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I am submitting herewith a dissertation written by John P. Lynxwiler entitled "The Organization of Regulatory Enforcement Among Grassroots Inspectors." I have examined the final copy of this dissertation for form and content and recommend that it be accepted in partial fulfillment of the requirements for the degree of Doctor of Philosophy, with a major in Sociology.

Donald A. Clelland
Donald A. Clelland, Major Professor

We have read this dissertation
and recommend its acceptance:

Neal Shover

Dean J. Champagne

Robert F. French

Accepted for the Council:

C. W. Minkel
The Graduate School

THE ORGANIZATION OF REGULATORY ENFORCEMENT
AMONG GRASSROOTS INSPECTORS

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John P. Lynxwiler

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This dissertation is dedicated to my parents

John L. and Gladys B. Lynxwiler

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ABSTRACT

THE ORGANIZATION OF REGULATORY ENFORCEMENT AMONG GRASSROOTS

INSPECTORS

Regulatory bureaucracies charged with controlling industry misconduct have two primary goals--obtaining rule-compliance to agency mandates and deterring violative behavior in the future. The realization of these objectives is a matter of program implementation at the agency's grassroots level. Since the early 1960s, regulatory policymakers and program administrators increasingly have selected implementation strategies that reflect a proactive, legalistic approach to enforcement. Within these agencies, grassroots personnel are mandated to enforce regulations in a uniform, non-discretionary manner. This study examines inspectors within a regulatory agency that mandated a stringently legalistic, non-discretionary enforcement style.

The Federal Office of Surface Mining Reclamation and Enforcement (OSM) was created in 1977 to regulate the surface effects of coal mining. Because of the serious environmental damages wrought in the past, policymakers and program administrators developed a decidedly stringent inspection and enforcement program. The study focuses on the organization of and the variation in regulatory enforcement styles among the OSM's grassroots inspectors. Four methodological strategies were used to examine the enforcement styles of inspectors. The analysis centers on a narrative history of the OSM's inspectorate.

Grassroots enforcement styles are examined in two of the OSM's five regional offices. Our findings indicate that during the agency's initial period as the primary regulatory authority distinct enforcement styles emerged within the two regions. An examination of intra-regional enforcement styles in one of the two regional offices selected for analysis indicates that intra-regional variations in enforcement styles also occurred.

In documenting variations in the enforcement styles among the OSM's inspectors, the local conditions that shaped the agency's enforcement styles are discussed. These determinants of enforcement styles are described and compared for each region in order to isolate those factors that appeared to have the most important impact. The findings suggest that, among other local conditions, firm size, complexity and level of compliance are important determinants of enforcement styles. Also, the enforcement preferences of mid-level managers were found to be important determinants of grassroots enforcement styles among the OSM's inspectorate.

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CHAPTER 1

INTRODUCTION

Little support is needed to document the growing ubiquity of regulatory bureaucracies in the United States (Wilson, 1980). Regulatory oversight of industrial trade practices, occupational health and safety programs, consumer protection laws and environmental pollution standards are but a few examples of this growth in public (state) regulation of the private sector. Today, few industries remain immune to regulatory intervention, and indeed, the impact of government regulation is becoming a way of life for the average U.S. adult. In addition to this proliferation, a general change has occurred in the focus of regulation, especially the federal regulation of industrial activities.

The earliest regulatory agencies and their enabling statutes attempted to regulate the economic climate and competitive practices of an industry (Arrow, 1981). By the 1950s, these "old-style" regulatory agencies were attacked by scholars and others for a variety of operational shortcomings, primarily a tendency toward "capture" or co-optation by the industries they were established to regulate (e.g., Bernstein, 1955; McConnell, 1966). Though varied in their emphasis, proponents of the capture theory argue that as agencies age, a loss of initial public and political support combine with limited budgetary, personnel and technical resources to produce a regulatory climate that increasingly succumbs to the influence of the regulated industry (Mitnick, 1980). Within the capture framework, agency officials are

portrayed "as industry-oriented, as reluctant to jeopardize their postgovernment careers by being too tough, or as gradually co-opted by informal contact with representatives of regulated firms" (Bardach and Kagan, 1982: 44).

By the late 1960s, especially at the federal level, legislators and policymakers began creating a "new-style" regulatory agency (Lilly and Miller, 1977). Unlike their predecessors, these new agencies are charged with protecting the public welfare from the externalities (public costs not borne in market prices) of business activities (e.g., the Environmental Protection Agency, the Occupational Safety and Health Administration). Bardach and Kagan (1982) argue that the "protective" regulations of these newer agencies reflect not only the growing belief that industry can absorb the costs of more stringent regulations without seriously affecting the economy, but also concern over regulatory capture.

In creating these newer agencies, legislators and policy-makers devised statutory provisions and regulatory mandates meant to minimize their capture by industry. This legislative creativity is evident especially in newer provisions for regulatory inspection and enforcement (Bardach, 1977; Bardach and Kagan, 1982). Whereas, earlier forms of "economic" regulation emphasized a reactive, flexible inspection and enforcement strategy, the newer emphasis on protective "social" regulation stresses a proactive, stringently non-discretionary stance (Wilson, 1980; Thomas, 1980). Within these newer agencies, an explicit effort is made to increase enforcement powers by

promulgating more comprehensive and legally defensible regulations, increasing the severity of regulatory sanctions, and restricting discretion at the delivery or grassroots level of policy implementation (Bardach and Kagan, 1982). However, the stringent, non-discretionary implementation stance of many regulatory policymakers and program administrators do not coincide with the research findings presented by students of regulatory enforcement.

Limiting Grassroots Discretion

In general, the rift revolves around the issue of inspector or "grassroots discretion," a term we employ to refer to the situational adaptation of specific policies or standardized rules by field-level enforcement agents to specific cases encountered in day-to-day work roles (Lipsky, 1980). Often, the situational contingencies of a specific case or event preclude the uniform application of officially prescribed program requirements or bureaucratic mandates. Thus, discretion implies a judgemental decision. And, the invocation of discretionary behavior at the grassroots level is influenced by negotiations between involved parties, the organizational arrangements of the regulatory agency and the environmental conditions external to the agency.

In order to highlight the disparity that currently exists between regulatory officials and scholars of regulatory agencies, I will briefly review the issue from both sides. Obviously, the viewpoints which follow are not shared by all parties concerned; however, the

general lack of agreement represents a problematic area that is in need of further examination.

The View From the Top

Sensitive to (public) interest group pressure against capture, policymakers and program administrators of the newer protective agencies generally view program implementation as a bureaucratic process bound by policy mandates and subject to managerial control. The goal of program implementation is seen as the uniform, consistent application of agency policies--a goal which discretionary behavior may threaten. Hence, among top-level officials, grassroots discretion is couched within a measure of distrust (Elmore, 1980). Simply put, grassroots discretion not only endangers program effectiveness, but also, legalistically, it leads to chaos:

Without specific rules, regularly enforced, the deterrent effect of the law will erode, resulting in unpredictability, unequal treatment, a high risk of corruption, and ultimately serious harm to unprotected citizens; the rule of law, whatever its defects, is preferable to the discretionary rule of imperfect officials (Bardach and Kagan, 1982: 35).

Evaluation studies of program implementation which adopt this position, support a "view from the top" perspective. For example, Kaufman (1973) argues that discretion, at best, subverts the effective implementation of regulatory programs. He locates the "major contribution" of his work "in the enhancement of leaders' capacities to neutralize tendencies toward non-compliance" by subordinates (Kaufman, 1973: 4). Likewise, Weatherley and Lipsky (1977) channel their discussion toward devising improved and more sophisticated means for controlling discretion.

The outcome of such a position has led policymakers increasingly to tighten program mandates for grassroots personnel (Bardach and Kagan, 1982). Meanwhile, program administrators often opt for a "fix-it" approach that centers around the continuous monitoring of program implementation and increased inspector accountability (Bardach, 1977). The effect of such practices reduces the reliance on knowledge and skill at the grassroots level and increases the reliance on abstract, standardized solutions (Elmore, 1980).

In sum, these activities, which are evident especially in the protective regulations of "newer" social agencies, represent an overt attempt to restrict any "variance of goals" that may arise between an agency's executive managers and its grassroots enforcement agents (Downs, 1967: 134). However, scholarly research on the social organization of grassroots inspection and enforcement indicates that inspection work seldom responds to the hierarchical, textbook solutions of regulatory officials.

The View of Scholarly Research

While program officials are concerned with controlling grassroots discretion, much scholarly research tends to document the incidence of discretionary behavior as a necessary tool for obtaining regulatory goals (Thomas, 1980; Bardach and Kagan, 1982). The relatively sparse, but growing, body of scholarly research on regulatory inspectors suggests that discretion, regardless of the agency's attempts to restrict it, is not only a common but a critical job element for "street-level bureaucrats" (Lipsky, 1980). Faced with the task of

Applying general rules to situational cases, grassroots enforcement agents routinize their work by employing "gaming strategies" to induce rule-compliance from their clients (Schuck, 1972; Mileski, 1971; Gregorio, 1978). For example, Hawkins (1980) observed that not only do British water quality inspectors ignore certain minor violations but, on occasion, they may deceive companies about penalties in an effort to induce rule-compliance.

The decision to invoke various types of gaming strategies is largely a function of the stereotypic conceptions that grassroots enforcement agents develop about their clients (Lipsky, 1980). Similar to the research findings on street-level policing work (Sykes and Clark, 1975; Muir, 1977; Manning, 1977), research on regulatory inspectors indicates that enforcement personnel develop and employ typifications of their clientele to organize their work (Hawkins, 1983; Kagan and Scholz, forthcoming). In a study of housing inspectors, Nivola (1978) found that when inspectors perceive landlords to be cooperative toward rule-compliance, they often issue warnings rather than formal citations for observed violations.

In addition to factors in the immediate workplace, the organizational arrangements of the agency and surrounding environmental conditions may contribute to grassroots discretion. Research by Kelman (1980) suggests that the values and beliefs which an agency's top executives have of the regulated may influence enforcement styles among inspectorates (cf. Kagan, 1978; Kagan and Scholz, forthcoming). Also, Thomas (1980) has hypothesized that an

agency's regulatory mandates, organizational arrangements and surrounding political environment may contribute to the incidence of grassroots discretion.

In sum, there is general agreement among scholarly researchers that the discretionary behavior of grassroots enforcement agents is a normal occurrence within regulatory agencies. Increasingly, this conclusion leads scholars to suggest that regulatory agencies which opt for a more flexible, discretionary inspection and enforcement program will be more successful in obtaining rule-compliance from the regulated industry (e.g., Bardach and Kagan, 1982). Such a position runs counter to recent trends adopted by legislators and regulatory policymakers. As noted earlier, the creators of newer, protective regulatory agencies advocate increasingly stringent, non-discretionary implementation policies as the "best" means for obtaining rule-compliance from, and avoiding capture by, the regulated industry.

The present study is a step toward bridging this fissure between regulatory officials and students of regulatory enforcement. It is an exploratory analysis of grassroots enforcement agents in a federal regulatory agency. Because the study is concerned with the issue of grassroots enforcement strategies, we now turn to a discussion of the two strategies as typologies of enforcement styles.

Grassroots Enforcement Styles

Regulatory agencies charged with controlling industry misconduct have two primary goals--obtaining rule-compliance and insuring future deterrence. Like their counterparts in police departments, grassroots

inspectors are low-level employees in bureaucratic organizations. Both groups are charged with enforcing legal mandates at the grassroots level. Hence, inspectors and the police are the initial point of contact between offenders and the formal, bureaucratic legal apparatus they represent. Occupying such a position provides considerable opportunities for discretionary behavior. Because they are subjected to numerous instances of violative behavior daily, it is unlikely that regulatory inspectors or the police will assume a legally correct posture for every rule-infraction or instance of suspicious behavior they encounter (Reiss, 1967; Lipsky, 1980). Nonetheless, police departments and regulatory agencies vary considerably in the amount of enforcement vigor displayed by their grassroots personnel (Wilson, 1968; Lipsky, 1980).

Based on their research, students of grassroots inspectorates have developed a set of bipolar typologies of enforcement styles. Obviously, analytic distinctions of this nature represent a theoretical attempt to approximate a set of ideal types for purposes of analysis. They do not pretend to replicate the precise nature of actual enforcement situations. In actual settings, the complex, subtle nature of situated interaction blurs such "pure" typologies. However, these polar types do offer a viable point of entry for examining grassroots enforcement styles.

The first style of enforcement involves a legalistic or penal enforcement style (Thomas, 1980; Bardach and Kagan, 1982; Hawkins, 1983). It may be termed "enforced compliance." The enforced compliance style is evidenced by an observable desire for efficiency,

most often manifested in the form of department generated statistics and high rates of citations (Wilson, 1968).

Generally, policymakers and program administrators of protective regulatory agencies favor enforced compliance styles simply because they are rule-oriented (Shover et al., 1982). That is, their policies are intended to minimize the discretionary options open to inspectors while ensuring uniform, predictable rule-application for the regulated industry. Thus, the enforced compliance style enhances the centralization of administrative control over subordinates and protects agency administrators from charges of bias and capture.

Additionally, as in Wilson's (1968) and Muir's (1977) descriptions of legalistic police departments, enforced compliance styles often are found in situations "where administrators' control is less certain and where greater and more systematic efforts must be made to achieve the desired behavior" (Wilson, 1968: 175). In other words, when organizational and/or contextual variables reduce the amount of administrative contact with subordinates, increasingly systemized forms of communication and directives will emerge.

Finally, enforced compliance strategies are common in regulatory agencies where the overall goal, or legislative intent, is to achieve social objectives larger than enforcement of the law purely for its own sake (Thomas, 1980). The regulation of environmental pollution laws (Wilson, 1980) or occupational safety (Kelman, 1980) are examples of these agencies.

In opposition to the enforced compliance style, we find the

flexible, conciliatory strategy that relies on negotiated compliance. Within the literature on police enforcement, the negotiated compliance style is referred to as the service oriented professional cop (Wilson, 1968; Muir, 1977). Responsiveness, forbearance and information transmission are qualities of the negotiated compliance style (Bardach and Kagan, 1982). Agency's that adopt this model of enforcement place less emphasis on "official" rates of enforcement than do their more legalistic counterparts. Trade-offs and gaming tactics involving bluffs and cajolery are common (Hawkins, 1983). Also, there is a tendency to favor a "results-orientation" rather than the stringent rule-orientation of enforced compliance styles (Shover et al., 1982). That is, clients and cases are handled in such a way as to deter future infractions through effective cooperation between enforcement agents and their clients (Wilson, 1968).

Among students of regulatory enforcement, the negotiated compliance style, whether it is termed "flexible" (Thomas, 1980) or "conciliatory" (Hawkins, 1983), appears to be the preferred method for ensuring effective compliance (Bardach and Kagan, 1982). Because personal and situational factors are important decisional facets of the negotiated compliance style, inspectors will use a great deal of discretion and leniency in their daily work routines. This style creates positive lines of communication and cooperation with the regulated (Nivola, 1978); it also requires a socially knowledgeable inspectorate (Bardach and Kagan, 1982). Kagan and Scholz (forthcoming) have referred to these types of inspectors as consultants. When inspectors function as consultants, they attempt to

educate and instruct clients instead of simply citing violations as would be the case with an enforced compliance style.

The typology of enforcement styles develops rather clear¹ distinctions between the two styles of enforcement. On the one hand, the enforced compliance style of enforcement emphasizes strict rule adherence for inspectors. An explicit effort is made to restrict discretionary behavior at the grassroots level. Stringent agency mandates and "official" enforcement rates are characteristics of this style. On the other hand, the negotiated compliance style is characterized by a flexible, conciliatory approach to the regulated. Discretionary behavior is an important facet of the negotiational approach. Inspectors are encouraged to consult with clients over rule infractions, and thereby, facilitate a cooperative relationship of regulatory compliance.

Determinants of Enforcement Styles

Preliminary investigations into the assessment of enforcement styles must focus on building a better understanding of those factors which influence variations in enforcement. Phrasing the question in this manner will allow researchers to build a stronger foundation for

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The literature on enforcement styles among police generally includes an additional style of enforcement: the "watchman" (Wilson, 1968; Muir, 1977). The watchman style of enforcement is characterized by a reactive, rather than proactive, approach to enforcement. Because my analysis deals with the "newer," protective regulatory agencies that are proactive in their approach to regulation (Wilson, 1980), this enforcement style is not applicable to my discussion of enforcement styles.

addressing the larger issue of which enforcement style is more effective in obtaining rule-compliance. Also, it enables researchers to distinguish the degree of influence that these determinants have on enforcement styles as they emerge at various levels in the regulatory matrix. Hence, a guiding research question in our research is what determines inspectors' proclivities toward enforcement styles.

In locating the determinants of enforcement styles at various levels in the regulatory matrix, it is useful to examine the work of others whose research coincides with our study of grassroots inspectorates. The remainder of this section reviews the more important determinants of grassroots enforcement styles as evidenced in the literature. Often, these determinants represent hypothetical generalizations and conclusions rather than rigorous, empirical findings. However, they are useful as a foundation for comparative purposes. Because our analysis is essentially exploratory, we will use this body of work as a point of reference when we interpret the data and posit our conclusions. For convenience, we have organized our discussion into a trichotomized scheme which we term the environmental, organizational and interactional. Each term represents a different level in the regulatory matrix.

The Environmental Context

At the environmental level of the regulatory matrix we may focus on larger, external issues such as the political and legislative environment and the nature of the regulatory task. Regulatory agencies, like police bureaucracies, do not operate in a vacuum.

Important agency concerns created by external conditions may have considerable influence on implementation policy. The impact of environmental factors on the enforcement policies of a regulatory agency are quite similar to those affecting enforcement styles in police departments.

The nature and degree of violative behavior which an agency seeks to control may be an important factor in determining enforcement styles. For example, a high level of violative behavior may contribute to enforced compliance styles. Gardiner's analysis of variations in traffic-law enforcement policies found that:

a high crime rate is associated with conditions under which the police will be likely to take a strict or formalistic view of violations [writing tickets] rather than a lenient or informal view [ignoring violations or issuing warnings] (Gardiner, 1969: 139).

The notion that high levels of violative behavior result in strict enforcement policies is related to the amount of public visibility experienced by the agency. Wilson (1980: 377) alluded to this idea when he noted that "the more visible the agency, the greater the demands on it, and thus the more rules it must produce to assure its security and survival." The amount of visibility experienced by an agency can be traced to three additional environmental factors: (1) the degree of political pressure brought to bear by interest groups and concerned citizen organizations; (2) the amount of evaluative and normative conflict over the agency's role within its area of operation; and (3) the agency's past history, especially if previous regulatory attempts were defined as corrupt.

The impact of these factors is well documented in both the literature on police bureaucracies and regulatory agencies. For example, Kagan maintains that:

a regulatory program which experiences high public visibility, which is subject to objective measures of performance, which is confronted with a more balanced pressure group structure, and which has multiple sources of intelligence and advice, is more likely to maintain a relatively stringent stance (Kagan, 1978: 68).

His comments are echoed in Thomas's review of agency constraints on grassroots discretion:

To the extent that an agency must concern itself with a hostile or unpredictable political environment, it will attempt to control the discretion available to officials who must apply rules to individual cases (Thomas, 1980: 23).

Hence, the impact of environmental factors external to the agency may indeed shape the enforcement style selected. In this sense, what is true for police departments is also true for regulatory agencies. That is,

the administrators of these departments want high arrest and ticketing rates not only because it is right but also to reduce the prospect [or the suspicion] of corruption, to protect themselves against criticisms that they are not doing their job or are deciding for themselves what laws are good or bad (Wilson, 1968: 180).

An environmental influence not as easily recognized or documented is the degree to which the surrounding values and norms of the community are homogeneous. On the one hand, when police administrators perceive a low degree of normative agreement in a community:

the law must be enforced with special vigor . . . failure to do so would penalize law-abiding persons in those areas and inhibit the development of a regard for community norms among the law breakers (Wilson, 1968: 285-6).

On the other hand, if administrators perceive a high degree of normative agreement, they are more likely to:

feel that they can use their judgement in a particular case without having to choose, or without being thought to have chosen, between competing standards of order held by different persons or subcultures (Wilson, 1968: 219-20).

By the same token, regulatory policymakers who perceive a high degree of normative agreement among their clients generally opt for less stringent enforcement styles (Kagan, 1978). If adherence to norms among clients is weak, the agency often will "respond with enhanced mistrust and legalism" (Kagan, 1978: 7).

The Organizational Context

Moving from the environmental to the organizational level, the internal dynamics of the agency and the nature of the regulations become important determinants of enforcement styles (Thomas, 1980). Vague, ambiguous regulations which lack specificity may engender negotiational styles. However, an abundance of highly specific regulations can create a cumbersome maze for inspectors resulting in lax enforcement techniques (Schuck, 1972).

Important too is the organization of the agency. The amount of physical distance and autonomy allocated to mid-level offices and managers of inter-agency offices may have considerable consequences for inspectorates (Shover et al., 1982). Because increasing physical distance weakens direct administrative control over inspectors, administrators may elect to formalize their subordinates' work routines through standardized rates of enforcement. Alternatively, inspector monitoring may be left to mid-level managers. However,

efforts to decentralize the agency's authority structure increases the probability of variations in enforcement styles, as the perceptions and management styles of mid-level administrators may differ considerably within the agency.

Finally, the ideological perspective of the agency's top executives will have an impact on enforcement styles (Kelman, 1980). Kagan and Scholz (forthcoming) have discussed how an agency's perception of the regulated's motives may influence their decision to adopt one type of compliance strategy over another. For example, if the agency's top-level officials believe the regulated to be honest businessmen, they will probably opt for flexible, negotiational compliance strategies. However, if the regulated are perceived to be dishonest capitalists out to make a fast buck, the agency may decide on stiff sanctions and enforced compliance tactics.

The Interactional Context

At the level of interaction between inspectors and clients, the work routines of inspectors are important determinants of enforcement styles. The perceptions and attitudes that inspectors have of the regulated, the regulations and their superiors may subvert even the most stringent enforcement strategy (Thomas, 1980). The outcome of face-to-face encounters between inspectors and clients over rule infractions are not entirely a matter of the agency's mandated preferences (Gregorio, 1978). Although on-site encounters between inspectors and clients are couched within the larger context of environmental and organizational determinants, the interactional

contingencies of the regulatory encounter are important considerations as well. For example, while the perceptions which top agency officials have of the regulated are important determinants of enforcement at the organizational level, the stereotypes which inspectors have of their clients also contribute to the incidence of discretionary behavior (Lynxwiler et al., 1983). This is evident especially when inspectors' work routines develop long-term relationships with specific regulated firms (Hawkins, 1983).

The amount of experience that inspectors have accumulated in their work roles is important also. The more familiar an inspector is with the regulations, the more likely he will rely on personal interpretations of rule infractions rather than official policy directives. Experience becomes even more important when inspectors attempt to invoke gaming strategies to induce rule-compliance (Hawkins, 1983).

Thus, at each level of the regulatory matrix conditions arise which influence the inspection and enforcement process at the implementation level. By isolating the determinants of enforcement styles at the environmental, organizational and interactional levels, we increase our knowledge of regulatory enforcement styles and, ultimately, add to our knowledge of grassroots enforcement agents in similar bureaucratic settings. In subsequent chapters, we will address the issues raised in the preceding discussion more fully.

Scope and Focus of the Study

This study explores grassroots inspectors in a relatively "new" federal agency--the Office of Surface Mining Reclamation and Enforcement (OSM). This study covers a two year period that begins with the agency's initial period of enforcement in May 1978. During this time, the OSM enforced a set of interim regulations and operated as the primary regulatory authority in the United States. The agency was organized into five regions of operation with a headquarters in Washington D.C. My analysis is confined to the implementation process of the OSM's inspection and enforcement program.

In addition to my analysis of the agency's entire inspector corps, two of the five regions were selected for a more in-depth examination of the enforcement process. The two regions were selected for their variations in geography and surface coal mining techniques. Analysis of the OSM's enforcement statistics and data collected from a mailed questionnaire provide the basis for establishing variations among grassroots enforcement styles. A more detailed discussion of these variations and the two regions is presented in those chapters which focus more fully on inter-regional variation.

The OSM provides an interesting setting for examining grassroots enforcement styles. It is representative of the protective, social regulatory agencies. In fact, it is one of the most recent and legalistic of these agencies. The creators of the OSM's enabling legislation went to considerable lengths to develop a stringent policy of enforced compliance (Shover et al., 1982).

The study will focus on the organization of and the variations

in regulatory enforcement styles among the OSM's grassroots inspectors. Because regulatory inspectors are entrusted with the enforcement of legal mandates, we need to examine how they perform their work and the degree to which it appears consistent with the legal statutes. By exploring these issues, we may learn a great deal about the determinants of enforcement styles and, ultimately, increase our knowledge of the decision-making process within a bureaucratic setting. Hence, as a part of my analysis, we will examine and attempt to isolate the determinants of enforcement styles at various levels in the regulatory matrix. To accomplish these goals, we will interpret data from a variety of sources though our analysis will center on a narrative history of the OSM's inspectorate. Nonetheless, such knowledge, presumably, is generalizable to comparable settings beyond the OSM.

We will discuss the relevance of the finding for two critical problem areas for social science and policy formation. First, our present knowledge of regulatory agencies has not kept pace with the ubiquitous growth of protective regulation. While this condition is changing, there has been insufficient scholarly research in this area. By providing findings on the regulatory process in one area (coal mining), we hope to contribute to the development of a sociology of the regulatory process.

Additionally, our research should contribute to understanding how various types of regulatory enforcement styles influence grassroots inspector's efforts to obtain rule-compliance from their clients.

Although it is not a primary goal in our analysis, this knowledge, ultimately, should prove useful in determining whether flexible or stringent enforcement programs are more effective in obtaining regulatory compliance. And, thereby, it may be of use to those presently engaged in legislative and regulatory policymaking.

Overview of Subsequent Chapters

This chapter outlined the scope and focus of our study. In subsequent chapters, we will report our findings on these issues. Chapter Two is a summary discussion of our research methods. Chapter Three provides the reader with an historical reference point for the remainder of the study. The growth of surface coal mining in the United States is reviewed along with a discussion of the damages wrought by this mining technique. We will then introduce the agency, its enabling legislation and the OSM's inspection and enforcement program.

Chapter Four examines the agency's corp of inspectors. We use data gathered on the OSM's inspectors to describe how they were hired, trained and organized into the agency's five regional enforcement units. Additionally, we discuss the organization of inspectors' work routines and their attitudes on a number of topics including the agency's inspection and enforcement program. The data on attitudes will be used to locate the inspectors' preferences for different enforcement styles. Finally, this chapter will offer findings on the incidence and nature of grassroots discretion in the OSM.

In the next two chapters, we pursue the influences on inspector discretion and enforcement styles adopted in two of the agency's five regions of operation. In Chapter Six, We narrow this analysis by discussing why enforcement variations emerged in two of the OSM's district offices which operated in the same region.

In the remaining chapters, we will draw together the findings from previous chapters to examine why variations from the agency's mandates occurred. The determinants of enforcement styles at various levels in the agency are presented in Chapter Seven. Also, we will posit a preliminary assessment of the differential impact which these determinants have on grassroots enforcement styles and the exercise of discretionary behavior. Because such an assessment is dependent on variables whose influence is difficult to isolate, my conclusions will be judgemental. That is, the ranking of enforcement determinants will be based on our extensive analysis of the data, and any assessments will be speculative in nature. In Chapter Eight we will conclude our analysis by offering some tentative hypotheses and directions for future research on regulatory enforcement styles and their determinants. Also, we will locate our findings within the larger research objectives of this study in the hope that such a discussion will stimulate future work in this area.

CHAPTER 2

METHODOLOGY

The data for this study were collected during a larger research project which focused on the OSM's legislative history, initial organization, program development and policy implementation (Shover et al., 1982). The larger project commenced in May 1980 and lasted 24 months. Originally, the research team planned to use participant observation techniques to examine the implementation phase of OSM's inspection and enforcement program. This methodology was approved by the agency's headquarters executives in Washington D.C. Unfortunately, the directors of the two regions targeted for analysis objected to members of the research team accompanying their inspectors onto coal mining sites. Subsequent to the regional directors' objections, executives in Washington withdrew their support for the study. In order to salvage the research project, the research team's plan for an extended participant observational analysis of OSM's inspection and enforcement program was curtailed.

While this decision is a constraint on our research, it is a relatively common inpingement on researchers in action settings (Langbein, 1980). The most practical method for overcoming administrative limitations and methodological restrictions of this type involves the "triangulation" of methods (Smith, 1975). Triangulation is the tactic of gathering data through a variety of techniques which are then compared to obtain a more "correct" and valid understanding of the research phenomenon (Webb et al., 1966).

Our analysis of the OSM's inspectorates makes use of the triangulation method and employs four data collection techniques: (1) open-ended, personal interviews, (2) a mail questionnaire, (3) agency documents and (4) comparable studies completed by others.

In the course of the larger study, open-ended, personal interviews were conducted with 154 respondents. The majority of the interviews took place in two of OSM's five regions of operation and the agency's headquarters office in Washington D.C. Each interview lasted approximately one hour, and most were conducted in face-to-face situations. The majority of the interviews were tape recorded and later transcribed for analysis. When tape recording was not possible, members of the research team took field notes for later analysis.²

Interview respondents included OSM's headquarters personnel in Washington D.C., regional managers, field supervisors and grassroots inspectors. Additionally, we interviewed representatives of coal mining companies, representatives of coal mining companies, representatives from both industry and environmentalist related interest groups, and personnel from state regulatory agencies involved in the regulation of surface coal mining. Table 2.1 describes the breakdown of interview respondents.

The interviews were organized around topics to allow for extended discussion with respondents. As new information and analytic themes

²Three interviews with the OSM inspectors were not tape recorded. However, follow-up interviews were conducted with each of these individuals, and the second interviews were tape recorded.

TABLE 2.1.

