

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In the 1960s and early 1970s the policy analysis "movement" irrupted into American political life. Opportunistically assembling rudiments of authority, knowledge, technical skill, and application that began to accumulate with the emergence of the modern administrative state, a well-positioned group of federal executives succeeded in forging new structural links between research-based knowledge and policy-making. The legacies of their efforts are still evident in social science scholarship; in undergraduate, graduate, and professional training; and in administrative institutions, technologies, and practices at all levels of government. These legacies remain controversial, however. The role of social science in democratic governance and the mediating contributions of policy analysts are vigorously contested, raising issues concerning the future of policy analysis training and practice.

The advent of policy analysis as an administrative technology¹ marked a watershed in public administration: both a culmination of trends toward governance by qualified managers, initiated in the nineteenth century, and, in view of the movement's tendency to centralize political power, a stimulus to late-twentieth-century efforts to democratize policy-making influence and expertise. Public policy scholarship, textbooks, curricula, and folklore, however, still tend to idealize executive-oriented policy analysis. Thus a relatively young profession has seemed slow to adapt to the post-cold war, "third way," communication-based politics that appears to call for changes in policy analysis methods and applications.

This apparent inertia in policy analysis training and practice may appear to vindicate its most recent and strident critics, who see positive social science and its applications as inimical to democracy, community, truth seeking, and constructive change. I shall argue that both supporters and critics of contemporary research- and analysis-based policy-making inadequately appreciate the

extent to which tendencies toward rationalizing public action on the basis of expertise are tightly woven into our political-legal-bureaucratic institutions. These tendencies antedate the policy analysis movement, and they will survive its severest critics. The issue is not whether but how social science-based policy analysis will inform state action in ways that are both constructive and consistent with evolving American political values.

Scholars concerned with such matters have demonstrated two rather distinct tendencies. In the first, social scientists as interested parties, in other words, experts who view the public sector as a source of resources and opportunity, are preoccupied with the question "Are we making a difference?" They produce what may be termed a "knowledge and power" literature. In the second, social scientists as relatively disinterested scholars consider policy-making as a social process from a variety of disciplinary and epistemological perspectives, addressing the question "What is the role and influence of expertise?" They produce a critical "science and society" literature. This essay adopts the second orientation to address the first.

The discussion is organized as follows: The next section is concerned with the power side of knowledge and power, addressing administrative developments that have enlarged opportunities for expert influence. I will argue that the power of policymakers, whether executive, legislative, or judicial, and their need for knowledge derive from their discretionary authority, that is, their formal and actual authority to propose and to design actions to be taken by others. The issue of how and why policymakers should act has grown in importance, inspiring important innovations in administrative technology, among them policy analysis.

The following section discusses the knowledge side of knowledge and power. The argument is that an important stimulant to the acquisition of social science knowledge has been its potential value to policymakers, especially as these officials are compelled to argue for the legitimacy of their discretionary actions before partisan legislators, stakeholders, and an often skeptical judiciary.

With these sections as foundation, I take up the controversies that have been associated with policy analysis when viewed as an administrative technology mediating between social science scholarship and policy-making. Do experts and their mediators produce enlightenment or distortion? I then consider the implications for the role of policy analysts and for policy-relevant research of recent tendencies toward the diffusion throughout the polity of influence over public policy. The concluding argument is that policy analysts and the researchers that inform them must diversify their focus, de-emphasizing executive decision making in favor of addressing the varied needs for enlightenment of other influential actors enmeshed within complex processes of political communication.²

An "Active, Originating, Inventing, Contriving Element"

The United States is a representative democracy founded on governmental power that is checked, balanced, and limited by the Constitution and by the rule of law. Its public administrators must in the first instance fulfill legal obligations imposed by legislatures, courts, and formal executive orders. It now seems self-evident that making and managing public policy in such a system requires human agency: judgment and discretion by officials with legitimate authority to act. While administrative discretion occurred in practice from the beginning of the Republic, the concept of administrative discretion in public administration theory and the existence of administrative law that formally recognizes it are distinctly twentieth-century developments, features of the modern administrative state and, in particular, of the post-New Deal welfare state.³ The delegation of power to public managers for the accomplishment of public mandates, moreover, has been controversial from the time the modern state began to emerge. Unreviewable authority to act has been regarded, especially in our governmental system, as a potential danger to democracy. For this reason, the incorporation of doctrines of administrative discretion into jurisprudence, political theory, and administrative practice is far from complete.

Prior to the twentieth century, the law governing public administration in the United States was assumed to be indistinguishable from private law.⁴ With the emergence of the administrative state, the courts had to decide how to rule on issues involving the exercise of discretion by administrative officers in a wide range of matters. The law governing executive authority in the administrative state evolved as courts tried to reconcile the dramatically increased law-making authority of the executive branch with a constitutional system that made no provision for it.⁵ Further, the courts had to resolve contentious issues involving the separation of powers and the nondelegation doctrine, which pitted legal formalism against reasonable interpretation. A milestone was the 1946 enactment of the Administrative Procedures Act, but the high-water mark of deference to administrative discretion was reached when the Supreme Court issued its 1984 decision in the case of *Chevron USA v. Natural Resources Defense Council*. In this case, federal district judges were directed to defer to agency decision making (a) if agency action is in clear conformity with legislative intent and (b) if, in the absence of clear legislative intent, the agency's actions are reasonable.

Administration by Professionals

The need for discretionary action by administrators within a constitutional regime that does not actually provide for it gives rise to the enduring issues of policy-making and implementation. The study of policy-making can be viewed

as the study of administrative discretion, its location, and its uses. Among the branches, levels, and agencies of government, who shall define the goals of public policy? In whose hands shall its execution be placed, and how much discretion shall the executors be allowed to exercise? To whom and how shall those with delegated authority be accountable? How shall conflicts over authority and performance be resolved?

The institution of professional administrative roles, formally insulated from political rewards and reprisals, introduced the idea of qualifications, tenure, and neutral competence into governance. The creation of a professional civil service beginning late in the nineteenth century enabled the large complex organizations of government. Policymakers were able to delegate responsibility for program administration to subordinates through an employment contract while remaining generally accountable to the public for the activities of their employees. In the meantime, these subordinates would have the authority to do what was needed to implement public law. They would need training and expertise to do their work well, stimulating the emergence of public administration as a profession to replace public officeholding as an extension of legislative politics.

Administrative discretion might seem to be intrinsically an executive function. This idea was given scientific support by Frederick Taylor's (1911) concept of "scientific management," which divided formal responsibility for administration between a managerial group and a group that performed the work. This division of labor became popular in both business and public administration (Rainey 1991). But, as Justice Holmes recognized, there are no intrinsic legislative, judicial, or administrative actions. The courts were consistently hostile to administrative discretion, believing it to be inherently arbitrary, and they assumed responsibility for addressing the kinds of questions listed above. As Marshall Dimock saw it,

The general rule which the courts have laid down is that, before administrative officials will be permitted to exercise a discretionary power affecting an individual's rights, the legislature must have created a standard. . . . [However], the law on the subject [of standards] is elusive. (1936b, 53-54)

Over time, "personnel" and "procedural elements" came to be recognized as the best safeguards against the arbitrary exercise of administrative discretion. Are public managers qualified, and have they followed procedures that preclude the abuse of power? Early public administration doctrine came to emphasize an "institutional" approach to administration where "the emphasis is shifted from legal rules and cases to the formal framework and procedures of the administrative machine" (Dimock 1936a, 7). Judicial rules and decisions,

statutory and constitutional limitations and requirements, and, later, executive orders and administrative rules having the force of law were thought to govern administration.

Excluded from the foundation of administrative action by public law and institutional traditions were concrete experience and the "human side of administration" (Dimock 1936b). Laski (1923) argued, "Administrative discretion is the essence of the modern State." More fully developed notions concerning executive discretion with respect to policy-making began to take shape with the first attempts to institutionalize social planning in the United States. "Heretofore," said Dimock, "discretion has been viewed through the lawyer's eyes; let us try to observe it from the perspective of the administrator as well" (47). His argument was that administrative discretion had been hostage to judges as yet unable to grasp the requirements of the modern administrative state and instinctively disposed to view administrative discretion as essentially arbitrary and subject to abuse. This, Dimock believed, was a fundamental misconception.

