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A PROCESS APPRAISAL OF COMPREHENSIVE
HEALTH PLANNING AT THE STATE LEVEL

DISSERTATION

Presented in Partial Fulfillment of the Requirements for
the Degree Doctor of Philosophy in the Graduate
School of The Ohio State University

By
William J. Waters, B.S., M.P.A., M.S.

* * * * *

The Ohio State University
1974

Reading Committee:

Thomas N. Chirikos, Ph.D.
Richard R. Lanese, Ph.D.
Martin D. Keller, M.D., Ph.D.

Approved By

[Signature]
Adviser
Department of
Preventive Medicine
Many individuals contributed to the satisfactory completion of this dissertation. However, the central role of one individual deserves special recognition and gratitude. I was most fortunate to have had a very competent and active Committee Chairman, Thomas Chirikos. He gave generously of his time and of himself. I will always be in his debt for helping me to chart the course, and for constantly encouraging me to do my best.

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VITA

August 6, 1945... Born—Key West, Florida

1967............ B.S., Holy Cross College, Worcester, Massachusetts


1972............ M.S., The Ohio State University, Columbus, Ohio

1972-1974........ Teaching Associate, Department of Preventive Medicine, The Ohio State University, Columbus, Ohio

PUBLICATIONS


FIELDS OF STUDY

Major Field: Health Policy and Planning

Studies in Health Planning. Professors Thomas N. Chirikos and Douglas R. Brown

Studies in Epidemiology. Professors Martin D. Keller and Richard R. Lanese


Studies in Environmental Health. Professor Charles E. Billings

Studies in Medical Care Administration. Professor Roger M. Battistella
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I. INTRODUCTION

Purpose And Direction Of The Study

Nature Of The Problem

Public Law 89-749, the Comprehensive Health Planning and Public Health Services Amendments of 1966, was signed into law on November 3, 1966 and took effect on July 1, 1967. This Act, among other things, provided for: 1) "Grants to States for Comprehensive State Health Planning," 2) "Project Grants for Areawide Health Planning, and 3) "Project Grants for Training, Studies, and Demonstrations." Since the enactment of P.L. 89-749, as amended, more than $100 million in Federal money has been spent on the Comprehensive Health Planning (CHP) programs. Under the Fiscal Year 1974 budget, the Comprehensive Health Planning programs were scheduled to receive $38.3 million in Federal funds. Currently every State has a State CHP agency, and there are over 200 Area-wide CHP agencies. These agencies must match Federal dollars with local dollars on a 75/25 or 50/50 basis depending on Federal regulations.

Opinions differ regarding the effectiveness of the CHP programs. Roseman listed a number of problems which he believed contributed to "CHP failure." He summarized these
problems as follows: "(1) a pattern of conflict avoidance in policy formulation and goal establishment, (2) a failure to deal with root causes of health problems, (3) a lack of political influence, leadership, or expertise, coupled in some States with a naive supportive clientele inside and outside of the health field, (4) grossly inadequate funding to provide plans for comprehensive health care delivery in light of anticipated universal health insurance." Another article summarized the thinking about CHP programs in this way: "Assessments of CHP vary from a few hymns of praise to a multitude of harsh indictments." Briefly put, there has been concern about CHP's funding levels and sources, political legitimacy, implementation powers, and planning procedures.

In any event, an appraisal of the CHP program would seem to be critical from any or all of the following four perspectives. First, all sizeable Federal expenditures should be monitored on a continuous basis to determine the efficiency and effectiveness of those expenditures. Thus, continuing assessments of the CHP programs are needed to determine if they are meeting their legislative mandate to a maximal extent. Second, a widespread feeling exists that there is a health care crisis in the U.S. Berki and Heston offer "five salient symptoms" of this crisis: 1) "Shortages in the availability of providers and resources...," 2) "High and still rapidly rising costs...," 3) "A significant rela-
tive enlargement of the medical care sector," 4) "The patient is lost in the maze," and 5) "There has been no concomitant improvement in health levels...."? Since the CHP programs were intended to have a positive impact on health and health service problems, an assessment of their effectiveness is especially critical during this crisis period. Third, many CHP agencies have been in existence for five or six years now, so there has been a sufficient lapse of time to warrant serious progress evaluations. That is, the CHP agencies have been in existence long enough now for trends and patterns to be discerned. Fourth, it would seem to be an appropriate time to examine the current level of CHP achievement, since new health planning legislation is currently being debated. We may be at a crossroad in the history of health planning in the U.S. Therefore, it would be desirable to review past experiences in order to be able to prepare better for the future.

**Research Objectives**

This dissertation is aimed at contributing to the ongoing assessments of the CHP programs, at a time that seems particularly suitable for such assessments. The research has two primary objectives. The first objective is to construct a set of evaluation criteria for the process of comprehensive health planning. The second objective is to measure the extent to which the activities of the CHP agencies are in compliance with the evaluation criteria. It is
hoped that the attainment of these two objectives will contribute to the goal of advancing the practice of health planning in the United States.

The first objective is essential because while P.L. 89-749 mandated comprehensive health planning, neither the law nor the ensuing regulations and guidelines provided a detailed definition of that process. In order to conduct a process appraisal, however, a systematic and explicit statement of the norm is required. Thus, in order to evaluate the activities of CHP agencies, it will first be necessary to establish a set of evaluative criteria. (See Chapter II.)

Of course, one might legitimately question whether the planning processes of all CHP agencies can be, or should be appraised using the same criteria. There are, obviously, some attributes of health planning which will vary from place to place and time to time (i.e., contextual characteristics). However, it is the author's belief that the fundamental steps of planning should remain the same regardless of geographical, temporal, or organizational locus. This belief in a common (albeit not sufficient) element in all planning endeavors is one shared by many experts in the field. Davidoff and Reiner state that "The theory presented is a general one, applying to all fields, and is not restricted to planning in an urban context...for the same steps are followed no matter what the substantive or geographical
focus." Faludi states that "all these types of planning will have something in common which is the planning method." Perhaps Holder and Deniston state the idea best when they wrote "Dimensions of planning may also vary in purpose, subject matter, scope, depth, formality, time, area covered, and so forth. However, the basic elements of the planning process are applicable to all dimensions." Therefore, the fundamental steps (i.e., the process) of comprehensive health planning are defined as that part of comprehensive health planning practice which should remain relatively constant regardless of the geographical, political, or organizational setting (i.e., the essence). The conceptual statement on these fundamental steps serves as the yardstick for an appraisal of planning practice.

The second objective is to measure the extent to which the fundamental steps of comprehensive health planning have actually been operationalized or implemented by the CHP agencies, i.e. to compare and contrast concept and practice. The empirical portion of the study is aimed at answering the following three questions. The first question is: Are CHP agencies planning? Here an effort is made to measure whether those agencies which have organized for the purpose of conducting comprehensive health planning are actually planning as defined by the conceptual statement. The second question is: Are the activities of CHP agencies focused on health? P.L. 89-749 declared that the "fulfillment of our national
purpose depends on promoting and assuring the highest level of health attainable for every person, in an environment which contributes positively to healthful individual and family living." Thus, an attempt is made to determine if the primary concerns of CHP agencies are appropriate in light of the fact that they proclaim to be planning for health. This determination is made using questions drawn from that section of the conceptual statement which describes the essentials which are added to the fundamental planning steps when health is their subject matter. The final question is: Are the activities of CHP agencies comprehensive in scope? Once again, this question is answered in light of the conceptual statement—specifically that part that deals with the essentials which are added to health planning when it is intended to be comprehensive in scope.