SUMMARY DESCRIPTION OF INTERVIEW RESPONDENTS

Type of Respondent/Group	Number
<u>OSM Personnel</u>	
Headquarters Personnel:	
Executives	9
Other (e.g., branch chiefs)	3
Regional Level:	
Managers	11
Others (e.g., field supervisors, inspectors)	43
<u>Interior Department</u>	
Executives	2
Solicitors	6
<u>Coal Industry</u>	
Mining Companies	38
Trade Associations/Lobbying Organizations	9
Mining Consultants & Related Industry	6
<u>Environmental Organizations</u>	
National	4
Regional	6
<u>State Personnel</u>	
Managers	6
Others (e.g., field supervisors, inspectors)	8
<u>Others</u> (e.g., Congressional staff)	3
<u>TOTAL</u>	154

emerged during the data collection process, the interview guides were revised. Generally, the inspector interviews fall into two categories. Nineteen interviews examined the agency's relationship with state programs, its early inspection and enforcement program, and the impact of the Reagan administration on inspection and enforcement. The remaining 24 interviews focused on the agency's penalty process, the inspectors' daily routines, and their attitudes on discretion, the coal industry and the OSM's regulatory mandate.

The interviews conducted with administrative personnel in the two targeted regions and the agency's Washington headquarters provide a means to assess and locate the agency's guiding ideology and attitudes toward the inspection and enforcement program. While these interviews cover a wide range of topics, our analysis is concerned primarily with the implementation phase of OSM's program.

Second, in the Summer of 1981, a questionnaire was mailed to all OSM inspectors and field supervisors working in each of the agency's five regions of operation. At that time, this group totaled 158 employees. We received responses from 126 grassroots personnel (79.8 percent). Questions were organized into Likert-type responses, and along with demographic information, the respondents' attitudes were tapped on a number of topics related to the OSM's regulations and implementation policies, the regulated industry and comparable state programs and personnel. We coded the questionnaires to make identification of respondents by region and office possible. This facilitates comparisons of both inter- and intra-regional data from the questionnaire.

Agency documents provide a third data source. We collected and analyzed routine, periodic statistical reports on the agency's inspection and enforcement operations. This data included periodic information on the number of inspections conducted, citations issued and citizen complaints received for each of OSM's five regions of operation.

Finally, we have made extensive use of the data analysis and conclusions contained in the final report of the larger research project which also provided the necessary support for the research (Shover et al., 1982). And we have examined existing studies of the OSM when such analyses dovetailed with my research interests.

CHAPTER 3

THE REGULATION OF SURFACE COAL MINING IN THE UNITED STATES

This chapter provides an overview of the industry and legislation important in our analysis of the OSM's grassroots enforcement agents. We begin with a review of coal production in the United States. Following this historical review, we discuss the process of surface coal mining and the detrimental social and environmental impacts that, historically, were associated with this industry. Next, we review the legislative struggle to regulate the surface coal mining industry at the federal level. As a portion of this discussion, We summarize the federal legislation that eventually was enacted by Congress. Finally, We introduce the OSM and its regulatory mandates. Hence, this chapter fulfills two purposes. First, it provides the reader with an historical frame of reference for the remainder of our analysis. And, second, it introduces the more important environmental determinants which influenced the OSM's selection of grassroots enforcement styles.

Coal and Coal Production

Coal has been a major source of energy in the United States for more than a century. Today, the United States ranks second in world wide coal production and first in recoverable coal reserves (President's Commission on Coal, 1980). U.S. coal is found in 31 states and mined in 26 (Department of Energy, 1981). In 1976, our country's demonstrated reserves totaled 438.3 billion tons of coal, and the recoverable reserve base--consisting of coal deemed to be

technically and economically minable--was approximately 219 billion tons (Presidents' Commission on Coal, 1980).

Our country's reliance on coal has declined from nearly one-half of our energy supply at the end of World War II to less than 20 percent in 1980 (President's Commission on Coal, 1980). However, the rising cost of crude oil coupled with increasing energy demands in both the public and private sectors suggest that this trend will reverse itself in the future. Most projections put 1985 and 1990 coal use at about 4,300 and 5,000 million tons per year--and increase of 15 and 34 percent over 1977 levels with an annual growth rate of two percent (Department of Energy, 1978).

U.S. Coal Fields

Normally, the nation's coal reserves are categorized in terms of the three principal coal fields or regions that underlie the United States: Appalachia, the midwest and the far west (see Figure 3.1). In each of these three regions, coal mining presents quite different technical problems and has a different history as well.

The Appalachian region contains 25.5 percent of the nation's total demonstrated reserve base, primarily bituminuous coal. Appalachian coal mining is characterized by thousands of small firms, working on steep terrain, mining the seams of relatively high energy value, high sulfur coal. Additionally, Appalachian coal operators must contend with heavy annual rainfall, relatively thin coal seams and extremely thick overburden. The Appalachian overburden ratio--the cubic yards of earth that must be removed per ton of coal mined--is highest among the three coal regions.

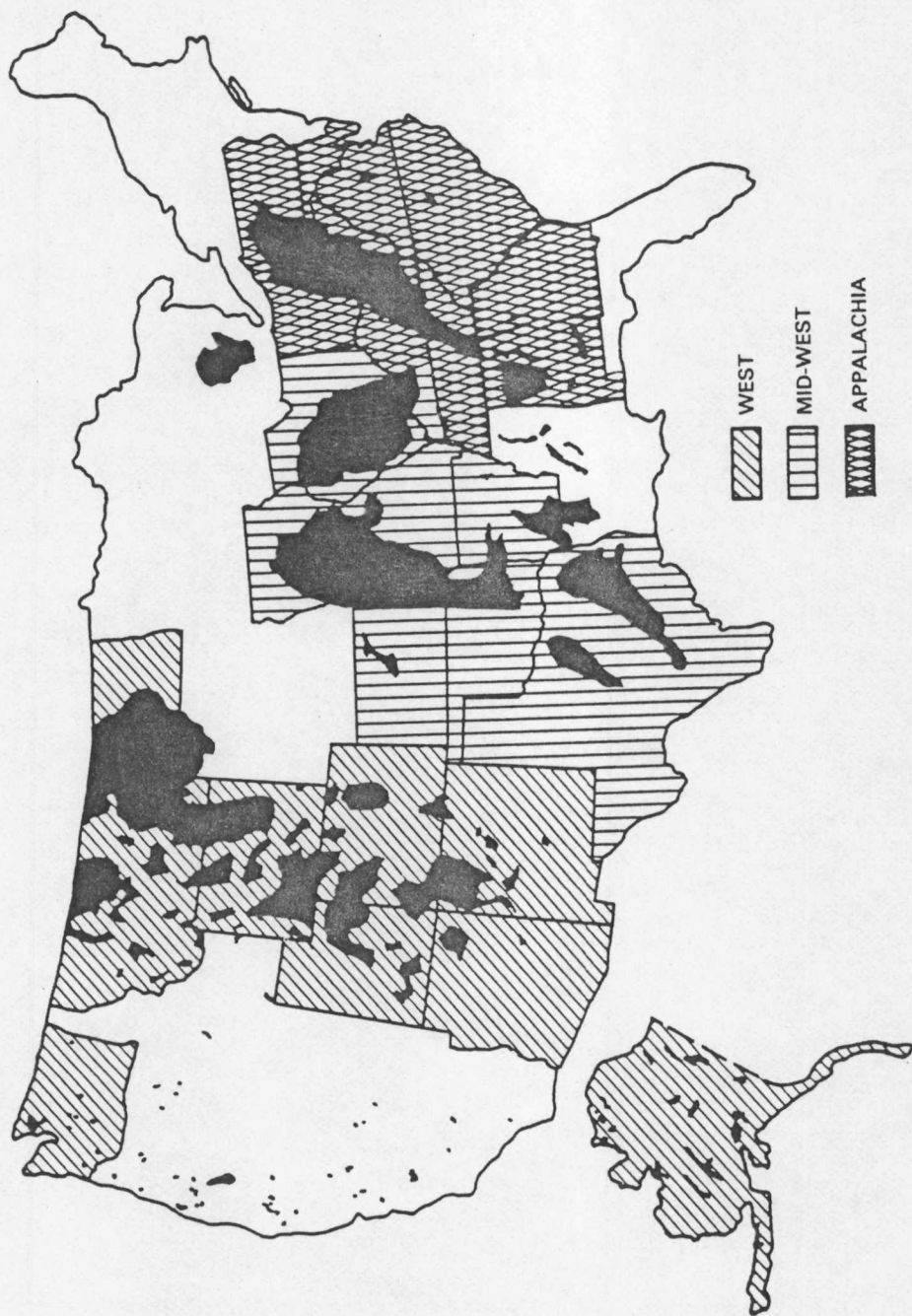


Figure 3.1. U.S. Coal Fields.

In 1979, Appalachia held a 54.69 percent share of the nation's total coal production and accounted for 91 percent of the active mines (Department of Energy, 1980). In recent years, however, the dominance of Appalachian coal has been declining as a result of increased production in the far west region. Projections indicate that, by 1985, Appalachia's share of the national market will decrease from 34 to 43 percent, although regional production should increase by one to six percent over the same time period (President's Commission on Coal, 1980).

In the midwest or interior region, terrain is more hospitable to mine operators because much of it is gently rolling farm land with moderate average annual rainfalls. Coal seams generally are thicker than in Appalachia, and the overburden ratio is lower. Together, these factors permit the use of much larger machinery than is possible in most of Appalachia. The midwest's reserves, chiefly bituminous with some lignite, account for 23.9 percent of the nation's total demonstrated reserve base. Projections indicate that midwest production will increase in the future, but its share of the total market will remain constant, perhaps decreasing slightly (President's Commission on Coal, 1980).

The coal fields of the far west hold 50.6 percent of the nation's reserves, although the coal is predominantly subbituminous, which as a lower heat content than the bituminous coal mined in the midwest and Appalachia. Historically, nearly two-thirds of all coal produced in the United States was mined in the east. However, projections

indicate that western coal production will increase between 250 to 600 percent by 1985, and its market share may increase from 1975's 14 percent to 32-43 percent by 1985 (President's Commission Coal, 1980).

Unlike the east, western coal mines are extremely large, although few in number. For example, in 1978, 18 of the nation's 20 largest coal producing surface mines were located in the west while none were located in Appalachia (Keystone, 1979). Despite being somewhat lower in quality, western coal possesses a number of distinct advantages over coal mined in other regions (Lynxwiler and Groce, 1980). Western coal seams are quite thick and the overburden ratio is relatively small, averaging 4.62 cubic yards per ton of coal mined as compared to 22.19 cubic yards for Appalachia (Department of Energy, 1980). Additionally, western coal is lower in sulfur content, making it a preferred fuel for electric utilities because of federal sulfur dioxide emission standards (Glass, 1974; Powe, 1974).

Thus, in contrast to the east, western coal mining is concentrated in the hands of a few producers, working on relatively flat terrain, mining thick seams of relatively low energy value, low sulfur coal under arid conditions and in areas of low population density. Overwhelmingly, the growing importance of and positive projections for, western coal mining is complimented by an increase in surface coal mining. Most of the new mines opened recently or expected to open in the future are surface mines (National Research Council, 1981). The extreme variation between eastern and western surface coal mining had an important impact on the OSM's regulatory

program in the two areas. In subsequent chapters, we will discuss this impact in more detail.

Surface Coal Mining in the United States

In the United States, coal mining began in the mid 1700s. Historically, the majority of coal produced in our nation was obtained through underground or deep mining methods. In underground mining, a series of parallel and connecting tunnels are dug to reach the coal seam which is at least 200 feet below the surface. In the 1920s, underground methods accounted for approximately 98 percent of the coal produced in U.S. mines. However, by the end of World War II, surface mining methods began producing an increasingly larger share of U.S. coal. Figure 3.2 illustrates this trend.

There are a number of reasons for the growth of surface coal mining; the major ones are economic. For example, surface mining has a higher recovery rate than underground methods. Surface mining can recover up to 90 percent of the coal in a seam while deep mining recovers approximately 50 percent (Department of Energy, 1980). In addition, the average surface miner produces approximately three times the coal produced by the average underground miner. Further, surface coal mining is much less hazardous to miners than deep mining. Technological advancements in the size and handling capacities of surface mining equipment have contributed also to the growth of surface mining, especially in the midwest and west where terrain and thick coal seams permit the use of extremely large machinery. In sum, the locus of coal production has been shifting from underground to the

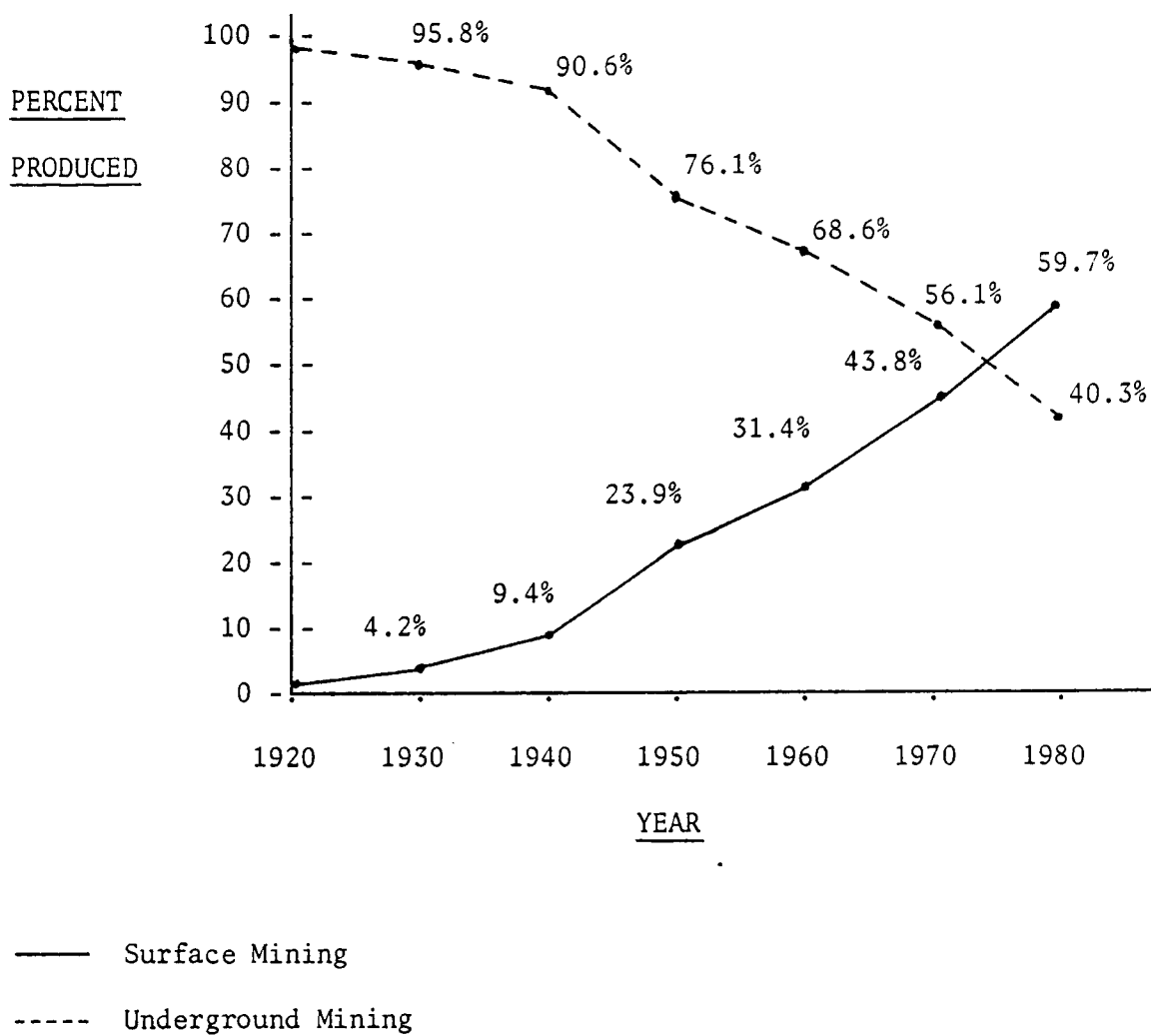


Figure 3.2. Percentage of all Bituminous and Lignite Coal Produced in the U.S. by Type of Mining--1920-1980.

Source: U.S. Department of Energy, 1980, 1981.

surface, and, further, projections indicate that this trend will continue (President's Commission on Coal, 1980).

Surface Mining Methods

Surface coal mining, a form of quarrying, varies considerably according to the topography of the land, the climate, hydrological conditions of the area, the size and location of the coal deposit (or seam) and the type of coal being extracted. Generally, a surface mine consists of:

a mine producing coal which is usually within a few hundred feet of the surface by the removal of overburden [earth above or around the coal] to expose the coal bed which is then mined using surface excavation equipment such as draglines, power shovels, bulldozers, loaders and augers (Department of Energy, 1981: 88).

The most common types of surface mining are contour mining and area mining.

Contour mining is the most common method of surface mining in the mountainous regions of Appalachia. In this process, bulldozers cut a shelf, or bench, into the side of the mountain. The vertical wall created by this bench cut is referred to as the highwall; the undisturbed portion of the mountain below the bench is the downslope. Explosives, placed in the highwall, are used to loosen the overburden. After the loosened overburden, or spoil, is removed, the coal is loaded onto trucks and hauled away for processing. The mining process continues by extending the bench cut along the contour of the mountain. Figure 3.3 illustrates the removal of coal using contour mining techniques.

Because of the relatively flat terrain, surface coal mining in

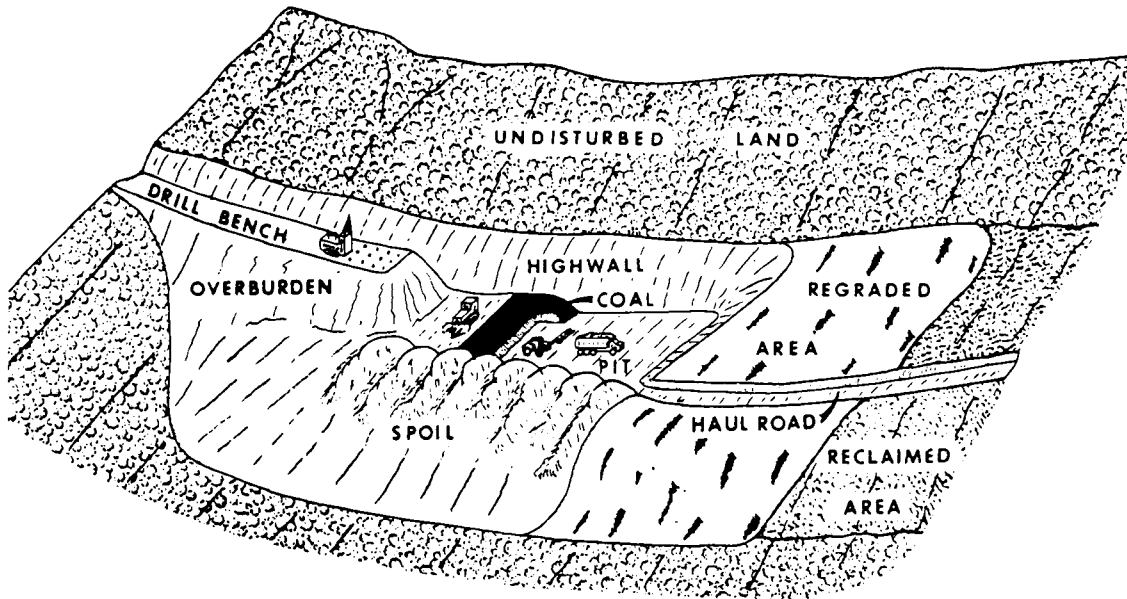


Figure 3.3. Surface Mining-Contour Method.

1. Topsoil is removed and stockpiled for later reclamation purposes.
2. A bench is dozed into the side of the slope.
3. Blasting cracks the dense overburden.
4. Overburden is hauled by scrapers or trucks and is backfilled continuously.
5. Coal is removed by loaders and/or shovels and carried out of the mining area along the haul road (which has been cut into the slope).
6. While blasting for the next stage of overburden removal, reclamation of the first cut is beginning: the pit is filled with overburden, reggraded, layered with topsoil, then seeded.

Source; The President's Commission on Coal (1980; 159).

the midwest and far west coal regions employs area mining techniques (see Figure 3.4). In this process, the overburden is removed with very large shovels suspended from booms. An initial trench is dug to reach the underlying coal seam, and the spoil is placed beside the trench. The coal is loosened with explosives, and the shovels load it onto trucks. As subsequent, parallel trenches are dug, the spoil materials are placed into the adjacent trench that was mined previously. Successive trenches are made until the entire coal seam is excavated.

Area mining is most common in the midwest and western coal regions while contour mining is found more often in the Appalachian coal region. In chapter 5, we will examine the impact that these variations in surface coal mining techniques had on the enforcement styles of the OSM's inspectors.

The Social Problems of Surface Mining

The preceding description of surface mining techniques ignores the fact that the rapid ascendance of surface coal mining was not matched by similar advances in and sound use of reclamation practices. Until 1977, the regulation of surface coal mining on private lands was left largely to the states. Excepting a few states, the result was weak, occasionally corrupt, regulation. State laws, regulations and regulatory agencies suffered from inadequate resources, weak statutes and regulations, and lax enforcement policies (Imhoff, Friz and LeFevers, 1976; Grandis, 1979). Deficiencies in state regulation permitted the proliferation of socially and environmentally harmful

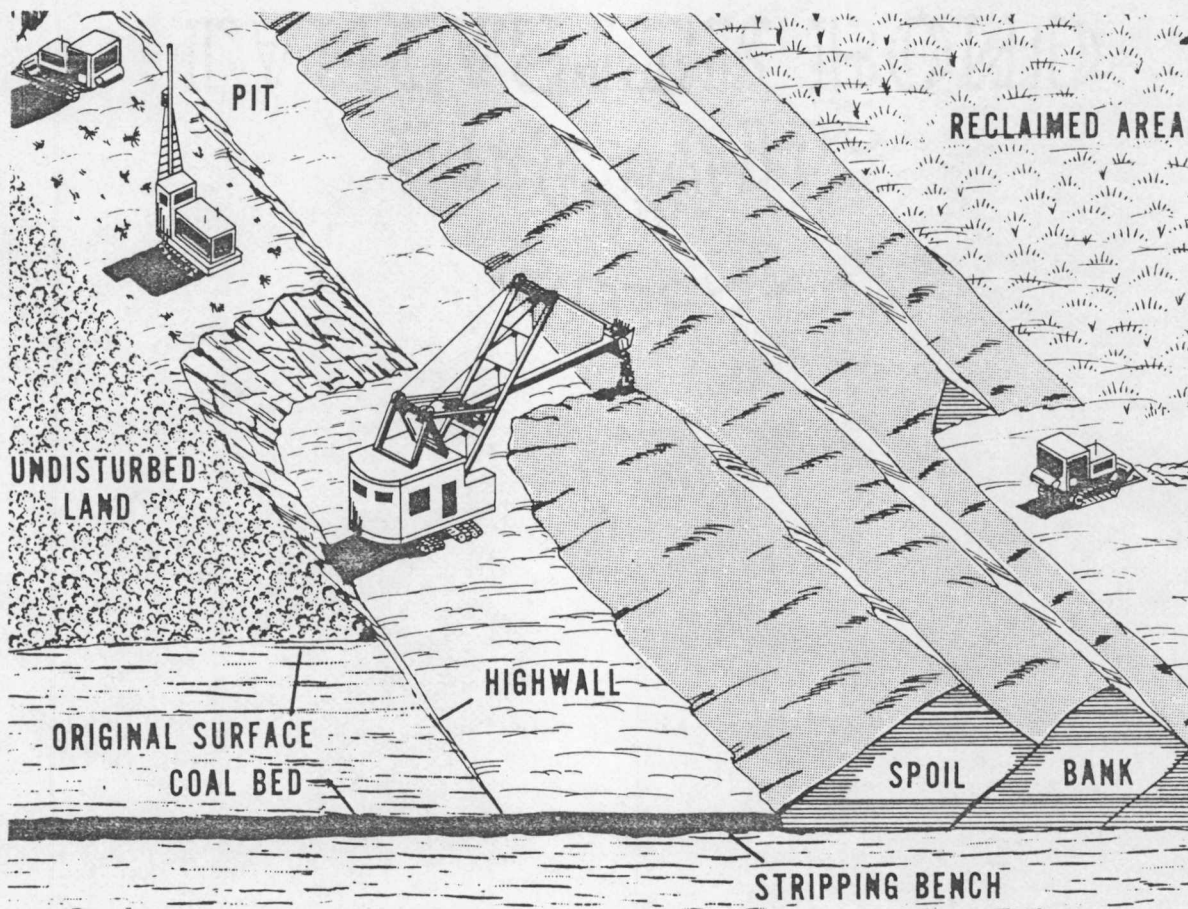


Figure 3.4. Surface Mining-Area Method.

Source: National Environmental Research Center (1974: 30).

mining practices. Minimal concern for the surrounding land was common.

Indeed, the past record of surface mining includes many ghastly reports of acidic runoff, pollution, mudslides and devastating floods resulting in costly economic and ecological damage (U.S. Department of Interior, 1967). Many times the destructive impact of surface mining was not the result of willful misconduct; often it was the consequences of accepted solutions to the mundane, technical problems of surface mining. Regardless of the type of surface mining, many observers agree that, "the surface mining process produces a sort of fallout that carries the damage of the strippers far beyond the mine site itself" (Stacks, 1972; 36).

In the Appalachian coal region, this fallout posed a serious problem. Heavy annual rainfall, high sulfur coal and thick overburden created the potential for severe environmental damage through acid run-off. The unchecked use of explosives subjected local residents and dwellings to shock waves and dangerous debris hurled from the blasts (flyrock).

Contour mining can leave enormous highwalls which gradually erode previously undisturbed land further up the mountain slope. In the past, mine operators did not grade the highwalls after excavation of the coal. As the slope erodes, existing vegetation and earth slide down the slope presenting a threat not only to the environment but also to whole communities living at the base of the mountain. De-vegetation also increases the probability and severity of floods. The following excerpt illustrates the damage from such practices:

While newspapers covered the diligent efforts of flood recovery agencies, little attention was focused on the reasons why the flooding occurred. A downpour of up to six inches of water over a four-hour span was the immediate reason. However, as many residents living along Paw Paw Creek will testify, strip mining on steep slopes [up to 45 degrees] directly contributed to the flood. Two county residents died and property estimated at over \$10 million was destroyed (Mountain Life and Work, 1979: 26).

Perhaps the most damaging activity of steep slope mining was the industry's practice of pushing the spoil over the downslope. Traditionally, the rock, trees and earth covering the coal seam were "placed to one side" simply by pushing them over the mountain. These unstable materials, when exposed to rain, produced serious environmental problems. Acidic runoff combined with siltation often ruined wells, destroyed aquatic life and choked the numerous streams of Appalachia. In sum,

[W]hat [strip mining] does is to tear enormous gashes into the sides of the mountains, scatter mine wastes all over the landscape, destroy vegetation, ruin what is left of the topsoil, sour the streams, leave the land vulnerable to rock slides and flash floods, and strand animals deep in the highlands by carving impassible strip benches across the slopes like ancient moats (Erikson, 1976: 70).

While an abundance of rainfall poses many of the reclamation problems in Appalachia, it is the scarcity of water that creates problems in the west. In the arid and semi-arid regions of the west, rainfall and ground water supplies are limited and extremely fragile resources (cf. National Research Council, 1974). Damage to these resources may prove devastating to grazing lands and make it virtually impossible to establish self-revegetating plant life. Additionally, the spoil materials from large area mines often were left in ridges and piles. In both the midwest and far west, this process ruined thousands of

acres of grazing and farmland. The result has been the creation of large areas of land which maybe incapable of supporting plant and animal life.

The Federal Regulation of Surface Coal Mining

By the mid-1960s, the detrimental effects of surface coal mining no longer could be ignored. Prior to federal intervention, approximately one and a half million acres of land had been directly disturbed by coal mining, while over 11,500 miles of streams were polluted by sedimentation or acidity from surface or underground mines (U.S. Department of Interior, 1977: 108). This neglect, and often total disregard, for the ecological balance of the area, as well as the safety and property of nearby inhabitants, came to be defined as a major social problem by affected individuals and concerned environmentalist groups (e.g., Caudill, 1963, 1971; Erikson, 1976). Between the mid-1960s and early 1970s, at least 28 states enacted or amended surface mining legislation (Imhoff et al., 1976). As the anti-strip mining movement gained momentum, pressure mounted for federal regulation or abolition of surface coal mining (Shover et al., 1982).

Although a bill was introduced in 1940, Congress took no action until 1968 when hearings were initiated (Shover, 1980). Perhaps the stormy legislative history of the bill was best summed up by one of its leading proponents, Representative Morris K. Udall:

It took six years of tenacity and bitter debate to pass Public Law 95-87 . . . Let me say . . . that a legislative endeavor

involving 183 days of hearings and legislative consideration, eighteen days of House action, three House-Senate Conferences and Reports, eleven Committee Reports, two Presidential vetoes, approximately fifty-two recorded votes in the House and Senate, and the machinations of three Presidents is an activity ripe for scholarly analysis, let alone the stuff for a pretty good novel (Udal, 1977: 554).

While members of Congress wrestled with the problems of economic burdens and states' rights, local and national environmentalist and conservationist groups urged Congress to pass stiff regulatory measures for, and in some instances prohibit, surface coal mining in the United States. Because the movement to regulate surface mining originated on a grassroots level and was joined by national lobbying groups with considerable financial resources, pro-regulatory groups were financially and politically equipped for a long struggle (Shover et al., 1982).

Lobbying groups for the industry, which included coal associations, heavy equipment manufacturers and power utilities, admitted to some past abuses of surface coal mining. However, they assured Congress that such practices had been caused by a few irresponsible operators who were no longer in business (Shover, 1980). Further, they argued that existing state laws and agencies were capable of effectively policing the industry and ensuring proper reclamation of mined land. Also, industry spokesmen emphasized the nation's need for coal as a major energy source while claiming that federal legislation would contribute to the rising cost of energy for consumers (Shover et al., 1982).