Theory and Invention

Following this line of thinking, Dimock (1936a), foreshadowing the policy analysis movement, identified an alternative approach he called "theory and invention." Its purpose "is largely to uncover false assumptions and to invent new ideas and ways of doing things for the administrator" (8). He pointed out that practicing administrators tend to emphasize experience and "the practical approach." They are prone to denigrate theoretical or technical approaches even though they themselves are influenced by "ideas and researches." The pragmatism associated with John Dewey contributed to the idea that administration is "a tool by which the problems of society may be solved" (8). "The law related to the subject must, of course, be considered, but in addition the economic situation, the pressure of political parties, and vested interests must be given consideration" as well since they constitute "influences acting upon the actual administration of government" (8-9). Dimock argued:

Public administration is not merely an inanimate machine, unthinkingly performing the work of government. If public administration is concerned with the problems of government, it is also by the same token interested in fulfilling the ends and objectives of the state. (11-12)

Administrative discretion is essential, Dimock (1936c) argued, because of the limits on the time, pace, and aptitude of legislative bodies. He continued:

The execution of the law is not the only responsibility of the modern-day administration. Therefore, efficiency is not the only desideratum. Those

who view administrative action as simple commands . . . fail to comprehend the extent to which administration is called upon to help formulate policy and to fashion important realms of discretion in our modern democracies. Legislation and administration are not separable into nicely divided compartments. . . . And because they are not separable, the philosophies of public servants and their ideas concerning the ends of the state score heavily in the shaping of public policy. . . . *Administration . . . is an active, originating, inventing, contriving element in the body politic.* (127–28, emphasis added)

The notion of administrative discretion began congealing into doctrine. In their seminal postwar text, Simon, Thompson, and Smithburg ([1950] 1991) assayed the extent of administrative discretion and the value premises governing its exercise. They concluded that discretion is extensive and nearly fully explained by a detailed consideration of the formal and informal controls that establish the framework of accountability within which public administrators function. “Administrators and employees . . . have considerable freedom to decide matters on the basis of their own ethical promptings” (539). The principal contribution of Simon and his colleagues of the Carnegie School was the elaboration of the concept of discretion in terms of official behavior and, in particular, of discretionary acts of decision making and the premises on which decisions are based.

The Ultimate Act of Discretion

Discretion became an article of faith in public administration. Emmette Redford argued that “though administration is permeated and circumscribed by law, discretion is vital to its performance” (1958, 41). Discretion is necessary in administration because “law is rigid, and policy must be made pragmatically” (43). Variability of circumstances, multiple factors, and unanticipated contingencies are characteristic of administration. “The ultimate act of discretion,” says Redford, “is often in the decision whether to follow or not to follow an existing standard” (1958, 47). Morstein-Marx argued that the core of the executive function is discretion and control, “the former in the sense of providing for the right kind of action, and the latter looking toward the attainment of accountability for the execution of policy” (1959, 185). He advocated “a profitable blend of judgments—political and professional, staff and line, general and special” (186).

Morstein-Marx and Reining carried the argument to the level of middle management:

As the principal support of top-level direction, middle management . . . has to infuse the generality of organization-wide purposes into its indi-

vidual operations. On this score it can succeed only insofar as it captures in its own thinking the broad-range ends of the organization at large. (1959, 375)

Further,

Control of operations, even under exceptionally favorable circumstances, is never a purely mechanical process. Human beings do not function like machines. *Attainment of a reasonably standardized group product hence requires considerable leeway in direction.* A great number of factors enter into any kind of organized group action. Only when the middle manager is placed in a position to influence these factors *without undue restraint* can he be expected to live up to his task. (377, emphasis added)

The notion that administration requires the exercise of discretion, the concept of discretion as the exercise of judgment concerning the ends and means of government, and the idea that the exercise of judgment takes place through decision making provided foundations for the idea that decision making should be based on sound analysis that incorporates knowledge derived from scientific research.

Truth for Power

As the concept of administrative discretion became doctrine, planning traditions appropriate to the exercise of that discretion began to take form, laying the intellectual groundwork for revolutionary developments in the role of trained experts in policy-making. Out of war, Depression, and the growing complexity of modern government arose sustained efforts to identify and satisfy the intellectual needs of policymakers—indeed, to establish and publicize that policymakers have intellectual needs associated with their exercising discretion. The policymakers whom social scientists and policy analysts would inform and advise, whether authoritative decision makers at the top or bureaucrats at middle and street levels of administration, were viewed as actors with the power to formulate, evaluate, and choose between or propose actions to be carried out by others.

“Good New Ideas”

The deliberate use of scientists and science-based information to inform public policy-making and implementation is hardly a recent phenomenon (Lynn 1989).⁶ Heretofore, however, such uses had been more or less restricted to par-

ticular instances or regimes and were not necessarily a normal feature of policy-making. Moreover, a movement to bring "policy sciences" to bear on policy-making had already taken form. Initiated by Lasswell and colleagues and essentially formally initiated in 1951 (Lerner and Lasswell 1951), academic social scientists had begun to address the need of democratic states for systematic information to inform their deliberations, albeit with a far different purpose in mind than facilitating bureaucratic decision making.

The incorporation of policy analysis practice into executive policy-making beginning in the 1960s was nonetheless regarded within the social science community as something new in American politics. This new movement brought together knowledge derived from recent developments in systems, management, design, and economic sciences, improving competence in administrative leadership and efficiency in resource allocation: tools for managing complexity, identifying and solving problems, and allocating resources for maximum effect. Such tools were thought likely to be most effectively wielded by administrators with discretion to propose, decide on, and implement actions to be taken by others in pursuit of the goals of public policy. What was in fact new, at that time, was the deliberate incorporation of policy analysis and policy analysts into the central direction of large, complex government organizations. A new group of staff officers—policy analysts, answerable only to the organization's senior executives—were given privileged access to the executive and were empowered to speak for that executive in a variety of forums. The visibility of these officers attracted new attention to the processes by which the substance of public policies is determined.

Among the early demonstrations of the potential value of systematic analysis was the RAND corporation study of how to reduce the vulnerability of U.S. strategic nuclear forces. A number of the analysts' recommendations were immediately adopted by the U.S. Air Force. Quade (1964) drew a lesson from these RAND analyses that became a theme of the emerging policy analysis movement: "In an analysis aimed at policy-making, the relevance of the many factors and contingencies affecting the problem is more important than sophisticated analysis techniques. *A good new idea—technical, operational, or what have you—is worth a thousand elaborate evaluations*" (63, emphasis added).

In one of the first policy analysis texts, worth quoting at length in view of the subsequent criticisms of policy analysis discussed below, Quade (1964) identified pitfalls of analysis in the seemingly tractable domain of military planning. Analysts must recognize, he argued, that problems "frequently belong to that class in which *the difficulty lies more in deciding what ought to be done than in deciding how to do it*" (301, emphasis added). The most serious error of practice would be to look at an unduly restricted range of alternatives, to apply "some mechanistic test to alternatives suggested by others" (302), and to

uncritically accept "official" figures. Nor is it the case that if enough factual research is carried out, a valid generalization will somehow automatically emerge. "It is a pitfall," says Quade, "to become more interested in the model than in the real world. . . . A model is but a representation. . . . More must be left out than can be included" (309). Analysts should not overvalue methods that facilitate computation, nor should they use techniques that are more complicated than necessary. "It is a serious pitfall for the analyst to concentrate so completely on the purely objective and scientific aspects of his analysis that he neglects the subjective elements or fails to handle them with understanding" (314). Finally, "an analyst is in a position to bias the conclusions of a study. . . . Doing this deliberately to impose his personal preferences is unethical" (316).

A New Administrative Technology

An expanding literature offered additional definitions of policy analysis:

In a contemporaneous formulation that captured its evolving essence, Lane (1972) defined policy analysis as "the answers to the question: What happens when we intervene in the social system this way rather than that and why?" (71). He saw the movement as having several themes: a concern for government's purpose, mission, and objectives; the illumination of the wider social costs and the latent or unintended consequences of government interventions; consideration of alternatives, especially those of interest to groups "unable to present their own case effectively"; consideration of competing values; the normative basis of political advocacy, or "de-mystification of government and politics"; exposure of the consequences of assumptions and conventions; a consumer rather than producer orientation; and an orientation toward intervention, in other words, toward control and action (79–83).