It is hoped that by highlighting any possible discrepancies between the concept of the fundamental steps of comprehensive health planning and the practice of planning the appraisal will generate constructive concern and positive movement. Litsios expressed well the relative paucity of experience with this type of appraisal, but, also, the great potential rewards of such appraisals:

With both the theory and practice of health planning being in an early stage of development, it is not too surprising to find the practice of evaluation (of health plans) in an equally primitive state.

If the planning process does not meet the standards assumed..., plan evaluators will
be frustrated. Rather than do nothing, however, they may hasten the development of planning by systematically noting the deficiencies in the existing planning mechanism.13

Methods

It is necessary to employ both conceptual and empirical research methods in order to approach the two main objectives of this dissertation.

First, the normative statement on the process of comprehensive health planning is built from the existing literature. References were selected for reading and study which emphasized the procedural and technical requirements of planning and health planning, not those which focused on the institutional, organizational, and participatory aspects of planning. Further, within this specific category of planning and health planning references, those that dealt with the subject in a general or generic sense were primarily selected, not those that dealt with it in a highly particular or partial sense (e.g., health facilities planning, and health manpower planning). (See the "Planning Concepts," and "Health Planning Concepts" sections of the Selected Bibliography.) Partial planning tasks, per se, are only of interest in so far as their relationship to the entire planning process is concerned. Thus, most of the contemporary literature dealing in a generic way with planning and, especially, health planning steps, tasks, and techniques was reviewed and analyzed. In this regard, Donabedian's
thoughts on normative standards are worth recounting: "their distinctive characteristic is that they stem from a body of legitimate knowledge and values rather than from specific examples of actual practice."14

The author pulled from the literature those points regarding the process of planning for health comprehensively which were widely held to be critical. The conceptual statement on the fundamental steps of comprehensive health planning is based principally on these common, essential points. At the same time, however, the conceptual statement does indicate major variations and disagreements in regard to planning process paradigms. Therefore, the conceptual statement is eclectic in the sense that it borrows very heavily from various planning and health planning authors. It is, also, synergistic in the sense that it weaves the literature together in a way that is nowhere available at the moment.

Further, the conceptual statement is constructed utilizing both deductive and inductive reasoning. General planning concepts are utilized to deduce the ideal nature of comprehensive health planning. By the same token, specific health planning concepts are used to induce the ideal nature of generic planning. Thus, the conceptual statement relies greatly on the logic of its construction for its credibility and acceptance.
The conceptual statement does not attempt to describe actual planning behavior, rather it attempts to state normatively how health planners should go about planning for health comprehensively. The way in which the author views the conceptual statement is similar to the perception of such constructs held by Chadwick: "A fully rational theory of planning...is obviously at odds with reality, but this is not to say that a rational theory is of no use. It can be regarded as normative, as an ideal construct. Rationality can be regarded, and may be necessary as a yardstick." Davidoff and Reiner took a similar approach: "But our article was not a description of current planning behavior; we sought to state how planners should act if they were to plan as we defined the process."^15

Second, the measurement of comprehensive health planning, in light of the conceptual statement, utilizes two empirical methods. These methods are employed in order to cope with the two main technical problems which concern all scientific researchers: sampling errors and nonsampling errors. Sampling errors are those errors of inference which arise because not all of the elements of a universe are investigated. Nonsampling errors are those errors of measurement which would occur even if all elements in a universe were investigated.^17

On the one hand, a mailed questionnaire survey of CHP agencies is conducted. (See Chapter III.) The survey
instrument is made to be as specific and direct as possible, in order to allow for future replication of the study. As Donabedian states: "The major mechanism for achieving higher levels of reliability is the detailed specification of criteria, standards and procedures used for the assessment..." The conceptual statement on the fundamental steps of comprehensive health planning serves as the inspiration and the ground for the survey instrument. As Chadwick put it: "recognition and description of the system and the formulation of criteria for its testing advantageously proceed side by side." The survey instrument incorporates a set of questions which are devised in such a way that the responses to such questions reflect whether and to what extent the fundamental steps of comprehensive health planning are being implemented by the agencies being probed.

With respect to data analysis, the survey results are primarily analyzed in a univariate fashion. That is, the percentages of agencies which completed certain planning steps, tasks, and techniques are presented. In addition, the author's interpretation of these descriptive findings are presented. Finally, some bivariate and multivariate analyses are conducted in an attempt to understand the dynamics of the process being investigated. These analyses are conducted utilizing a planning index constructed from the survey findings.
On the other hand, a case study of one CHP agency is conducted in order to compliment the survey. (See Chapter IV) The case agency's activities are compared to the conceptual statement on the fundamental steps of comprehensive health planning in toto. That is, unlike the survey no concrete bridging instrument is used. The investigator uses all of the following information gathering resources in the case study: 1) reading the recorded activities and products of the case CHP agency, 2) direct observation of the formal and informal work conducted by the case agency during the study period, and 3) personal discussion with the case agency's staff and volunteers to elicit their individual opinions. Thus, the case study is designed to allow for flexibility and spontaneity in investigating and reporting.

The CHP agency chosen for case study was selected on the basis of its presumed representativeness, as well as, on the pragmatic basis of geographic proximity to the author. The author spent approximately six months conducting the case study. Such an indepth investigation should minimize nonsampling errors. The case study perceptions are presented in the same format as the survey findings. That is, the perceptions are organized around the five fundamental steps of planning.

Thus, it is believed that by combining the mailed survey and case study research methods, a fairly accurate
reading can be obtained regarding whether, and if so to what extent, the State CHP agencies have implemented the fundamental steps of comprehensive health planning.

Scope And Focus Of The Study

First, with regard to the scope of this study, Section 314(a) of Public Law 89-749, as amended, authorized the Surgeon General to make grants to States "in order to assist the States in comprehensive and continuing planning for their current and future health needs." In order to obtain funds under the law, a State had to designate or establish a single State agency for administering the State's health planning activities. The State also had to create a State Health Planning Council, to include representatives of public and voluntary agencies concerned with health and consumers of health services. A majority of the Council's members have to represent consumers of health services. The purpose of the Council is to advise the designated State agency. By July 1, 1968 all States had received their initial funding under this authorization. This appraisal of CHP programs is limited to these State Comprehensive Health Planning Agencies (State CHP agencies).

One reason for selecting State CHP agencies for appraisal at this time and not, say, Areawide CHP Agencies, is that the State agencies appear to be more closely tied to the decision-making process. Areawide CHP agencies appear
to have few, if any, formal links to community decision-makers. State CHP agencies, however, have clear-cut ties to State governments which have generally played an active role in health affairs. Theoretically, then, (all other things taken as equal) these close relationships would seem to auger for more intensive health planning experience at the State level. Therefore, at this time it seems worthwhile to delimit the appraisal to State agencies.