By the early 1970s, Congress began drafting legislation to regulate surface coal mining. Twice during the Ford administration Congress sent surface mining bills to the President (Dale, 1978). On both occasions, President Ford vetoed the bills. His major objections included the nation's growing need to develop alternative energy sources and the negative impact that regulation would have on the economy.

Increasingly, however, it became apparent that Congress would pass a federal law. As pro-regulation groups pressed for a tough law, large coal producers and their spokesmen began to support flexible legislation that would increase industry predictability while recognizing the need for regional variations (Shover et al., 1982). Meanwhile, smaller sectors of the industry, who were largely from the eastern coal regions, maintained their opposition to federal legislation of any type.

In 1977, Congress sent surface mining legislation to President Carter. On August 3, 1977, President Carter who had pressed for a tough federal law during his campaign signed the Surface Mining Control and Reclamation Act (SMCRA; the Act; Public Law 95-87; U.S.C. 1202 et seq.). Although concessions were made by all parties (Shover et al., 1982), the SMCRA is a relatively stringent law containing over 114 environmental performance standards. These standards set specific, acceptable levels for a variety of mining activities. In many cases, they also mandate the means or procedures required to achieve the standards.

The Act provides recovery guidelines to correct past mining abuses, design and performance standards for surface and underground coal mines, formal procedures to designate areas unsuitable for mining, administrative provisions for removing coal from federal lands, and transitional policies to locate primary regulatory authority in the states. Of the Act's thirteen purposes, the overriding goal is not only to "assure that surface coal mining operations are so conducted as to protect the environment," but also to "strike a balance between protection of the environment and agricultural productivity and the Nation's need for coal as an essential source of energy" (PL 95-87, s 102d,f). The brief summary which follows will familiarize the reader with the Act's nine Titles.

An Overview of the SMCRA

Titles I and II contain the Act's rationale, intent and enforcement powers as formulated by the 95th Congress. Title II provides for the creation of the Office of Surface Mining Reclamation and Enforcement as an independent federal regulatory agency. Congress placed the new agency within the Interior Department, and empowered it to enforce the Act by working in conjunction with existing state programs. Eventually, these state programs, by incorporating the design and performance standards mandated in the Act and specified in the regulations, would assume primary regulatory responsibility with the OSM functioning in an oversight capacity.

Title III established funds to assist the states in furthering research on mining and mineral resources. Titles VIII and IX

specified criteria for awarding funds toward the establishment of university research laboratories and graduate fellowships. These funds, like those in Title III, are provided to further existing research on the production, conservation and utilization of coal and other energy (or fuel) sources (PL 95-87, s 801-806; 901-908).

Title IV confronted the environmental degradation of past mining abuses (PL 95-87, s 401-413). Mining companies are required to deposit a reclamation fee into an Abandoned Mine Reclamation Fund. The fees vary depending on the company's annual production rate, the type of coal being mined and the mining techniques being used. States receiving primary regulatory authority over mining within their borders, receive a portion of this fund to aid in restoring unreclaimed mine sites.

The procedures set forth in Title V are, to many, the "guts" of the Act and are the portions of the Act which have the largest bearing on this research project (PL 95-87, s 501-529). Section 501 of Title V specified time periods for the promulgation of interim and permanent regulations. The interim regulations were to be finalized by November 21, 1977, and the permanent regulations were scheduled for completion by August 3, 1978. Both sets of regulations were to be published in the Federal Register. In order to incorporate any necessary, viable changes to the regulations, the OSM was mandated to hold public hearings and to allow a thirty-day comment period from interested parties and state governments.

Title V also specified requirements for the establishment of state regulatory programs. States desiring primary regulatory

authority (primacy) were required to submit proposals to the Secretary of the Interior by January 31, 1979. The decision of the Secretary was disclosed after a review of the state's primacy proposal and an examination of hearing transcripts. When primacy was denied, the state was given sixty days to submit a revised proposal. The OSM remained as the primary regulatory authority in those states that did not request primacy or whose primacy request was denied and not resubmitted.

All commercial coal mining operations that disturbed over two acres of land were required to submit, for approval, a permit package to the regulatory authority. The permit package included detailed mining and reclamation plans, impact statements on the hydrological balance of the area, and the amount and type of blasting to be performed. All applications for permits were made available for review by private citizens. In fact, section 520 of Title V detailed the rights of private individuals to commence citizen action suits if the primary regulatory authority did not sanction a coal mining operation that was not in compliance with the act.

In addition to the permit package, mine operators were required to deposit a monetary bond of sufficient value to ensure reclamation of the disturbed area (minimum bonds were set at \$10,000). Release of the bond occurred after all mining and reclamation procedures were accomplished and subsequently approved by the primary regulatory authority.

The Act's 114 environmental protection performance standards were

presented in Title V. These standards were to be incorporated into the primacy programs designed by the states. Among the performance standards, were requirements for the removal, storage and replacement of topsoil disturbed during the mining operation. Also, operators were no longer allowed to push the removed spoil over the downslope. In order to protect the hydrological balance of existing water sources, operators were required to construct sedimentation ponds and silt structures. Once the coal had been removed, operators had to return the impacted area to its approximate original contour and establish adequate revegetation of the mined area. All highwalls created during the mining operation had to be removed.

Other sections in Title V contained provisions designed to protect, and in some cases restrict, coal mining in certain areas. For example, section 522 contained procedures for protecting the agricultural productivity of prime farmlands. Section 527 focused on certain areas west of the 100th parallel in which no mining was allowed due to the arid conditions and long-range hazards of upsetting the hydrological balance of farmlands further east.

Finally, Title V outlined the inspection and enforcement policies and penalty provisions of the Act. The Act provided for a system of mandatory enforcement. OSM inspectors were required to inspect each permitted mine site biannually without prior notice being given to mine operators. Section 521 required inspectors to write a notice of violation (NOV) for every regulatory infraction they observed on a mine site. Further, it required them to issue a cessation order (CO; an order to cease all mining) under two conditions: (1) when they

observed a violation which caused or created the threat of imminent danger to the health or safety of the public or environment, or (2) when an operator failed to abate, within the specified time period, a condition for which he previously had received a notice of violation.

Section 518 established the monetary value of penalties assessed for violations and the process by which they were to be assessed, adjusted and collected. A maximum of \$5,000 could be assessed for each violation. The amount of fine assessed was to be determined by:

the permittee's history of previous violations at the particular surface coal mining operation; the seriousness of the violation, including any irreparable harm to the environment and any hazard to the health or safety of the public; whether the permittee was negligent; and the demonstrated good faith of the permittee charged in attempting to achieve rapid compliance after notification of the violation (PL 95-87, s 518 a).

Violations not corrected within the allotted time period set by the inspector were to be assessed an additional \$750 a day. Each permittee who was assessed a fine was to be given the right to a public hearing in order to determine the validity of the imposed penalty. Collection of delinquent fines were to be referred to the Justice Department for collection and/or prosecution. Finally, section 518 determined that maximum civil and criminal penalties of \$10,000 or one year imprisonment (or both) should be imposed if a person knowingly and willfully refused to comply with the Act.

Of the remaining portions of the Act, Title VI designated specific areas unsuitable for non-coal mining. Title VII contained administrative and miscellaneous provisions. These included definitions of terms used in the Act, time tables for annual reports,

protection clauses for government employees and guidelines for feasibility studies of Alaskan surface mining.

The Office of Surface Mining Reclamation and Enforcement

Shortly after Jimmy Carter's inauguration, the Secretary of the Interior, anticipating the eventual passage of the SMCRA, organized an OSM task force in Washington, D.C. The task force, which included approximately 90 persons, was divided into 17 groups (Shover et al., 1982). Each group was assigned a specific task. While some began developing the agency's organizational structure, others focused on promulgating the interim regulations. Hence, by the time President Carter signed the surface mining legislation, efforts were underway to make the agency operational.

The task force divided the United States into five regions. In each region a city was selected as the headquarters for the particular region (see Figure 3.5). The task force chose a decentralized organizational structure that would allow considerable autonomy with the regions. It was felt that this structure would facilitate the agency's ability to adjust to the regional variations of the industry (Shover et al., 1982). The formal structure of the regional offices paralleled the structure of the agency's headquarters in Washington, D.C. (see Figure 3.6).

In the course of the larger study of the OSM, interviews with members of the headquarters task force revealed several factors which combined to engender an enforced compliance stance toward inspection and enforcement (Shover et al., 1982). First, because Congress had

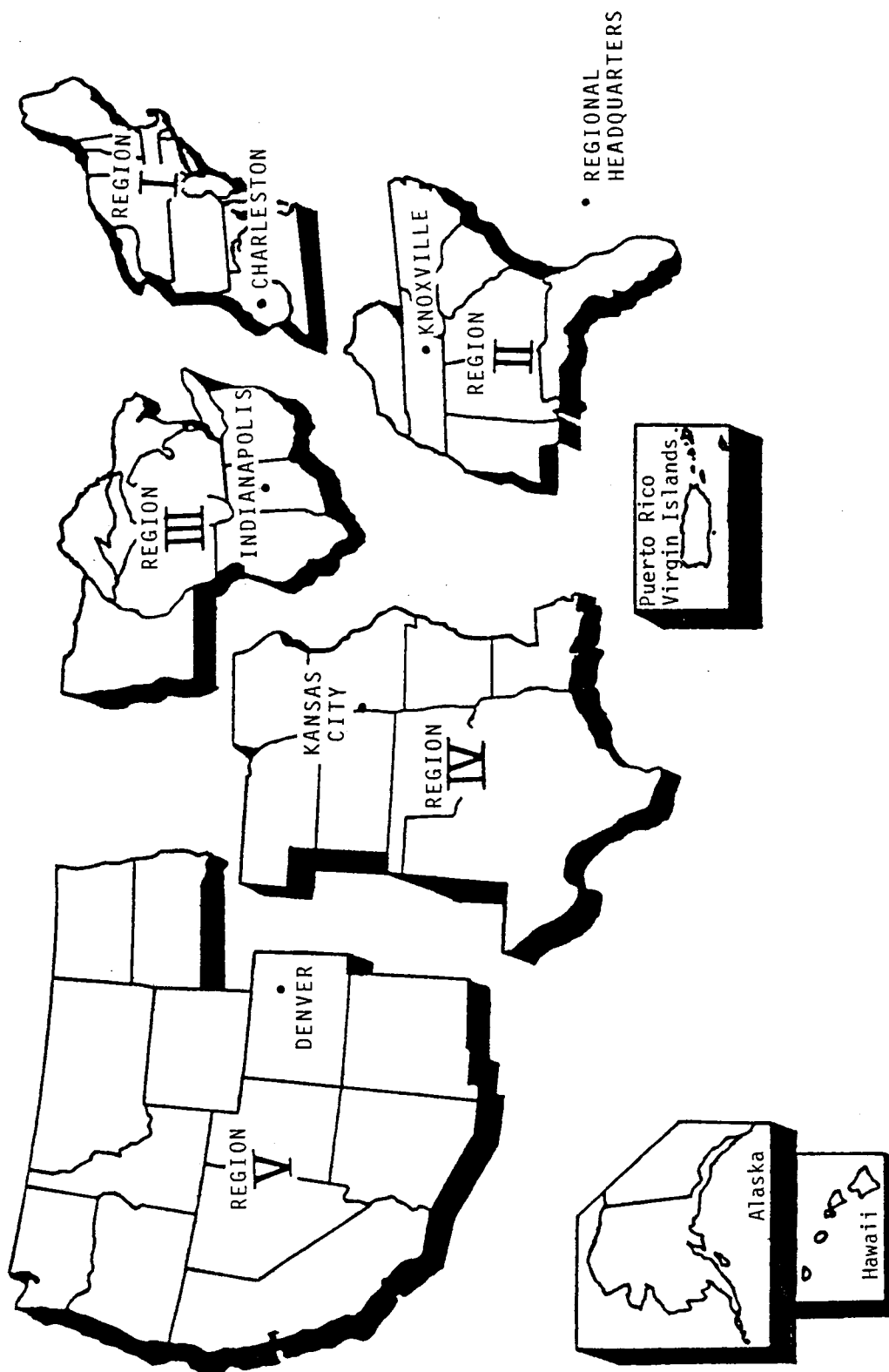


Figure 3.5. OSM's Regions of Operation.

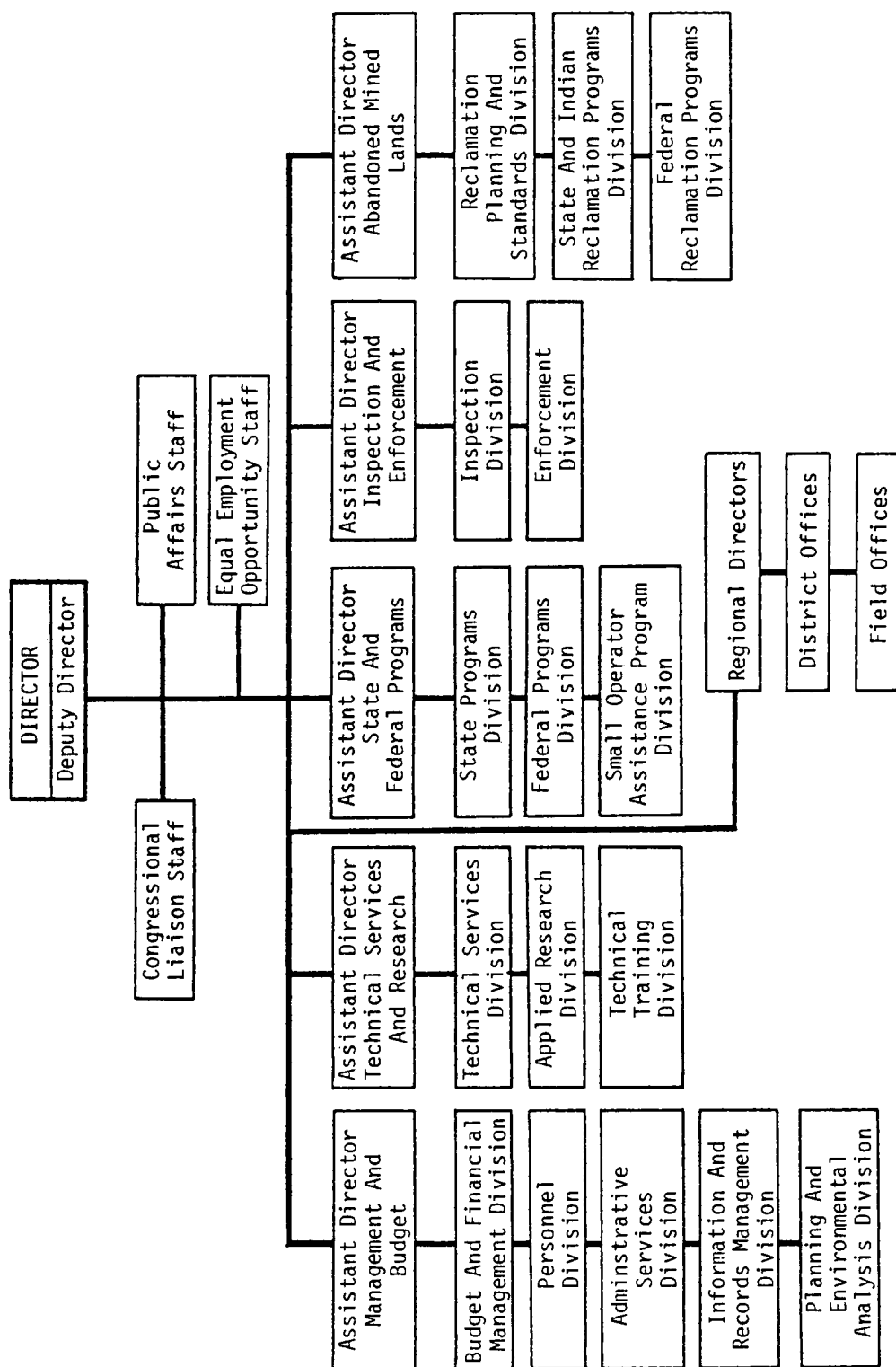


Figure 3.6. OSM Organization Chart.

sent surface mining bills to President Ford on two previous occasions, the task force perceived that both houses of congress supported the SMCRA. Further, President Carter had expressed openly his desire for tough legislation on this issue. In fact, upon signing the SMCRA, he expressed disappointment that the bill was not as stringent as he would have preferred. The task force internalized these actions as support for a tough regulatory posture.

Also, many of task force members were sympathetic toward an environmental protection philosophy. A few of them had been active in the movement to correct the past abuses of surface mining. A portion of this abuse was attributed to the states' inability to effectively regulate the industry. Hence, for these individuals, the objective of the task force became imbued with a sense of mission and a commitment toward "reforming" both the recalcitrant surface mining industry and the historically lax enforcement record of many states (Shover et al., 1982). Related to this reformist ideology was the assumption that because the industry, and many of the states, had resisted federal legislation from the beginning, they would continue to contest the OSM's actions in court once enforcement activities began. Thus, there was a desire among members of the task force to create a set of regulations that were legally defensible (Shover et al., 1982).

In addition to these perceptual and ideological biases among the task force members, there were temporal and budgetary constraints which shaped the agency's eventual selection of an enforced compliance stance. The SMCRA, as noted earlier, mandated that the OSM begin enforcing a set of interim regulations within 90 days after enactment

of the law. Further, within one year of this date, the agency was to produce the permanent regulations (PL 95-87, s 501). Thus, when the Act was signed by the President, the task force was under considerable pressure to produce and begin enforcing the interim regulations. To compound the problems of the Act's mandated deadlines, Congress delayed budget appropriations and operating funds for the OSM. It was seven months before the agency received its resources. Because of these constraints, the task force increasingly opted for "a highly centralized, disciplined process for accomplishing its work" (Shover et al., 1982: 92-3).

Thus, several factors combined to shape the agency's selection of enforcement styles. There was the underlying assumption that Congress and the President supported a tough regulatory stance. The vociferous struggle to pass surface mining legislation had created a context of high public visibility and scrutiny by interested parties. Further, the mandated time deadlines of the Act and the delays in funding forced the agency to cut corners when organizing the agency and promulgating the interim regulations. Also, the reformist, environmental ideology of many task force members contributed to a growing desire to develop a tough regulatory posture. And, finally, the decision to create a set of legally defensible regulations that could with stand the anticipated court challenges of the industry helped channel the agency toward an enforced compliance stance. Together, these factors, which occurred at the environmental and organizational levels, constrained the agency's development of their

inspection and enforcement program; it is to this facet of the agency that we may now turn.

CHAPTER 4

OSM'S INSPECTION AND ENFORCEMENT PROGRAM

In this chapter, we examine the OSM's inspection and enforcement program. Its organization reflects the agency's decision to adopt an enforced compliance stance. We present the inspection and enforcement program from its beginnings. The organization of inspection work is discussed along with an examination of the agency's enforcement activities. Also, we examine data on inspector's attitudes toward the regulated, their enforcement duties and the agency.

Program Mandates

The OSM's interim regulations for the conduct of surface coal mining were issued in December 1977 (42 FEDERAL REGISTER 44920-44957).³ Generally, they are detailed and rigid, intentionally written to minimize discretion by mining corporations and OSM personnel alike.

In accordance with the Act's mandates, the regulations required inspectors to conduct unannounced biannual inspections at every permitted surface coal mining operation in the United States. Additionally, private citizens could request special inspections if they suspected that a mining operation was not in compliance with the regulations. The interim regulations provided civil and criminal

³The OSM's interim regulations were enforced throughout the agency's period as the primary regulatory authority, the period studied here. The permanent regulations primarily serve as a model for the states' surface coal mining laws.

sanctions for operators who denied inspectors entry to their mine sites or access to any records deemed necessary for completion of inspections. Also, the interim regulations stipulated that OSM's inspectors must issue a NOV for every regulatory violation encountered during an inspection. A time limit of not more than 90 days was allowed in which the violation had to be corrected (i.e., put into compliance with the regulations). Further, if the violation was not corrected within the allotted time period, or if the inspector determined that the violation presented a significant, imminent threat to the health or safety of the public or to the environment, he was mandated to issue a cessation order shutting down all present and future operations on that site until such time as the violation was satisfactorily abated. Based upon the type of violation as well as its seriousness and degree of operator fault, monetary penalties were adjudged. The fines, which were assessed in OSM's centralized, Washington, D.C. Assessment Office, could be appealed at a later date in regional conference hearings.

Thus, the interim regulations, like the Act, mandated an inspection and enforcement policy that was consistent with an enforced compliance style of implementation. However, the regulations were not the only factor that contributed to the inspection and enforcement program's legalistic stance.

Selecting a Grassroots Enforcement Style⁴

One member of the headquarter's task force, who had an interest in the inspection and enforcement program, was asked to organize a special task group to begin creating the inspection and enforcement program. Because this individual was sympathetic to the environmentalist groups who had pressed for stringent regulatory controls, the decisions and subsequent policies of the inspection and enforcement (I & E) task group reflected an environmentalist stance.

Certainly, one of the most strongly held values among the I & E task group was a desire to protect the environment. Similar to other task group members, they felt this was the underlying intent of the Act. They were aware of the past abuses of surface mining and shared a belief in the continuing common use of environmentally harmful mining practices. Also, the members of the I & E task group generally agreed with other headquarters' personnel that a rigorous, uniformly applied inspection and enforcement program would deter such practices in the future. One of the initial headquarter's executives captured this feeling when he noted: "We were reformers."

Further, members of the I & E task group were convinced that many states' inability to regulate surface mining was due to lax

⁴The conclusions in this chapter, as well as the subsequent chapters, represent a cumulative narrative of the OSM's activities. It is an oral history provided by interview respondents. Each point stressed was supported by two or more respondents with an insider's perspective. None of these points were rejected by any of our respondents. The explanations given are interpretations based on interview data. Many of the interpretations in this chapter were worked out through discussions with members of the research team (Shover et al., 1982).

enforcement practices. They believed that the coal industry, historically, had operated in a lawless fashion and had become adept at evading the law. Hence, there was a strong desire to "take the rule of law" to the coal fields. One respondent put this idea succinctly:

I really came to believe that what was missing [under the states' program] . . . was just that [coal operators] were not told that "you're supposed to do it." . . . And that was the missing ingredient . . . One ought to do what the law says. It's as simple as that. And . . . eventually that relatively simple truth would get translated into a reality--of compliance.

This desire was reinforced by the knowledge that the OSM was to be the primary regulatory authority only until the states gained primacy. Hence, there was no need to plan for a prolonged system of cooperation with the regulated industry (Bardach and Kagan, 1982). In fact, setting an example for the states to follow remained a pervasive force even after the I & E program was put into effect. As one regional manager told us,

OSM literally had to lead the way, sort of show that this is what was going to be expected in the future when you [the states] get your turn . . . And you couldn't very well demand that of [the states] if you didn't demand it of yourself.

Also, of concern to the I & E task group was the behavior of grassroots personnel who would be charged with implementing the regulations on a daily basis. There was no insurance for the task group that the grassroots inspectors would share their philosophy toward regulation nor could they count on the inspectors' integrity in the field. Even if these concerns were unfounded, there was still the issue of inspector discretion. Discretion among inspectors, it

was felt, might lead to policy inconsistencies in a program that had been designed toward uniformity.

Obviously, the most effective means to guard against inconsistencies in the inspection and enforcement process was to minimize the likelihood of grassroots discretion. And, further, to ensure that when discretionary behavior was invoked, it would be consistent with the ideological beliefs of the agency's headquarters executives. By incorporating the procedural mandates of the Act into the regulations, the Washington task force further ensured that the law would receive maximum enforcement regardless of who did the inspecting. Hence, the OSM's headquarters executives charted a grassroots enforcement style from the outset. Meanwhile, members of the I & E task group began searching for an initial corp of inspectors who shared their enforcement philosophies and values. However, they were forced to move quickly due to the Act's relatively early deadline for implementing the regulatory program.

The Initial Hiring and Implementation of the Program

In general, the hiring of the initial grassroots inspectors was accomplished through contacts with other federal agencies and state-level administrators of regulatory programs. Also, there existed an informal network between members of the I & E task group and a number of attorneys and environmentalists who had been active in local and regional programs aimed at curbing surface mining abuses in Appalachia. Through these contacts, the task group was able to identify a group of potential inspectors who were experienced in the

regulation of surface mining and who shared the agency's philosophy regarding the I & E program.

For example, among those who were contacted, there was a retired state inspector from Kentucky. He had a strong reputation in Appalachia for his knowledge of the industry and his pro-environmentalist beliefs. Through a series of meetings with a leader in the I & E task group, he was hired by the agency. Subsequently, the job of selecting the initial corp of grassroots inspectors began to take shape. The former state inspector contacted individuals that he had met during his employment years with the state. As a result, many of the initial employment offers went to state inspectors or TVA (Tennessee Valley Authority) inspectors working in Appalachia. In an interview with this individual, he recalled how this process transpired during a meeting with an attorney and the task group member:

So, I went over and had a talk with _____ and _____, and that was the beginning of my part in the program. And not too long after that, of course I filled in my application and sent it out to Washington, and wasn't too long until I was hired and then started my trips down to Knoxville, back and forth, trying to get this whole program together. Of course, the first thing that we did was, the whole group of people that we had picked as the first people in the program, they were schedule to have two weeks training down in Madisonville, Kentucky and well, I was going . . . I'll show you later but I've got a photograph out there of the original 50 or 55 people there about, that started this whole program throughout the United States. Had their training down in Madisonville.

Q: Well, most of them were hired in this area weren't they? The first bunch?

A: The majority of them yes. The majority of them. Including the West Virginia boys that were hired, and _____ and the others from the Tennessee area.

Under the requirements of the SMCRA, the OSM was obligated to begin inspecting and enforcing the interim regulations on May 3, 1978. However, funding for the new agency was delayed seven months. As a result, the regions (see Chapter 3) were not adequately prepared in terms of the personnel or resources needed to begin the national program as originally planned. Most of the regions began their operations with temporary directors and skeleton crews of inspectors who operated out of their homes, drove their personal vehicles, and learned many of the agency's procedures in the field. It was several months before the I & E program began operating smoothly on a national level.

Life for the initial group was difficult because of the need to move quickly in implementing a program that was in the organizing process. As one "old timer" related his experiences to us,

So, we would come in on Monday morning and get all of our stuff that we figured we would need from the office and touch bases with the supervisor. Give him a rough itinerary of where we were going to be and we'd hit the woods and we, you know, we'd be gone until Friday. We'd come back in Friday, we mailed out own, we did all of our own certified mailing of citations and all that kind of thing. From the post office nearest your house. Did our paperwork at home at night. We were inspecting a lot of times from 7:00 in the morning until 8, 9:00 at night.

In addition to the long hours which often necessitated travel to isolated locations, the initial inspectors, for a time, functioned with a limited chain of command.

So, that's how we started. And we worked more or less out of our houses, it varied from one area to another. Depending on how long it took them to find office space and get the phones hooked up and so on and so forth.

Q: How long did you have to work out of your house?

A: Uh, about 8 or 9 months I guess because see, we had the region, we were at an advantage here because we had the regional office _____ was supervisor, he was acting head honcho because we didn't have a district manager, they didn't have a regional director, they didn't have a nothing. All they had was field supervisors and inspectors. And we had 11 inspectors I think to cover all of region II.

Even though the interim regulations were detailed, there was some uncertainty among the initial inspectors concerning their job duties. Some of this ambiguity was resolved during a two week training session in Western Kentucky approximately three weeks before the May 3, 1978 enforcement date. Inspectors met with members of the I & E task group to answer questions and plan enforcement strategies. For example, this group decided that the requirement to conduct two inspections at every mining operation in a given year would have to be suspended because of their sparse number. Also, because they anticipated a certain amount of hostility and resistance from operators, they decided to conduct their initial inspections in pairs. However, this idea was discarded soon after enforcement began, primarily once again, because of their sparse numbers. Efforts were made to organize a standardized inspection report that would serve as a guideline for inspections and for determining fines in the Washington Assessment Office. Later, these inspection reports were modified in the course of the inspectors' daily job routine.

Well, the forms that we made, when they say we made them up ourselves, we made up some forms you know had them typed up . . . The kind of information we thought should be on them went to the field solicitors and they added some things that they felt should be on them, sent them to Washington, let them look at them. And, they added some things and deleted some things and said, "Okay, you know, let's go with that for the time being."

While most of the planning efforts made during these meetings were altered later, they, nonetheless, helped organize the expectations and actions that were to follow. For example, the inspectors had planned to conduct initial inspections in pairs, but this plan was altered because of their limited numbers.

There are two additional functions that these meetings served for the new inspectors. First, they developed a strong sense of camaraderie among the inspectors. As one of the inspectors from the initial group noted:

And, boy, there's a bond between that first group that I don't think will ever, ever dissolve . . . Uh, the, the two weeks there in [Madisonville], I think developed such a strong bond in all of us that, that we're often referred to as the [Madisonville] group.

Second, along with the sense of "belonging" or camaraderie, the meetings engendered a sense of mission among the inspectors. The I & E task group had made an effort to recruit initial inspectors who shared their pro-environmentalist philosophy. Interviews with members of the initial group of inspectors indicates that this search was successful. For example,

Q: Do you think that all of you shared a similar environmental concern?

A: Yeah, there's no doubt about it . . . Not all of us, but for the most part yes. Yeah, I think well if you're like sitting on a fence and you had an operator pulling on one arm like this, and an environmentalist or a citizen pulling on the other arm like this, probably, we'd fall toward the citizen's side. And of course, you know, that was the, that was the basis of the Act.

Q: Right.

A: It's for protection of the environment and protection of the citizens of the nation, not for protection of the industry.

For many inspectors, this sense of mission or commitment was enhanced by their previous experiences with the coal industry. Most of them previously had worked for state regulatory programs and had experienced varying degrees of frustration in their jobs. They saw their OSM employment as an opportunity to establish a regulatory program that would be taken seriously by the industry--something that many of them believed had not been true of the state programs in which they had labored.