Wildavsky described "the art of policy analysis" as follows.

Policy analysis must create problems that decision-makers are able to handle with the variables under their control and in the time available . . . by specifying a desired relationship between manipulable means and obtainable objectives. . . . Unlike social science, policy analysis must be prescriptive; arguments about correct policy, which deal with the future, cannot help but be willful and therefore political. (1979, 16)

Lynn (1987) saw the proper role of social science-based policy analysis as improving the basis on which policy decisions are made by employing theory, empirical knowledge, and analytic craftsmanship to clarify issues, alternatives, and consequences in a precise and dispassionate way. If policy analysts do not

perform this type of work, which is essential to the clarity and effectiveness of public policy, no one else in politics will do it.

A theme that proved especially inspirational to policy-oriented social scientists of that era was Aaron Wildavsky's characterization of policy analysis as "speaking truth to power." Given access to policy-making by enlightened officials in all agencies and branches of government, many policy-oriented social scientists came to view policymakers ("power") as members of a social engineering firm, whose business it is to correctly apply scientifically grounded "truth" to solving social problems. When policymakers needed help with this important work, they would be able to turn to the growing ranks of professionally trained policy analysts, who, being bilingual in the languages of science and policy, would "speak" to them in terms they could understand. The products of this communication would comprise new forms of "knowledge for action": policy analysis, program evaluation, and policy-relevant research. Serious consideration was given to the possibility that policy analysis might integrate the disparate social science disciplines, thereby reaping the benefits of interdisciplinary inquiry.

The popularity of policy analysis and policy-relevant scientific research strongly reinforced a positive view of social science, viz., the world of human, social, and political interaction can be known through rigorous, transparent protocols that guide policy researchers in their search for general principles and robust propositions that inform action by empowered policymakers. Associated with this view of knowledge was a compatible view of action: action is enabled by power, and power is executive power.

Policy and program analysis, development, planning, and evaluation began to be incorporated into the administrative routines and functional structures of public bureaucracies, thereby ensuring that policy analysts would have a place at a great many tables. The number of policy analysts in government grew rapidly, inspired by President Johnson's apparent intention to institute scientifically grounded policy analysis, planning, and program evaluation as regular functions of the public executive and as instruments of political leadership. Sundquist (1978) coined the term *research broker* to describe the role of packaging and retailing the intellectual products of the research community to policymakers. In his view, knowledge potentially useful to policymakers, while often available in the research community, is inaccessible to or unrecognizable by policymakers. Hence policy-making is often less thoughtful and well-informed than it might be. By identifying, assembling, and translating potentially relevant bodies of knowledge into intelligence relevant to the immediate needs of policymakers, research brokers perform an essential role in the policy-making process.

Policy analysis practice became the subject of a growing literature. Heclo (1977) labeled the new breed of policy analysts as "reformers." "Such analysts,"

he observed, "are often the agency head's only institutional resource for thinking about substantive policy without commitments to the constituents, jurisdictions, and self-interests of existing programs" (151). "Their most enduring problem," he added, "is one of attracting political customers to use their analysis while maintaining constructive relations and access to the program offices being analyzed." Meltsner (1976) studied the activities of policy analysts at work, emphasizing the social role of the analysts in the bureaucracy. Based on observing policy analysis in the Department of Energy, Feldman (1989) argued that the role of policy analysts in a bureaucracy is not to inform decision making—even the analysts themselves do not see this as their function—but, rather, through negotiating and crossing institutional boundaries, to contribute to the definition of organizational interests and to the interpretation of events and actions. While their technical, problem-solving skills are important, so, too, is their skill in performing their social/institutional role.

The literature on policy analysis practice suggests that its emerging ethos was progressive, critical, pragmatic, optimistic, and reformist. Never monolithic in its methods, policy analysis practice has evolved in response to the political and social realities that shape public policy agendas. Policy analysis in practice has been fueled by intuition, argument, and ethical promptings, clearly associated with the world of political action, both normative and prescriptive, often identified with interests otherwise unrepresented at the table. Says practitioner Robert Nelson (1989), "In many cases, policy analysts make their greatest contribution, not with highly sophisticated economic analyses, but with *simple arguments that challenge practices and ideas that have simply become part of agency tradition, culture, and ideology—even in the face of common sense*" (408, emphasis added).

The Diffusion of Practice

As a result of high-level recognition, a market for policy-relevant research and analysis rather quickly emerged. Apparently, the appearance, at least, of reliance on research-based analysis was good politics. "At all levels of government and at every stage of the policy process, analytical studies of problems and evaluations of programs have become commonplace" (Heineman et al. 1997, 1). Policy analysis organizations inside and outside of government have proliferated; advocacy-oriented policy research has grown in popularity; and non-profit and proprietary policy research firms have grown in numbers and influence. More recently, the emergence of sophisticated new means of communication has facilitated instantaneous dissemination of policy-relevant research and political mobilization based on policy research findings.

Whereas the earliest generation of policy analysts took advantage of executive agency monopolies on data and program information, data sets now are

accessible for public use, and techniques for analyzing data, once restricted to technocratic elites, also are widely available. Small, community-based non-profit organizations are frequently as eager to conduct poverty research and service evaluations as large public agencies. Community groups demand facts, information, and access to expertise. Information-based planning and collaboration are sponsored by philanthropic foundations, and both governments and foundations require needs assessments, feasibility analyses, impact assessments, and forecasts as conditions of grant awards. Courts look to the adequacy of planning and analysis as grounds for adjudicating a growing array of class-action lawsuits.

Policy analysis is now taken for granted in political discourse procedure, causing far-reaching implications that unfortunately are often missed by those most closely involved in policy analysis training and practice. Though teaching cases record the rich contextual details of policy deliberation and administration, methods training and doctrines continue to be based on the traditional trilogy of economics, political science, and statistics (and very occasionally sociology and organization theory). The contextualization of abstract concepts is often left to elective courses, workshops, field placements, and internships. However, the societal implications of this narrow curriculum have not been overlooked by the critics of the policy analysis movement, the stridency of whose commentaries has increased over time.

Consequences and Controversies

In assuming a featured role in American politics, policy-making itself and the new, influential policy analysis methods became the objects of scholarly attention. Two questions in particular came to the fore: (1) In view of the growing political interest in their contributions, what should social scientists study? (2) What is the authority of social science knowledge as a basis for public policy-making? Fueled by public and private grant support for both academic and think tank scholarship and research, as well as by the continually evolving agendas of academic disciplines and subfields, policy-relevant scholarship has prospered, yielding influential new concepts, models, and methods for research and analysis. The employment of this scholarship and the mediating role of policy analysts in its applications have, however, provided abundant grist for the mills of academic controversy.

New Issues for Social Science

From its inception, policy analysis as an administrative technology attracted attention from across the social science community (see, e.g., Charlesworth

1972; Nagel 1975). Emerging from its behavioral phase, for example, political science began to discover an interest in the content of public policies. A renewed, rigorous concern for institutions emerged in sociology, political science, and economics. New subfields and research agendas took form: policy-making as decision science and as bureaucratic politics, policy formation as political process, legislative behavior as institutionalization of public choice and democratic control, and public deliberation as social learning and mobilization. As a result of this policy-oriented scholarship, understanding of the institutional context for the creation and dissemination of policy advice has changed dramatically and helpfully in recent decades. Here I offer examples of this new understanding.

Discretion and performance. The issue of administrative discretion is now a good deal more complex than it was in Dimock's day. Is there too much administrative discretion (yielding unaccountable bureaucracy) or not enough (resulting in micromanaged bureaucracy)? Is structure-induced equilibrium a problem (causing gridlock) or a benefit (producing stability and reliability)? Are public executives requisite (as entrepreneurs and innovators), or are their contributions epiphenomenal (mechanistic and inconsequential)? If bureaucracies are suffused with unaccountable authority, is this situation an inevitable concomitant of our system of governance (Brodtkin 1987) or inadvertent, inappropriate, and remediable (Gruber 1987)? To the extent that bureaucratic discretion appears to be choked by constraints and unduly restrained by custom, is this as it should be, representing effective social control through collective choice processes (Noll and Weingast 1987), or is it inimical to effective (i.e., visionary, creative, innovative, ethical) governmental performance and, therefore, in need of reform (Goodsell 1995)?