It also seems appropriate to concentrate on the State level because it was, in fact, one of the original purposes of the CHP legislation to enhance the capacity of the States to govern themselves. P.L. 89-749 stated that "desirable administration requires strengthening the leadership and capacities of State health agencies." This particular goal of P.L. 89-749 was discussed by Battistella & Weil and Kane, among others. For example, Battistella & Weil state:

The opportunity and inducement given states to reactivate historic powers of leadership responsibility for health affairs within their borders constitutes the heart of the Comprehensive Health Planning Act. The first objective is to encourage the states to develop and carry out comprehensive health planning. The second objective is to give state health agencies greater administrative freedom and flexibility in decision-making. Comprehensive health planning is clearly designed to strengthen state government at a point in time when state government is undergoing a renaissance....

Further, Feingold pointed out that "Public Law 89-749 provides the health planner with a potential sanction he did not have before its passage...the requirement that Public Health Service block grants be spent in accordance with the
plan,* (i.e., such plans as have been developed under the State CHP agency's auspice). Thus, there are both theoretical and legislative reasons for concentrating on comprehensive health planning at the State level.

It must be recognized that appraising State health planning to the exclusion of national and local health planning necessarily produces a somewhat unbalanced view of the strengths and weaknesses of health planning in the U.S. It is clear that effective State health planning is dependent, to some degree, on effective Federal and local health planning. Yet, none of the three levels can transfer its own planning responsibilities to a higher or lower level. The parameters of health planning will, certainly, differ among these three distinct planning levels. This does not mean, however, that State planning activities cannot be assessed in the absence of an "over-all" appraisal. Holder and Deniston point out that "different groups may make decisions at the same point in the planning process but at different levels of detail or specificity." For example, in Battistella & Weil's view: "In addition to laying down general guidelines, the state health department's principal functions in relation to the regional agencies would involve the resolution of competing claims and coordination of plans for the preparation of an over-all integrated state plan." This research effort concentrates on whether or not the State CHP agencies are carrying their weight, in terms of
planning responsibilities appropriate to their level in the planning structure.

Second, with regard to the focus of this study, over the past decade a number of analyses and assessments of both Areawide and State health planning agencies have been conducted. With only one exception, viz., the study conducted by Frieden & Peters, these investigations have analyzed and assessed areawide and state health planning agencies primarily from the perspective of organization and participation. That is, they have analyzed health planning agencies primarily with regard to their location within external socio-political structures, and/or their own internal organizational structures. These appraisals and analyses have largely neglected the technical and methodological aspects of health planning.

It would appear that the time has come for analyses and assessments of areawide and state health planning agencies from the perspective of planning steps and tasks. A number of health planning authors indicate that it takes from two to five years to complete a plan; we can therefore, legitimately expect that all state CHP agencies have completed a plan or are well along on the development of a plan by now. Thus, the time would seem ripe for an appraisal of state CHP agencies using procedural and methodological (i.e., process) criteria. It is, in fact, this perspective which constitutes the main focus of this dissertation.
It should be noted that the term "process" is used here in a different way than it is frequently used in health planning circles. Many U.S. health planners interpret the term "process" as being synonymous with "involvement", "give and take", "input", and "participation". Here "process" refers to essential activities, not who participates or how participation is structured. That is, here "process" refers to the question of involvement in what, not involvement per se. Thus, we draw a distinction between the process of planning and the various modes of participation in that process (e.g., the generic comprehensive health planning process v. CHP advisory council requirements).

**Framework And Foundation For The Study**

First, in order to analyze any planning operation systematically, an overall framework is required. Such a framework would divide planning operations into logical parts, and identify the relationships between the parts. In fact, a number of planning researchers have offered frameworks for the analysis of planning operations. One that has particularly attractive features was proposed by Brown who suggested that: "an appropriate framework for categorizing possible methods for achievement of planning councils is to be found in Avedis Donabedian's work on evaluating the quality of medical care." Accordingly, Brown advanced the following three approaches for evaluating health planning
activities: 1) structure, 2) process, and 3) outcome.34

The framework used in this study is based primarily on the Donabedian model, although it incorporates the ideas of the other authors as well. An elaboration of the framework is presented at this point in order to put this study into proper perspective. A brief sketch of the model should clarify the limited scope of this study. However, the presentation will also make it clear that the limited boundaries of this study were arrived at by conscious choice, not blind neglect.

The overall framework for planning research, thus, can be divided into the following three major components.

**Contextual Characteristics**

We refer to the "structure" of planning as its contextual characteristics. These characteristics are not constant or fixed. In fact, no two planning endeavors will have exactly the same constellation of contextual characteristics. For the purposes of logical presentation, the contextual characteristics can be organized into the following three divisions.

**Historical antecedents**—Planning endeavors can be characterized by the social, political, and economic forces which preceded them in history. Glass says that "whenever a scheme for the evaluation of planning is devised, there is one field of study which is indispensable—that of the
social influences in the history and trends of planning thought." Thus, primarily on an international basis, the contexts of planning endeavors can be distinguished by their: a) traditional socio-cultural values, b) past political stability, c) traditional standard of living and rate of economic growth, and d) past utilization of planning concepts and techniques.

Contemporary milieu—Planning endeavors can also be characterized by their present social, political, and economic milieu. Silvester asserts that "in a more complete system the environment of the action would be equally important" as the action. Thus, mostly on an international level but also on an intranational level, the contexts of planning endeavors can be distinguished by their: a) present demographic characteristics (e.g., age, sex, race, religion, areal distribution, etc.), b) present locus of resource allocation decisions (i.e., public v. private), c) present type of political system (e.g., republic—social democracy—totalitarian state), d) present locus of government decision-making (i.e. centralized v. decentralized), e) current standard of living, and f) current understanding and acceptance of planning.

Immediate situation—Planning endeavors can also be characterized by their immediate administrative structures and relationships. McDougall states that "one must understand the structural context within which action occurs and
Thus, both on an international basis and on an intranational basis, the contexts of planning endeavors can be distinguished by:

a) the extent of legal legitimization of the planning mission (e.g., mandates for planning embodied in legislation, and administrative regulations and policies),

b) the primary decision-maker or makers to whom the planning unit is responsible (i.e., lines of authority—administrative or organizational placement),

c) the level of commitment of the decision-makers and planners to the planning activity (i.e., personal agreement with, interest in, and enthusiasm for planning),

d) the locus of the planning unit in the planning network (i.e., the vertical and horizontal relationships of the planning unit to other planning units),

e) the geo-political boundaries of the planning unit (i.e., the geographic area and encompassing political divisions for which the planning unit is to plan),

f) the internal organizational structure of the planning unit (i.e., Table of Organization or arrangement of staff, committees and task forces),

g) the quantity and quality of resources available to the planning unit (i.e., finances, information, manpower, equipment, facilities, and time),

h) the sources of resource support including their number and the magnitude of their contributions,

i) the locus of planning decisions (i.e., are planning decisions made primarily by the full-time professional staff or by part-time
consultants and/or volunteers), j) the autonomy of planning decisions (i.e., the degree to which the decision-makers actually participate in the formulation of planning decisions), k) the breadth and depth of participation of the system's operators and beneficiaries in the planning process (i.e., providers and consumers), l) the extent of special authority available to the planning unit to implement planning decisions (i.e., the degree to which developmental and/or regulatory functions have been coupled with the planning function).

In concluding this section of the framework, it can be stated that most of the health planning studies conducted in the United States, to date, have mainly addressed issues relating to contextual characteristics.