The feelings of camaraderie and sense of mission were important elements of support for the new inspectors since they received little reinforcement outside the agency. On the other hand, their clients in the coal industry naturally were resistive to any type of enforcement action, and they often labeled the inspectors as environmental zealots who were out to end surface coal mining in the United States.

Q: Did that cause a major problem for you when you started doing inspections, that you'd been cast as environmentalists?

A: Yes, it did. Of course we, a lot of us, rationalized the work that we were doing, and rightfully so. As being you know, that's the law and that's what it says in black and white, and so therefore, you've got to do it otherwise I would be breaking the law . . . it bothered all of us to be called environmentalists and birdwatchers and tree lovers and so forth. But we just had to kind of grin and bear it you know, and do our job. Just like the undertaker, somebody has to do it.

On the other hand, the anticipated support from local and national environmental and citizen groups did not emerge, at least from the inspectors' point of view.

When we first started out we thought that we'd get more support from the environmental community, from the citizen groups than we did. And thought that we'd find more of an ally in the environmental community. But it hasn't, it never came out that

way, you know, they just weren't there for the support that we were looking for. It was hard enough to, it was difficult to, to enforce [the regulations]. It was difficult to feel good about what we were doing because there was nobody, nobody out there backing us . . . In fact, we've been sued by the Council of Southern Mountains.

A: Uh huh.

Q: And all their satellite agencies. Their satellite environmental groups, and although it was a friendly lawsuit, nobody likes to get sued.

Increasingly, this led many of the initial inspectors to turn to each other for support.

Many people, many of our inspectors find solace, find comfort in fraternizing with their own kind. You'll find the coffee room in many OSM offices a very well liked place, very frequented. The place is very frequently used by inspectors. There's a fellowship, a bond between inspectors that I don't think you find in very many agencies. Perhaps that's the only, that's the consolation that the inspectors have.

Q: Does it become like an "us-they," "we-they" type of relationship?

A: Yeah, I think so. As bad as that sounds, but I think it does . . . Sure, it's, I think it's pretty well defined between us and them. As bad as that sounds. As bad as that sounds. But you can't blame the inspectors for getting into that groove because who else can they, can they turn to?

Together, these factors set the tone of the I & E program's initial enforcement style, a style which complimented the agency's strategy of enforced compliance. None of the initial inspectors that we interviewed expressed regrets about the decision to adopt an enforced compliance style. Typical are the comments of an initial inspector who later became a district manager:

I think though really that probably the approach, what happened was the best that could have happened.

Q: Why is that?

A: Uh, looking back at it in retrospect, I think that perhaps, you know, what I'm trying to express here is a point of view that I've heard on occasion by people; the best way to do it [enforce the regulations] was to put the fear of OSM into the operators right off at the beginning. And really do a bang up job in terms of enforcing the law. So that, that would carry over until staffing was complete and the housing was found and office space was obtained and equipment issued and so forth . . . I guess what I'm saying is that, it's just like in modern day warfare; one dozen guerrilla soldiers can do as much harm or as much good for a campaign as a whole battalion of regular soldiers.

Throughout the OSM's first three years of operation, their determination to promote better reclamation and environmental protection for future generations remained strong. It was an important component of their socialization. Although subsequent groups of inspectors were trained and supervised by this initial group, these beliefs lost much of their impact. However, the sense of mission remained strong among the initial inspectors. Thus, by May 1978, when the agency first began inspecting mine sites, a combination of circumstances had produced an agency and personnel with a clear, perceived mission to protect the environment by rigorous, non-discretionary rule enforcement.

Although the preceding discussion focused on the agency's initial corp of inspectors, there were three distinct groups or "waves" of inspectors hired by the agency. The last two waves were hired after the regions had established their offices. However our questionnaire showed that the hiring was staggered over a period from Spring 1978 to June 1980 with significant clusters at each hiring wave.

Inspectors and Their Work

A Profile of OSM Inspectors

Although the OSM employed approximately 220 inspectors during their peak enforcement period as the primary regulatory enforcement authority, there were 158 inspectors working for the agency during the Summer of 1981. The primary reason for the decrease in numbers was due to the Reagan administration's re-organization of the agency. Table 4.1 presents summary descriptive data on the 126 inspectors who responded to our questionnaire.

Based on our questionnaire data, the average OSM inspector was about 32 years old at the time of his employment. (Because the OSM inspectors are almost entirely white men, we omitted questions on sex and race.) Eighty-seven percent came from rural or small town backgrounds (n=109), and 80 percent grew up in households whose heads did not work in the coal industry (n=100). Still, 63 percent had some experience in the regulation of coal mining before joining the OSM (n=79).

Seventy-five percent of the inspectors held bachelors degrees (n=94), primarily in environmental management (n=47) and plant and animal sciences (n=31). Generally, these areas emphasize a conservationist or environmental protection perspective. Given their undergraduate education, we would expect the inspectors, as a group, to espouse a strong environmental protection approach. However, items in our questionnaire that, conceivably, measure the degree of environmentalism among respondents, produced anomalous findings.

TABLE 4.1

SUMMARY DESCRIPTION OF OSM INSPECTORS -- JUNE 1981

Variable	$\bar{X}$ Score	<u>S.D.</u>	N
Age at Employment (years)	32.02	8.43	126
Length of Employment (months)	29.41	6.51	126
OSM Training Prior to Certification (months)	4.16	2.29	96
<u>Percent</u>			
Background:			
Rural/Small Town (pop. < 2,500)	56%	70	
Small Town (pop. 2,500 - 100,000)	31	39	
Large City (pop. > 100,000)	13	16	
	<u>100%</u>	<u>125</u>	
Pre-OSM Experience in Coal Regulation	63%	79	
Education:			
High School/Some College	25%	32	
4 Year College Degree	48	61	
Some Graduate Work	16	20	
Advanced Degree	10	13	
	<u>99%</u>	<u>126</u>	
College Major:			
Earth Sciences ^a	14%	14	
Plant/Animal Sciences ^b	30	31	
Environmental Management ^c	45	47	
Other	10	11	
	<u>100%</u>	<u>103</u>	

^a Includes degrees in geology, engineering, natural science, etc.

^b Includes degrees in biology, agriculture, zoology, etc.

^c Includes degrees in forestry, wildlife management, mining reclamation, etc.

We asked the respondents to make a choice between: (1) increased environmental protection, or (2) increased economic growth and development for the United States. Of the inspectors who answered this question, 88.5 percent (n=100) selected the environmental protection option. Hence, the OSM's inspectors would appear to identify with the environmentalist and citizen groups who sought passage of the law. However, we also asked the inspectors to rank order four groups in terms of how important it was to them personally that each group thought they were doing a good job. The findings from this question do not appear to coincide with the previous question.

The four groups that inspectors were asked to rank included: coal operators, co-workers, supervisors and environmentalists. If we assume that the previous question indicated the degree to which inspectors identified with a pro-environmentalist philosophy, we would expect them to view environmentalist groups as a more important reference group than the coal industry. Our findings do not support this conclusion. As the data in Table 4.2 shows, we found that inspectors ranked environmentalist groups lower than the other three in terms of the group's approval for their job performance. In fact, by looking at the modal responses for the four groups, we find that inspectors ranked the groups in the following order (with one representing the most important group and four the least important): (1) supervisors, (2) co-workers, (3) coal operators, and (4) environmentalists.

There are several explanations for these findings. First it is possible that inspectors simply identify more strongly with the

TABLE 4.2
RANK ORDER OF GROUPS WHOSE APPROVAL IS DEEMED IMPORTANT
TO OSM'S INSPECTORS

Group [*]	$\bar{X}$ Score	Mode
Supervisors	1.9	1
Co-Workers	2.3	2
Coal Operators	2.6	3
Environmentalists	3.2	4

N = 126

* Inspectors were asked to rank the groups from 1-4, with 1 representing the most important and 4 the least important group.

regulated than with environmentalist groups whose basic philosophy they have internalized as a result of their undergraduate degrees and employment experiences with the OSM. However, additional data from our questionnaire suggests that inspectors do not share the coal operators basic complaints against the OSM's regulatory program. First, 80.6 percent (n=100) of the inspectors felt that the OSM's regulatory program was fair to the coal industry. Also, 75.4 percent (n=95) of the inspectors felt that the OSM's regulatory program had no impact on the cost of coal production. Hence, the inspectors do not identify with the problems and complaints espoused by the coal industry. In fact, 77.6 percent (n=97) of the inspectors felt that the coal industry could not be trusted to mine their coal in an environmentally sound way.

A more plausible explanation takes into account the interview data touched upon earlier. Like the agency's initial wave, the majority of inspectors that we interviewed were disappointed with the general lack of support that environmentalist groups had given to their regulatory efforts. The Council of Southern Mountains sued the agency for its failure to conduct biannual inspections at every permitted mining operation (Council of Southern Mountains v. Andrus, U.S. District Court, D.C., Civil Action #79-1521). Also, evaluation studies by regional environmental groups found that the OSM's inspectors were not enforcing the interim regulations as stringently as they would have preferred (e.g., Johnson et al., 1980; Save Our Cumberland Mountains, n.d.).

Thus, the support that many inspectors anticipated from the environmentalist community was not forthcoming. And, further, when these groups did examine the I & E program, they found it to be lacking in the enforcement style they preferred. Yet, the majority of inspectors felt that they were enforcing the regulations to the best of their ability, and that their efforts had made a positive impact toward reclaiming the environment. Hence, many inspectors adopted a negative attitude not toward a pro-environmentalist philosophy but toward the groups who represented such ideologies. Typical of this attitude were the comments of one inspector who considered himself to be an environmentalist:

[A]t times, the environmental groups turn out to be more antagonists than the industry.

In sum, the inspectors could understand why the industry complained about the OSM's I & E program, but attacks from the environmentalist side were not in line with their own perceptions. As a result, inspectors became increasingly isolated from outside pressures and turned to co-workers and supervisors for support.

Inspector Training

Before assignment to one of the agency's five regions, inspectors attended a formal OSM training school in Beckley, West Virginia. This training lasted two weeks and focused primarily on familiarizing inspectors with the agency's mechanics. Inspectors learned how to fill out the inspector reports and statements that they would use to document violations. They also were introduced to the basic skills needed to conduct inspections (e.g., reading mine plans and

topographical maps, drawing soil and water samples for lab analysis). However, the utility of this training should not be over emphasized. For example, the agency's INSPECTION MANUAL, which was to be used in the formal training classes was not issued until February 1980, almost two years after the agency's May 1978 starting date (OSM, 1980). Even then, it contained only one chapter; the other four chapters were "to be issued at a later date." Apparently, this date never arrived as the inspection manual was never completed. Also, because many inspectors already had experience in the regulation of coal mining before joining the OSM (63.2 percent), the bulk of information they received during this training was of secondary value. Our questionnaire showed that 65.3 percent (n=77) of the inspectors felt that their formal training was of little value.

Once the formal training was completed, inspectors were assigned to an office in one of the OSM's five regions. Before they were certified to conduct inspections on their own, they underwent a period of on-the-job-training. While this training often lasted up to 12 months, our questionnaire data show that inspectors averaged four months of on-the-job-training. Throughout this period, new inspectors accompanied and observed their co-workers during mine inspections. Also, they completed their own inspection reports which supervisors could examine and compare to the actual reports for evaluation of the inspectors's progress. When supervisors determined that inspectors were ready to conduct inspections on their own, they normally were assigned to specific areas within their region.

Inspecting a Mining Operation

Ignoring inter-office variation, our interview data and analysis of agency statistics permits a general overview of inspector's daily routine. Inspectors averaged between three and five inspections per week, depending on the distance between inspection sites and the size of the mining operation. Each inspection normally required one to two hours of preparation. The preparation time was spent reviewing an operation's mining plans.

Inspectors generally followed a routine during an inspection. Arriving unannounced at the mine site, they first reviewed the operation's log books and mining records. Following this, inspectors "walked" the mine site, usually with someone from the company. Inspectors took notes and photographs for use later in documenting the inspection.

After walking the site and noting violations, the inspector met with the company's representative to review any enforcement actions. Violations and abatement requirements were discussed, and a copy of each NOV was given to the company. Analysis of the agency's weekly inspection statistics from June 1, 1978, to December 31, 1981, show that its inspectors averaged 11.29 NOVs per inspector (OSM, 1978-1971). A breakdown of inspection activity for the OSM is presented in Table 4.3.

The inspector then set a deadline for correcting the violation. At the end of this period, the inspector conducted a follow-up visit to determine if the company had corrected the violation. The

TABLE 4.3

OSM INSPECTION AND ENFORCEMENT ACTIVITY PER INSPECTOR--JUNE 1978 TO DEC. 1981

Time Period	Inspectors ^a	Notice of Violation		Cessation Order	
		# of NOVs	NOVs per Inspector	# of COs	COs per Inspector
Jun 78 - Dec 78	98	776	7.92	134	1.37
Jan 79 - Jun 79	181	1,469	8.12	274	1.51
Jul 79 - Dec 79	206	2,993	14.53	541	2.63
Jan 80 - Jun 80	209	3,797	18.17	812	3.89
Jul 80 - Dec 80	198	3,150	15.91	808	4.08
Jan 81 - Jun 81	171	1,330	7.78	396	2.32
Jul 81 - Dec 81	157	1,038	6.61	222	1.41

^a Number of active OSM inspectors certified to conduct mine inspections during the median date indicated.

Source: OSM, 1978 - 1981.

inspector terminated the NOV if the violation was abated properly within the set time period. However, the assessed fine was not affected by this action. If the company failed to meet the time deadline, the inspector (1) extended the deadline; (2) issued an additional NOV; or (3) issued a CO if corrective measures were not forthcoming. If the inspector did not issue an NOV or CO during his initial inspection, no inspector could conduct another inspection at the mine site for six months unless a citizen complaint was issued.

Inspectors devoted one to two days each week to filing reports for completed inspections. Inspectors are required to file not only a detailed report of any violations encountered but also, they must complete an "inspector's statement" which contains a detailed account of what transpired during the inspection. These documents included the technical aspects of each violation as well as the existing weather conditions, the degree of operator negligence, and even the operator's attitude toward the inspector. The reports were sent to the agency's Assessment Office in Washington, D.C. and provided the basis for determining the amount of civil penalty assessed for each NOV.

Supervision

In general, eight to 15 inspectors were assigned to each OSM office. The small number of inspectors facilitated direct supervision.

The bulk of OSM's supervisors were former inspectors who had joined the agency during the initial hiring wave. Although variations

do exist in the degree of emphasis, most of the supervisors shared the headquarter's philosophy for uniformity and strict adherence to the regulatory mandates. That is, the majority of the nine supervisors we interviewed expressed a strong opposition toward inspector discretion.

Q: Would you want your ideal inspector to be very dogmatic or open minded to where discretion might be used during an inspection?

A: You're getting back there to what my personal opinion of how a program should be implemented and my personal opinion both as having been an inspector and also of having had the problems of being a supervisor, trying to get somebody else to do the work, is that you can't give an inspector that kind of latitude in the field and have a meaningful program. Because if you've got ten inspectors out there, you're going to have ten different versions of the law being enforced. It's not fair, it's not fair to the other inspectors in the first place because some of them are working harder than others. And it's not fair to the operators because some of them are going to get written up for things that others won't. And it makes it almost impossible to run a program from the supervisor's point of view because you, if your inspectors have that kind of leeway, you have no way of following your inspectors up to find out whether they're doing their job or not.

Q: So, you need to have the uniformity, right?

A: You've got to have uniformity.

The OSM supervisors employed formal and informal control mechanisms to minimize inspector discretion. To avoid undue familiarity with specific coal operators and mines, supervisors rotated these areas among inspectors. Also, supervisors regularly examined inspectors' files, photographs and reports for discrepancies.

Q: How often do you spotcheck? Is that a regular routine?

A: As a general rule in OSM, yes it is.

Q: Is that a formal rule or is that a more of an informal rule?

A: Well, nobody has told me to do it, but that's the way during the staff meetings and things like that, that's the way that

we've decided in this district to control our people. You can, an inspector can put anything he wants to in the inspection report. I mean, just reviewing, I review every inspection report, every modification, vacation, termination and citation, either NOV or CO that they issue. And that gives you a pretty good feel for what they're doing in the field. But still yet, if you don't follow up on them every once in awhile, you really don't know for sure what they're doing.

As the above quote points out, periodically, supervisors followed-up their inspectors by conducting their own inspections of the mine sites. In general, supervisors feared the extensive use of grassroots discretion because it opened up the possibility for circumventing the OSM's policies regarding consistent application of the regulations. This feeling was especially true for supervisors who trained the second and third waves of inspectors. As another supervisor noted, "I think if the discretion had been there for a lot of young inspectors to begin with, it may have been abused."

Many offices posted statistics on enforcement activities for their inspectors as well as those of the other regions. Though no formal policies were associated with these statistics, often they operated as an informal means of self-evaluation. A number of interviewed inspectors expressed a need to meet or exceed the quotas. They viewed the quotas as the "agency's" rates. For example, one inspector told us,

They [supervisors] had, what was it, an "inspection per violation ratio" that they plotted. And, yes, you used to have to, I don't know whether, they never really told us that, but you know, if you're, once you saw the graph, you know, you sort of felt that you should write a few more [NOVs] or not write so many or . . .

Q: Yeah, well how did that make you feel?

A: Well, at first you know, I had no problem with it because you know, they told us to write every violation you see, which I did, and I, my quota was just right at the mean.

In later chapters, I will explore further the impact of the OSM's supervisors on the enforcement styles of their inspectors. This impact should not be underestimated. As the data in Table 4.2 suggests, the inspectors were concerned with obtaining favorable responses from their supervisors. Also, the relatively low inspector to supervisor ratio that we found in the agency suggests that supervisors were able to monitor their personnel rather closely. This conclusion is supported by our interviews. Close monitoring by, and strong support from, field supervisors was an important concern among the agency's upper-level managers and headquarters executives. Many of these individuals felt that the states' inability to enforce surface mining regulations had been a result of lax supervision and low support from within the inspector's chain of command. As one regional manager noted,

[E]verybody felt that . . . a fairly strict state inspector could go out and would be undone by his supervisors up above . . . We weren't going to permit that.

Documenting Inspector Discretion

Attitudes Toward Discretion

In our questionnaire, we asked inspectors several questions related to their attitudes on discretionary versus non-discretionary enforcement of the interim regulations. Additionally, the inspector's response were broken down by their length of employment with the OSM

and whether they had any previous experience in the regulation of coal mining prior to their OSM employment.

Research on grassroots discretion suggests that discretionary behavior is a necessary component of an enforcement agents' work role because of the situational contingencies encountered with client's cases (Lipsky, 1980). Also, if inspectors feel the regulations are unfair or burdensome to the regulated, they will be more likely to use discretion (Kelman, 1981). Finally, if inspectors believe that the regulated are honest businessmen who would abide by the regulations without penalties, they are more likely to use discretion when conducting inspections (Kagan and Scholz, forthcoming). Our data permit a partial evaluation of these conclusions (see Table 4.4).

We asked inspectors two questions related to their perceptions of the coal industry. First, we asked inspectors if coal operators would comply with the OSM's regulations if the threat of civil penalties were not present. Overwhelmingly, the inspectors felt that the threat of fines were a necessary component in gaining rule-compliance (70 percent). Second, we asked the inspectors if coal operators could be trusted to mine their coal in an environmentally sound manner. Again, the inspectors indicated suspicion of the industry with 77.6 percent agreeing that the industry could not be trusted. Moreover, as noted earlier, 80.6 percent of the inspectors felt that the OSM's interim regulations were fair to the industry. Given these responses, we would expect that the OSM inspectors would be likely to favor the enforced compliance style of enforcement.

TABLE 4.4

OSM INSPECTORS' ATTITUDES TOWARD THE COAL INDUSTRY
AND THE INTERIM REGULATIONS

Question	RESPONSE					
	Agree		Undecided		Disagree	
	Percent	N	Percent	N	Percent	N
Without the threat of fine, inspectors would be unable to gain compliance from most coal operators.	70.0%	83	7.3%	9	22.8%	28
Most coal operators can be trusted to do the right thing and to mine their coal in an environmentally sound way.	18.4%	23	4.0%	5	77.6%	97
On the whole, OSM's interim regulations are fair to the coal industry.	80.6%	100	4.8%	6	14.5%	18

N = 126

In order to assess the inspectors' attitudes on discretionary policies we asked them a number of questions related to their work. Tables 4.5 and 4.6 present the findings of these questions. When we asked inspectors to take a position concerning the need to use discretion to produce the fairest results, the majority selected a moderate position that favored more than limited discretion (67.5 percent). While a slight majority indicated that they had tried to enforce the interim regulations strictly and uniformly (55.3), a larger proportion felt that OSM's strict enforcement policy was not an effective regulatory strategy (73.4 percent). Further, although inspectors generally felt that the enforcement process would have been fairer if more discretion had been allowed (65.5 percent), there was no consensus on whether an informal as opposed to a stringent enforcement approach was an important determinant of whether an inspector was good at his job.

In sum, the inspectors who responded to our questionnaire, while favoring a more discretionary approach than had been allowed (practiced), were divided on their image of the model inspector (discretionary versus rule-bound). More importantly, the inspectors' attitudes toward discretion, when compared to their attitudes toward the regulated and the interim regulations, do not "fit" the expectations which the literature on grassroots inspectors would appear to suggest (e.g., Thomas, 1980). One possible reason for the anomaly might be related to the inspectors' prior experience in the regulation of coal mining. However, when we adjusted for the

TABLE 4.5

OSM INSPECTORS' ATTITUDES TOWARD DISCRETION

QUESTION:

How much discretion is necessary to enforce OSM's regulations fairly?

RESPONSE:

	Percent	N	Response Categories
	1.6%	2	No Discretion is Fairest
	16.7%	21	Limited Discretion is Fairest
	67.5%	85	Moderate Discretion is Fairest
	14.3%	18	High Degree of Discretion is Fairest
TOTAL	100.0%	126	

TABLE 4.6

OSM Inspectors' Attitudes Toward Enforcement Styles

Question	RESPONSE					
	Agree		Undecided		Disagree	
	Percent	N	Percent	N	Percent	N
Mandatory NOVs on every observed violation is not an effective regulatory strategy.	73.4%	91	4.8%	6	21.8%	27
The enforcement process would have been fairer if more discretion had been permitted.	65.5%	80	10.7%	13	23.8%	29
I have tried to enforce the interim regulations strictly and uniformly.	55.3%	67	6.6%	8	38.0%	46
Inspectors who enforce the regulations in an informal manner are better at their job than inspectors who adhere strictly to OSM's formal procedures.	46.4%	58	18.3%	23	35.2%	44

inspectors' occupational background, we found no significant variations in the data.

When the data in Tables 4.4, 4.5 and 4.6 were adjusted for the OSM's three hiring waves, significant variations became evident (see Table 4.7). In general, the agency's initial corp of inspectors (wave #1) adhere more strongly to headquarters' perceptions of the industry, the regulations and effective enforcement strategies. Also, with each additional wave of inspectors, this adherence to the agency's initial enforced compliance strategy becomes weaker. Hence, the newer the inspector to the OSM's I & E program, the more likely he was to adopt a favorable view of the industry. Likewise, he would be more prone to view the regulations as unfair to the industry, and to advocate the need for, the use of discretionary enforcement tactics.⁵

In attempting to account for this trend among inspector waves, two interrelated explanations are evident. First, it is likely that the commitment and sense of mission which was quite high among the OSM's initial inspectors was not as strong among subsequent waves. Second, the subsequent waves of inspectors entered the I & E program after the industry had been exposed to the interim regulations. Because the regulated had become more familiar to the OSM's regulatory presence, they may have been less hostile and resistive to inspectors and the regulations. While it is difficult to substantiate these

⁵This monotonic relationship holds for all but one of the eight items in Table 4.6, namely the fourth. Second wave inspectors took the polar position on the effectiveness of mandatory NOV's.

TABLE 4.7

MEAN RESPONSES FOR INSPECTORS' ATTITUDES BY OSM HIRING WAVE

Question ^a	Mean Responses				
	Wave			Total	
	1	2	3	$\bar{X}$	S.D.
Without the threat of fine, inspectors would be unable to gain compliance from most coal operators.	3.6	3.7	3.8	3.7	1.1
Most coal operators can be trusted to do the right thing and to mine their coal in an environmentally sound way.	*2.0	*2.1	*2.7	2.2	1.0
On the whole, OSM's interim regulations are fair to the coal industry.	3.8	3.8	3.7	3.8	0.9
Mandatory NOV's on every observed violation as not an effective regulatory strategy.	*3.3	*3.9	*3.6	3.6	1.2
The enforcement process would have been fairer if more discretion had been permitted.	*3.3	*3.6	*4.0	3.6	1.2
I have tried to enforce the interim regulations strictly and uniformly.	3.4	3.1	3.0	3.2	1.1
Inspectors who enforce the regulations in an informal manner are better at their job than inspectors who adhere strictly to OSM's formal procedures.	*2.7	*3.4	*3.6	3.1	1.2
How much discretion is necessary to enforce OSM's regulations fairly?	*1.8	*2.0	*2.1	1.9	0.6
N =	53	47	26	126	

^a The response categories to these questions are contained in Tables 4.4, 4.5 and 4.6.

* Significant difference in means, $p < .05$.

explanations, the literature on regulatory inspectors offers limited support.

Kelman's (1981) study of OSHA inspectors found that infusing inspectors with a sense of mission contributes to more stringent enforcement behavior. This finding fits with our first explanation for the OSM's inspectors gradual shift in attitudes. Support for the second contention may be found in Kagan's (1978) discussion of regulatory enforcement styles. Kagan noted that:

Inspectorates, in turn, confronted with rising legal contestation and challenges to their authority, respond with enhanced mistrust and legalism (Kagan, 1978: 7).

While Kagan's conclusion would certainly be true for the initial wave of inspectors, the converse should be equally applicable to the attitudinal shifts in the later waves. We will return to these issues in chapter seven; however, first it will be useful to examine the points at which inspector discretion may occur in the OSM's regulatory matrix.

The Nature of Inspector Discretion

Even though we were not able to accompany the OSM's inspectors during their regular work routines, 24 interviews with inspectors focused upon the issue of grassroots discretion. Our examination of these interviews found that discretionary practices are visible at three stages of the inspection process.

The first occurs when an inspector decides whether to issue a NOV for an observed violation. All inspectors insisted that serious violations never were ignored. However, five respondents acknowledged

that on occasion they ignored minor violations (e.g., missing entries in log books, fallen perimeter markers). In deciding whether a violation was minor, inspectors usually assess the violation's environmental impact. For example,

[Y]ou take that violation and you say to yourself, "Okay, first, is it a violation? Secondly, does it have an impact; does it have environmental impact?" That would be some kind of discretion. If it doesn't [have an impact], then I don't [write it] . . . I'd say the big tool in developing discretion is asking yourself whether or not it does have an impact. And many times you can avoid a lot of hassle, you can get them to fix it a lot easier if you don't zap them for something that's minor.

Moreover, a majority of inspectors stated that if the violation could be corrected before the inspection was completed, a NOV usually was not issued.

This tactic was a relatively common gaming strategy among OSM inspectors, although it appeared to be more prevalent in some offices than others. For example, inspectors said that they often pointed out a minor violation to the company's representative indicating that it would result in a fine if processed. Then, the inspector tacitly offered to overlook the violation if the company corrected it immediately. Several inspectors told us that this tactic created a more harmonious working relationship with the operator and also enabled them to extract company promises to abate quickly more serious violations. The five respondents who admitted to ignoring minor violations indicated that this latter "trade-off" rationale was their motive for overlooking minor violations (cf., Hawkins, 1983). As one of these inspectors noted,

The whole idea of the law is to be compiled with, you know, and part of the discretion should be how the inspector gets that

operator to comply with it. Now if he has to use a piece of paper to get it done, fine. If he can tell the guy, "Okay, do it and do it now," and the guy goes and does it; why write a piece of paper [an NOV]? You know, it really doesn't do anything but make bad feelings between the inspector and the operator and toward OSM respectively, you know. Shoot, it's a lot better if I can go out there and say you know, "This is wrong, get it corrected," and he knows that, if he knows I'm going to write him if he don't do it, you know. We're getting the same, we're getting the same law . . . And then you get on a working relationship and you can keep most things corrected then.

Second, the outcome of inspectors' discretion was apparent when they set the time period for abating violations. The bulk of the interviewed inspectors told us that this could be used to punish or reward companies. When operators were perceived as cooperative toward rule-compliance, inspectors normally gave them a longer abatement deadline for correcting the violation. On occasion, inspectors "punished" uncooperative companies with short deadlines or refusals to extend existing deadlines. The comments offered by one interviewed inspector were typical of this strategy:

Q: How much difference does their [the coal operator] attitude make, like if they're really on your case you know. Does that kind of tend to lead you to say, "You've got 10 days instead of 60 days [to correct the violation]?"

A: Makes a big difference because I don't have to, don't have to extend the time to give him the maximum amount of time, 90 days. But if I go up there and I've given somebody a month or two months, and then I go up there and they haven't done anything, I'll just give them a CO for 30 days . . . But now, I can go up there, and if they haven't done anything but they have called me several times and said that they've had this problem with the weather and this problem with their equipment, then I'll give them more time. But their attitude makes a big difference.

Hence, this strategy was effective, especially when companies failed to meet the abatement deadline. In this instance, as the above quote points out, the inspector generally extended the deadline for

more cooperative companies. Companies considered to be recalcitrant offenders were sometimes issued an additional NOV (or even a CO).

The final outcropping of inspectors' discretion is visible in their documentation of violations. Inspectors confidently asserted that they could influence the size of the fine by the wording of their reports. This finding is supported by our questionnaire data. Seventy-two percent (n=89) of the respondents felt that the wording of inspector reports influenced the amount of penalty assessed for a violation. As one inspector noted, "your discretion comes in the inspector's statement."

When we asked how their reports influenced fines, inspectors suggested that the OSM assessors were responsive to certain words or phrases. By invoking such linguistic devices, without adjusting the "facts" or technical aspects of the violation, inspectors employed their discretionary powers within the regulatory structure. Thus, not only were inspectors aware of their reports' impact on the determination of fines; but also they were cognizant of how to effect this impact!