Theoretically, scholars of governance may now begin with a relatively parsimonious view of the public sector, as reflecting a logic of collective choice and a process of institutionalization, and systematically introduce elements of conceptual complexity, including those suggested by bureaucratic theory and by sociological and social-psychological perspectives on organizational and interorganizational behavior. Generic management problems such as overcoming resistance to change, motivating cooperative behavior, or coordinating and integrating distinct horizontal activities can be addressed with due regard for the details of their context. As Weiss (1996) has shown, a process as seemingly straightforward as instilling a sense of mission in an agency can now be understood at a much deeper level as involving complex processes of socialization.

Based on recent empirical research, a formidable array of variables potentially associated with governmental performance has been identified: resource levels and structures of financial administration; judicial institutions and practices; organizational structures; policy designs; intergovernmental relations;

the composition of policy networks; and the discretionary choices of managers. There is respectable evidence to support an argument that the qualifications of managers and the nature of managerial behavior are endogenous to the general system of policy-making and public administration and that the particular qualities of individual managers and of individual acts of management are, as some sociologists have long insisted, epiphenomenal. That specific executives appear to exert an independent influence on what government does may be a self-indulgent and illusory view. Perhaps administrative discretion is not the essence of the modern state after all.

Policy and behavior. A new, critical perspective on the nature of questions that ought to engage social scientists has been penetrating deeply into policy studies at the vital center of public policy schools but especially into studies conducted outside of public policy schools. Judgment, perception, interpretation, reflection, and framing are, it is argued, the forms of cognition that dominate policy formation and implementation. Cognition, moreover, is less important to effectiveness in policy-making than the ability to exercise leadership without authority and without the dubious support of an intrinsically limited social science.

Welfare studies provide an example of this new type of policy-relevant inquiry. How do we redirect public assistance administration toward the promotion of work, healthy living, and self-reliance? How do we promote collaboration among autonomous actors involved in the lives of the poor in order to reap the benefits of cooperation? New approaches to policy scholarship seem especially promising in policy domains where human behavior is not ordered primarily, or at all times, by material incentives or by enforceable rules.

Empirical research based on structuration theory, for example, has attempted to establish that local social structures, not formal governance, determine how policies are implemented. "The structures of front-line social systems act as filters, neutralizing elements of new initiatives that do not make sense from a front-line perspective" (Sandfort 1997). Left unclear are whether and how these structures adapt to exogenous changes in organizational contexts and what kinds of mechanisms induce change in local structures. In general, the research problem is to identify those collective dispositions that are reflective of local, socially constructed realities, assess their malleability to internal and external changes (such as reallocations of resources), and identify their consequences for organizational performance.

Public policies and programs, including many of our most important social programs, are now recognized as frequently implemented not by bureaus and public employees but by networks of local offices, public schools, neighborhood collaborations, service delivery areas, regions, special districts, and other organizations in the public, nonprofit, and proprietary sectors. Poli-

cymakers often acquire voluminous data on the performance of local organization networks. It is almost always true that some offices have a higher level of performance than others. Why? The answer hinges on the number and characteristics of people served, the skill or motivation of workers, the effectiveness of local site management, the clarity of higher level policy direction, the effectiveness of systemwide coordination and control, and the use of private and non-profit sectors. Some of these factors may weigh more than others in the overall scheme of things. Policymakers and managers need to know which factors are most influential in order to obtain better overall performance. Their ability to decentralize operations and to bring services closer to the people who are served depends on knowing how to ensure accountability and good practice across often far-flung, diverse locations.

Knowledge of which factors are most influential in the performance of local organizations is not obvious and cannot be obtained by simply conversing with people in the field or by studying raw administrative data. Obtaining useful answers requires not only good data but the use of appropriate statistical models and methods to identify causal factors and significant relationships linking governance and performance while controlling for contextual details. A deeper understanding of public policies requires, therefore, sophisticated social science that is both rigorous in conceptualization and respectful of evidence from qualitative and quantitative methods. Policy analysis must be clever in integrating knowledge and insights from diverse sources.

If such conclusions seem straightforward to proponents of policy-oriented research and its application to policy-making and analysis, they are far from clear to their critics.

New Issues for Statecraft

An apparent shift of power over the direction of the state toward executive actors with a superior command of information and analysis could be expected to inspire reactions ranging from imitation to competition to opposition and critical scrutiny by partisans and scholars (who are often the same people). Thus from the onset, those who believe that policy analysis is essential to statecraft have contended with criticism.

The initial spread of analytic practice into military force structure and national security planning aroused relatively little controversy in the social science community. Any kind of enlightenment of defense decision making, especially if it was on behalf of efficiency, seemed benign if not heroic. Controversies over policy analysis methods and practices became intense when policy analysis appeared to be a foundation for American intervention and strategy in the Vietnam Conflict,⁷ and even more so when policy analysis began to be incorporated into domestic agency planning in federal agencies such as the

Department of Health, Education, and Welfare; the Department of Labor; and the Department of Housing and Urban Development.

It is worth remembering that the original case for social science-based policy advice seemed straightforward to its proponents. A former (and future) public official, Charles Schultze (1968), in explicit rebuttal of Lindblom's popular and imprecise conception of politics and policy-making as inevitably and appropriately a process of "muddling through," observed:

The most frustrating aspect of public life is . . . the endless hours spent on policy discussions in which the irrelevant issues have not been separated from the relevant, in which ascertainable facts and relationships have not been investigated but are the subject of heated debate, in which consideration of alternatives is impossible because only one proposal has been developed, and, above all, discussions in which nobility of aim is presumed to determine effectiveness of program. (75)

Schultze saw "analytic efforts" as "instruments for shaping decisions by merging analysis, planning, and budgetary allocation" (77). Systematic analysis is outside of but complements "the advocacy process" by articulating the relationship between values and program characteristics. However, systematic analysis is in tension with political dialogue because "it emphasizes resource efficiency and stresses economic opportunity costs" (92). Following this argument, policy analysts should recognize, but not slavishly follow, political constraints. Policy analysis ought to modify the political process by, in effect, introducing a new set of participants, policy analysts, into the decision-making process and by empowering executive decision makers against self-interested subordinates and their constituencies who comprised, in the term popular at the time, iron triangles of concentrated, unreviewed political influence.

The apparent reasonableness of this perspective notwithstanding, critical reaction to institutionalized policy analysis was virtually instantaneous. The initial controversies had an intramural feel to them: mainstream scholars criticizing their overzealous colleagues.

"Metaphysical madness." The first generation of critics seemed positively angry that academically qualified policy analysts such as Schultze, Rivlin, Schlesinger, and Kissinger should be influential in policy-making.

Lawrence Tribe (1972) criticized policy analysis for its overemphasis on economic assumptions and instrumental rationality and for neglecting "distributive ends, procedural and historical principles, and the values . . . associated with personal rights, public goods, and communitarian and ecological goals" (105).

In a 1972 symposium, "Integration of the Social Sciences through Policy Analysis," a roster of concerns was cited. For example, Kariel (1972) saw the possibility that policy analysts might lose their integrity; rather than representing sound epistemology, they might instead come to represent "accredited interests. . . . They may . . . be led to conclude that research consists of language acts which test and disrupt given states" (106-7). McCord (1972) called attention to the historical misuse of social science: "at times, social science has acted as the handmaiden of policies aimed at the suppression of revolution, the degradation of an ethnic group, or the conversion of ethically torn men into killers" (120).