Fundamental Steps

We refer to the "process" of planning as the fundamental steps of planning. These steps should remain essentially the same regardless of the contextual characteristics. That is, despite geographic, social, political, economic, and temporal differences, planning should be planning. From a conceptual or normative standpoint the fundamental steps of planning should consist of: 1) Task Design which includes defining the system of interest and planning itself, 2) System Investigation which includes projecting system characteristics and selecting problem priorities, 3) Ends Establishment which includes the setting of goals and targets, 4) Means
Selection which includes the identification and comparison of alternative interventions, and 5) Intervention Evaluation which includes determining if goals have been reached via the preferred means. The fundamental steps of planning are the primary concern of this study. Since they are thoroughly defined and discussed in Chapter II, further comment at this point is not required.

Ultimate Results

We refer to the "outcome" of planning as its ultimate results. While most empirical planning research to date has focused on "structure", very little of empirical planning research has been directed at "outcome". In two conceptualizations of the outcomes of planning, Ewing lists seven "ideal" accomplishments and Litsios lists five things an "effective" planning system must do.

Planning is intended to have a direct effect on decision making and an indirect effect on execution or implementation (i.e., through decision-making). Therefore, it would seem reasonable to divide the intended results of planning into two main categories: 1) effects on decision-making, and 2) effects on the planned for system.

Impact on decision-making--There is the hope that planning will result in better, more rational and reasonable decisions. Holder and Deniston write that "the hypothesis of those who advocate planning is that better decisions
result with planning than without it." Friedmann states that "the most the planners can hope for is the most rational decision under the circumstances." Davidoff and Reiner state that "the goal for decision-making should be increasing the degree of assurance that the choice made was at least as reasonable or more reasonable than any other alternative." The problem here, of course, is to operationalize the concepts of better, more rational, and reasonable with respect to decisions.

One way to define a "good" decision is on the basis of whether: 1) the ends have been clearly identified, 2) the alternative means have been carefully considered, and 3) the selected means are the most appropriate in light of the established ends. In terms of planning outcomes, then, the question would be whether or not these three conditions of decision-making exist in the presence of planning, and if so, whether they exist to a greater extent in the presence of planning than they do in the absence of planning.

Impact on the system—There is also the hope that planning will result in a more effective and efficient system (i.e., the system being planned for). Navarro states that "The purpose of planning is to rationalize the activities on which planning is imposed, to make subject to calculation what was previously left to chance, and to replace spontaneous adjustment by deliberate control." Rosenthal says: "The performance of planning must be evaluated in terms of
the degree to which it changes the outcome of the operating system in a manner which moves that outcome closer to that desired by the planner." May writes that "For a planned system to be better than an unplanned one, it is necessary that the planned behavior and solution be demonstrably superior to those which would have existed without planning." 

Thus, the outcome of planning in terms of its impact on the system could be defined in terms of the following two components: 1) whether or not the system has changed in the way the planners desired, 2) if so, whether or not this desired change was more satisfactory than it would have been in the absence of planning.

To summarize, then, the intended results or outcomes of planning are:

1. To improve the capacity for intelligent self-direction within a system.

2. To improve the capacity for intelligent self-control and correction within a system.

It seems clear, at this stage in the development of health planning in the United States that it is probably too early to conduct assessments concerning the ultimate results of health planning. However, it certainly is not too early to begin thinking seriously about what those results should be, and how they could be measured at some future point in time.
Next, the purpose of Chapter II is to layout criteria defining the process of comprehensive health planning. Since that Chapter deals with concepts which are often misunderstood, the following preparatory material is presented at this time.

**The Planning Function**

Decision-making is the process of making final choices or commitments. Planning is an adjunct to the decision-making process. The purpose of planning is to enlighten the decision-making process. Planning is thinking before deciding. Decision-making is deciding before doing. Thus, while the heart of decision-making is final choice, the essence of planning is definition and analysis. Decision-making takes place in many different contexts (e.g., political and administrative). Implementation or execution is the process of performing or carrying-out those actions which have been chosen in the decision-making process. Execution or implementation can be accomplished primarily through programming and/or regulation.

Therefore, while the processes of planning, decision-making, and execution are obviously interdependent and closely intertwined, it is necessary for the purposes of discussing planning in conceptual terms to separate them. (See Figure 1) In this regard Dror states: "Even if the same unit combines planning functions with authority to approve and execute, these are distinct, though interdependent
Planning

↓

task design

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system investigation

↓

ends establishment

↓

means selection

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intervention evaluation

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Decision-making

←

RESULTS

-->

Execution

Fig. 1. -- The Planning Role
processes which must be kept analytically separate."* 47

On the one hand, there are many different models for decision-making. For example, Dyckman indicates that decisions can be made by reference to traditional norms, intuition, or rational analysis.** 48 We might want to add emotion to this list, and also acknowledge that any particular decision can be made on the basis of any or all of these factors.

On the other hand, there is really only one model for planning. It is widely accepted that planning is an intellectual process of relating ends and means. Thus, Dror states that "The very nature of planning as a process for rational shaping of the future according to our desires, depends on the means-ends relationship, which is basic to the planning process."** 49

There are differences, however, among planning concepts and theories with regard to the relative emphasis placed on ends or means in the planning process. In fact, this is the primary distinction among planning concepts and theories. Beyond this primary distinction, there are secondary distinctions which have to do with the concepts' or theories': 1) completeness, 2) depth, and 3) sequencing.

Planning Assumptions

Planning is commonly based on five primary premises. First, there is often the belief that change is desirable. Bolan states that "the planning process is basically
Arnold says "the core of any planning process is its information." Fifth, planning is infused with values. That is, planning should not be a purely scientific-technical operation but should, also, incorporate social preferences. McDougall maintains that "Any theory of planning which evades the normative character of planning...will either result in professional inertia or be based on self-deception." Sixth, planning should be repetitive. It should be a circular, continuous process. Theoretically, there should be no end to the planning process. Like a cybernetic system, there should be a constant process of adjustment through many feedback loops. A WHO Expert Committee states that "it cannot be overstressed that planning is a continuous process." Rosenthal states that "Circularity is essential to effective planning."  

Planning Levels

Planning can take place at all levels of decision-making. In fact, planning should be employed to enlighten decision-making at every level. Therefore, the planning function can be inaugurated at all of the following levels of human commitment: 1) individual, 2) familial, 3) group, 4) program, 5) institutional, and 6) community. Community level planning includes local, regional, state, national, and international planning activities. Although the parameters and variables will change from one planning level to another, the essence of planning should remain constant.
In effective planning systems, the planning activities at different levels are logically integrated.
FOOTNOTES


2In a telephone conversation on July 9, 1974 the Comprehensive Health Planning Service, Health Resources Administration, Department of Health, Education and Welfare indicated that a total of 139.7 million dollars in Federal funds alone had been obligated to the 314(a) and (b) agencies since the beginning of the programs (i.e., up to the end of FY'74).


10Davidoff & Reiner, p. 103.
11Faludi, p. 75.
12Holder & Deniston, p. 560.
16Dakin, p. 23.
17For a detailed discussion of these two types of errors, See: L. Kish, Survey Sampling, (New York: John Wiley & Sons, Inc., 1965), pp. 509-573.
18Donabedian, p. 183.
19McDougall, p. 85.
20U.S. Congress, op. cit.