Environmental harm is one word that will really send the fines skyrocketing. If you've got environmental harm, you put that in the report, that'll really send it up there. Another thing is lack of reasonable care-which is negligence-and that's another thing that'll send the points up there.

Thus, although the OSM emphasized a non-discretionary stance, our analysis of the OSM points out that inspectors regularly employ discretion at several stages in the inspection process. And, further,

our questionnaire data indicates that inspectors generally favor the use of discretion when enforcing the regulations.

The Impact of Inspector Discretion

Although it was not possible to determine how often inspectors ignore violations or engage in the other types of discretionary behavior, data collected during the larger study of the OSM allowed us to examine the impact of agency discretion on the assessment of civil penalties. In the course of the larger study, we drew a purposive sample of coal mining corporations which had received civil fines for violations of the OSM's interim regulations.⁶ In examining the data from this sample, we found that smaller mining companies paid higher fines than larger corporations (Shover et al., 1982; Lynxwiler et al., 1983). Even when other influencing variables were controlled, company size was related inversely to the size of the fine ($r = -.16$). Stated differently, our analysis reflects a differential advantage for the more powerful sectors of the industry (see Clinard et al., 1979 for similar findings).

⁶From all mining corporations that received at least one NOV from October 1978 through March 1980, we drew a purposive sample of 83 mining companies. The sample was drawn to ensure approximately equal numbers of NOVs for small, mid- and large-size coal mining companies. The 83 firms received a total of 735 NOVs during the 18 months. Using records maintained by the OSM's Assessment Office, we coded variables related to the nature of the violation, the magnitude of the assessed fine, and the company's response to the assessed penalty. We focused on the relationship between the size of the offending corporation and the amount of the assessed fine (Shover et al., 1982).

This modest inverse relationship between company size and the magnitude of the fine suggests the presence of informal mechanisms of corporate influence on agency decision-making. Because the OSM's penalty assessment process is based on inspector reports, the fines elicited by the reports reflect systematic inspector perspectives toward offending corporations. We hypothesize that the social organization of agency-client encounters is structured by increased corporate complexity--a function of the power differentials rooted in corporate size (Long, 1979). Our interview data show that larger mining companies benefit from the fact that inspector-client confrontations are a match between salaried technicians in which large, but not small, industry has the upper hand. How does this process work?

Influences on Inspector Discretion at the Interactional Level

Research on the police (Muir, 1977; Sacks, 1972; Sykes and Clark, 1975) and regulatory inspectors Hawkins, 1983; Kagan and Scholz, forthcoming) indicates that enforcement personnel develop and employ typifications of their clientele to organize their work (Lipsky, 1980; Manning, 1977; Piliavan and Briar, 1964; Scheff, 1966). In fact, the invocation of discretionary strategies is largely a function of the stereotypic conceptions that enforcement agents develop about their clientele (Gregorio, 1978; Lipsky, 1980; Nivola, 1978).

Our analysis supports this finding. When we asked 24 inspectors to distinguish "types of operators," 22 did so on the basis of company size. For example, one inspector told us:

There's basically your large companies that are often cold to you, but you know they're going to contest every violation you write them . . . Whether they have a dog's chance or not, they'll still try. And then you've got your small operators that are real nice to you and bend over backwards. And as far as their image goes, they'll promise you the moon and never do anything. These are the worst of all.

As this suggests, OSM inspectors employ two perceptual distinctions between mining companies of different sizes. First, they claim that large companies are more likely to contest violations, especially in formal, extra-agency hearings. And second, they believe that large companies are more responsive than smaller companies (hence, cooperative) with regulatory demands.

Corporate Responsivness

Like the police, inspectors expect responsiveness from their clients. Generally, OSM inspectors believe that responsiveness in abating violations and company size are related. There are structural bases for this belief. Unlike small companies, larger ones usually possess the personnel, capital and knowledge to abate violations in a timely fashion. Also, inspectors view large companies as more concerned with their corporate reputation than are smaller companies. And, finally, inspectors believe that large companies are more likely than smaller ones to view regulatory intervention and monetary penalties simply as "part of the cost of doing business" (Clinard and Yeager, 1980: 124). As one inspector commented:

The larger companies are aware that this is their business. They're real business orientated type people to be in this, its a complex industry and they would like to--from what I've observed they would like to--comply. Well, I wouldn't say they would like to comply, but they don't want any violations or notices issued. And then in order to do that they need to comply to reclamations.

And the small operators--a lot of them try, but they don't have the technical background to or resources to know exactly what to do . . . [L]arger companies will have engineering staff that they hire to look specifically at, you know, violations that's been issued and how to go about correcting them as fast as possible. The smaller operations have consulting engineers that they contract, you know, to do their engineering work. And they're not there all the time and have trouble getting them. It seems to be a problem.

Responsiveness is important to inspectors since primary goals of any regulatory agency are rule-compliance and deterrence. Companies that respond quickly to correct regulatory infractions make the inspector's job less time consuming, therefore, easier to manage (cf. Nivola, 1978). In sum, larger companies are perceived as being responsive to the agency's operative definitions of regulations in the field. And, this responsiveness, is considered indicative of a willingness to operate in a responsible, cooperative and rational manner. As one respondent told us,

Generally you get better work out of some of the bigger companies. I'm able to talk to them. They've got people that, they're information people, they've got their own engineers. You run into a problem, you write them up and maybe they want me to meet their engineer or whoever and, you know, work the problem out in a rational manner. And not like some situations with maybe a small operator and you know you're the straw that broke the camel's back so to speak, and he's frothing at the mouth.

Due to their size, larger companies more often than smaller ones employ resident environmental specialists to monitor developments in the regulatory matrix, to stay abreast of advances and alternatives in reclamation practices, and to plan for reclamation in a legal, cost-effective manner. Like the OSM's inspectors, these specialized personnel are fellow salaried technicians. Generally, they are well educated and tend to accept the principle, if not the specifics, of

regulation. Also, their detailed and long-range understanding of mining and reclamation plans on particular mine sites gives them an advantage during negotiations with inspectors.

Research has highlighted the informal, negotiational nature of the criminal justice process (McClearly, 1975; Sudnow, 1965). Though structured by formal rules, such negotiations rely heavily on the typifications of the offender that interactants bring to the situation. Interactionally, these typifications function to define the offender as a particular type of person to whom a specific identity and set of motives can be attached. Thus, "The decision to invoke legal sanction is a process of determining the extent to which the individuals involved conform to the criminal stereotype" (Swigert and Farrell, 1977: 17). In this way, court officials selectively filter the legal and extra-legal aspects of a case to negotiate a consensual, stereotypic perception of defendants and their actions. More recently, Maynard (1982) examined the process by which legal (offense-related) and extra-legal (offender-related) factors are contextualized selectively in the plea-bargaining inter-actions of attorneys.

A similar process occurs during encounters between OSM inspectors and mine representatives. On a more structural level, the OSM inspectors operate with the assumption that they are the "reclamation experts" whose task it is to insure compliance with the regulatory statutes. This assumption is challenged by reclamation specialists of large mining companies whose knowledge at a particular mine site often is greater than the inspector's. Hence, inspectors are more likely to

treat them as equals when negotiating common definition of violations. In some cases, inspectors may defer to the reclamation specialists. One inspector we interviewed noted this possibility:

Q: Do the large companies ever intimidate you just because they have so many experts in each different field?

A: Sure.

Q: How do you deal with that?

A: Well, I, personally, am more careful. When I'm writing a violation, I'm real careful that I have the goods, so to speak, before I act . . . Which makes it difficult.

Q: Yeah, I would think so. Well, what do you do in that case, just concede to a greater amount of knowledge?

A: Well, I think in some cases I probably do, realistically.

Thus, within an encounter over infractions of the regulations, the reclamation specialists of large companies are able to "neutralize" the violation by "legitimizing" the company's violative behavior within a larger context. They can demonstrate how deviations at one point in the mining operation nevertheless are consistent with the spirit of the Act--protection of the environment. Because their knowledge of the operation's relationship to current mining technology and the regulatory statutes often rivals the inspector's knowledge, reclamation specialists, on occasion, can erode the inspector's position as "the" reclamation expert. In turn, this aspect of the inspector-specialist encounter influences the inspector's perception of the violation.

Corporate Intimidation

Additionally, large mining companies often challenge violations formally in agency conferences and in extra-agency administrative forums (i.e., the Office of Hearings and Appeals). The possibility of such challenges operates as an additional constraint. As one inspector commented:

Usually, the larger operators aren't violent toward you or hostile; you don't fear from them. But, they'll take you to court and fight everything you do.

Apprehensive lest their actions be subjected to a formal, extra-agency hearing, inspectors are more careful, and perhaps more lenient, throughout the inspection process. For example, words or phrases used in documenting inspection reports are selected not so much for the assessors use in determining fines but for the possibility of legal challenge before an administrative law judge. Thus, the threat of legal challenges outside the agency will effect the tone of the inspector's reports.

In sum, large mining companies and their specialized personnel, while less threatening to inspectors in the potentially assaultive style characteristic of some smaller firms, are threatening nonetheless. Often times they appear to be more knowledgable about the regulations than the inspectors themselves. This imbalance of knowledge, together with the threat of legal challenge and the greater responsiveness (hence, civility) of larger companies, makes for a degree of trust and deference which find expression in the inspector's use of discretion. Completing the process of differential corporate influence, assessors, relying on inspector's reports, adjudge the

violations of larger companies to be less damaging to the environment, and the companies themselves as less negligent than smaller companies.

Although the preceding discussion focused on the inspector's reports, the influence of company size may have an impact on inspector's decisions to ignore minor violations and the amount of time set for abatement measures also. When discussing these latter types of discretionary behavior, inspectors often noted that responsiveness and cooperation were important influences on their decisions. Hence, in a fashion similar to the above discussion, inspectors who associate responsiveness and civility with larger mining corporations may be more likely to ignore the minor violations of larger companies and set their abatement dates accordingly.

Summary

This chapter has described the OSM's I & E program and its grassroots personnel. Members of the I & E task group strove to organize an enforced compliance style of enforcement. Initially, their efforts to imbue inspectors with a sense of mission were successful, however, it appears that subsequent hiring waves were less likely to prefer an enforced compliance approach. As a group, the inspectors felt that interim regulations were fair. The outcropping of inspector discretion were explicated at three points in the I & E program. There is evidence to support the contention that variations in the size and complexity of coal mining firms affect the incidence of inspector discretion at the interactional level.

In the next chapter, we will explore the differences in enforcement styles that emerged in two of the OSM's regions. Although the structure and size of the coal industry varied considerably in the two regions, organizational variations also contributed to the differing enforcement styles.

CHAPTER 5

INTER-REGIONAL VARIATION IN ENFORCEMENT STYLES

In this chapter, we narrow the focus of my analysis to examine the variations in enforcement styles that emerged in two of the OSM's five regions of operation: Region East and Region West. Because our interview and questionnaire data from the last chapter suggested that variations in the size and complexity of the regulated industry are associated with inspectors' enforcement styles, we begin by describing differences among the surface coal mining industry in the two regions. Next, we present agency data on the regional variations for OSM's I & E program. Also, we present questionnaire data related to the variations in regional enforcement styles. In the remainder of the chapter, we examine the regions for additional factors that may have contributed to the differences in enforcement styles.

Surface Coal Mining: East and West

Surface coal mining in Regions East and West exhibits several important differences. Region East was located in the Appalachian coal region. As noted in Chapter 3, Appalachian coal is surfaced mined by thousands of small firms that must contend with thin coal seams, thick overburden, steep terrain and sparse rainfall. Historically, surface coal mining in Region East was characterized by lax state regulation and serious environmental damage (Brauson, 1974). Among some Appalachian coal operators, indifference and open hostility toward state regulatory programs was common. Also, "wild-catting"

mining without a permit--was a serious problem in some areas of Region East; however, its prevalence is difficult to determine. The abuses and environmental degradation of surface coal mining in Appalachia were a major reason for the passage of the Act (Shover et al., 1982).

OSM's Region West was located in the coal fields of the far west (see Chapter 3). In sharp contrast to the surface coal mining industry of Region East, western coal mining is concentrated in the hands of a relatively few producers; many of the mines are owned by power utilities and oil companies. Western coal production is typified by enormous surface mines, operating on relatively flat terrain in isolated areas. Also, western coal seams are much thicker than in Appalachia and the overburden is thinner. Moreover, average annual rainfall is much less than in the East.

Another difference between the two regions is the pattern of ownership. In the East, coal is either owned by the industry or leased from private individuals. However, the majority of western coal is owned by the federal government (President's Commission on Coal 1980). Other large portions are owned by the railroads and tribes of Native Americans. Hence, mining corporations in Region West have been accustomed to a federal regulatory presence over the past decade. Also, most state regulatory authorities and programs have enjoyed a reputation for honesty and stringency that was absent in the state programs of Region East (Shover et al., 1982). Western states were among the first to gain regulatory primacy under the OSM's permanent programs. Wildcatting never has been a problem in Region West.

Variations in Regional Enforcement

Due to regional inconsistencies in record keeping in the early months, we chose a twelve-month period from July 1, 1979 through June 30, 1980 to examine the OSM's inspection and enforcement performance in the two regions. Using the OSM's records, we were able to determine the number of NOV's and CO's for both Region East and Region West during the designated time period. During the specified time period; inspectors in Region East issued 3,254 NOV's and 901 CO's. Region West's inspectors issued 88 NOV's and 5 CO's. Given the structure of the coal mining industries in the two regions, the enforcement variations are not surprising.⁷ However, to facilitate comparisons between the regions, we can convert these numbers into rates of enforcement.

During 1979-80, Region East employed 60 inspectors while Region West employed only seven. When we convert the number of NOV's and CO's to rates (# per inspector), we find that Region East inspectors issued 54.23 NOV's and 15.02 CO's per inspector while Region West inspectors issued only 12.14 and 0.71, respectively.

Another comparative measure of enforcement activity for the two regions can be calculated using the total number of completed inspections. During the 1979-80 time period, Region East inspectors completed 12,451 inspections and Region West inspectors completed 378

⁷We were not able to obtain data on the number of inspectable units for each region during this time period. However, in 1981, there were 6,689 inspectable units in Region East but only 161 in Region West.

inspections. The resulting rates of enforcement are 2.62 NOV's and 0.73 CO's per ten inspections in Region East and 2.34 NOV's and 0.14 CO's in Region West.

A final comparative measure employs the amount of coal produced in the two regions as a base. Use of such a base measure can be defended as a surrogate measure of the total volume of earth that must be moved in mining operations. In turn, this serves as a reasonable measure of the total volume of mining activity that is potentially sanctionable. During the time period in question, coal operators in Region East produced 189.01 million tons of coal while operators in Region West produced 200.96 million tons of coal (U.S. Dept. of Energy, 1981; 1981a). Using these production figures as a base, inspectors in Region East issued 17.22 NOV's and 4.77 CO's per million tons of coal produced during July 1979 through June 1980. At the same time, Region West's inspectors issued 0.44 NOV's and 0.03 CO's per million tons of coal produced. Table 5.1 summarizes the various measures, including comparable statistics for all OSM regions.

Although the amount of regional variation differs, these rates of enforcement activity show that inspectors in Region East issued more NOV's and CO's than did their counter-parts in the West. It is possible that these variations in enforcement activity for the two regions, to some extent, may be the result of natural differences in the overall volume of sanctionable mining practices. Nonetheless, we still would expect that the inspectors in each region approach their work roles through distinctive interpretations. And, in turn, these

TABLE 5.1

SUMMARY MEASURES OF OSM INSPECTION AND ENFORCEMENT ACTIVITY BY REGION,

JULY 1, 1979 TO JUNE 30, 1980

Region	Number of NOV's per:			Number of CO's per:		
	Inspector	Ten Inspections	Million Short Tons of Coal ^a	Inspector	Ten Inspections	Million Short Tons of Coal ^a
East	54.23	2.62	17.22	15.02	0.73	4.77
West	12.14	2.34	0.44	0.71	0.14	0.03
Total (U.S.)	32.31	2.01	8.45	6.54	0.40	1.66

^a U.S. Department of Energy, 1981; 1981a.

interpretations become transformed into distinctive enforcement styles.

Inspectors' Attitudes--East and West

At the time our questionnaire was mailed, Region East employed 54 inspectors while Region West employed eight. We received responses from 44 inspectors in Region East (81.5 percent) and six responses from Region West (75.0 percent). There was no significant difference in the length of employment for the inspectors in the two regions ($\gamma = -.07$), nor did we find any significant differences for the other background variables (e.g., prior experience in the regulation of coal mining, inspector education). However, the inspectors' responses provide several interesting findings concerning attitudes toward their enforcement tasks.

In Chapter 4, we examined inspectors' attitudes concerning the regulations and the regulated industry. Table 5.2 presents mean responses for the two groups on these questions (means for all inspectors in our survey are included also). Even though neither group felt that the interim regulations were unfair, inspectors in Region East (mean = 3.9) felt that the regulations were fairer to the coal industry than did their western counterparts (mean = 3.0). Also, on three questions Region East's inspectors showed a consistent tendency toward greater suspicion of the regulated industry than did inspectors in Region West. They were more likely to view the industry as uncooperative toward rule-compliance (means of 2.1 and 1.8). When we asked inspectors if coal operators could be trusted to mine in an

TABLE 5.2
REGIONAL ATTITUDES TOWARD THE COAL INDUSTRY
AND THE INTERIM REGULATIONS

Question ^a	Mean Responses			S.D.
	Region East	Region West	All OSM	
On the whole, OSM's interim regulations are fair to the coal industry.	* 3.9	* 3.0	3.8	0.91
Most mine operators are uncooperative in their efforts to bring their operations into compliance with OSM's regulations.	2.1	1.8	2.3	0.93
Most coal operators can be trusted to do the right thing and to mine their coal in an environmentally sound way.	2.0	2.3	2.2	0.98
Based on your personal experience, how often do mine operators willfully and knowingly violate the federal regulations.	* 1.3	* 2.2	1.4	0.70
	N = 44	6	126	

^a The first three questions had the following response categories: 1, Strongly Disagree; 2, Disagree; 3, Undecided; 4, Agree; and 5, Strongly Agree; The possible responses for the last question were: 0, Very Frequently; 1, Frequently; 2, Infrequently; and, 3, Almost Never. Since the proportion answering "undecided" was small in all cases, means centered near 3 should be interpreted in terms of their direction rather than as equivalent to the modal responses.

* Significant differences in means, $p < .05$.

environmentally sound way, neither group expressed a strong degree of trust, although Region East's inspectors (mean = 2.0) indicated greater distrust of the industry than did inspectors in Region West (mean = 2.3). Finally, inspectors in Region East felt that operators were more likely to willfully and knowingly violate the regulations (means of 1.3 and 2.2, respectively).

Based on the two regions' rates of enforcement activity and their attitudes toward the regulations and the industry, we would expect that inspectors in Region East would be more likely to favor the OSM's enforced compliance style of enforcement than would Region West's inspectors. In order to measure this preference toward an enforced compliance style we constructed a scale from our questionnaire. The scale was designed to measure inspectors' preference for a legalistic, non-discretionary style of enforcement. The results of the three item scale are reproduced in Table 5.3. As expected, the scores of Region East's inspectors were higher than were the scores of inspectors in Region West (means of 4.95 and 2.33, respectively).

In sum, from these data, as well as inspectors and management interviews, it is clear that Region East's inspectors employed and favored a more enforced compliance style of enforcement than did their counterparts in the West. However, both regions were given the same mandate to enforce. In attempting to understand why the two regions developed different enforcement styles, our attention immediately is drawn to the extreme industry variations in the two regions. But there were other important differences between the two regions that

TABLE 5.3

REGIONAL VARIATION ON DIMENSIONS OF REGULATORY ENFORCEMENT STYLES

Dimension	Region East			Region West			U.S. Total		
	X Score	S.D.	N	X Score	S.D.	N	X Score	S.D.	N
Legalism ^a	* 4.95	3.05	44	* 2.33	1.63	6	4.59	2.57	126

^a A three-item scale (Cronbach's alpha = .67). Items are: "Generally the requirement that OSM inspectors write an NOV on every violation they observe is not an effective regulatory strategy" (0 Strongly Agree; 1 Agree; 2 Undecided; 3 Disagree; 4 Strongly Disagree); "The best way for inspectors to do their job is to go strictly 'by the book'" (4 Strongly Agree; 3 Agree; 2 Undecided; 1 Disagree; 0 Strongly Disagree); and "I have tried to enforce the interim regulations strictly and uniformly, much as a police officer would do" (4 Strongly Agree; 3 Agree; 2 Undecided; 1 Disagree; 0 Strongly Disagree). Responses to the three items were summed.

* Significant difference in means, $p < .05$.

contributed to their selection of enforcement styles. The remainder of this chapter discusses these variations.

Determinants of Regional Enforcement Styles--East and West

Variations in the Regulated Industry

The most obvious difference between the coal industry in Region East and West is related to their size. Because the mines in Region West are larger and complicated, their organization and staffing patterns are more complex than in Region East.

Most of the mines in the West have a resident environmental specialist, either at the mine or at least someone who is assigned those duties. A lot of the larger mines--most of them, in fact--have people who are trained in regulatory compliance functions. And those are the people you deal with. The people back in the East--at least when I was back there--the people that you deal with are the pit foreman or the mine superintendent, who's actually at the mine. And his main job is production . . . you're dealing more with production-oriented people in the East. And in the West, most of the people you deal with are not production oriented, but environmentally oriented.

As we discussed in Chapter 4, inspectors find that the reclamation specialists of large mines are more responsive to regulatory demands, more knowledgeable about the regulations and much more likely to be civil and "reasonable" toward inspectors. These factors, in turn, contribute to a more negotiational style of enforcement.

The import of this notion gains further support if we consider the relationship between the two regions' rates of enforcement and the attitudes of Region West's inspectors. First, across all comparative rates of enforcement activity, inspectors in Region West issued fewer NOV's and CO's. If we "bracket" the various other variables that may

have influenced these different rates, it appears that inspectors in Region West collectively displayed a more negotiational, flexible I & E program than did Region East. Certainly, their relatively low score on our legalism scale (Table 5.3) indicates that they were not strongly biased toward an enforced compliance approach. Also, their attitudes toward the industry reflect a more positive, somewhat favorable, regulatory posture than the inspectors from Region East. Finally, their rather neutral, middle-of-the-road, position toward the interim regulations suggests that they were not strong supporters of the Act's emphasis on design standards nor its approach to the I & E program.

Hence, we may conclude that inspectors in Region West adopted a regulatory stance that identified rather strongly with the regulated industry. Additional support for this conclusion is found in a comparison of the two groups mean responses to another question in our inspector survey. As noted in Chapter 4 (Table 4.2), we asked inspectors to rank order four groups in terms of how important it was that each group felt they were doing a good job as an OSM inspector.

In Table 5.4, we have produced the results of this question for the inspectors in Region East and Region West (mean responses for all respondents are included also). The mean responses of inspectors from Region East tend to parallel the population means. However, as Table 5.4 shows, Region West's inspectors ranked coal operators as a more important reference group than their supervisors, co-workers or environmentalists. Given the above discussion and supportive data, we may conclude that Region West's inspectors, as a group, were more

TABLE 5.4

RANK ORDER OF GROUPS WHOSE APPROVAL IS DEEMED IMPORTANT TO
OSM's INSPECTORS

Group *	Mean Responses			S.D.
	Region East	Region West	All OSM	
Supervisors	1.9	2.3	1.9	0.99
Co-Workers	2.3	2.5	2.3	1.00
Coal Operators	2.6	1.9	2.6	1.10
Environmentalists	3.2	3.3	3.2	0.88

* Inspectors were asked to rank the groups from 1 to 4, with 1 representing the most important and 4 the least important group.

supportive of the industry and reflected a more accomodative, flexible style of enforcement than was evidenced by inspectors in Region East.

However, in the East, the picture is reversed. Region East's inspectors are more likely to encounter production personnel during their inspections. Such individuals tend to be poorly educated, lack a detailed understanding of the regulations, and to be unsympathetic toward any interference with production activities and schedules.

Q: What are the relative advantages and disadvantages, from the inspector's standpoint, of having to deal with production people, as opposed to specialists in reclamation?

A: The guy, . . . the production people--you have to explain, re-explain. He doesn't even know what part of the regulations you're talking about. The reclamation guy, that's his job. I mean, you don't even have to, probably, cite the regulations. He knows it. In other words, he knows he may be incorrect. Or he knows how to articulate, "gee, I'm trying to do this instead of doing that. So I'm not in violation." He knows how to properly--for his side--articulate the argument against some sort of enforcement action. Or, he can demonstrate, "here's what we're doing, here's how the mine will proceed," you know. "Here's how I'm going to do this, and later, when I come around to this cut, I hope to take this point off and put the pond over here, relocate or divert." He can sort of look into the future, and look at what they did. He's knowledgable of those regs. Production guy--I mean, I've been on sites with inspectors where some of the simplest violations . . . has to be explained ten times. Often [the] production guy will take his reclamation plan and never look at it. Throw it in the truck, that's it.

Q: It's much easier to deal with specialists?

A: Right.

Q: Makes the job more manageable and, I would imagine, just less of a headache?

A: Oh yeah. Oh yeah. Oh yeah, that's for sure. Even if you get in an argument, I think it's less of a headache. At least you're arguing with someone who can articulate with you and speak to you on the level of the regulations, rather than "I hate these goddamned things. And I can't do anything with them and I wish

they were . . . They're a bag of shit and they're costing me a million dollars."

Another important difference between the coal industries in Regions East and West was their history of regulatory experience. Western operators, because they often mined on federally controlled lands, were used to a federal presence before the OSM began enforcement actions. Also, because of the prevalence of federal lands, the OSM was able to extract regulatory promises during the corporation's permitting phase. To a great extent, Region West personnel used their control over the mine permit process as an enforcement tool. Other regions, because they lacked control over permitting, necessarily relied more extensively on conventional I & E procedures.

An additional difference between the two industries was their respective attitudes toward the OSM. In the West, coal operators had grown accustomed to stringent regulation. Western states had a reputation for strong, environmentally sound enforcement. Although western coal operators did not welcome the OSM inspectors with "open arms," generally, they did not react with extreme hostility. However, in the East, and especially among the small coal operators, the reaction to the OSM's presence was different.

Inspectors in Region East were aware of the region's history of mining abuses and lax state regulation. Many Appalachian operators viewed the OSM's presence as an attempt to eliminate surface coal mining in the east (Lynxwiler and Groce, 1981). Many were marginal operators. Together, these factors produced a type of coal operator

who was not only resistive to the OSM's regulations but also, on occasion, prone to violence. Some of these operators had threatened or assaulted state inspectors in the past with relative impunity.

[Y]ou've got [one kind of operator] that practically won't talk to you at all. They just . . . you don't, you really feel uncomfortable around them 'cause you don't know--you're afraid they're going over the edge any minute. They practically won't talk to you, and consider you to be a Communist and everything else. But I've been fortunate, I haven't had too many of these kind. Usually this--your wildcat category is where these kind of operators fall.

Unfortunately, not all of the OSM's Eastern inspectors were as fortunate as this inspector. For example,

On March 7, Robert Hatmaker assaulted Bill McCreary, an OSM inspector . . . Hatmaker apparently threatened McCreary, who did not budge [from his car]. Hatmaker then opened McCreary's car door, and when he couldn't pull him out because the seat belt was fastened, he repeatedly punched McCreary in the face (Mountain Life and Work, June 1980: 37).

The result of such confrontations prompted OSM managers to call in law enforcement officers to protect their inspectors during visits to remote areas. While incidents of physical assaults on Region East's inspectors were not great, they were substantially higher than in the west. Between 1978 and 1982, Region East solicitors referred twelve cases to U.S. attorneys for criminal prosecution while their counterparts in Region West did not refer any cases.

As the preceding discussion points out, there were important differences between the two coal industries. Together, these differences contributed to variations in regional enforcement styles among inspectors. Inspectors in Region East were forced to deal with a less educated, more recalcitrant group of coal operators than were

Region West's inspectors. Also, inspectors in Region East did not have the advantage of an historically strong state program of enforcement, as was evidenced in the West.

In our questionnaire, we asked inspectors several questions concerning their attitudes toward the state's regulatory programs and the OSM's I & E mandates. Tables 5. 2 and 5.3 reported on some of these issues; however, in order to highlight the previous discussion, I have included four additional questions that touch on these issues. As the data in Table 5.5 show, Region East inspectors felt a stronger distrust of the state's programs and ability to regulate the coal industry than did Region West's inspectors. Further, inspectors in Region East, to a greater degree than Region West's inspectors, agreed with the agency's policies of civil fines and stringent enforcement of the regulations.

Up to this point our discussion of variations in regional enforcement styles has focused on differences in the regulated industry, and their impact on inspector's collective selection of an enforcement style. However, there were important differences in the political environment of the two regions.

Variations in the Political Environment

As discussed in other chapters and elsewhere (Shover et al., 1982), the struggle to enact the SMCRA was bitter and protracted. Nowhere was the conflict more intense than in the coal fields of Appalachia. The suspicions and antagonisms engendered during the battle did not abate when the Act was passed. Rather, they persisted

TABLE 5.5
REGIONAL ATTITUDES TOWARD THE STATE REGULATORY
AUTHORITIES AND OSM's I & E PROGRAM

Question ^a	Mean Responses			S.D.
	Region East	Region West	All OSM	
Without the threat of a fine, inspectors would be unable to gain compliance from most coal operators.	3.5	2.7	3.7	1.10
Effective compliance with OSM's regulations is easier to obtain if an inspector is willing to 'bend' the rules governing the inspection process.	2.8	3.3	3.1	1.10
Most of the progress that OSM has made toward curbing mining abuses will be lost when State regulatory programs are implemented.	*3.6	*2.8	3.6	0.98
Generally, how would you rate the working relationship between your Regional Office and the State regulatory authorities?	*2.3	*1.5	2.3	0.94
	N = 44	6	126	

^a The first three questions had the following response categories: 1, Strongly Disagree; 2, Disagree; 3, Undecided; 4, Agree; and, 5, Strongly Agree. The possible responses for the last question were: 0, Excellent; 1, Good; 2, Neither good nor bad; 3, Not very good; and, 4, Bad. Since the proportion answering "undecided" was small in all cases, means centered near 3 should be interpreted in terms of their direction rather than as equivalent to the modal response.