Richard Nelson (1977) criticized "traditional" policy analysis for being "relatively blind to exactly the kind of disagreements, and conflicting interests, which need to be perceived in order to guide the search for solutions that, over the long run, do not harm significant values or groups" (75-76). He advocated de-emphasizing "choice and decision" in favor of

the saliency of organizational structure . . . and . . . the open-ended evolutionary way in which policies and programs do and should unfold. . . . Central high-level decision making [is] immune to . . . social sciences' standard research methods. . . . There is little hope to comprehend basic patterns of governance and policymaking within the thin slices of time typically considered by contemporary social and policy sciences. (79)

Rein (1976) insisted that the most demanding task facing policy analysts is "identification of their own values, along with an understanding of how these values blatantly and subtly bias analysis . . . The concealment of values, by tactical ambiguity or denial—which takes the form of a retreat into an impartial, dispassionate, value-free scientific stand—threatens moral integrity" (169).

Observing with cold contempt the "metaphysical madness" of policy scientists aiming to supplant politicians and statesmen (and inadvertently conceding the premise of the policy analysis movement that analysts are indeed influential), Banfield (1980) argued that the popularity of social science-based policy analysis in both the executive and legislative branches could not be justified by "the existence of a body of knowledge about how to solve social problems" (6). He observed:

Professionals, because of their commitment to the ideal of rationality, are chronically given to finding fault with institutions . . . and, by virtue of their mastery of techniques of analysis, to discovering the almost infinite complexity and ambiguity of any problem [until problems are viewed as] too complicated for ordinary people to deal with. (18)

Based on a clever study by David Cohen and Janet Weiss (1977), Banfield worried that "an analytical society may increase its problems while decreasing its ability to cope with them" (14). Mesmerized by policy science, statesmen might be tempted to devalue wisdom, prudence, and good judgment in their exercise of executive discretion.

His thinking significantly altered by a lengthy period in government, Yehezkel Dror (1983) came to the conviction that "policymaking should be viewed as an existential phenomenon, or phenomena cluster, much too complex and dynamic to be fully caught in concepts, models, and theories" (x).

This general line of criticism has not abated. Recently, Lindblom (1990) and Schön and Rein (1994) have recommended radical revision in policy analysis practice and in the training of policy analysts. Lindblom criticizes policy analysts who see their task as "solving the decision maker's problem for him" (271). He recommends, instead, cooperative inquiry or "probing" by scholars and policymakers and forms of assistance to policymakers tailored to their needs and competencies: a missing body of facts, a synthesis of the issues, probing critiques of the policymaker's own analyses. Say Schön and Rein in a similar spirit:

We believe that policy researchers should seek first to understand policy practice—not to draw from it rules of effective policymaking, but to describe and explain the kinds of inquiry in which policymakers engage. Policy researchers should focus on the substantive issues with which policymakers deal, the situations within which controversies about such issues arise, the kinds of inquiry carried out by those practitioners who participate in controversy or try to help resolve it, and the evolution of the policy dialectic within which practitioners play their roles as policy inquirers. (193)

"Tools of tyranny." In recent years, scholars who identify themselves as postpositivists have emerged as the most strident critics of mainstream policy analysis. Their critique has its foundations in critical theory, postmodernism, and various non- and postpositive epistemologies. DeLeon's critique is representative:

The quotidian policy sciences have become an elite, sequestered activity, one whose services to democracy seemingly come as an afterthought to their primary fealty to their governmental agencies. . . . Their traditional positivist methodologies as well as their putative removal from politics have increasingly distanced the policy analyst from the policy recipient

. . . as they self-consciously reclude themselves from the hurly-burly but imperative normative aspects of politics. (1997, 65)

Policy analysis, says Torgerson in a similar vein (1986), is "haunted" by its original "dream," which bears "the unmistakable imprint of the positivist heritage," viz., "the abolition of politics" (34). "Professional policy analysis," he says, "is not really of this world—this all-too-human world of conflict, confusion, and doubt. . . . [T]he analyst . . . becomes one who performs remote operations on an essentially alien object" (35).

The postpositivist animus toward unreconstructed policy analysis has two primary objects (Lynn 1999). The first is a doctrinaire allegiance to positivist dogma and its consequence: the existential removal of policy analysis from the contaminating influence of social and political reality. The goals of public policy are matters of value, postpositivists argue, not facts and logic. Thus, given their dependence on positivist science, which insists that facts and values be kept separate, the goals of public policy cannot be included within the scope of what the policy analyst is concerned about.⁸ As a result, conventional policy analysis is "blinded to political reality" (Torgerson 1986, 37). Policy analysts, according to Danziger, cling to the hope that "policy debate can be confined to technical questions on which experts can agree" and believe that certain objective rules of behavior will automatically lead to optimal results (1995, 440). Forrester (1993) indicts the staples of conventional policy-planning practice—means-ends models of instrumental rationality; problem solving; rationalistic, "scientific" models; cybernetic, information-processing models; and "satisficing" models of "bounded rationality" (19)—for failing to address in a systematic manner the ethical and normative issues associated with policy-making.

With respect to epistemology, the postpositivists argue, first, that facts and values cannot and should not be separated in democratic deliberation. Thus policy analysts must take a "value critical approach" in which, as deLeon puts it, "ideology, values, and belief become part and parcel of the formal analysis" (1997, 79). Second, facts to postpositivists are social constructions, not objective features of the material world awaiting discovery and manipulation. Assertions of fact must be recognized as essentially arbitrary pseudodiscoveries that disguise a social and political agenda. Social facts do not exist independent of investigators as sociopolitical beings. Science is not "passive reception and organization of sense data" but rather itself a product of the social world, "grounded in and shaped by normative suppositions and social meanings" (Fischer 1993, 167).

The second object of postpositive animus is the tendency toward clientelism of mainstream policy analysis. Postpositivists view the partnership between policy analysis and the hierarchical state and its executive agencies as devastating to democracy and to policies that would otherwise emerge from

unimpeded discussion among informed, autonomous citizens. Unconcerned with social values, policy analysts are said to serve the state willy-nilly, heedless of the normative needs of citizens and unprincipled in their policy advice.

Postpositivists believe the hierarchical structures of a top-down, mass society corrupt democracy by enacting elitist policies favoring the few (Fischer 1993, 166). The touchstone of postpositivist practice is the involvement and empowerment of citizens, especially of those citizens most directly affected by public policies, in the processes of policy-making. They would substitute for bureaucracy what they variously term authentic democracy, unimpeded inquiry, and ethically illuminating, communicative practice. The public policy professional would no longer pose as expert, no longer define practice as serving a bureaucratic client. Instead, policy analysts would facilitate and help inform civic discourse leading toward democratic choice.

Tilling the Epistemological Garden

Because policy analysis is an administrative technology with uniquely significant consequences for the direction of the state, controversies over its means and ends are inevitable. Moreover, they are bound to be intense. Policy analysis exists in a multidimensional Euclidian political space such that its deviation from any axis of normative idealization can be argued to constitute evidence of impermissible, even corrupt, "bias." Indeed, to make their point, critics attempt to maximize the perceived distance of practical policy analysis from critical idealization. Thus it is often difficult to believe that the supporters and critics of practical policy analysis inhabit the same reality, much less understand the basis of the argument.

Now arrayed against policy analysis and positive science as the basis for "knowledge and action" is a flowering of epistemologies based on hermeneutic, phenomenological, symbolic interactionist, and, in general, postmodern philosophies that would redirect attention toward the social construction of reality and its implications for knowing and acting. The language of neutral, unbiased observation and inference has been supplemented by a language emphasizing frames, lenses, interpretive templates, and schemas. Knowledge is generally accepted to be context- and "knower"-influenced, and investigation can be conceptualized quite reasonably as interpretation of sensory experience, which might benefit from the insights of critical theory.

A clash of ideologies. Almost certainly, the critics' political ideologies influence their criticism. This is particularly true of the postpositivist critique of policy analysis. Its literature often has a cloistered quality, its authors largely ignoring the wider policy analysis literature and the realities of practice. Their critique, therefore, tends to be based on a decontextualized caricature, virtually

a parody, of actual policy analysis training and practice, from which observations and examples are often wholly lacking. That caricature is chilling but false, so strained, so far removed from the ethos of policy analysis as generally taught and practiced, so inconsistent with the history and literature of policy analysis, and so subservient to its own political agenda, that postpositive charges of bias on the part of traditional policy analysts seem either naive or disingenuous (Lynn 1999).