27. Holder & Deniston, p. 562.


This general approach was suggested by May some time ago. See: Selected Papers on Health Planning, (Health Administration Perspectives No. A8, Chicago: University of Chicago, 1969), pp. 39-43.


For Donabedian's model, See: Donabedian, "Evaluating the Quality of Medical Care," pp. 166-206.

Glass, p. 408.

37McDougall, p. 82.


40Holder & Deniston, p. 562.


42Davidoff & Reiner, p. 110.

43This is similar to the definition of rationality given in: M. Meyerson and E.C. Banfield, Politics, Planning, and the Public Interest, (Glencoe, Ill.: The Free Press, 1955), pp. 314-315.


45Rosenthal, p. 293.


52Dakin, p. 21.


57Holder & Deniston, p. 562.


60McDougall, p. 87.


II. THE FUNDAMENTAL STEPS OF COMPREHENSIVE HEALTH PLANNING

Introduction

In order to appraise or evaluate any program (be it a service, planning, or some other type of program), there is the necessity of specifying a standard or target. Opti­mally such a standard should be developed prior to the initiation of the program (i.e., ex ante). However, in some circumstances it is necessary to develop such criteria after a particular program has already been initiated (i.e., ex post). This is one such circumstance.

At the time of this study no detailed, precise standard existed for the appraisal of comprehensive health planning at any level. Thus, the following material (Chapter II) represents an attempt to develop "process" criteria for the appraisal of planning programs whose stated mission is to plan for health comprehensively. These criteria will then be used to appraise comprehensive health planning at the State level in the U.S. (i.e., Chapters III and IV).

Method

It should be pointed out that this standard was developed around an outline which incorporates two conceptual
devices. First, the planning process is presented as a perpetually revolving sequence of discrete steps. From both a conceptual and practical perspective, these steps cannot be as discrete as they are presented here. Actually, there must be a great amount of constant interaction between the steps (See Figure 2). However, the steps are presented in a relatively discrete fashion here in order to: 1) simplify the argument, and 2) indicate the primary or main flow of the planning process. Second, each of the five steps is divided into three sections: 1) planning, 2) health focus, and 3) comprehensiveness. Obviously, this is a relatively artificial way to present the process of comprehensive health planning. However, the standard is presented in this fashion in order to make explicit the deductive, logical thought processes which were utilized in its production by working out the implications of each term in the phrase comprehensive health planning. Basically, the following questions were addressed: 1) what is the function of planning in a generic sense, 2) what differences in planning exist if its subject matter is health, and 3) how can health planning be laid out such that it will be comprehensive in scope? The premise here is that each of these three things (i.e., function, subject matter, and scope) must be thoroughly grasped before the process known as comprehensive health planning can be intelligently approached. As Hilleboe concludes: "Organized knowledge
Fig. 2. -- The Fundamental Steps of Planning
can be brought to bear only by those who possess it."

Finally, the ideal nature of the following conceptual statement must be emphasized further because of the cyclical, continuous nature of the planning process. Obviously, it should be expected that the operationalization of planning will improve over time (i.e., from one cycle to the next). Each succeeding cycle should be a closer approximation of the ideal. The concepts discussed here represent the ideal, or what the planning process should look like on some unspecified nth cycle. However, it would be impossible at this time to specify the ideal techniques for operationalizing the concept. All forms of planning depend upon continuous advances in the disciplines (e.g., statistics, survey methods, operations research, demography, etc.) for the upgrading of planning methods. Thus, the following standard was created by combining a conceptual ideal with the "current state of the art" of its methodological underpinnings.

The Statement

The operationalization of comprehensive health planning requires the completion of many tasks. In the following paradigm these tasks are organized into five fundamental steps.
Task Design

Generic planning requirements--The first step in planning is to answer the question: What Are We About? Planning itself must be planned (i.e., a plan for planning is required). Elling states: "Assuming that an adequate coalition of forces has been or can be gathered and planners have been given adequate sanction, the most crucial decision to be examined is the definition of the planning task." Kahn puts it this way: "An emphasis on the formulation of the planning task as a first phase, may, therefore, be seen as an effort to make conscious and deliberate the entire process."

Events experienced by the planners during previous planning cycles (in the cases of the 1st + n cycles) should be drawn upon to improve the upcoming cycle. This is an evaluation of the planning process itself (i.e., internal evaluation), as opposed to an evaluation of the policies and programs recommended and executed as a result of the planning process (i.e., intervention evaluation). Since the planning process is cyclical in nature, this task could be thought of as following the end of a planning cycle, or preceding the beginning of a planning cycle. Here it is placed at the beginning of the planning cycle in order to clearly distinguish it from Intervention Evaluation, and because its products are most relevant to Task Design. As a result of this internal evaluation, planning procedures can constantly
be clarified and refined over time in a conscious and systematic manner. While the application of certain procedures and techniques can be upgraded, the less effective and efficient procedures and techniques can be eliminated. Litsios claims that the planning process should include provision for: "a retrospective evaluation of the manner in which planning steps have been carried out, so as to improve the entire process."\(^4\)

Regardless of prior planning experience, the system of interest must be defined. That is, a definition must be chosen for the concrete, abstract, or conceptual system which is to be the object of the planning process. The system definition should include the identification of the system's boundaries, structures, processes, products, and outcomes. This activity is pivotal to the whole planning process because it will determine the focus and scope of the process. The necessity of this particular activity is widely agreed-upon by planning theorists. Rosenthal says that: "It is essential to define the relevant operating system within which changes are desired."\(^5\) Handler states that planning "must have its own subject matter which defines the system within which internal relations and between which and other systems of external relations have to be sought."\(^6\) The definition of the system of interest should be based to some extent, on an analysis of the logic and relevance of past system definitions in the light of
current issues. In other words, system definitions should change occasionally in order to reflect current concepts, theories, ideals, and urgencies. Kahn says that the "planner may find it useful periodically to pause in his work to look at the ways in which boundaries among intervention systems are currently drawn. Are they basically sound?"7 Faludi says: "Planning systems, whatever else they may do, form an image of their environment. If any given study is to be fruitful, the boundaries of the system must be appropriate to the problem."8

Also, a definition of the planning process, itself, must be chosen. That is, the steps and tasks of the upcoming planning cycle must be established or confirmed, and their sequencing must be laid out. These decisions are critical to effective planning. While the generic tasks of planning should always remain the same, the particular organizing steps, the incorporated techniques, and the particular sequencing of the steps and tasks can vary. The particular sequencing of steps is not as important as the act of establishing a logical sequencing, and making it explicit to all involved in the planning endeavor. It should be recognized that in time dimension the planner may be working on several steps simultaneously, or he may deviate from the sequencing pattern in some other way. However, it should, also, be recognized that on an intellectual plane, the planner should adhere to the sequencing
logic established prior to the beginning of that planning cycle. Schaefer states that "the cycles and processes of planning must be worked out, made explicit, and practiced faithfully."9

In addition, the major techniques which will be utilized in the furtherance of specific planning tasks should be chosen. The choice of specific planning tools should depend upon the level of sophistication which a particular planning program has reached. That is, there should be a reasonable balance between planning experience and expertise, and planning methods, both software and hardware. One would normally expect more sophisticated tools to be chosen for the nth + 10 planning cycle than the nth cycle. While the prospective list of operational tools cannot be final and complete, it can go a long way in terms of clarifying the upcoming planning cycle, and thereby help to avoid unnecessary delay and confusion. For example, Litsios says "A thorough analysis of the types of predictions likely to be required in the course of planning should be undertaken early...."10

Further, two types of time frames need to be chosen for the upcoming planning cycle. First, an estimate needs to be made with regard to the anticipated length of the planning cycle itself. That is, how much time is required to complete one full cycle of the planning process? Will it take two years, five years, or how many? Conceptually,
later planning cycles (e.g., nth + 25) should require less time than earlier planning cycles (e.g., nth + 5). This is due to the assumption that the foundation for planning will be continuously expanded and strengthened.