* Significant difference in means, $p < .05$.

and were brought to bear in critical scrutiny of and attacks on the OSM.

In Region East, OSM began operations against an historical backdrop of considerable indigenous citizen opposition to the excesses of surface coal mining. Because much of the strip mining in Appalachia is conducted adjacent to or near homes or rural settlements, the environmental, social and property damage from this type of mining has affected many citizens. Though not completely free from oversight by citizen's groups, this has not been true to the same extent in Region West, where there are relatively few mines which tend to be located in remote areas away from family farms and settlements. Moreover, in Appalachia, grassroots movements openly express feelings of pent-up frustration concerning the perceived venality and powerlessness of state regulatory authorities. When OSM arrived on the scene, citizens were urged to exercise their rights under the Act and told that only by doing so would past abuses be corrected and curbed (e.g., Center for Law and Social Policy, 1978).

There is a clear, substantial difference between Regions East and West in the number of citizen complaints received about harmful or dangerous mining practices. During 1979-80, Region West received only five, while Region East received 445. Given the large number of mines in Region East, it is to be expected that some difference would occur. Consequently, we converted the number of citizen complaints to a rate, that makes comparison across regions more meaningful. These data are contained in Table 5.6. The data in Table 5.6 show clearly that even

TABLE 5.6

SUMMARY MEASURES OF CITIZEN COMPLAINT ACTIVITY BY REGION,

JULY 1, 1979 TO JUNE 30, 1980

Region	Number of Complaints	Number of Citizen Complaints per:		
		Inspector	Ten Inspections	Million Short Tons of Coal
East	445	7.42	0.67	2.35
West	5	0.71	0.31	0.03
Total (U.S.)	1043	6.56	0.61	1.28

when alternative measures are used for the base, the rate of citizen complaints in Region East far exceeds the rate for Region West.

OSM's Region East program and personnel were attacked on a variety of fronts. Industry was hostile and suspicious that enforcement was conspiratorily lax in other regions, where larger companies mine coal (Lynxwiler and Groce, 1981). The states were critical because the federal government had usurped their primary regulatory role and they feared their "own" coal producers would be disadvantaged by stringent regulations (Shover et al., 1982). And citizens' groups, who were emboldened and made more determined by passage of the Act, were vigilant in their scrutiny of Region East operations. In sum, the political environment in Region East was conflict ridden, whereas Region West's was much more placid.

Based on his review of the literature on regulatory agencies, Thomas has suggested:

To the extent that an agency must concern itself with a hostile or unpredictable political environment, it will attempt to control the discretion available to officials who must apply rules to individual cases (1980: 121).

Thomas's comments indicate that regulatory agencies might adopt a police-like, impartial enforcement program as a strategem to separate the agency and its operations from a partisan, conflict-ridden political environment. There is evidence to support this contention for the OSM, and it is to the regional organization and enforcement philosophies that we now turn.

Variations in the Organization of the Regions

Both Region East and West received the same mandate from the Washington headquarters; however, the directors of these regions had somewhat different approaches to their jobs. The director in Region West had served as a Congressional staff member on a subcommittee which was instrumental in passing the Act. Thus, he was aware of the problems caused by unregulated surface mining, and at the same time, he was cognizant of the industry's problems. Perhaps his enforcement "philosophy" was best summed up in an interview he gave after his appointment:

The SMCRA is a national act. But, in fact, there are distinct regions of coal mining with different histories and cultures and, therefore, there also will be distinct programs implementing this national act. It isn't a regionalization of the objectives. It's a regionalization of the implementation (The Energy Daily, 1978).

As this quote points out, the director of Region West was concerned with ensuring that coal operators complied with the intent of the Act (protection of the environment) rather than stringently following its mandates for the I & E program. He also employed considerable oversight of his inspection staff. Region West did not have any field offices. Instead, the inspectors operated out of the regional headquarters. In fact, their offices were only a few feet down the hall from the regional director's office. This close proximity facilitated close supervision by the regional director, and it had an impact on inspector's work roles.

Q: Inasmuch as you all were located in just one office out there [in Region West] and the regional director and the assistant regional directors were all in the same office, did that make for more of a feeling of comradeship or did that, I guess what I

really want to ask you is how did that affect staff relations and staff morale as compared . . .

A: Well, it had a greater, I would say it had a much greater effect on relations and morale than it would have had in a field office situation.

Q: Uh huh.

A: I think you're better--if you want to go by the book, if you have a set of regulations, here are the regulations, go and enforce these regulations--if you are not around top management. It's a lot easier to do your job because you're not afraid that he's going to undercut you.

Based on our interviews, it is difficult to determine the extent to which Region West's inspectors used discretion in their work. On the one hand, an interview with a Region West manager indicates that inspectors had no discretion. On the other hand, our interviews with inspectors in Region West show that discretion was relatively common. Perhaps this discrepancy was understood best by a Region East manager who told us:

Q: Is it safe to say that [the Region West director's] philosophy of I & E was to encourage, certainly to permit more discretion at the field level? Than you tried to do here?

A: No, I would say that his was to permit no discretion. In other words, "unless I did it, you couldn't do it." Which means no discretion at all. In other words, "you tell me first and then I'll let you do it." I don't see what, that's . . . that isn't discretion.

Aside from the issue of discretion, Region West's inspectors were not assigned specific areas to inspect. Instead, they were handed their assignments on a weekly, sometimes daily, basis.

Q: How much prep time do you usually put in before you go out on inspections? Or how far in advance do you know what areas you'll be going to?

A: Sometimes we didn't have any advance warning at all. It would change on Friday afternoon.

Also, inspectors were required to bring every CO to the attention of the regional director before they issued it to an operator.

From the outset, managers in Region West viewed the Act and the regulations as flexible resources. Vigorous, uniform rule enforcement was played down as a necessary or even desirable strategy. In Region West, relatively greater emphasis was placed on conciliatory enforcement and efforts to work accommodatingly with mine operators. Also, there is ample support for the conclusion that Region West's I & E program reflected the philosophy and extensive control of its regional manager.

The overall enforcement style was quite different in Region East. Region East had eleven field offices, and a rather bureaucratic chain of command. The director of Region East was an attorney from Kentucky who had previous experience working with legislation and regulatory programs at the state-level. Hence, he was aware of the region's mining history. He summed up his enforcement philosophy in an interview:

[O]ne of the objectives I set myself was to try to set up a pragmatic workman-like approach to regulate the industry that was not politicized, that was not prostituted, that was not part of the old, uh . . . "hand in the till-type approach" . . . I saw my job to try to be as neutral as possible in implementing the law.

In implementing his approach to enforcement, the director of Region East elected to follow rather closely the Act's mandates and the strategy preferred by headquarters. He felt that this was the most direct approach to avoiding charges of favoritism and regionalization; "it was a commitment on my part to develop a system

that would institutionalize the program rather than personalize it." Hence, an effort was made in Region East to encourage professional autonomy among inspectors who were expected to follow the Act's mandates.

So, we began that system and devised a system of having monthly, and it turned out at first almost bi-weekly it seemed like, meetings with the managers, the field managers. Who in turn had those kind of monthly meetings with their supervisors. Staff meetings, weekly, were required at that time, just to merely make sure that everybody was doing it the same until the type of written direction could get out to insure . . . consistency.

Supervisors were encouraged to keep close supervision over their inspectors. It was felt that only by strict adherence to the regulations could a consistent program emerge. A Region East manager told us:

Q: The philosophy itself, I'm talking about kind of internal OSM of, philosophy of regulation; how would, what are the dimensions or the descriptive terms on which you would contrast Region [East] and Region [West]?

A: Well, I guess we read the Act much more literally. I mean, we read the Act and read the legislative history. And, it said, and because you had a bunch of lawyers here too, you know, saying "this is what you do, this is what your charge is." And, this is what the few policy memo's said you were to do, this is what you were trained to do, and you set out and did it.

Q: So, if you contrast on the one extreme a literal mandatory enforcement and, and on the other a high degree of discretion, you probably came down closer toward the mandatory enforcement . . .

A: That's right . . . And we, and you know, our philosophy was worse case operators first. Ones the states wouldn't go on, you know, limited personnel. That, that dictated our philosophy too, that we realized that because there had never been enforcement back here and there was going to be mandatory enforcement by the states, . . . and at first take on the worst. It's sort of like beating up the "bully on the block." Take on the bully on the block. Beat him up real good . . . and then half your problems are over because the word gets out. And it helped, and it worked.

As this quote points out, Region East managers were fully cognizant of the historical record of weak enforcement and operators' recalcitrance in Appalachia. OSM's Region East personnel saw their task, in part, as one of generally, bringing the rule of law to the operation of the Appalachian surface mining industry.

Region East managers believed that aggressive, consistent enforcement against known violators, would enhance the operators' perceptions of the credibility and legitimacy of OSM and its operations. Because of the existence of operators' communication networks, such enforcement activities, would eventually convince them that the OSM, unlike state authorities, would not simply "go away." A Region East manager told us:

Essentially, there's a big grapevine out there. I mean, I'm not a neophyte to the industry, not knowing there's a big grapevine. And if "Fred" tells "Joe" that "gee, yes, the OSM visited me and here's what they told me." And, "boy, they socked me a good one and I had to . . . and I've just been assessed a \$27,000 fine. Oh, my God." And they do talk like that in bars. They don't share enough information, I think for reclamation techniques.

Additionally, Region East managers realized they would be dealing with many operators of limited literacy skills, whose mine planning rarely extended beyond a few days or weeks. For such operators, a major task simply of informing and educating them would be required. In sum, OSM managers approached their work with an assumption that the job would be difficult, that state regulation had been ineffective or corrupt, that many operators would resist their actions, and that an aggressive enforcement program would be required if the operators were to take the program seriously. Only by vigorous, impartial and consistent enforcement would the operators come to see the program as

credible and legitimate, major objectives in Region East. And, in turn, Region East inspectors were imbued with a philosophy of firm, impartial enforcement and were encouraged to apply the regulations in a quite literal fashion. As one Region East inspector stated:

When you put the hard hat on and get out of the truck on that mine site, you've got to be--you just, you're like a state cop out there. You've got to enforce the law. No more, or no less . . . At least that's the way this office is run. That's the way they're all run in this district. And in this Region.

Conclusions

As this chapter has pointed out, there were variations in the OSM's enforcement styles in at least two regions. The beliefs that these two regions were most distinctively different was unanimous among informants. The regional variations were, to a large extent, the result of very real differences in the type of surface coal mining operations in each region. However, there were other factors that influenced the different enforcement styles that emerged in Region East and Region West. The history of state regulation in each region was an important variable. Also, the prevalence of federally owned lands in Region West and the high incidence of citizen involvement in Region East helped shape the two regions' enforcement styles. Finally, the organization of the regional offices, and, especially their respective director's enforcement philosophies, played an important role in setting the tone for the enforcement styles in each region.

In the next chapter, we will elaborate on these determinants by examining why two distinct offices in Region East developed different

enforcement styles. Within such an analysis, we will look more closely at various factors that may have an important influence on enforcement styles. And, at the same time, we can attempt to hold other determinants constant (e.g., the influence of regional director's enforcement philosophies, the importance of federally owned lands).

CHAPTER 6

INTRA-REGIONAL VARIATION IN ENFORCEMENT STYLES

In this chapter, we further narrow the focus of our analysis to examine the variations in enforcement styles that emerged in two of the four district offices in Region East: District One and District Two. (District One and District Two are separate states in Region East). We begin by describing the differences among the surface coal mining industry in the two districts. Next, we present agency data on the enforcement activities in each district. Also, we present questionnaire data related to the variations in enforcement styles for each district. In the remainder of the chapter, we discuss variations between the two district offices that may have contributed to the emergence of distinctive enforcement styles. We will couch this discussion in terms of findings from earlier chapters.

The analysis in this chapter replicates the methodology used in the preceding chapter. By replicating the earlier analysis, we are able to provide a measure of internal validity for the analysis of enforcement styles and their determinants. Also, this chapter, when combined with the analysis of chapter 5, may be viewed as an attempt to extend our discussion of the determinants of grassroots enforcement styles. In chapter 5, we found a number of differences between Region East and Region West (e.g., the type of mining techniques used, the structure of the industry, the history of state regulation). Each of these differences contributed to regional enforcement styles.

However, it is difficult to specify if all the variables were equally important determinants of grassroots enforcement styles.

By examining intra-regional variation in enforcement styles, we may shed further light on the determinants of enforcement styles. If these patterns are found to be consistent with inter-regional determinants, the relevance of parallel explanations will be sustained. However, if intra-regional patterns deviate from the inter-regional patterns of the preceding chapter, we may extend our discussion toward alternative explanations of grassroots enforcement styles.

Industry Variations and the Nature of the Regulatory Task

While there are a few important differences between the surface coal mining industries of the two districts, they do not represent the vast, polarized variations between Region East and Region West. In 1979, the estimated recoverable coal reserves for District One were 563.6 million tons and for District Two, 510.1 million tons (U.S. Dept. of Energy, 1981: 85). Although coal is not the main economic activity of either state, it is an important industry to both. In 1979, District One coal operators produced 24.18 million tons of coal, and the total production for District Two was 8.68 million tons of coal (U.S. Dept. of Energy, 1981: 15-16).

The surface coal mining in District One can be divided roughly into two types. In the northeast, at the end of the Appalachian mountains, contour mining on steep slopes is common. Further south and to the west, the topography of the land develops into rolling

terrain that accommodates much larger area mining. Roughly, 90 percent of the coal mines in District One are surface mines. There are a few large mines in the district; however, in 1979, smaller coal operators who produced between 10,000 to 100,000 tons of coal per year accounted for 71.82 percent of the district's surface mining community (U.S. Dept. of Energy). Coal miners in District One produced 26.4 million tons of coal in 1980, which indicates a gradual growth for the state's coal industry (U.S. Dept. of Energy, 1981a).

District Two surface mining is characteristic of the Appalachian surface coal mining region (see Chapter 3). Approximately one half of the mines in District Two are surface mines. Almost all of the coal mining in District Two is conducted in the eastern part of the state. Contour mining and its offshoots (mountaintop removal and auger mining) are the predominant types of surface mining techniques in District Two, although some area mining is conducted further west. These mines tend to be smaller than the large area mines of District One's southwest. Although only District One has surface mines that produce over 500,000 tons of coal (there were four in 1979), the two districts are comparable in the number of small operators. In 1979, 80.88 percent of the surface coal mines in District Two produced between 10,000 to 100,000 tons of coal (U.S. Dept. of Energy, 1981: 16). Coal production in District Two was 9.85 million tons in 1980 which indicates a gradual growth for the state (U.S. Dept. of Energy, 1981a).

Although there are more surface mines in District One, the differences between the two surface coal mining industries are not

great. Both districts experience heavy annual rainfalls (approximately 50 inches) that account for much of the environmental problems in the surface coal mining industry of the Appalachian coal region (see Chapter 3; also, Shover et al., 1982).

Historically, the problem of wildcat surface mining was more extensive in District Two. Part of this problem can be traced to the large number of operators who produce less than 10,000 tons of coal a year. However, all three states in Region East contain a group of small operators and wild-catters whose recalcitrant behavior was given special attention by OSM's managers in Region East. Although an exact number is impossible to report, one Region East manager hazard a guess:

Q: So, you're talking about these people, are legal operators you're talking about not wildcatters?

A: Yeah, both kinds.

Q: Okay, these people that work in the delays, what proportion of all operators in the region would you be talking about? . . . One percent, two percent or ten percent?

A: Oh, anywhere between one and five . . . Let's say, when you're talking about, you've got over 2500 operators in [another district in Region East] and six hundred operators in each [District Two] and [District One].

Most of these "problem" miners are confined to "pockets" or counties within the districts.

As noted, both District One and Two were in OSM's Region East. Each district had a district office and one field office. The two offices in both districts were within easy driving distance from each other. Also, each district employed approximately equal number of inspectors and supervisors. One difference in the two districts was

the location of the Region East headquarters. Region East's headquarters office was located in District Two, approximately 30 minutes away by car. The manager's office in District One was a six hour drive from Region East's headquarters.

Initially, meetings between Region East's four district managers and their supervisors were held in the Regional headquarters on a fairly regular basis. The meetings decreased in frequency as the headquarters managers in Region East increasingly formalized their directives and lines of communication. Nonetheless, both districts were given identical directives concerning the region's I & E policies and enforcement philosophy. The essence of these directives was an attempt to implement the letter of the law. In an interview, the director of Region East summarized his regional policy for the I & E program:

We generated an inspection and enforcement handbook, that set out policies, what was required . . . You were limited in that, you know we were told "you had to write what you see." We were told "that's the law's requirements." Well, when you were given, if I give you a system where you have to write what you see, you might say "well, it might be nice not to write it," you know, "it might be nice to ad hoc it," but that flexibility wasn't allowable under the system.

As noted in the above quote and elsewhere (Chapter 5; also, Shover et al., 1982), Region East adopted a policy of uniform, mandatory enforcement. Managers in Region East's headquarters felt that an aggressive, consistent I & E program would provide an example for state regulatory programs and at the same time, bring a measure of credibility and legitimacy to the regulation of surface mining in Appalachia.

Variations in District Enforcement

For the reasons outlined in Chapter 5, we chose a twelve month period from July 1, 1979 through June 30, 1980 to examine the OSM's inspection and enforcement activity in the two districts. During the specified time period, OSM's records show that inspectors in District One issued 450 NOVs and 146 COs. District Two's inspectors issued 451 NOVs and 267 COs. To facilitate comparisons between the district offices, we can convert these numbers into rates of enforcement by using the three different bases employed in the previous chapter (Table 5.1).

During 1979-80, District One employed eleven inspectors, and District Two employed ten. When we convert the number of NOVs and COs to rates (# per inspector), we find that District One inspectors issued 40.91 NOVs and 13.27 COs per inspector. District Two inspectors issued 45.10 NOVs and 26.70 COs per inspector.

Another comparative measure of enforcement activity for the two districts can be calculated using the total number of completed inspections. During the time period in question, District One inspectors completed 1834 inspections and District Two inspectors completed 1653 inspections. The resulting rates of enforcement are 2.48 NOVs and 0.81 COs per ten inspections in District One and 2.75 NOVs and 1.62 COs in District Two.

Finally, we can calculate rates of enforcement activity by using the amount of coal produced in the two districts as a base (see Chapter 5; Table 5.1). During the 1979-80 time period, coal operators in District One produced 25.78 million tons of coal while operators in

District Two produced 9.92 million tons of coal (U.S. Dept. of Energy, 1981, 1981a). Using these production figures as a base, inspectors in District One issued 40.91 NOV's and 5.66 CO's per million tons of coal produced during July 1, 1979 through June 30, 1980. At the same time, inspectors in District Two issued 45.10 NOV's and 26.92 CO's per million tons of coal produced. Table 6.1 summarizes the various measures, including comparable statistics for all Region East and OSM inspectors.

Even though the amount of variation differs, these rates of enforcement activity show that District Two inspectors issued more NOV's and CO's than did their counterparts in District One. These differences especially are pronounced when CO rates for each District are compared. While District One produces over two times the amount of coal produced in District Two, the two industries were similar in many respects, especially when compared to Region East and Region West. For example, in 1981 there were approximately 843 "inspectable units" in District One and 735 inspectable units in District Two.⁸

Given the distinct differences in enforcement rates and the relatively similar conditions of the districts, it appears that one of the two groups of inspectors did not adopt fully the enforcement directives of Region East's managers. Our questionnaire data help shed light on this apparent deviation.

⁸We were not able to obtain comparable figures for the 1979-80 time period, but it is doubtful that there was any major change.

TABLE 6.1

SUMMARY MEASURES OF OSM INSPECTION AND ENFORCEMENT ACTIVITY BY DISTRICT,

JULY 1, 1979 TO JUNE 30, 1980

Office	Number of NOV's per:			Number of COs per:		
	Inspector	Ten Inspections	Million Tons of Coal	Inspector	Ten Inspections	Million Tons of Coal
District 1	40.91	2.48	17.46	13.27	0.81	5.66
District 2	45.10	2.75	45.46	26.70	1.62	26.92
Region East	54.23	2.62	17.22	15.02	0.73	4.77
Total (U.S.)	32.33	2.01	8.45	6.44	0.40	1.66

Inspectors' Attitudes--District One and Two

At the time our questionnaire was mailed, District One employed eleven inspectors and District Two employed ten. We received responses from six inspectors in District One (54.55 percent) and nine from District Two (90.0 percent). There were only two important differences between the two groups of inspectors. First, inspectors in District One, on the average, were about six years older than District Two inspectors (means = 35.5 and 29.3, respectively). Second, District One inspectors, on the average, had not been employed by OSM as long as the inspectors in District Two (means = 26.0 months and 33.7 months, respectively). However, on the other background variables, the two groups of inspectors differed only slightly if at all. For example, with the exception of two inspectors in District Two, all the inspectors had prior employment experience in the regulation of coal mining before joining the OSM.

In Chapter 5, we examined inspectors' attitudes concerning the regulations and the regulated industry. Table 6.2 presents mean responses for the two groups on these questions (means for all inspectors in our survey are included also). Both groups of inspectors felt that the OSM's interim regulations were fair to the coal industry (means = 4.0 and 3.9). Also, the questions which represent the inspectors attitudes toward the coal industry showed little variation. Neither group indicated a strong degree of trust for the regulated, but they did not feel that the industry was uncooperative toward achieving rule-compliance. Finally, the groups

TABLE 6.2
DISTRICT ATTITUDES TOWARD THE COAL INDUSTRY
AND THE INTERIM REGULATIONS

Question ^a	Mean Responses			
	District One	District Two	Region East	ALL OSM
On the whole, OSM's interim regulations are fair to the coal industry.	4.00	3.89	3.90	3.80
Most mine operators are uncooperative in their efforts to bring their operations into compliance with OSM's regulations.	2.33	2.44	2.10	2.30
Most coal operators can be trusted to do the right thing and to mine their coal in an environmentally sound way.	2.33	1.67	2.00	2.20
Based on your personal experience, how often do mine operators willfully and knowingly violate the federal regulations.	1.83	1.22	1.30	1.40
N =	6	9	44	126

^a The first three questions had the following response categories: 1, Strongly Disagree; 2, Disagree; 3, Undecided; 4, Agree; and, 5, Strongly Agree. The possible responses for the last question were: 0, Very Frequently; 1, Frequently; 2, Infrequently; and, 3, Almost Never. Since the proportion answering "undecided" was small in all cases, means centered near 3 should be interpreted in terms of their direction rather than as equivalent to the modal response.

had different estimates concerning the frequency with which operators knowingly and willfully violate the regulations.

Based on the two districts' rates of enforcement activity and their attitudes toward the regulations and the industry, we would expect that inspectors in District Two would be more likely to favor the OSM's enforced compliance style of enforcement than would District One inspectors. When we measured the degree of legalism for the inspectors in District One and District Two, a significant difference emerges. In Table 6.3, we present the two offices' mean scores on our legalism scale (see Chapter 5, Table 5.3). Inspectors in District One scored relatively low on the legalism scale (mean = 3.0), but District Two inspectors recorded a very high score (mean = 7.0).

Similar to the findings of Chapter 5, the group of inspectors that recorded the highest rate of enforcement activity, also scored higher on our measure of legalism. Also, both District One and District Two were given the same set of directives or mandates to enforce, yet neither group found the OSM's regulations to be unfair to the coal industry. The remainder of this chapter discusses the differences between the two offices for clues to their variations in enforcement preferences and activities.

Determinants of Enforcement Styles--District One and Two

Variations in the Regulated Industry

Although coal operators in both districts shared many characteristics, there were a few important differences. District One contained a few, large area surface mines and a few very small

TABLE 6.3

DISTRICT VARIATION ON DIMENSIONS OF REGULATORY ENFORCEMENT STYLES

Dimension	District One			District Two			Region East		
	$\bar{X}$	S.D.	N	$\bar{X}$	S.D.	N	$\bar{X}$	S.D.	N
Legalism ^a	* 3.00	1.55	6	* 7.00	2.69	9	4.95	3.05	44

^a A three-item scale (Cronbach's alpha = .67). Items are: "Generally, the requirement that OSM inspectors write an NOV on every violation they observe is not an effective regulatory strategy" (0 Strongly Agree; 1 Agree; 2 Undecided; 3 Disagree; 4 Strongly Disagree); "The best way for inspectors to do their job is to go strictly 'by the book'" (4 Strongly Agree; 3 Agree; 2 Undecided; 1 Disagree; 0 Strongly Disagree); and, "I have tried to enforce the interim regulations strictly and uniformly, much as a police officer would do" (4 Strongly Agree; 3 Agree; 2 Undecided; 1 Disagree; 0 Strongly Disagree). Responses to the three items were summed.

* Significant difference in means, $p < .05$.

operations. District Two had no large surface mines of comparable size to District One, but there were many more very small coal mines in District Two than was the case in District One. However, the largest proportion of coal operators in both districts were small producers whose annual tonnage averaged between 10,000 to 100,000 tons. Also, the coal industry in both districts was an important source of local revenue and political influence.

The state regulatory programs in both districts have been notoriously lax in their enforcement. Each state primacy package from the districts was turned down by the OSM. However, the problems with the state programs have a slightly different history.

In District One the problem with the state program revolved around ineffective regulations rather than poor enforcement. A District One manager took note of this problem in an interview:

Q: What about the states, from what I gather, you have a kind of strange relationship. There was no state program here before OSM?

A: Right. Well, now there was, but it was what you might call a hap-hazard kind of thing. It was something that was enacted politically to get, I think, a lot of environmental people and so forth off the backs of the legislators and stuff like that. So, they passed a, what I call, a quasi-type surface mine and regulatory association. Alright, it wasn't that the people that was trying to enforce the law didn't do a good job. It's just like I said with ours [District One], a lot of cases, we just didn't have anything to enforce, literally. They did the best they could with what they had. And their bond insurance was, such you know like, 12 hundred dollars an acre. Now \$1200 an acre on a flat piece of ground and where you're not moving but maybe 30 feet of cover, you could do some good with that land. But, you're talking about say a 75 or 100 foot highwall on a \$1200 bond an acre, you can't even unload a bulldozer for that. So, that kind of structure, you know, with their law and so forth, that was the (19)76 Act for the state of [District One]. Now, they have upgraded the Act, naturally since we've [OSM] come

in because they were forced to, you know, to where they could get more of the money to begin and so forth and so on. And they are upgrading and they are coming along you know a little bit at a time gradually, you know, they are making strides. What you might say, I guess, slowly or how ever you term it, but they will eventually get there.

Because District One had a history of ineffective regulations, the reaction of coal operators when OSM began enforcement was directed more toward the regulatory standards than the OSM's method of enforcement. Incidents of operator hostility were infrequent relative to District Two's experiences. For example, as one inspector from District One told us:

Q: How do the operators react when you, when you write up and hand them an NOV. What's their usual reaction?

A: They're, they're not happy about it, and they let me know they're not happy about it . . . So, they're kind of, they just say " well, you know, they wish I wouldn't write an NOV, and sometimes we do get some that are quite argumentative but not angry. I've never had a really angry man.

Q: They don't ever crumple it up and throw it on the ground or something? . . . Or cuss at you?

A: We have a set of people up in _____ which is North of here who are known for their tough way of handling everyone, not just inspectors. They're almost like [District Two] in the way that they handle inspectors. Now, we did have some problems with them getting very angry and red in the face and screaming and hollering and jumping up and down. but they were in the wrong. And, finally, they came to realize that they were going to have to get into this new way of mining. And, after they got through to that, they have just been the most, just the easiest to get along with people that you could imagine. But now the very first time that we started going out there, we did have some problems with them. And other inspectors do have problems with other miners.

In contrast to District One, regulatory problems in District Two centered around the inspection and enforcement process. Historically, state inspectors in District Two were notoriously lax in their

enforcement duties (Save Our Cumberland Mountains, 1978; n.d.). Most individuals whom we interviewed felt that state inspectors in District Two were neither paid nor supported well enough to properly implement the state's regulatory program. Typical of this position were the comments of a District Two inspector for OSM who formally had worked as a TVA inspector in District Two:

Q: Well, the problem with the state inspections, was it because the regulations weren't strict enough or because they weren't enforced?

A: Well, the laws and regulations were there with the state and in the past, I think it's getting away from it a little bit now, but politics played a lot in it.

Q: Sure.

A: And, it used to be the state inspectors were political appointees, It's not that why in a civil service job for the state. I think it's getting away from that more, but a lot of trouble, but I've had the state inspectors tell me well, they'll cite violations then they won't get backing from their supervisors or people above them, so it's kind of discouraging to them to try to do a good job.

Hence, in District One, OSM encountered a state with an ineffective regulatory program while in District Two inspectors found a state with an ineffective inspection and enforcement program. From an enforcement standpoint, this difference is important.

In both districts, inspectors had to introduce the industry into a "new" way of mining under the OSM's regulations. In District Two, they faced the additional burden of an industry that was used to ignoring state inspectors' demands for rule-compliance. This problem was compounded by an additional difference between the districts.

In District Two, there were many more very small operators; a number of them operated completely outside the law. State inspectors

had been unable to control this segment of the industry in the past. Likewise, OSM inspectors in District Two experienced more verbal abuse and hostility than their counterparts in District One. For example, a District Two supervisor told us:

Q: What about revenge from the other way, do you all ever have to put up with any kind of subtle revenge attempts from the operators?

A: Well, of course you know about [a District Two inspector] getting his nose pushed in.

Q: Right.

A: Yeah, there's all kinds of threats made against our inspectors all the time. I got a phone call one night about a year ago, at home--and I forget now exactly what was said--I answered the phone and they guy asked me if I was _____, the federal mine inspector. And I said "yes." And, he said, "well, if you all don't back off, we're going to blow the hell out of you." The end of conversation. . . I had another guy tell me one time they were going to burn me out, but they never did.