The words *needs*, *politics*, and *elites* are, for example, staples of postpositivist discourse. The fact that such terms are usually undefined suggests that postpositivists view *politics* and *citizens' needs* as unambiguous, the definition of their meanings self-evident. That the reification of such terms is no different epistemologically from the positivists' use of terms such as *utility* or *significance* or *cause* is never acknowledged. Moreover, in the name of politics, the postpositive critique of policy analysis puts forth a vision of collective deliberation that leaves out legislatures, elected executives, organized interests, policy networks, the plethora of elites that claim privileged roles, and other political institutions, not to mention money, media, opinion polling, and citizen apathy. By substituting one set of taken-for-granted terms for another, the postpositivists reveal their own inescapably political stance.

The controversy dividing positivists from postpositivists is predominantly ideological. The politics of mainstream policy analysis unapologetically strengthens the liberal democratic state through bringing knowledge to bear on important policy questions. The politics of the postpositivists apparently is replacing the liberal democratic state with an imagined show-of-hands democracy in which no actor has power over others and in which expertise has no privileged role.

Blind spots. Traditional policy analysis is hardly invulnerable to criticism, however. The primary conceit or blind spot of the policy analysts of the first generation was to see themselves as an extension of executive power, necessarily opposing the centrifugal, self-serving forces of legislative politics. The U.S. Department of Defense under strong leadership standing against the military-industrial complex was paradigmatic, and it could easily be imagined that every agency head at every level of government stood in a similar relationship to interest-oriented legislatures and iron triangles of stakeholder influence. Policy analysts were needed to define and analyze the "public interest" and to evaluate alternative ways of achieving it, identifying those ways that were likely to be the most cost-effective.

Contributing to the intensity of the controversies over policy analysis have been some defining features of the policy analysis methods and practice. The lightning rod has been the seemingly privileged role of economists and economic reasoning. With confidence in the prescriptive power of their paradigm,

economists have asserted hegemony over an ever-wider range of intellectual precincts, from choices of tactical aircraft to choices among air quality improvement strategies, to selections among day-care, health care, and education investments. Their often patronizing attitude toward "good intentions," their arrogance toward traditional professional and bureaucratic elites, and their tendency to ignore or dismiss "traditional" public administration, the policy sciences movement, and nonprescriptive social science in general account for much of the hostility the policy analysis movement has received.

The early policy analysts, moreover, did tend to place undue faith in the appearance of scientific rationality. As Heineman et al. (1990) note:

Social scientists and, more recently, policy analysts have often assumed that the objective scientific quality of their analyses would carry weight in the policy process and protect them from the effects of political partisanship. Because it rests on a superficial view of the scientific enterprise and a faulty conception of the policy process, such a posture can lead to considerable frustration for the practitioner of policy analysis. (22-23)

In their own defense, policy analysts would argue that if policy-making is based to a greater extent on "what's right" rather than "who's right" (an early aphorism popular in the McNamara Department of Defense), then the appeal to transparent methods of analysis makes perfect sense despite the limitations of those methods. Contrary to postpositivist claims, policy analysis can be argued to have an antielite bias. But misinterpretations of their apparent "scientism" are understandable.

Shortcomings in policy analysis practice can easily be magnified out of proportion to their importance and must not lead to the outright abandonment of policy analysis as an administrative technology.

Policy Analysis as Contextualized Craft

With administrative discretion a necessary element of political administration, credible bases for its exercise are essential. Thus the modern American state has come to exhibit a dependence on expertise and a bias for apparent rationality. The legitimacy conferred by rational analysis and by expert endorsement of political action ensures that policy analysis in various forms will remain deeply woven into the fabric of civic discourse, policy-making, and public administration. Because a bias for rationality on the part of untrained decision makers renders them vulnerable to specious, statistics-laden arguments they do not understand, the professional role of the policy analyst is to advocate for and

practice careful, transparent, nonparochial analysis of the means and ends of public policy. Policy analysts provide an indispensable antidote for official vulnerability due to the lay official's ignorance of science's own biases and for the unscrupulous, self-serving use of political information by political actors.

But the professional practice of policy analysis can never be divorced from its political context. As a professional practice, policy analysis is inevitably and necessarily endogenous to liberal political economy. That is, policy analysis is associated with power and requires the sponsorship and endorsement of liberal political economy. Any presupposition that policy analysts as professionals should act in deliberate defiance of the state or in ways that would undermine it is unsustainable. Advocating replacement of the liberal state should be left to policy intellectuals who can sustain themselves through academic affiliation alone.

If training and practice are to adapt to changes in the context of policy discourse and choice, however, teachers and practitioners must employ three seemingly antithetical tactics: (1) adopt a more scientific approach, (2) demonstrate the political relevance of their work, and (3) identify more clearly as a unique "contextualized craft" that is neither wholly scientific nor wholly political. Past resilience of policy analysts to criticism provides grounds for optimism in regard to their future adaptability.

Policy analysis as science. Among the most thoughtful conceptions of the role of science in policy analysis is that of Robert A. Heineman and his colleagues (1990). "As long as human dignity and meaning exist as important values," they argue, "social science cannot achieve the rigor of the physical sciences because it is impossible to separate human beliefs from the context and process of analysis." They continue: "Essentially, when science is applied as a label to the pursuit of policy analysis, what is being described is the careful accumulation of data, rigorous study of possible interpretations and alternatives, and the articulation of reasons for the recommended course of action" (37, emphasis added). The challenge is to be "rigorous" and "reasonable" in performing policy analysis.

A possibly underappreciated dilemma facing a problem-oriented, interdisciplinary professional practice such as policy analysis is the need to avoid the kinds of conceptual and procedural errors that nonspecialists are prone to commit. Avoidance of these fallacies requires that policy analysts demonstrate mastery and realism with respect to both the advantages and limitations of the tools at their disposal. Thus, policy analysts should aspire to a correct understanding of the social scientific concepts they employ, such as goal displacement, cognitive dissonance, opportunity cost, the collective action problem, selection bias, statistical independence, social network, social role, information

asymmetry, and incentive compatibility. Policy analysts should incorporate such concepts into their analyses for the generality and power they contribute to policy arguments.

A second dilemma facing policy analysts is sustenance of policy analysis legitimacy as an academic enterprise, exercising the intellectual obligation to be critical, perhaps deeply so, of politics as a social process while maintaining access to and credibility within that flawed system. Many policy intellectuals are prone to pessimism concerning American politics, with its seemingly inherent irrationality, its dominance by partisan interests, the unseemly roles played by money and media, the apparent impossibility of translating the public's desires into public policy in any straightforward or timely way. Policy analysts are easily tempted into the embrace of such critical perspectives and into roles as missionaries for the reform of the political process. While I do not want to deny the validity of personal motivations for practicing policy analysis as a profession, I believe that to adopt reflexively critical perspectives would be self-defeating. This is to say that policy analysis as a profession succeeds by being intellectually and dependably pragmatic and realistic in its aspirations more than by being revolutionary. Its most passionately held convictions must not be seen to require the transformation of liberal democratic politics.

Policy analysis as politics. A related but subtly different dilemma is encountered when policy analysts become engaged with the political world: maintenance of intellectual integrity in the politically partisan, interest-driven world whose sponsorship and regard are essential to policy analysts' opportunity to contribute. Critics have long pointed out that policy analysts are vulnerable to transformation into instruments of political manipulation, becoming the co-opted authors of rationalizations and pseudoscientific quantitative symbols for use in partisan debate, committed to the appearance but not to the substance of sound argument. Of course, auditors, lawyers, physical scientists, and other publicly engaged professionals are no less vulnerable to political manipulation. The inherent strength of any profession include its ethical foundations and its perceived value to the public interest; these are the ultimate protections for professionals in a political world.

In their efforts to avoid the undertow of political manipulation, policy analysts resort to various forms of protective cover. One of the most effective is to appeal to the putative objectivity of the scientific methods that are at the heart of their craft. They may point also to their lack of direct material interest in the policies they aspire to inform. They may appeal to their commitment to "the public interest" or to normative goals such as a better-informed or more democratic politics. None of these arguments is beyond criticism. Social science is far from "objective"; notions such as "public interest," "information,"

and "democracy" are social constructions; and the well-being of the agency that employs them is a direct material interest.