Second, a choice needs to be made with regard to the planning horizon. That is to say, for what terminal point are we planning? Are we planning for the short-term (e.g., 1-2 years), the medium-term (e.g., 5 years), or the long-term (e.g., 10 or more years)? This decision will affect every aspect of the planning process and should, therefore, be made deliberately and consciously. The selection of the terminal period should be based on a number of considerations. The terminal period should be compatible with the length of political cycles, and the time covered by budget periods. This will enhance the usefulness of the planning process to the decision-making process. In selecting a planning horizon, the rate of change within the planned for system should, also, be taken into account. The general period of time over which reasonably accurate projections or forecasts can be made should, also, be considered in choosing a terminal period. Finally, the types of ends being pursued, and interventions being weighed should influence the selection of planning horizons. Obviously, no single terminal period is likely to be satisfactory from all of these perspectives. Thus, it is preferable to utilize more than one terminal period in the planning process.
(e.g., both long and short range horizons). Further, it should be acknowledged that planning horizons or terminal periods can change as one moves through the planning process in order to adapt to changing perspectives and circumstances.

Finally, the work of the planning cycle needs to be assigned, and a method of coordinating it needs to be developed. Responsibility for directing and coordinating the overall planning endeavor should be clearly fixed in order to insure the smooth meshing and steady progress of the planning steps and tasks. The specific responsibilities of staff, consultants, and volunteers should be clearly delineated so that all participants are aware of their respective roles and how their roles relate to other roles. In fact, one might want to PERT (Program Evaluation Review Technique) the planning cycle.11

In concluding this generic discussion of Task Design, it should be acknowledged that very few authors have included this step, per se, in their discussion of planning procedures. Perhaps some authors felt that a discussion of "planning for planning" would be too abstract, or too confusing. Possibly many authors simply overlooked this step in planning. Conceivably some authors took this step for granted (i.e., considered it obvious, and therefore not worth discussing). Whatever the case, planning for planning cannot be overlooked or taken for granted in practice.
Planning is a difficult process because it is relatively abstract, complex, and intellectual by nature. The absence of a well defined, explicit plan for planning can only serve to make this inherently difficult process near impossible!

Health focus—The fundamental steps of planning should remain the same regardless of subject matter or system of interest. Thus, when planning for health one should adhere to the fundamental planning steps. However, if one is going to plan for health, one has to put flesh (i.e., substantive knowledge) on the conceptual skeleton. In this regard, Faludi says: "Planning theory would simply be the theory of the planning process in its general form, an umbrella to all kinds of specific planning theories. These in turn must justify their existence within that one framework by reference to identifiable attributes of their specific environmental variables."12

When "health" is the subject matter of planning, the system of interest should be that abstract system which influences or produces health, the health system. That is, the system whose primary output is change in health status. If the subject matter of planning was "medical services," one might have a different orientation (e.g., the number of such services supplied, utilized, and demanded). However, even if one was planning for medical services, one should ultimately be concerned about what effect those services have on health status. DHÉW policies stated "the health
status of people is the focus for health planning."13
Also, Blum and Associates indicate that in health planning
"the main concern is with measurements of the many facets
of health."14

In "open systems" terms, health can be defined as a
composite of the following three conditions:15

1. the absence of signs and symptoms (i.e.,
   physical attributes)
2. a sense of well-being (i.e., psychological
   attributes)
3. an ability to fulfill social roles (i.e.,
   social attributes)

In this regard, Goldsmith states:

To an individual person, good health may
be 'feeling well' or the absence of dis­
comfort; to a physician, it might be ab­
sence of clinical disease; and, perhaps to
society, health is closely associated with
the individual's fulfilling his social role.16

Therefore, the Task Design step in health planning
must define the system of interest in such a way that:
1) health is recognized as the primary output, and 2) all
aspects of health are clearly identified.

Comprehensive scope--The addition of the adjective
"comprehensive" to the phrase "health planning" adds addi­
tional requirements to the health planning process; just
as the addition of the modifier "health" conditions or
grounds "planning". While the term "health" serves to de­
fine the subject matter or focus for planning, the term
"comprehensive" indicates the scope or breadth of the
planning process. Handler sees comprehensive as "distinct from piecemeal or partial planning." When applied to planning of any sort, comprehensive connotes that the system of interest will be specified in its totality. Schaefer states that "comprehensiveness in planning should be introduced into the work from the start, at least at the level of conceptualization, through the statement of system characteristics." Therefore, the totality of the "health system" should be identified. Litsios says "The term 'comprehensive' is used to reflect the need for a planning system to consider all major aspects of the health situation."19

When health is the subject matter of planning, the system of interest should include as primary inputs all those factors which condition or affect human health status (See Figure 3). These primary inputs can be grouped according to the following three classifications:

1. A defined population group including its demographic structure and composition, its genetic makeup, and its attitudes and behaviors. Thus, Gottlieb says "it is necessary initially to identify the population to be served."20

2. The health service subsystem including personal and environmental health services, manpower, facilities, costs, and expenditures. Bridgman states that "A thorough analysis of the organization and use of existing medical services is a prerequisite to planning."21

3. The remaining portion of the environment which has a large impact on health, especially those physical, chemical, biological,
Health Services

The Environment

Physical agents
Chemical agents
Biological agents
Social agents

Personal
Environmental

Health Status

Population Characteristics
Genetic
Attitudinal and behavioral
demographic

Fig. 3 -- The Health System
and social stimuli which have a relatively direct effect on health. Purdom states that "the status of man's health represents the result of complex interactions between his internal biological system and the total external environmental system." In this regard, Blum and Sully indicate that "Health may be seen as determined by four major influences: Environment, Habits and Health Behavior, Genetic Heritage, and Health Services." Schaefer lists "the environment, congenital factors, human behavior, and health services" as "the four determinants" of health.

Therefore, the Task Design step in comprehensive health planning must define the system of interest in such a way that it includes all of the above agents or variables, because they all have a significant impact on the primary output of the health system--human health levels.

System Investigation

Generic planning requirements--The next step in planning is to answer the triple questions: Where are we, How did we get here, and Where are we heading? In the words of Blum and Sully:

Planning hinges on an assessment of where we are and how we got where we are--both the circumstances and the rate. From this moving set of bases, the planning attempts to predict where we are going to be at some appropriate point in time.