Q: Well, that doesn't go on as much now does it?

A: . . . It's localized now, put it that way. In other words, that kind of stuff is still going on. Our inspectors are still threatened when they show up to give testimony. . . Well, when we show up you know there's all kind of remarks and threats made as the inspectors are goind in or coming out. That, yeah, that kind of stuff is still going on right now.

Almost all inspectors in District Two reported similar threats or isolated incidents of operator hostility. The inspectors in District One were more likely to comment on outbursts of operator anger at the regulations rather than open defiance and hostility toward the inspectors.

Although the difference between the coal industries in the two

districts were not great, they were of critical importance for inspectors' daily work roles.

In our questionnaire, we asked inspectors several questions concerning the states' regulatory programs and the OSM's I & E mandates. Tables 6.2 and 6.3 reported on some of these issues. Table 6.4 presents four additional questions on these issues. As the data in Table 6.4 show, District Two inspectors expressed a more negative attitude toward their state's regulatory programs. Also, they, more so than District One inspectors, agreed with the agency's policies of civil fines and stringent enforcement of the regulations.

Variations in the Political Environment

Both District One and District Two had a reputation of industry influence in state and local politics. The states, themselves, were staunch advocates of "states' rights" (Shover et al., 1982). Also, by the early seventies, environmentalist and citizen groups in both districts became more persistent in their struggle for effective state regulation. The antistripping mining groups from District Two experienced more national visibility, and they were more persistent in their activities after OSM began enforcement activities. However, these differences were not great. In both districts, environmentalist and citizen groups successfully lobbied for state regulatory programs.

In District One, the coal industry was able to undermine the impact of a state program by securing relatively weak performance standards for the industry. In District Two, the industry was more individualized with operators using their influence in local political

TABLE 6.4
DISTRICT ATTITUDES TOWARD THE STATE REGULATORY
AUTHORITIES AND OSM's I & E PROGRAM

Question ^a	Mean Responses		
	District One	District Two	Region East
Without the threat of a fine, inspectors would be unable to gain compliance from most coal operators.	2.83	3.33	3.50
Effective compliance with OSM's regulations is easier to obtain if an inspector is willing to 'bend' the rules governing the inspection process.	* 3.17	* 2.11	2.80
Most of the progress that OSM has made toward curbing mining abuses will be lost when State regulatory programs are implemented.	3.33	4.00	3.60
Generally, how would you rate your own personal working relationship with State surface mining inspectors?	* 1.67	* 3.22	2.23
	N = 6	9	44

^a The first three questions had the following response categories: 1, Strongly Disagree; 2, Disagree; 3, Undecided; 4, Agree; and, 5, Strongly Agree. The possible responses for the last question were: 1, Excellent; 2, Good; 3, Neither Good nor Bad; 4, Not very good; and, 5, Bad. Since the proportion answering "undecided" was small in all cases, means centered near 3 should be interpreted in terms of their direction rather than as equivalent to the modal response.

* Significant difference in means, $p < .05$.

arenas to render the state's program ineffective at the enforcement level (Shover et al., 1982).

When we examine the number of citizen complaints received in each district, the picture is somewhat confusing. From July 1, 1979 through June 30, 1980, District One received 78 citizen complaints while District Two received 59. In order to compare these numbers, we converted them to rates. Table 6.5 contains the rates of citizen complaints for each district.

When the number of inspectors and completed inspections were used as bases, District One showed a higher rate of citizen complaints. However, when we used each district's annual coal production figures as a base, District Two showed a higher rate of citizen complaint. While these variations appear confusing, they are quite consistent with earlier comments. That is, in both districts the amount of citizen involvement was similar although District Two received more national exposure. This exposure may have been related to the amount of open hostility expressed by smaller coal operators who created many of the more "newsworthy" acts of defiance (Franklin, 1980).

In attempting to solve the discrepancy in Table 6.5, I examined the number of citizen complaints received by each district office for a two year period from January 1, 1979 through December 31, 1980. During this period, District One received 116 citizen complaints while District Two received 124. Although District Two received more complaints during the two year period, the difference is not great.

The political environments of District One and District Two were quite similar. The state governments, industry lobbyists and

TABLE 6.5

SUMMARY MEASURES OF CITIZEN COMPLAINT ACTIVITY BY DISTRICT,

JULY 1, 1979 TO JUNE 30, 1980

Office	Number of Complaints	Number of Citizen Complaints Per:		
		Inspector	Ten Inspections	Million Tons of Coal
District 1	78	7.10	0.43	6.05
District 2	59	5.90	0.36	11.89
Region East	445	7.42	0.67	2.35
Total (U.S.)	1043	6.56	0.61	1.28

environmentalist interest groups were relatively equal in their level of concern and activism. In turn, the district offices in each state experienced similar political environments.

Variations in the Organization of the Districts

Both district offices received the same mandates from the regional office. Each employed similar organizational and staffing patterns. However, the district managers had different approaches to enforcement.

The manager in District Two joined the agency during its initial hiring wave. In fact, prior to the appointment of a regional director, he had served as the temporary director for all of Region East. As discussed in Chapter 4, the members of OSM's initial wave of inspectors were imbued with a strong sense of mission by OSM's I & E task group members. During our interviews with OSM personnel, his name often surfaced as a key member of the initial wave. Further, because this individual had served as a TVA inspector in District Two before joining OSM, he was aware of the state's history of lax enforcement and operator recalcitrance.

Like many managers in Region East, he shared the agency's desire to bring the rule of law to the Appalachian coal industry (see Chapter 5). Thus, the district manager of District Two not only accepted the legalistic enforcement philosophy of Region East's managers, but he also helped establish and coordinate the region's early enforcement policy of strict adherence to the mandates of the Act.

The manager of District One was hired after the regional director had assumed his position, approximately seven months after the agency's initial period of enforcement. Prior to his employment, District One's manager had spent over ten years as an inspector then engineer with the Mine Safety and Health Administration (MSHA). The District One manager differed from other Region East managers in his enforcement philosophy and approach to OSM's enforcement mandates.

Q: As for the interim regs, as far as the inspectors procedures, you know, the initial inspections twice a year, ah, and citing everything you see . . . did that help or was that bad?

A: I feel like when you have to hold it mandatory like that with every operator it's bad. Now, if you get some discretion as to who needs it versus who don't need it, I think it is good. Cause there is some of them you need to be out there with them everyday if you can. And then, there is some of them you know you wouldn't have to, you know, you could fly over once ever six months . . . So, that kind of discretion of saying cite everything you see, every operator you come in contact with, I think that is a bad kind of policy. I don't think that in one sense of the word it's fair, you know that's not fair.

A major difference between the managers in District One and District Two can be traced to their interpretations of the Act's overall intent. On the one hand, the District One manager emphasized that the goal of regulation in his district was to ensure that environmental safeguards were practiced by coal operators on a daily basis. Also, his prior experience in regulatory enforcement with MSHA had emphasized a more relaxed regulatory enforcement posture. Hence, he sought to enforce selectively those interim regulations that would effect proper reclamation techniques and protection of the environment.

On the other hand, the manager in District Two, having experienced first hand the flagrant disregard for the environment among some coal operators, was predisposed to correct the past abuses of surface mining. He felt that the OSM should set an example for the state to follow. Also, the District Two manager was a key member of the OSM's initial inspector corp, and as such, he had been exposed to the I & E task group's strong sense of mission. Thus, he emphasized the agency's initial mandate of an enforced compliance approach to the regulations--an approach that would bring the rule of the law to the coal fields of his district.

There are other organizational differences between the districts that were important as well. First, all of the supervisors in District Two were former TVA inspectors and they along with an overwhelming majority of their inspectors had been among the OSM's initial corp of inspectors. None of the District One supervisors were former inspectors from the area, nor were any of the personnel we interviewed in District One among the agency's initial corp of inspectors.

Second, while all inspectors recounted incidents of operator anger and verbal abuse, only the inspectors in District Two offered reports of operator threats or physical attacks by coal operators. However, District One was not free of miner hostility as the inspectors recounted experiences of former personnel in their area who had been attacked by miners. Still, incidents of inspector abuse by operators were the exception rather than the rule in District One. The manager of Region East's I & E program told us:

Q: How many incidences, I'm not asking for a precise number, have you seen of a serious hostility or aggression toward your inspectors in Region [East]?

A: Whew, I'd say probably average 30 or 40 a year. Of what I consider serious nature to where we would explore internally and maybe with local U.S. attorney on, should we take some criminal . . . action.

Q: How many incidences can you recall where one of your inspectors was actually physically assaulted?

A: Five or six.

Additionally, the regional headquarters were located in District Two, not far from the district manager's office. Supervisors and managers were used to meeting with regional managers. At one time, the assessment conferences for District Two were held in the regional headquarters. This arrangement created strong lines of communication. As we found in Chapter 5, it encouraged inspectors to follow closely the enforcement desires of the regional managers.

In District One, the reverse was the case. On only one occasion did the Region East director visit District One, and then, it was in conjunction with a state primacy hearing. The manager of District One interpreted this as a sign of regional disapproval for his views on enforcement.

Like I, you know, a long time ago we were looked at and I was looked at from the region concept, I guess you know, kind of hard, because I wasn't a hard liner, you know. A lot of the other district managers and so forth, you know, they didn't like it because I wasn't a hard liner you know. I'm not totally from an environmental, you might say, concept. That, I, you know, it kinda upset them to a certain extent, and I'm kinda like the ole saying . . . I'm kinda the outsider in the thing. I don't go with a hard line like that I never have you know. I just didn't think it was right. I think like, . . . now, there is some people that need the hard line you know.

Q: Have they put a lot of pressure on you?

A: No, they really haven't you know. They haven't put any pressure on me, nothing to say pressure or anything like that. They haven't tried to bear down on me or anything like that. It's just the little innuendos and the little things like that, that you pick up on you know. They don't come around you and they don't visit you and the regional director came to [District One] one time since he was up there, Mr. _____. Only time he ever came down here was, had a meeting with some surface mining reclamation people, not us. And, I felt like the only reason he came by the office was like, courtesy, you know. I would have kinda looked pretty bad for him to come to [District One] to talk with these other people and not come by this office.

As a result of this lack of direct communication, personnel in District One relied heavily on the district manager for guidance and support. Typical of this position were the comments of a District One supervisor:

I knew [Regional I & E manager] on a personal nature. But, there's fellas down here that the only way they, the only thing [Region East Director] and [Region East I & E manager] means to them is a name on a sheet of paper . . . But, for most, for me, the person that had the most impact on me was down here. It was, I think, _____ [manager of District One]. It was through him, you know, that the policy in [District One] was basically, you know, directed and enacted.

Finally, there was a difference in supervision for the two districts that reflected the enforcement preferences of the district managers. In District Two, supervisors kept close supervision over their personnel. Supervisors in both districts reviewed inspector's reports and rotated assignments on a six month basis. However, District Two supervisors appeared to have kept much closer and more formal tabs on their personnel. For example, inspector quotas were posted in both offices in District Two while none appeared in the offices of District One. Also, District Two supervisors undertook periodic, random follow-up inspections to determine if their personnel

were enforcing the Act. They justified these spot checks as necessary to ensure uniformity and avoid discretionary behavior. As one District Two supervisor told us:

You've got to have uniformity. If you don't, . . . You just get however many inspectors you've got in the field, you're going to get that many different versions of the regulations on the wall. And it's not fair to the coal industry and it makes it impossible from a management point of view to be able to control your inspectors because you can't spotcheck them . . . Everybody's discretion is a little bit different . . . [and] that's the way during the staff meetings and things like that, that's the way that we've decided in this district to control our people.

District Two supervisors felt that discretion not only led to inconsistency but often, it eroded operator respect for the OSM and its personnel.

Well, it's like, you know, when you got a guy out there and there's violations to be seen, and he sees them maybe he even, between the operator and himself, he tries to justify that he's not being a problem or that maybe there's nothing needs to be done, his justification to correct it. I think the operator probably openly appreciates it at the time. I think after he leaves they both, especially the operator, I think he, deep down inside, he knows that it was a problem, that he got away with something . . . And he don't respect people that don't do their jobs . . . He looks at the guy, at the inspector, and says, "well, he didn't really do his job. He helped me out, but he didn't really do his job." And, I don't think they're respected for that.

Again, the situation in District One was different. Supervisors did not see a need to "control" their people.

I have enough trust in them [District One Inspectors] that . . . I don't take it on myself to go out and follow them around either. Cause, I do believe, if I start doing that, that would sort of breakdown their respect or whatever, between them and the rapport and trust, so to speak, that we have--that's inherent with the supervisor--that we have in this office.

The trust that District One supervisors had for their inspectors can

be traced to their training and approach to enforcement. As one District Supervisor told us:

Q: Well, let me ask you then as a supervisor, how do you, how do you teach discretion to a new inspector?

A: Well, coming out of here, uh, I just, I may be a little fortunate in this office up here. But, the supervisor that was here before me, I helped him train, or I gave my "individual touch" to each one of the inspectors out here--I don't know if you asked them that or not--but, I trained, at least over six to ten week period, each one of these inspectors.

Q: Uh huh.

A: Up in this particular office, okay. So, they basically see my point of view on things . . . When I trained the fellas, I didn't . . . What I'd do was say "here's a copy of the regs. You have, your option of going down there like the others with the book and saying, 'this is this way, if it's not then write it!' . . . or else we can, when we're done, write our notes down, take a look at the mine operation as a whole, I mean overall." Generally, the, the intent of the law was, what kind of damage or how good a shape, you know. Evaluate the mine on a whole. Evaluate the operator, you know. How has he been mining? Has he been trying or does he just don't care.

District One supervisors did not view inspector discretion as an undesirable quality or a threat to consistency. Rather, it was seen as a necessary tool for obtaining compliance to the regulations and for establishing a cooperative regulatory environment with coal operators.

Q: Do you think you have sacrificed consistency or any level of fairness by doing that [using discretion]?

A: Sure don't. I most certainly do not.

Q: What about your reaction to the operator?

A: . . . I've never had one tell me that he felt like I had let so and so do this and I didn't let him do it or something like that. Now most of my people, like I said, I make sure that it is done within reason, that my inspector be able to justify why he does something. . . if he can justify to me in a good way, like, "well this guy right here, I know if I cut him a little slack he

is going to get me." And, I tell him, I say "alright, just tell him that." Tell him right to his damn face, you know, don't beat around the bush, tell him you know, "the reason I didn't do so and so is because last time I let you do this you got me a little bit, and I am not going to let you get me again."

Q: Does that seem to work?

A: It seems to work. Let him know where you are coming from. I don't believe in slipping around and laying in the bushes and watching him and getting him like that [a common tactic in District Two]. Come right out in the open with him and say "look now, you know, this is it, if you do this again or so and so, you know, there is no more discretion with me and you. It's right down the line."

In sum, the organizational variations between District One and District Two were numerous and rather distinct. Personnel in District Two encountered a much more hostile regulatory environment than District One personnel. The offices of District One were some distance from the regional headquarters which was located only a few miles from the manager's office in District Two. Also, there was extreme variation in the enforcement preferences of the two district managers. These variations were reflected in each district's approach to supervision.

Conclusions

As this chapter has pointed out, even within one of the OSM's more legalistic regions of operation, variations in the enforcement styles of grassroots inspectors emerged. These variations resulted, to some extent, from the existence of a small, vociferous group of coal operators in District Two. However, other differences in the two district's coal industries were minimal; each district encountered an historically weak state regulatory program; and the political

environment of each district was similar. The most extreme variations between District One and District Two occurred at the organizational level.

Together, the differences between District One and District Two produced unique approaches to the OSM's regulatory mandate. District Two followed the Act's mandates for I & E policies rather closely, and paralleled the philosophy of Region East's headquarters managers. The enforcement style of District Two approached an enforced compliance model. As an inspector from District Two told us:

A: You might, discretion might come in when you interpret the regulation . . . But now, as far as seeing a violation, the inspectors, if they see it and observe it, they have to issue it. That's just policy.

Q: You think it's better that way?

A: Well, you got your pros and cons. I, basically, I think it's better. You have a, you have a more persistent environment you know. I've had operators and consultants tell me "I don't, a lot of times I don't like what you tell me, but you tell me what you expect and you stick with it." And I've had the same consultants and engineers and operators say they have dealt with the various state agencies and they'll get two or three different people. And they say they'd rather have one hard line, strict approach, but they know what it is. They know what to expect.

In District One, a different enforcement style emerged. In many respects District One personnel went "against the grain." Their approach to enforcement did not parallel the mandate of the Act or the preferences of Region East's managers. Instead, District One personnel opted for a more negotiated compliance model of enforcement. During an interview, a District One inspector, who formerly had worked for the state, told us how he modified his approach after being assigned to OSM's District One:

A: I found that I could get the job done without writing violations. And in most cases, I found that I knew which companies had to be written up and which companies didn't, to get the job done . . . What I did was I went into each mine; I inspected the whole mine, and told them at the end of the inspection if they had any problems, they had two days to fix it. I would be back at the end of two days. If they didn't have it fixed, they would get a violation written. So, at the end of that, I found that I got all kinds of things done . . . Without having to write violations. So, that changed my whole view of inspecting. Up to that point, I had always gone at it from the other direction, and I actually was going against the law. The law says that I would write the violation as I see them.

Q: . . . And you found it to be much more effective, right?

A: But, I found that it was a much better way of handling it. So since then, my whole way of inspecting is very different.

Q: Do you still do that with OSM now?

A: Uh huh. We handle it that way. And this whole office with OSM has handled their inspections that way pretty much.

In the next chapter, we review the findings of the preceding analyses. Within this review, we will examine the extent to which variations at the environmental, organizational and interactional levels helped shape the OSM's selection of enforcement styles. Additionally, we will locate these findings within our earlier review of the literature on grassroots enforcement styles.

CHAPTER 7

DETERMINANTS OF OSM'S ENFORCEMENT STYLES

In the preceding chapters, we have examined the enforcement activities and attitudes of the OSM's inspectors during the agency's period as the primary regulatory authority. In this chapter, we summarize the findings from this analysis. We locate our discussion within the context of Chapter 1. That is, the determinants of grassroots enforcement styles will be examined at each level in the regulatory matrix. Also, we offer a speculative assessment of the differential impact of the various determinants.

Determinants of OSM's Enforcement Styles

As noted in Chapter 1, regulatory agencies do not operate in a vacuum. They are influenced by a multitude of factors beyond the agency's regulatory task (Wilson, 1980). As is often the case, the clarity of vision which infuses regulatory policy makers is altered drastically at the delivery level (Pressman and Wildavsky, 1973). The OSM was no exception to this tendency.

The struggle to enact federal legislation for the regulation of surface coal mining in the United States was bitter and protracted. When federal controls were passed in 1977, the OSM was created to regulate the coal mining industry. However, this legislative turmoil did not abate with the passage of PL 95-87. Rather, the antagonisms forged during the Act's legislative history were brought to bear on the OSM. Perceiving a clear mandate from Congress and the President,

the OSM's task force executives were determined to create legally defensible regulations and to implement stringently proactive enforcement policies. However, the Act's mandated deadlines and congressional funding delays forced OSM executives to move quickly in promulgating the interim regulations and implementing the I & E program. Almost immediately following the promulgation of the interim regulations, the OSM was besieged by political and legal challenges from the states, the regulated industry and concerned environmentalist groups (Shover et al., 1982). Additionally, the Act's mandated time deadlines forced the headquarters staff to begin promulgating its permanent program regulations before the interim program was operationalized fully. As a result, the agency increasingly granted autonomy to its regional directors for shaping and implementing the interim program.

In earlier chapters, we found that the agency's selection of an enforced compliance strategy of enforcement was not followed consistently by regional personnel. In determining why variations in enforcement styles emerged at the implementation level, it is important to determine not only why some offices deviated from the OSM's I & E policies, but also why others conformed to them. To facilitate such analysis, we will compare and contrast the enforcement variations in Region West, District One and District Two at the environmental, organizational and interactional levels. Because the two district offices were in Region East, we will limit our discussion of Region East to intra-regional comparisons. We begin by examining the determinants of enforcement variations at the environmental level.

Determinants at the Environmental Level

At the environmental level there are four important facets of the regulatory matrix that influence the selection of enforcement styles--the agency's legislative mandate including the nature of its enforcement task, the structure of the regulated industry, the amount of public visibility experienced by the agency, and the history of similar regulatory programs.

Public Law 95-87 stipulated a stringent non-discretionary inspection and enforcement program. A minimum of two unannounced inspections were to be conducted each year at every commercially permitted coal mine that disturbed over two acres of land. Inspectors were mandated to issue a notice of violation for every regulatory infraction they observed during an inspection. For each NOV, civil penalties were assessed automatically by the Washington, D.C. Assessment Office. If a coal operator failed to comply with the federal regulations, OSM inspectors were empowered to shut down the mining operations at that site.

Hence, we may conclude that the stringent I & E mandates of the Act and the interim regulations established a clear enforcement goal for regional personnel--find and eliminate violations. In a study of OSHA inspectors, Kelman (1981) found that formulating a clear enforcement goal was conducive to imbuing inspectors with a sense of mission. Certainly, this was the case for the OSM's initial wave of inspectors who began their enforcement actions before the regional directors were hired. Questionnaire data (Table 4.6) show that the

early enforcement goals and sense of mission internalized by the initial wave of inspectors remained strong even after the regional programs were operationalized. Also, the large number of initial inspectors who filled the supervisory and managerial positions in District Two may have influenced the district's selection of an enforced compliance style of enforcement. In assessing the regulated industry's influence on enforcement styles, we have observed at several points that the structure of the industry was an important determinant of enforcement variations. For example, the surface coal mining industry's past history of environmental abuse and disregard for proper reclamation techniques had a significant impact on the passage of the Act and its legalistic mandates (Shover et al., 1982). Members of the OSM's I & E task group felt that a rigid, proactive I & E program could curb these problems in the future. One individual who occasionally consulted with members of the I & E task group summed up this idea in an interview:

[I]n our judgment, in a regulatory situation where you have a large number of inspectable units, where you have significant variation in compliance--including a minority, a significant minority of inspectable units that simply do not comply or have a history of non-compliance--and third, where you have a significant shift in performance requirements, that you require a mandatory enforcement system. And the surface mine act enforcement system, in almost every one of its provisions, both penalties, cessation orders, NOVs, whatever, is premised on that idea of mandatory enforcement . . . And it may be, in another situation, 20 years down the road before compliance is up very high, where you have a growing consensus of behavior . . . you should drop mandatory enforcement for discretionary enforcement. But where certain factors exist, we believe mandatory enforcement is justified, and indeed necessary, in surface mining.

Also, we found that differences in the size of mining corporations were related to variations in the determination of civil penalties assessed for corporate violations of the regulations (Shover et al., 1982; Lynxwiler et al., forthcoming). It was argued that variations in corporate size influenced inspectors' stereotypic perceptions of the regulated. For example, inspectors perceived larger corporations to be more responsive and cooperative to regulatory demands for rule-compliance. These perceptions influenced the inspectors' documentation of violations. In turn, the OSM's assessors relied on the inspectors' reports to assess civil penalties.

Finally, differences in the regulated industry's level of non-compliance influenced variations in enforcement styles. The differences of corporate size for District One and District Two were not great. However, the prevalence of overt, operator defiance and open hostility among a small group of operators in District Two strengthened the district's resolve for stringent enforcement policies. The industry differences between Region West and District One were large. The director of Region West was aware of the very large mining corporations that dominated western coal mining. As a result, he preferred a more accommodative enforcement style. He felt that a flexible approach to enforcement was more appropriate for the extremely large, environmentally conscious mining companies of Region West. The negotiational enforcement style of District One was not influenced heavily by extremely large surface mines. In fact, the mining community of District One was similar to District Two in many respects. However, the high degree of overt resistance and physical

acts of hostility that were common among the small operators in District Two were noticably absent in District One.

These findings indicate that variations in regulatory enforcement styles are related to (1) extreme variations in the size and complexity of the regulated industry and (2) the incidence and prevalence of industry resistance to regulatory demands. This latter conclusion offers some support for Wilson's argument (1968) that a more homogeneous environment among the regulated is conducive to flexible enforcement styles.

Another important determinant of grassroots enforcement styles is the amount of public visibility experienced by the regulatory agency (Wilson, 1980). Public visibility is associated closely with the amount of political pressure brought to bear on the agency (Thomas, 1980), and the past history of similar regulatory efforts, especially if they were defined as corrupt (Wilson, 1968). The high degree of public visibility surrounding the OSM was characterized by intense political pressures and a history of lax regulatory efforts by the states (Shover et al., 1982). Consistent with the available research in this area, the OSM opted for legalistic I & E policies. However, the findings from Chapter 5 and 6 present a somewhat confusing picture as to the importance of these factors in the selection of enforcement styles.

On the one hand, Region West did not have a poor history of state regulation. Also, compared to Region East, there was not a high degree of political pressure in the West, although Region West was not totally free from political turmoil. Further, the large number of

coal operators who mined on federally owned lands in the west were accustomed to a federal presence prior to the OSM. As expected, Region West developed a more flexible I & E program than Region East.

On the other hand, District One and District Two were quite similar with regards to the past history of surface mining regulation in their respective states. Also, both districts experienced similar political pressures at the state level. A major difference was the degree of national media exposure in District Two as a result of the open defiance exhibited by a small segment of the industry. The greater media exposure afforded District Two was the result of isolated acts which were especially newsworthy.

Bardach and Kagan (1982) have noted that "newsworthy" accidents or catastrophes often contribute to legalistic enforcement styles. It appears that this was the case within Region East. A small group of coal operators in District Two committed a number of physical attacks on inspectors that affected enforcement policies in much the same way as a catastrophe or spectacular disaster. It was the structure of the industry and in particular, a small segment of highly volatile coal operators that were linked most directly to increasing public visibility in District Two. Thus, when assessing the influence that public visibility had on OSM's enforcement styles, we are confronted again by variations in the structure and nature of the regulated industry.

In sum, each of the determinants at the environmental level (mandate, industry structure, visibility, and history) had an impact on enforcement styles. However, it appears that the structure of the

regulated industry provided the most consistent and dramatic impact on the selection of enforcement styles.

Determinants at the Organizational Level

At the organizational level, important determinants of regulatory enforcement styles include: the size of the enforcement task, adequate resource allocations, the specificity of the regulations, the organization of offices and personnel, the autonomy of mid-level managers, the enforcement preferences and ideologies of managers, and the monitoring of personnel by supervisors.

Except for the OSM's initial period of enforcement, resource allocations were not an important determinant. All of the interview respondents felt that they had received adequate funding, and we found no reason to question their assertions. Likewise, large case loads did not appear to be important. Although Region East and West differed considerably in their case loads and enforcement styles, such differences were not found in the district offices. District One had a slightly higher case load but a more flexible enforcement style than District Two. Thus, a high case load was not an important determinant of enforced compliance for the OSM.

Similarly, there was a general lack of support for the notion that highly specific regulations accommodate enforced compliance strategies of enforcement (Thomas, 1980). On the one hand, when we interviewed inspectors who preferred an enforced compliance style (e.g., District Two), they characterized the interim regulations as "black and white with no gray areas." On the other hand, when we

interviewed inspectors who preferred a negotiated compliance style (e.g., District One, Region West), they reported the same set of regulations as "grey and ambiguous." This finding was consistent throughout the interviews. Thus, we found little support for this hypothesis at lower level in the agency.

The organization of offices and personnel was somewhat important in maintaining rather than determining enforcement styles. For example, in Region West we found a more flexible style of enforcement than in Region East. This variation coincided with regional variation in the organization of offices and personnel. In Region West, inspectors, supervisors and regional managers operated from the same office. Our interview data and observations suggested that this arrangement facilitated the regional director's ability to informally implement his "regionalized" I & E program.

In Region East, a similar but inverse dynamic occurred. Because the personnel in Region East were dispersed widely in three states and four districts, the regional managers opted for a more structured, formalized chain of command. Within Region East, both District One and District Two had parallel office arrangements and personnel. The only significant difference in the organization of the districts was the location of the Region East headquarters in District Two. Yet, distinct variations in enforcement styles emerged between the districts contrary, it appeared, to the Region East managers' preferred enforcement styles.

In sum, we found that the greater the physical distance between regional managers and their personnel, the greater the tendency for

variation from the regional management's preferred enforcement style. Or, stated conversely the closer lower-level personnel are to upper-level managers, the easier it becomes to monitor their actions and to exert available inducements to maintain the preferred behavior. Although this finding does little to account for "why" variations in enforcement styles emerged, it does provide information as to "how" they are maintained (cf. Pressman and Wildavsky, 1973; Kelman, 1981).

The impact of managers' ideologies on enforcement styles was found to be an important determinant. This influence was an important determinant when I & E task group members sought to instill a sense of mission among the agency's initial wave of inspectors. However, the autonomy granted to the regions engendered the emergence and adoption of regional managers' enforcement preferences. This finding adds importance to the manager's ability to monitor closely the behavior of his grassroots personnel. For example, the close monitoring available to the director and managers of Region West, along with their increased distance from the Washington, D.C. headquarters, appeared to be important factors in their ability to adopt and maintain a more flexible enforcement style than the OSM's Washington headquarters preferred.

Again, a similar dynamic occurred within Region East. The regional director and managers elected to follow closely the enforced compliance approach of the agency. However, the manager of District One preferred a more flexible style of negotiated compliance. His district was a relatively long distance from the Region East headquarters. Also, except for occasional meetings with their

district managers, headquarters managers in Region East relied on formal directives and official enforcement rates to communicate with and monitor district personnel. We found that District One personnel did not feel a strong bond with the Region East executives. Instead, they appeared to respond to the highest ranking manager with whom they had the most frequent and direct communication--the District One manager.

In District Two, where the regional headquarters was located, we found that inspectors, supervisors and managers experienced a more informal, face-to-face relationship with Region East's headquarters managers. And, in turn, Region East's headquarters managers were in a better position to monitor more directly the behavior of District Two personnel. In Table 7.1, we have diagramed this relationship in terms of enforcement styles.