The general point is that policy analysts must have a sufficiently strong professional identity to sustain their argument that they bring into the political world valuable skills that are needed for effective governance and for which there are no good substitutes. Specifically, policy analysts represent the view that rigor and rationality are valuable contributions to political discourse and should be valued in the same ways that fiduciary accountability, the absence of conflicts of interest, legal sufficiency, and honest numbers are valued. Policy analysts must make their own work seem politically relevant.

Policy analysis as "contextualized craft." The most appealing alternative to more scientific forms of policy analysis has come to be known as the "craft perspective." Observes Kathleen A. Archibald:

Rigor and technical virtuosity are admired and often even set up as the sole ideal, but when it comes to examining pitfalls [of analysis], we find that the most serious pitfalls will not be circumvented by greater rigor or improved technical skills. Competencies usually considered "softer"—imagination, judgment, interpretive skills—are just as important. (Quoted in Majone and Quade 1980, 193–94)

Policy analysis, she says, is "an interpretive discipline" (190). Giandomenico Majone (1980, 1989) sees policy analysis as essentially "craft work" involving evidence, argument, and persuasion. "Policy analysis is more art than science," says Eugene Bardach in his recent compact textbook. "It draws on intuition as much as on method" (1996, 1).

The craft perspective is not in opposition to the notion that policy analysis has scientific foundations. Heineman et al. insist that "the very concept of analysis . . . presupposes the importance of rational argument and rigorous methodology" (1997, 5). Argues Majone:

To attempt to reconstruct policy analysis on the basis of rhetorical categories—to view the analyst as a producer of arguments, capable of distinguishing between good and bad rhetoric, rather than as a "number cruncher"—is not to deny the usefulness of . . . [m]odeling, mathematical programming, simulation, cost-benefit analysis, and decision analysis. . . . However, . . . the traditional skills are not sufficient. (1989, xii)

In other words, rigor, rationality, and transparency of methods remain foundation values of policy analysis. The craft perspective adds the important

emphasis that policy analysis is sustained by the particulars of contexts in and for which it is carried out. Herein lies perhaps the most complex challenge to maintaining an adaptable, constructive professional practice.

Perhaps the most perceptive way to view this challenge is to be found in the work of John Friedmann (1988). To Friedmann, the metaproblem of social planning is how to make technical knowledge relevant to social policy-making. He arrays various traditions for solving this metaproblem along two dimensions: whether the emphasis is on providing guidance to social institutions or on transforming those institutions, and whether the political premises are conservative or radical. Because its emphasis is guidance—assisting powerful actors to produce better policies—and its politics are pragmatic and incrementalist rather than revolutionary, traditional policy analysis, Friedmann argues, stands in sharp contrast to policy planning traditions that actively seek either the transformation or the restructuring of society.

Friedmann's conception of social learning provides a constructive and appropriate alternative to the traditional advisory and conservative approach of the early policy analysis movement.

Social learning . . . is a complex, time-dependent process that involves, in addition to the *action* itself (which breaks into the stream of ongoing events to change reality), *political strategy and tactics* (which tell us how to overcome resistance), *theories of reality* (which tell us what the world is like), and the *values* that inspire and direct the action. Taken together, these four elements constitute a form of *social practice*. It is the essential wisdom of the social learning tradition that practice and learning are construed as correlative processes, so that one process necessarily implies the other. In this scheme, decisions appear as a fleeting moment in the course of an ongoing practice. (181–83)

The social learning tradition focuses on task-oriented action groups, such as legislative subcommittees, agency leadership teams, and task forces or executive committees, that is, substructures of larger social entities. In the course of deliberating on and carrying out actions, the members of these action groups engage in tacit and largely informal learning. But their learning cannot be divorced from their actions and their practice. "The social learning approach works with a process concept of knowledge," says Friedmann. "Its central assumption is that all effective learning comes from the experience of changing reality" (216).

The social learning paradigm requires a de-emphasis on both the instrumentation of knowledge and the quest for efficient knowledge markets. It favors instead disinterested and powerful research communities who are closely tied not with select policy elites but with society itself and who are ded-

icated to the continuing process of societal transformation. In a social learning paradigm, the concept of research broker yields to the concept of change agent. The premium is to be placed on preparing individuals so inclined to play roles as change agents operating throughout policy networks rather than as research brokers seeking proximity to executive actors. The policy analyst, following this logic, would seek to encourage, guide, and assist social actors in the process of changing reality. They would see themselves as "professionals or paraprofessionals . . . who bring certain kinds of formal knowledge to the ongoing social practice of their 'client group.' To be effective, change agents must develop a *transactive* relationship with their client conducive to *mutual learning*" (185).

The social learning paradigm has quite radical implications for those who would clear pathways for knowledge into policy. Its premise is that policy formation is not intentional; it is not formally goal-oriented. The properties of policies are a resultant of collective action, by-products of the practice of governance by collective entities for which individual influence is epiphenomenal. An understanding of group dynamics, rather than of individual cognition and problem solving, is of paramount importance.

Policy analysis is and will remain pragmatic and crafty. The exigencies of the political world will continue to ensure a reality check on practice, and practice will evolve accordingly. For this reason, policy analysis practice will continue to be driven by problems as they arise in context and by its distinguishing values of rigor, rationality, and transparency. The contexts for practice are often hierarchical, polarized, and interest-driven rather than being the kind of idealized contexts envisioned by postpositivists and social learning theorists. Thus there will continue to be an important role for executive- and decision-oriented policy analysis and for policy-relevant positive research directed at the thinking and choosing of policymakers.

But public policy-making is far less "federal" and hierarchical than it used to be, and our knowledge about the complexity of our political institutions is deepening. Moreover, decades of right-of-center politics have shifted civic discourse decisively from public programs to communities, neighborhoods, and social groups as well as to decentralized incentives, choice, and quasi markets as means for accomplishing public purposes. Research, training, and practice should more incisively reflect those shifts. One of the original ideas associated with the policy analysis movement, "backward mapping" (Elmore 1979), may turn out to be one of the most useful for its future: a vision of social outcomes as foundations for identifying the social practices, resource allocations, institutions, and policies that might appear to be appropriate to achievement, and engagement in the kinds of political communication that might increase the chances of their adoption.

NOTES

1. The term *administrative technology* refers to such replicable methods as merit-based personnel selection, executive budgeting, the administrative department or bureau, regulation and rule making, the executive order, the categorical program, formula grants and block grants, the administrative procedures act, performance audits, and policy analysis.
2. Scholars of policy analysis have been too little inclined to develop in any depth the ideas underlying policy analysis methods and practice. In developing the arguments in this essay, I shall pay special attention to several seminal contributors, and in particular to the work of Marshall Dimock, Edwin S. Quade, John Friedmann, Giandomenico Majone, and Robert A. Heineman and his colleagues.
3. Observed Roscoe Pound in 1919, "As the eighteenth century and the forepart of the nineteenth century relied upon the legislature and the last half of the nineteenth century relied upon the courts, the twentieth century is no less clearly relying on administration" (Pound 1919). A fuller discussion of this issue is in Skowronek 1982.
4. The Decision of 1789 was an act of Congress to give President Washington broad discretion with respect to national defense.
5. I am indebted to Anthony Bertelli for his insights on these issues.
6. For example, the Lewis and Clark Expedition, which "replaced a mass of confusing rumors and conjectures with a body of compact, reliable, and believable information on the western half of the continent," established an elegant precedent for using science to alter the terms of public discourse (Dupree 1957, 27). Shils (1949, 222) observed that "it was the First World War which showed, particularly in the United States, that academic social scientists could be used by Government and by all organizations in controlling and modifying human behavior." President Herbert Hoover's seminal project *Recent Social Trends in the United States* and the extensive activities of the New Deal-era National Resources Planning Board brought social scientists into the service of the state. The use of operations research techniques provided the good and well-known means to evaluate military operations during World War II, and economists were employed by the Office of Price Administration.
7. This is a misperception. The policy analysts in war-related agencies were typically the most sophisticated and, because of their analyses, ardent critics of U.S. military strategies in Vietnam, a historical reality that is inconvenient for postpositivists and, therefore, suppressed by them.
8. Little noted by current critics of policy analysis is that one of the most important contributions of early "systems analysis" in military force planning was the rigorous examination of the purposes for maintaining forces in the first place.