With regard to the question of Where Are We, once the system of interest is clearly defined, it will then be ne-
cessary to measure its existing state (i.e., a profile). Basically, this means a descriptive analysis of the system including such items as its capacity and geographic distribution. Brotherston says that "Any planning worthy of the name is informed by an accumulation of knowledge of the situations to be dealt with." In order to carry out such a descriptive analysis, the planner must select certain indicators which will summarize the current state of the system. The descriptive analysis of the system will serve two primary purposes. First, it assists in laying the foundation for subsequent planning decisions (e.g., target selection). It is impossible to determine the best route to a specified destination, unless one's present location is known. Second, it provides a baseline against which implemented planning decisions can be evaluated. A reference point is necessary in order to measure progress toward a specified goal. Sultz expresses the dual purpose of a baseline study in this way: "Since the same measures and techniques can be used for both planning decisions and evaluative judgments, the community profile can serve either purpose. Ideally, it should serve both purposes in sequence for the communities in which it is conducted."27

With regard to the existing state of the defined system, a descriptive analysis is necessary but certainly not sufficient. It should be accompanied by or followed by a judgmental analysis (i.e., a diagnosis). This type of
analysis builds upon and draws from the descriptive analysis. It requires a much higher level of analytic skill. The judgmental analysis must be based on clearly defined criteria. In this regard, effectiveness and efficiency are the most generic criteria. While effectiveness and efficiency are given various meanings in the planning literature, the author prefers the following definitions. Effectiveness is a measure of the relationship between outcomes obtained and a priori goals (i.e., have ends been reached?). Efficiency is a measure of the relationship between resources expended and outcomes obtained (i.e., have resources been put to the best possible use?). In the best of circumstances, effectiveness criteria will be based on targets established in a previous planning cycle. However, effectiveness criteria, as well as, efficiency criteria can be derived from comparative systems, or based on expert judgment. That is to say, one could generate judgmental criteria on an a posteriori basis by either: 1) obtaining a consensus opinion from system experts on what is an appropriate level of system performance or 2) comparing the system's performance with a similar but separate system whose performance is generally considered to be better. Of course, both of these types of a posteriori criteria are poor substitutes for a priori targets, because they preclude prospective direction and control.
The primary purpose of conducting a judgmental analysis is to identify problems. Blum and Associates believe that "the identification of major problem areas is the first and foremost utility" of an assessment. They also state that "Assessment offers clues, suggests interventions and, ultimately, helps to develop means of verifying the etiology, predisposing and aggravating factors in various conditions." As problems are identified they should be carefully noted and catalogued, for much of the success of the ensuing planning cycle will depend on the accuracy and explicitness of the problem identification task. Some problems will be relatively obvious (i.e., gaps, overlaps, excesses). However, less obvious problems must, also, be identified (e.g., where continual maintenance is necessary to keep a latent problem from reappearing). In the words of Donabedian: "Greatest importance is attached to the process of arriving at a diagnosis since, without a diagnosis, therapy cannot be rational."

With regard to the question of How Did We Get Here, the defined and described system of interest must be viewed from a historical perspective. Here, we are interested in the major events which conditioned the existing state of affairs. The scope and depth of this type of analysis should depend upon: 1) the set of system indicators which have been chosen in previous planning cycles, and 2) the nature of currently identified problems. Regardless of the
scope and depth of this analysis, the planner should select a set of indicators which will reflect the history of the existing system in a relevant, accurate, and parsimonious way. This historical perspective will assist planners in at least two ways. First, it will provide insights regarding the possible causes of system problems. As PAHO-CENDES stated, "The diagnosis should not confine itself to a description...but should seek to explain...in the light of the influence...of the various factors involved."31 Second, the historical analysis will, also, assist in projecting the future state of affairs. When historical indicators are combined with current indicators, the underlying or prevailing direction of events will often manifest itself (i.e., a trend can be discerned). Sultz states that "A community profile which is purely descriptive of any situation as it exists at one point in time provides an assessment of limited value in planning for the future."32

With regard to the question of Where Are We Heading, the defined and described system should be projected into some future point in time, or its status at some future point in time must be forecast (i.e., prognosis).33 In this regard, PAHO-CENDES stated: "Prognosis has a very clearly defined function to perform in...planning; it must answer the question: What is the likely pattern of...conditions in a community for say, the next 10 years, if there is no change in...policies."34 Projections or forecasts of
the existing system can help to identify problems and to establish the need for intervention.

Arnold prefaces her discussion of tools for prediction and forecasting by stating that "Successful planning depends upon how well we can predict what is likely to occur in the future, and this ability in turn depends upon our certainty about the causes and effects of phenomena."³⁵ It must be admitted that in many areas of human activity our powers to make accurate predictions or forecasts, over extended periods of time, are seriously limited at this point. Thus, it is important for the planner to realize his limitations with respect to this task in the planning cycle.

Once a projection or forecast of the existing system has been completed, judgements can be made with regard to the anticipated state of affairs. The anticipated state of affairs may generate additional problems. Purola says "Our goal is to reach a desirable state of affairs, and our needs are perceived differences between desirable and undesirable."³⁶ Thus, problems and needs are generated both from an analysis of the present situation, and from an analysis of the anticipated situation. Feingold says, "planning, after all implies dissatisfaction with the existing or the anticipated state of affairs...."³⁷ Blum and Associates say "we wish to intervene because we desire to achieve a different set of outcomes than those we forsee."³⁸
The culmination of the System Investigation step in planning is to rank the problems and/or needs which have been identified. This ranking procedure is the practical response to the reality of scarce resources. It, also, helps to focus planning energies. Taylor indicates that the setting of problem priorities can be considered "the heart" of the planning process.39 Of course, the setting of priorities requires the selection of a decision rule.40 Such a decision rule should be established in an a priori fashion and be made explicit. In this regard, Blum states that "the choice of criteria should be made before problems have been placed on the agenda."41

A number of additional points about the System Investigation step need to be made. First, no other planning author has described this planning step in exactly the same way. However, the preceding step does include many widely recognized planning tasks and techniques (e.g., baseline assessment, system projection, problem identification, problem ranking, etc.). The foregoing discussion of tasks and techniques is grounded in "systems" concepts.42 The utilization of systems concepts facilitates the profiling or assessment part of planning by providing an orderly and logical framework for analysis.

Second, systems research requires both technical and conceptual skills. It is impossible to think of describing and analyzing the system being planned in the absence of an
ongoing source of information. Likewise, useful planning information cannot be gathered in the absence of a conceptual definition of the system of interest.

Finally, a few general (i.e., relating to all steps in planning) remarks regarding information systems and special studies are in order at this point. Unfortunately, there is much confusion regarding these two things vis-a-vis planning. From the perspective of planning, information systems and special studies are supports to the planning process. They have no worth in and of themselves. They exist to improve decisions, planning and otherwise. Information systems are highly structured, relatively fixed, ongoing mechanisms for collecting, organizing, and analyzing information. Special studies are usually one-shot, intense, research efforts to gain new, highly specific information. In relation to planning activities, the need for both of these is derived from planning steps and tasks. That is, the ultimate rationale for information systems and special studies lies in the need to make certain planning choices (e.g. problem priorities). Thus, information systems and special studies are derived requirements of the planning function. The importance of this point cannot be overestimated, since these things have traditionally been described as though they had a raison d'être of their own which was distinct from the planning process.
Health focus—If one is going to plan for any system, it is critical to be able to measure, and monitor the inputs and outputs of that system. In this regard, the health system is no exception. Inputs and outputs are relative. Every input is also an output and every output is also an input. Again, however, from the perspective of the health system the primary output is change in health status and the primary inputs are the independent variables listed previously (i.e., population characteristics, health services, the environment). Fanshel and Bush state: "Recognizing that planning demands a broad scope,...we look at the health complex as a system whose output, or end-product, is the change in the level of health of the population."^43