When enforcement activities and attitudinal data were compared in Chapters 5 and 6, the variations conformed more closely to the enforcement approaches and ideologies of managers who had experienced the most direct and frequent contact with their grassroots personnel. To further substantiate this finding, we have selected three questions from our survey that deal with the issues of flexible versus stringent enforcement styles. The mean responses for these questions are broken down by Region East, Region West, District One and District Two (see Table 7.2).

As Table 7.2 shows, grassroots inspectors preferred the enforcement approaches and attitudes of those managers with whom they had the most frequent and informal contact. In other words, the more

TABLE 7.1

ENFORCEMENT PREFERENCES OF MANAGERS BY INSPECTORS' PREFERENCES

Preference	Region West	Region East	District One	District Two
Preferred enforcement style of managers having the most direct contact with field personnel.	A	B	A	B
Enforcement style preferred by field personnel.	A	B	A	B
Enforcement style preferred by OSM.	B	B	B	B

A = Negotiational compliance style of enforcement.

B = Enforced compliance style of enforcement.

TABLE 7.2

BREAKDOWN OF ATTITUDES TOWARD ENFORCEMENT STYLES

Question ^a	Mean Responses of Cases Examined				
	Region West	Region East	District One	District Two	All OSM
OSM's interim regulations do not adequately take into account the practical problems encountered by surface mine operators.	3.17	3.11	3.50	2.22	3.14
The entire enforcement process would have been fairer if inspectors had been permitted to use more discretion.	3.17	3.44	4.33	2.25	3.56
Requiring strict adherence to the regulations is the only way to ensure fairness during inspections.	2.00	2.73	2.00	3.89	2.61
N =	6	44	6	9	126

^a The possible responses for these questions were: 1, Strongly Disagree; 2, Disagree; 3, Undecided; 4, Agree; and, 5, Strongly Agree. Since the proportion answering "undecided" was small in all cases, means centered near 3 should be interpreted in terms of their direction rather than as equivalent to the modal response.

familiar and direct the manager-subordinate relationship becomes the more likely subordinates will respond to the manager's enforcement preferences. Kelman (1981) has reported similar conclusions in his analysis of OSHA inspectors.

Additional support for this conclusion was found when we interviewed supervisors. Without exception supervisors preferred the enforcement styles of their closest supervisors regardless of the enforcement approaches and ideologies preferred by managers further up the chain of command. Thus, we may conclude that the enforcement approaches and ideologies of regulatory managers and executives are important determinants of grassroots enforcement styles at the organizational level. However, the likelihood that management's enforcement preferences will be realized is dependent upon their ability to closely monitor grassroots personnel.

Determinants at the Interactional Level

At the interactional level of the regulatory matrix, factors such as inspectors' length of employment, the incidence of long term inspector-client relationships and the perceptions of grassroots personnel may be important determinants of enforcement style. Because each group of inspectors we examined were rotated in some fashion on a regular basis, we were not able to evaluate effectively the impact that long term relationships between inspectors and clients have on grassroots enforcement styles.

Also, our findings offered limited support for the notion that an inspector's length of employment with the agency is associated with

variations in enforcement styles (Hawkins, 1983). For example, the OSM's initial wave of inspectors evidenced a higher degree of legalism than did the subsequent waves. Also, District Two, which had a substantial number of personnel among the initial wave, were more legalistic in their collective enforcement styles than District One which had a few first wave employees. However, any conclusions which might be drawn from these findings are complicated by the sense of mission which I & E task group executives instilled among the OSM's initial wave of inspectors.

Certainly, the data did not support certain conclusions from the literature on grassroots enforcement styles. In general, this literature indicates that the longer an inspector is employed by an agency, the more likely he will prefer a negotiated compliance style of enforcement (Bardach and Kagan, 1982; Hawkins, 1983). Our findings suggest that the opposite was the case in the OSM. That is, a cross-sectional test of a diachronic hypothesis casts considerable doubt upon it. It should be noted that our interviews with top management indicated that there was a broad movement within the agency toward more discretionary policies. This trend also may be seen in the questionnaire data. Even first wave inspectors expressed a desire for greater use of discretion, although later waves of inspectors were more strongly attached to this position.

We did find support for the contention that the perceptions and stereotypes of inspectors influence enforcement styles (Nivola, 1978; Long, 1979). In Chapter Four, we found that a company's degree of regulatory responsiveness and cooperation were important influences on

an inspector's enforcement style. Further, OSM inspectors are more likely to associate these positive traits with large mining corporations. It appears that this tendency is a result of very real differences among mining companies of different sizes.

For example, due to increased organizational complexity, large mining corporations possess the resources of capital, personnel and knowledge necessary to take responsive abatement measures. The scale of their operations necessitates the inclusion of engineers, reclamation specialists and attorneys as full-time staff personnel, rather than contracted help on a case-by-case basis. Also, they have greater recourse to procedures for formal, legal challenge. Together these factors structure the context of inspector-client encounters. We found that inspectors are likely to associate these positive characteristics with larger mine corporations whose complexity and capital facilitate the type of behavior which inspectors prefer when dealing with clients. As a result, inspectors tend to stereotype a coal operator's responsiveness and level of compliance according to factors correlated with the size and resources of his mining operation.

Similarly, we found that enforcement styles were associated with attitudes of the regulated as cooperative and trustworthy. For, example, in cases where OSM inspectors evidenced a negotiated compliance style of enforcement, they were more likely to view coal operators as cooperative and trustworthy than comparable groups of inspectors who preferred an enforced compliance style. Further, our conclusions drawn about the impact of organizational determinants

suggest that inspectors' attitudes toward the regulated were dependent on their managers' preferred enforcement styles. Hence, we cannot offer conclusive support for the relationship between enforcement styles and inspectors' attitudes of the regulated (i.e., both may have been dependent on the manager's preferred style).

Nonetheless, common sense and our findings in Chapter Four suggest that at least when inspectors are in the field and away from the "influences" and monitoring of supervisors and managers, they are likely to respond positively to coal operators who are responsive and cooperative toward rule-compliance (Hawkins, 1983). After all, supervisors and managers cannot follow inspectors to every mine site. Further, we expect that enforcement personnel would respond positively toward any behavior which makes the discharge of their work roles easier. By the same token, client behavior which is problematic for (or interferes with) inspectors' daily work roles will be perceived and dealt with more harshly.

Conclusions

Based upon our analysis of the OSM inspectors, we have shown that variations in enforcement styles emerged within the agency despite the Act's stringent legislative mandates and the enforced compliance preferences of agency executives in the Washington, D.C. headquarters. Each of the determinants that we found to have an impact on the OSM's grassroots enforcement styles represents a tentative hypothesis for future research. Although a number of variables influenced the variations in enforcement styles, our discussion of these determinants

has shown that some factors were more important than others. We will review those determinants which appeared to have the greatest influence on enforcement styles at each level in the regulatory matrix.

At the environmental level, variations among the regulated industry were important. Large, complex mining corporations were more likely to be associated with negotiational compliance styles of enforcement. The prevalence of small operators, especially wildcatters, who were hostile toward inspectors were associated with an enforced compliance style. While these findings are relatively common place, they are important nonetheless. First, if enforcement agents perceive that clients are highly responsive and cooperative to regulatory demands, they are more likely to employ forbearance in their negotiations. The net result is leniency. Conversely, clients deemed unresponsive beget less forbearance on the assumption that only by such action can future problems of a similar nature be deterred (cf. Reiss, 1971). The result is increased stringency. Second, regulatory encounters in which enforcement agents feel less knowledgeable than, and occasionally threatened by, the other party contain the potential for deferential treatment. Again, the result is leniency.

At the organizational level, we found that inspectors and supervisors are more likely to respond to the enforcement preferences of the highest level manager with whom they have the most frequent interactions. This dynamic appears to be consistent regardless of larger agency mandates or the preferences of managers further up the

chain of command. Because of their close proximity to grassroots personnel, these individuals can monitor subordinates behavior more directly and, therefore, exert more inducements to maintain subordinate behavior. Hence, the enforcement approaches and ideologies of regulatory managers are important in so far as managers are able to maintain relatively close supervision over, and regular interaction with, their grassroots personnel (cf. Kelman, 1981).

Finally, at the interactional level, top-level administrators of regulatory agencies are more likely to influence enforcement styles if they are able to imbue grassroots personnel with a strong sense of mission. However, determinants at the environmental and organizational levels, may subvert a sense of mission if the regulated industry does not conform to the client stereotypes advanced by the administrators. Also, mid-level managers who have direct contact with grassroots personnel may alter a sense of mission and redefine grassroots enforcement styles if these managers are not closely monitored by their supervisors.

For some readers, it may appear that our preceding discussion typified the OSM's inspectorate as black boxes or through-puts by which factors external to their daily routines shaped and directed subsequent negotiations with coal operators. My intuitive conclusions based upon a familiarity with the subject matter does not support this position. Rather, the OSM inspectors like other enforcement agents seek to increase their autonomy over daily work roles (Lipsky, 1980). Basically, they will do what they are told to do as long as they do not find the task too difficult or repulsive (Barnard, 1938). Those

individuals who exert the most influence and control over their mundane work setting will have the greatest impact on directing their actions. However, problematic, situational factors inevitably will arise during the discharge of inspectors' work roles.

Often, the solutions to these situations have not been defined by superiors. Hence, inspectors develop situational solutions which constitute discretionary behavior. In this sense, discretionary behavior is unavoidable since the policies of administrators and the preferences of superiors cannot anticipate all the situational contingencies that inspectors are likely to encounter. Nevertheless, inspectors will devise solutions that are as consistent as possible to their work roles. That is, inspectors use discretion; however, they define and employ discretionary behavior as a result of their officially defined work roles.

These official work roles are defined and to some extent monitored, by other determinants in the inspector's work setting. During our interviews with the OSM inspectors we asked them about the use of discretion in accomplishing daily work roles. Their responses varied according to the preferred enforcement style of their particular work setting. For example, District Two inspectors, who operated with an enforced compliance style, often commented that there were various ways to induce behavioral changes among their clients. If an operator was viewed as "trying" (i.e., responsive, cooperative), District Two inspectors were likely to offer an extension on the period of abatement for correcting a violation. Also, they might

offer to "help out" the operator at assessment conferences by noting that his efforts toward compliance warranted a reduced fine. For the inspectors in District Two, these actions were viewed as discretionary. Actions such as overlooking minor violations or cajoling operators into fixing violations without issuing a NOV were discounted as "against regional policy."

When we interviewed District One inspectors on the same issues, they felt that extending abatement times or "helping out" in assessment conferences were not discretionary actions but expected behavior. When we asked them what types of discretionary behavior they engaged in during an inspection, District One inspectors often told us that if an operator was "trying" they might ignore minor violations or threaten to issue a NOV if the operator did not correct an observed violation within a set time period. It will be remembered that District One inspectors operated under a more flexible style of enforcement.

Hence, while enforcement styles "set limits" on inspector behavior, they do not control it completely. Inspectors will seek to expand their autonomy over work roles (or use discretion) within the defined by these work roles. It is the work roles that are shaped and defined by various determinants in the regulatory matrix.

CHAPTER 8

IMPLICATIONS FOR FUTURE RESEARCH AND PROGRAM ADMINISTRATORS

Summary

Fundamentally, the entire regulatory structure of the OSM was oriented toward the implementation of an enforced compliance style of regulation. The OSM's enabling legislation specified detailed regulatory standards for the industry. The agency's I & E program incorporated a uniform policy of mandatory inspections, automatic citations and stringent penalties. The regulations were supported by headquarter's executives who advocated a stringent uniform enforcement program. These factors helped to define the agency's enforcement task. The agency's initial wave of inspectors shared the I & E task groups' skeptical perception of the industry and the existing state programs. This group internalized a strong sense of mission which set the tone for the agency's subsequent enforcement program.

The agency's initial inspection and enforcement program was characteristic of an enforced compliance style of enforcement. However, we found variations in the OSM's grassroots enforcement styles. The variations were not consistent with the desires of policymakers and top-level executives in the OSM. Instead, they reflected the enforcement preferences of mid-level agency managers. In part, the variations in enforcement styles were responses to differences in the nature of the enforcement task.

Even though it was difficult to isolate the impact of the

different influences, we found that significant variations in the size and complexity of the regulated industry and their responses to regulatory demands for compliance were important determinants of variations in enforcement styles. These variations among the regulated were associated with differences in enforcement activities and inspectors' attitudes and perceptions of the regulated.

Directions for Future Research

Future research should attempt to define the points at which environmental, organizational and interactional differences become transformed into variations in enforcement styles. Researchers should examine how different levels of client recalcitrance toward regulatory compliance become problematic for grassroots enforcement agents and how extensive this non-compliance must become before enforcement styles vary. Also, researchers should endeavor to isolate the impact of corporate size and complexity by examining the relationship between enforcement styles and more graduated differences in the regulated industry.

Although important, variations among the regulated industry do not explain fully OSM's variations in enforcement styles. We found that grassroots enforcement styles covary with the enforcement preferences of mid-level managers. Inspectors respond to the enforcement preferences of those managers who have the most direct influence on their daily work roles. The close monitoring available to mid-level managers enables them to exert available inducements on their personnel to alter the agency's preferred enforcement style.

Researchers should seek to isolate these inducements and to assess their importance in determining enforcement styles. Such findings would be of interest to top-level administrators of regulatory programs. Another area that requires further investigation is the relationship between the structure of the regulated industry and the enforcement preferences of mid-level managers. It is likely that an association exists between the two determinants (Thomas, 1980). However, our data did not permit specification on this relationship.

We found that the organizational arrangements of personnel and offices were associated with maintaining enforcement styles. Researchers should explore this issue more closely. It will help to explain how regulatory enforcement preferences are transformed at the grassroots level. Perhaps by exploring influences at the organizational level, researchers will be able to draw together many of the existing research findings on regulatory enforcement.

At present the majority of research focuses on two levels in the regulatory matrix. First, there are a number of insightful examinations of enforcement styles at a macro-level (Kelman, 1981; Wilson, 1980). These studies focus on policymakers decisions and activities, providing information on the selection of organizational enforcement strategies (Thomas, 1980). Second, there is a growing body of literature on enforcement styles that relies on qualitative case studies of the regulatory encounter at a micro level (Nivola, 1978; Hawkins, 1983). This research focuses on the negotiational aspects of inspector-client encounters that emerge during inspections

(Gregerio, 1978). If we are to extend and refine our knowledge of grassroots enforcement styles, researchers must attend more fully to the dynamics which operate at a level between the enforcement encounters of inspectors and the larger processes at work during the agency's policy-making phase.

A few attempts have been made to incorporate this facet of the regulatory process (Long, 1979; Kelman, 1981). However, these studies tend to view the agency's organizational arrangements as a static constraint upon inspectors' selection of enforcement styles. We found that variations in organizational arrangements are associated with inspectors' selection of enforcement styles. Moreover, our findings suggest that organizational arrangements contribute to grassroots enforcement styles. Researchers should examine this relationship more fully. By examining the organizational dynamics of agency enforcement styles as a process, researchers will increase their understanding of how on-site encounters between inspectors and clients are managed. Also, such analyses may prove useful in determining how the policies of agency officials at the top become transformed into enforcement decisions at the delivery level.

Lessons for Program Administrators

A common complaint of program administrators who review the findings of scholarly research is that the conclusions of these studies provide few clear guidelines for their work related problems. However, researchers are cautious of making "once and for all" conclusions because of the inherent difficulties in giving specific

advice to practitioners in situational settings. Our research is no different in this respect. Before arriving at pragmatic generalizations, further research is indicated. For now program administrators may compare and contrast their agency's particular features with the OSM during the period of our analysis. Based upon these evaluations, administrators may find the more general findings of our research helpful. However, the utility of our research conclusions should be made with caution.

Because the OSM and its enabling legislation were oriented heavily toward curbing massive environmental abuses by the surface mining industry, many regulations were designed not just to encourage but to force regulatory compliance. Such measures were necessary for controlling recalcitrant coal operators. However, because the OSM's policies emphasized uniform enforcement, coal operators who were responsive to the spirit of regulatory demands often found themselves without incentives to comply with the letter of the regulations.

In general, the OSM sought to punish industry non-compliance. It did not provide strong rewards for coal operators who were responsive toward rule-compliance. The lack of attention to a system of regulatory rewards may have increased operator resistance to regulatory demands. In this respect the OSM was similar to many of the newer protective regulatory agencies (Graymer and Thompson, 1982).

The lack of a meaningful reward structure in the OSM's regulatory structure may have contributed to variations in enforcement styles. Bardach and Kagan (1982) have discussed the need for rewarding rule-

compliance among the regulated as equally important as punishing industry non-compliance. Hence, administrators should endeavor to maximize the rewards available for clients who are responsive to agency demands.

Also, of considerable importance are the variations among regulated firms. Inspectors who interact with specific types of corporations will adapt their behavior accordingly. Administrators should try to identify the variations among these clients in advance in order to anticipate the full range of problems which inspectors are likely to encounter. Once a program is initiated, top management should be quite sensitive to feedback from the line and the grassroots. By paying close attention to variations among the regulated, administrators will be able to develop more consistent guidelines and solutions for the situational problems encountered by their grassroots personnel.

Finally, administrators should never assume that personnel will follow explicitly the policy directives of the agency. If uniform policy application is the agency's goal, close monitoring and frequent interaction between personnel at all levels is very important. Increasing supervisory personnel's authority may not be the most successful means to maintain consistent rule-application. Instead, the number of personnel that supervisors and managers are responsible for at each level in the agency should be limited to a number which facilitates direct and frequent monitoring of subordinate behavior.

Also, to ensure consistent behavior the routine meetings between grassroots personnel and managers should be relatively frequent.

Upper-level managers should make an effort to attend such meetings and to show a measure of support and concern for their subordinates mundane activities and problems. Timely responses to subordinate needs may not always be sufficient to ensure that desired behavior is implemented. Subordinate response to management directives will be increased if managers make an effort to monitor their personnel's actions more directly through face-to-face encounters in informal settings.

Again, we must emphasize that the preceding guidelines for program administrators are only suggestive. The object of our analysis was to explore variations in grassroots enforcement styles. In Chapter 1, we noted that extensive exploratory research was necessary to provide a foundation for evaluation studies of enforcement styles. The goal of our analysis was to develop questions and directions for future research. We have found that regardless of policy directives, variations among grassroots enforcement styles emerge within an agency's regulatory structure. Also, we found that these variations often are the result of a number of factors which enter the regulatory matrix at different levels. By continuing scholarly research efforts in the directions suggested by our analysis of the OSM, the sociology of regulation will develop a more complete understanding of the regulatory process at all levels. In turn, this knowledge will benefit the policy-makers and administrators of regulatory programs who seek workable solutions to the problems of grassroots enforcement.

BIBLIOGRAPHY

BIBLIOGRAPHY

- Arrow, Kenneth J. "Regulation." Federation of American Scientists Public Interest Report 34 (June): 11-12, 1981.
- Bardach, Eugene. The Implementation Game. Cambridge, Mass.: MIT Press, 1977.
- Bardach, Eugene and Robert Kagan. Going by the Book. Philadelphia: Temple University Press, 1982.
- Bernstein, Marver H. Regulating Business by Independent Commission. Princeton, N.J.: Princeton University Press, 1955.
- Brauson, Bramley A. "Stripping the Appalachians." Natural History 83 (November): 52-62, 1974.
- Caudill, Harry M. Night Comes to the Cumberlands. Boston: Little, Brown and Company, 1963.
- Caudill, Harry M. My Land is Dying. New York: Dutton, 1971.
- Center for Law and Social Policy (and) Environmental Policy Institute. The Strip Mine Handbook. Washington, D.C.: Brophy Associates, Inc., 1978.
- Clinard, M.B., P.C. Yeager, J.M. Brissette, D. Petrashek and E. Harries. Illegal Corporate Behavior. Washington, D.C.: Government Printing Office, 1979.
- Clinard, M.B. and P.C. Yeager. Corporate Crime. New York: Free Press, 1980.
- Dale, Lawrence B. "The Surface Mining Control and Reclamation Act of 1977." St. Mary's Law Journal 9: 863-92, 1978.
- Downs, Anthony. Inside Bureaucracy. Boston: Little, Brown and Company, 1967.
- Elmore, Richard F. "Backward Mapping: Implementation Research and Policy Decisions." Political Science Quarterly 94 (Winter): 601-16, 1980.
- The Energy Daily. "Surface Mining Law Takes on a Regional Flavor." Tuesday, August 1, 1978.
- Erikson, Kai T. Everthing in Its Path. New York: Simon and Schuster, 1976.

- Franklin, Ben A. "A Blueprint Against Doing Violence to the Land." New York Times, March 11, 1979.
- Franklin, Ben A. "The Coal War." The Amicus Journal 2 (1): 42-8, 1980.
- Franklin, Jack L. and Jean H. Thraser. An Introduction to Program Evaluation. New York: John Wiley and Sons, 1976.
- Gardiner, John A. Traffic and the Police. Cambridge, Mass.: Harvard University Press, 1969.
- Gregerio, David J. "Enforcement is the Name of the Game: An Essay on the Immigration Inspector at Work." Sociological Focus 11 (3): 235-46, 1978.
- Grandis, Edward S. "The Federal Strip Mining Act: Environmental Protection Comes to the Coalfields of Virginia." University of Richmond Law Review 13 (3): 455-86, 1979.
- Greymer, L. and F. Thompson. Reforming Social Regulation: Alternative Public Policy Strategies. Beverly Hills, CA.: Sage Publications, 1982.
- Hawkins, Keith. "Bargain and bluff: Compliance strategy and deterrence in the enforcement of regulation." Law and Policy Quarterly 5 (January): 35-73, 1983.
- Imoff, E.A., T.O. Friz and J.R. LaFevers. A Guide to State Programs for the Reclamation of Surface Mined Lands. Washington, D.C.: U.S. Geological Survey (Circular #731), 1976.
- Johnson, C.R., D.S. May and G.W. Pring. Stripping the Law on Coal. Denver: Public Lands Institute, 1980.
- Kagan, Robert A. Regulatory Justice. New York: Russell Sage Foundation, 1978.
- Kagan, R.A. and J.T. Scholz. "The 'criminology of the corporation' and regulatory enforcement strategies." In Keith Hawkins and John M. Thomas (eds.), Enforcing Regulation: Policy and Practice, forthcoming.
- Kaufman, Herbert. Administrative Feedback. Washington, D.C.: Brookings Institution, 1973.
- Kelman, Steven. "Occupational Safety and Health Administration." Pp. 236-66 in James Q. Wilson (ed.), The Politics of Regulation. New York: Basic Books, 1980.

- Kelman, Steven. Regulating America, Regulating Sweden. Cambridge, Mass.: MIT Press, 1981.
- Langbein, Laura Irwin. Discovering Whether Programs Work. Glenview, Ill.: Scott, Foresman and Company, 1980.
- Lilly, W. and J.C. Miller. "The new 'social regulation'." The Public Interest 47 (Spring): 49-61, 1977.
- Lipsky, Michael. Street-Level Bureaucracy. New York: Russell Sage Foundation, 1980.
- Long, Susan B. "The Internal Revenue Service: Examining the Exercise of Discretion in Tax Enforcement." Paper presented to the Law and Society Association, San Francisco (May), 1979.
- Lynxwiler, John P. and Steven B. Groce. "Social Impacts of the Coal and Uranium Fuel Cycle: The Mining and Waste Disposal Phases." Final Report for Oak Ridge National Laboratory (February), 1980.
- Lynxwiler, John P. and Steven B. Groce. "Violative Behavior and the Negotiation of Public Identities in the Work Setting: An Analysis of Appalachian Mine Operators." Paper presented at the annual meeting of the Southern Sociological Society, Louisville, KY (April 9), 1981.
- Lynxwiler, John P., Neal Shover and Donald A. Clelland. "The organization and impact of inspector discretion in a regulatory bureaucracy." Social Problems 30 (April): 425-36, 1983.
- Lynxwiler, John P., Neal Shover and Donald A. Clelland. "Corporate Size and Interactional Contexts: Determinants of Sanctioning Severity in a Regulatory Bureaucracy." In Ellen Hochstedler (ed.), Corporations as Criminals in Theory and Practice. Beverly Hills, CA: Sage Publications, forthcoming.
- Manning, Peter K. Police Work. Cambridge, Mass.: MIT Press, 1977.
- Maynard, Douglas W. "Defendant Attributes in Plea Bargaining: Notes on the Modeling of Sentencing Decisions." Social Problems 29 (April): 347-60, 1982.
- McCleary, Richard. "How Structural Variables Constrain the Parole Officer's Use of Discretion." Social Problems 23 (December): 209-20, 1975.
- McConnell, Grant. Private Power and American Democracy. New York: Knopf, 1966.

- Mileski, Maureen. Policing Slum Landlords: An Observation Study of Administrative Control. Unpublished doctoral dissertation, Yale University, 1971.
- Mitnick, Barry M. The Political Economy of Regulation. New York: Columbia University Press, 1980.
- Muir, William K., Jr. Police: Streetcorner Politicians. Chicago: University of Chicago Press, 1977.
- National Research Council. Rehabilitation Potential of Western Coal Lands. Cambridge, Mass.: Ballinger, 1974.
- National Research Council. Surface Mining: Soil, Coal and Society. Washington, D.C.: National Academy Press, 1981.
- Nivola, Pietro S. "Distributing a municipal service: A case study of housing inspection." Journal of Politics 40 (February): 59-81.
- Office of Surface Mining. Inspection Activity Reports. Washington, D.C.: Division of Inspection and Enforcement, 1978-81.
- Pressman, Jeffrey L. and Aaron Wildavsky. Implementation. Berkeley: University of California Press, 1973.
- Piliavin, I. and S. Briar. "Police Encounters with Juveniles." American Journal of Sociology 70 (September): 206-14, 1964.
- President's Commission on Coal. Coal Data Book. Washington, D.C.: U.S. Government Printing Office, 1980.
- Reiss, Albert J., Jr. The Police and the Public. New Haven, Conn.: Yale University Press, 1971.
- Sacks, Harvey. "Notes on Police Assessment of Moral Character." Pp. 280-93 in David Sudnow (ed.), Studies in Social Interaction. New York: The Free Press, 1972.
- Save Our Cumberland Mountains. A Study of Tennessee Strip Mine Enforcement, 1972-77. Knoxville: East Tennessee Research Corporation, 1978.
- Save Our Cumberland Mountains. A Study of Tennessee Strip Mine Enforcement, 1981. Knoxville: East Tennessee Research Corporation, n.d.
- Schuck, Peter. "The curious case of the indicated meat inspectors." Harpers Magazine 245 (September): 81-92, 1972.

- Shover, Neal. "The Criminalization of Corporate Behavior: Federal Surface Coal Mining." Pp. 98-125 in Gilbert Geis and Ezra Stotland (eds.), White-Collar Crime: Theory and Research. Beverly Hills, CA: Sage Publication, 1980.
- Shover, N., D.A. Clelland and J.P. Lynxwiler. Constructing a Regulatory Bureaucracy. Research report submitted to the National Institute of Justice, Washington, D.C. (October), 1982.
- Smith, H.W. Strategies of Social Research: The Methodological Imagination (2 ed.). Englewood Cliffs, N.J.: Prentice-Hall, 1975.
- Stacks, John P. Stripping. New York: Sierra Club, 1972.
- Sudnow, David. "Normal Crimes: Sociological Features of the Penal Code in a Public Defender's Office." Social Problems 12 (Winter): 255-70, 1965.
- Swigert, V.L., and R.A. Farrell. "Normal Homicides and the Law." American Sociological Review 42 (February): 16-32, 1977.
- Sikes, R.E. and J.P. Clark. "A theory of deference exchange in police-civilian encounters." American Journal of Sociology 81 (November): 584-600, 1975.
- Thomas, John M. "The regulatory role in the containment of corporate illegality." Pp. 107-40 in Herbert Edelhertz (ed.), Development of a Research Agenda on White-Collar Crime. Seattle: Battelle Human Affairs Research Centers, 1980.
- U.S. Department of Energy. Coal Data: A Reference. Washington, D.C.: Energy Information Administration, 1980.
- U.S. Department of Energy. Coal Production--1979. Washington, D.C.: Energy Information Administration, 1981.
- U.S. Department of Energy. Energy Data Report. Washington, D.C.: Energy Information Administration, 1981a.
- U.S. Department of the Interior. Surface Mining and Our Environment. Washington, D.C.: U.S. Government Printing Office, 1967.
- Weatherley, Richard and Michael Lipsky. "Street-level bureaucrats and institutional innovation: Implementing special education reform." Harvard Educational Review 47 (May): 174-98, 1977.
- Webb, E.J., D.T. Cambell, R.D. Schwartz and L. Sechrest. Unobtrusive Measures: Nonreactive Research in the Social Sciences. Chicago: Rand McNally & Company, 1966.

- Wilson, James Q. Varieties of Police Behavior. Cambridge, Mass.: Harvard University Press, 1968.
- Wilson, James Q. The Politics of Regulation. New York: Basic Books, 1980.
- Yin, Robert K. "Studying the implementation of public programs." Pp. 36-72 in Walter Williams (ed.), Studying Implementation: Methodological and Administrative Issues. Chatham, N.J.: Chatham House Publishers, 1982.

VITA

John P. Lynxwiler was born May 3, 1951 in Wichita, Kansas. His parents, Gladys and John, have three other children, Judith Ann, Toni Jean, and Bret De. John was married in 1972 to Cissi Holt of Demopolis, Alabama. They have two children, Elizabeth Ann (born 1972) and John Christopher (born 1976).

After completing four years of service in the United States Air Force, John entered Livingston University (Livingston, Alabama) in the spring of 1975. Majoring in sociology and minoring in fine art, he graduated cum laude in 1977 with a Bachelor of Science degree.

In the fall of 1977, John entered the graduate sociology program at The University of Tennessee, Knoxville. He received his Master of Arts degree in 1980. His Doctorate of Philosophy degree was completed in 1983. John is presently an assistant professor in the department of sociology at the University of Alabama in Birmingham.