REFERENCES

- Banfield, E. 1980. Policy science as metaphysical madness. In *Bureaucrats, policy analysts, statesmen: Who leads?* ed. R. Goldwin. Washington, D.C.: American Enterprise Institute for Public Policy Research.

- Bardach, E. 1996. *The eight-step path of policy analysis (A handbook for practice)*. Berkeley: Berkeley Academic Press.
- Brodin, E. 1987. Policy politics: If we can't govern, can we manage? *Political Science Quarterly* 102 (4): 571-87.
- Charlesworth, J. 1972. *Integration of the social sciences through policy analysis*. Philadelphia: American Academy of Political and Social Science.
- Cohen, D., and J. Weiss. 1977. Social science and social policy. *Educational Forum* 41.
- Danziger, M. 1995. Policy analysis postmodernized: Some political and pedagogical ramifications. *Policy Studies Journal* 23:435-50.
- DeLeon, P. 1997. *Democracy and the policy sciences*. Albany: State University of New York Press.
- Dimock, M. 1936a. The meaning and scope of public administration. In *The frontiers of public administration*, ed. J. Gaus, L. White, and M. Dimock, 1-12. Chicago: University of Chicago Press.
- . 1936b. The role of discretion in modern administration. In *The frontiers of public administration*, ed. J. Gaus, L. White, and M. Dimock, 45-65. Chicago: University of Chicago Press.
- . 1936c. The criteria and objectives of public administration. In *The frontiers of public administration*, ed. J. Gaus, L. White, and M. Dimock, 116-33. Chicago: University of Chicago Press.
- Dror, Y. 1983. *Public policymaking reexamined*. New Brunswick, N.J.: Transaction Books.
- Dupree, A. 1957. *Science in the federal government: A history of policies and activities to 1940*. Cambridge: Harvard-Belknap Press.
- Elmore, R. F. 1979-80. Backward mapping: Implementation research and policy decisions. *Political Science Quarterly* 94 (4): 69-83.
- Feldman, M. 1989. *Order without design: Information production and policymaking*. Stanford, Calif.: Stanford University Press.
- Fischer, F. 1993. Citizen participation and the democratization of policy expertise: From a theoretical inquiry to practical cases. *Policy Sciences* 26:165-87.
- Forrester, J. 1993. *Critical theory, public policy, and planning practice: Toward a critical pragmatism*. Albany: State University of New York Press.
- Friedmann, J. 1988. *Planning in the public domain: From knowledge to action*. Princeton: Princeton University Press.
- Gaus, J., L. White, and M. Dimock. 1936. *The frontiers of public administration*. Chicago: University of Chicago Press.
- Goodsell, C. 1995. *The case for bureaucracy: A public administration polemic*. 4th ed. Chatham, N.J.: Chatham House.
- Gruber, J. 1987. *Controlling bureaucracies: Dilemmas in democratic governance*. Berkeley: University of California Press.
- Heclo, H. 1977. *A government of strangers: Executive politics in Washington*. Washington, D.C.: Brookings Institution.
- Heineman, R. A., W. T. Bluhm, S. A. Peterson, and E. N. Kearny. 1990. *The world of the policy analyst: Rationality, values, and politics*. Chatham, N.J.: Chatham House.
- . 1997. *The world of the policy analyst*. 2d ed. Chatham, N.J.: Chatham House.
- Kariel, H. 1972. Commentary. In *Integration of the social sciences through policy analysis*,

- ed. J. Charlesworth. Philadelphia: American Academy of Political and Social Science.
- Lane, R. 1972. Integration of political science and the other social sciences through policy analysis. In *Integration of the social sciences through policy analysis*, ed. J. Charlesworth, 71-87. Philadelphia: American Academy of Political and Social Science.
- Laski, H. 1923. The growth of administrative discretion. *Public Administration* 1, 92-100. Quoted in Dimock 1936b.
- Lerner, D., and H. Lasswell, eds. 1951. *The policy sciences*. Palo Alto, Calif.: Stanford University Press.
- Lindblom, C. E. 1990. *Inquiry and change: The troubled attempt to understand and shape society*. New Haven: Yale University Press.
- Lynn, L. 1987. *Managing public policy*. Boston: Little, Brown.
- . 1989. Policy analysis in the bureaucracy: How new? How effective? *Journal of Policy Analysis and Management* 8:373-77.
- . 1999. A place at the table: Policy analysis, its postpositive critics, and the future of practice. *Journal of Policy Analysis and Management* 18:411-25.
- Majone, G. 1989. *Evidence, argument, and persuasion in the policy process*. New Haven: Yale University Press.
- Majone, G., and E. Quade, eds. 1980. *Pitfalls of analysis*. New York: John Wiley and Sons.
- McCord, W. 1972. Commentary. In *Integration of the social sciences through policy analysis*, ed. J. Charlesworth. Philadelphia: American Academy of Political and Social Science.
- Meltsner, A. 1976. *Policy analysts in the bureaucracy*. Berkeley: University of California Press.
- Morstein-Marx, F., ed. 1959. *Elements of public administration*. 2d ed. Englewood Cliffs, N.J.: Prentice-Hall.
- Morstein-Marx, F., and H. Reining Jr. 1959. The tasks of middle management. In *Elements of public administration*, ed. F. Morstein-Marx. 2d ed. Englewood Cliffs, N.J.: Prentice-Hall.
- Nagel, S. 1975. *Policy studies and the social sciences*. Lexington, Mass.: Lexington Books.
- Nelson, R. R. 1977. *The moon and the ghetto: An essay on public policy analysis*. New York: W. W. Norton.
- . 1989. The office of policy analysis in the Department of the Interior. *Journal of Policy Analysis and Management* 8:395-410.
- Noll, R., and B. Weingast. 1987. Rational actor theory, social norms, and policy implementation: Applications to administrative processes and bureaucratic culture. In *The economic approach to politics: A critical reassessment of the theory of rational action*, ed. K. Monroe. New York: Harper Collins.
- Pound, R. 1919. The administrative application of legal standards. *Reports of the American Bar Association* 44:445-65. Quoted in Dimock 1936b.
- Quade, E. 1964. *Analysis for military decisions*. Santa Monica, Calif.: RAND Corporation.
- Rainey, H. 1991. *Understanding and managing public organizations*. San Francisco, Calif.: Jossey-Bass.

- Redford, E. 1958. *Ideal and practice in public administration*. University: University of Alabama Press.
- Rein, M. 1976. *Social science and social policy*. New York: Penguin.
- Sandfort, J. 1997. *The structuring of front-line work: Conditions within local welfare and welfare-to-work organizations in Michigan*. Manuscript.
- Schön, D., and M. Rein 1994. *Frame reflection: Toward the resolution of intractable policy controversies*. New York: Basic Books.
- Schultze, C. 1968. *The politics and economics of public spending*. Washington, D.C.: Brookings Institution.
- Shils, E. 1949. Social science and social policy. *Philosophy of Science* 16.
- Simon, H., V. A. Thompson, and D. W. Smithburg. [1950] 1991. *Public administration*. New York: Alfred A. Knopf; New Brunswick, N.J.: Transaction Publishers.
- Skowronek, S. 1982. *Building a new American state: The expansion of national administrative capacities, 1877-1920*. New York: Cambridge University Press.
- Sundquist, J. 1978. Research brokerage: The weak link. In *Knowledge and policy: The uncertain connection*, ed. L. Lynn Jr. Washington, D.C.: National Academy of Sciences.
- Taylor, F. 1911. *The principles of scientific management*. New York: Harper.
- Torgerson, D. 1986. Between knowledge and politics: Three faces of policy analysis. *Policy Sciences* 19:33-59.
- Tribe, L. 1972. Policy science: Analysis or ideology? *Philosophy and Public Affairs* 2:66-110.
- Wildavsky, A. 1979. *Speaking truth to power: The art and craft of policy analysis*. Boston: Little, Brown.