Descriptive epidemiology elucidates the distribution of disease frequency in a population. Analytic epidemiology elucidates the determinants of disease frequency in a population. ^44 Blum states that "one of the early tasks to be undertaken by a comprehensive health planning group is the rapid evaluation of its particular community, the unique panorama of social and health problems and the services available."^45 Thus, both service type (i.e., availability, accessibility, acceptability, equity, and efficiency) problems and human condition type problems (i.e., disease categories) should be generated in the system investigation stage of health planning. In this regard, Hilleboe and Schaefer point out that needs "may be concerned primarily
with the unsolved problems of an ailment or a hazard, or largely with unmet administrative or construction needs."\textsuperscript{46} Obviously, health information systems should be designed in such a way as to accommodate a holistic definition of the health system.\textsuperscript{47}

At the present time, the primary output of the health system is more difficult to define and measure than the primary inputs.\textsuperscript{48} The health planner does have access to reasonably accurate mortality data and data on the incidence of certain communicable diseases. Unfortunately, at a time when chronic diseases are the most prevalent form of health malady in the U.S., there is very little useable morbidity and disability data. This is especially true at the State and local levels where there are no equivalents to the National Health Survey. Thus, at the present time health planners will have to:

1. adapt national and special studies on morbidity and disability to their own populations;

2. utilize, to some extent, the demand morbidity experience of prepaid group practices and health institutions in their planning areas;

3. participate in and/or initiate special sample surveys designed to measure the physical, and psychological, and social attributes of health in their defined population (i.e., physical examinations, attitudes, levels of functioning).

Thus, the health planner must be imaginative, innovative, and resourceful in utilizing those indices which he
can presently muster to measure the primary output of the health system, as well as its primary inputs. At the same time, health planners should be among the main advocates for the development of health information systems relevant to State and local areas.

**Comprehensive scope**—When applied to planning, comprehensive implies that the inter-relationships between the system of interest and other systems, and the intra-relationships between the components or subsystems of the system will be specified. Dror states: "The noun comprehensiveness refers to two interrelated characteristics of comprehensive planning, namely, attention to multiple dimensions of a system and an interdisciplinary approach." Davidoff and Reiner state that comprehensive planning "serves to relate the components of a system." Therefore, in comprehensive health planning the inter-relationships between the health system and other systems, such as the political and economic systems, should be examined. Haro and Purola state that "Health planning, therefore, cannot be anything but comprehensive taking into account the needs of other sectors." Also, the intra-relationships between the components of the health system should be analyzed (e.g., the relationship between environmental health services and the health of the population). DHEW policies state that "Health planning must consider a large number of different kinds of factors that influence health status." Comprehensive also
implies that in analyzing the system of interest, its total range of problems will be identified and considered. Thus, in comprehensive health planning the total range of health problems of all the people should be identified and taken into account (i.e., all the physical, psychological, and social aspects of the health problems of all the people in the planning area). Blum and Associates say: "We see comprehensive planning as an analysis of the various problems or conditions afflicting man to determine the influences...Clearly, this is something much more than planning for health services comprehensively or otherwise."53

Ends Establishment

Generic planning requirements--The next step in planning is to answer the question: Where Do We Want To Go? Handler states "No answer is possible without first answering the question: to what end?"54 Kissick expresses the same thing by saying "If we do not know where we are going, one road is as good as another."55 It is for this reason that Ends Establishment is a necessary and critical part of the planning cycle. In the words of an AHA publication "In many ways, goal setting is the key to planning."56 Davidoff and Reiner agree: "Since choice permeates the whole planning sequence, a clear notion of ends pursued lies at the heart of the planner's task, and the definition of these ends thus must be given primacy in the planning process."57
The System Investigation step is designed to tell us where we are and where we are heading, but it cannot tell us where we want to go. That is to say, there is a distinction between projection and goal-seeking. The purpose of the Ends Establishment step is to suggest future desired states based on: 1) dissatisfactions generated in the system investigation step, and 2) overall societal values and ideals. These desired end states are expressed first in terms of goals and then in terms of objectives (targets). In the words of Arnold: "planning involves projection into the future as well as analysis of what is now and, if we take this emphasis on planning seriously, we accept the challenge of determining what we believe the future should be like."58 Thus, it is the Ends Establishment step which makes a system self-directing.

Before discussing overall goals, goals, and objectives the general nature of end statements should be pointed out. The temptation is great to reduce planning primarily to a technical process, because in some ways this would greatly simplify it. However, there is no technical way to establish where it is one wants to go. Thus, it is critical that the planner: 1) recognize the central role of values in the planning process, 2) devise methods and procedures for clarifying values, and 3) incorporate such values into planning decisions. Arnold states that "the desired outcomes must be based in the values we wish to enhance."59 Kahn states
that “Facts by themselves will not suggest what would be
good or what should be preferred.”

Perhaps McDougall states it best when he says:

I would not agree that the process of goal-
formulation can be derived from the scientific
method. The methodology of the sciences may
be applicable to the establishment of uniformi-
ties in social phenomena but it cannot enable
us to choose the desirable ends of action nor
enable us to decide what the future ought to be.
Science may predict but it cannot prescribe.

First, then, the overall value and goal structure of
the relevant society should be identified. This is impor-
tant from at least a couple perspectives. All planned in-
terventions are in one way or another an attempt to improve
the quality of life. Thus, for the purposes of derivation,
all planning endeavors should remain constantly cognizant
of the overall societal definition of the good life. It
is, also, important to remain cognizant of the overall soc-
cietal definition of the good life for the purely pragmatic
reason of compatibility. Goals which are formulated in a
circumscribed planning process are unlikely to be reached
if they are in direct conflict with the overall preference
function of society. Thus, Dakin points out that: “In cer-
tain kinds of planning…there is confusion between general
goals of society, which is in the last analysis a question
of how the society defines the good life, and those more
specific goals which form in detail the aims of a particular
plan.”

So, Haro and Purola caution that technically sophis-
ticated plans are useless if they “are not relevant from the
point of view of the prevailing values of society."63

Second, working from overall societal goals and identified problems, alternative system goals must be identified, analyzed and ranked. Michael et al., define a goal in the following way:

A goal is the long-range, specified accomplishment toward which programs are directed. The goal itself does not fix a period for its achievement. A goal is not necessarily limited by current resources or current knowledge.64

An AHA publication describes a goal this way, "The end result that the organization or program is trying to achieve by certain actions, rather than the actions themselves."65

While planners can not establish final goals, planners must assist in identifying alternative goals, and perhaps, ultimately recommending certain goals. Davidoff and Reiner say that "the planner, as an agent of his client, has the task of assisting them in understanding the range of the possible in the future."66

At this time, however, there are no widely accepted methods for identifying alternative goals in the planning process. Expert judgment, nominal groups, public hearings, public opinion polls, and other techniques have all been suggested and utilized.67 Since goals are primarily grounded in values, there exist many difficult questions regarding whose values should be utilized in the planning process, and how individual values should be aggregated. The answers to these questions will depend upon prevailing
socio-political norms and the technology of value research. From the dual perspectives of democratic ideals and maximization of acceptance, it can be stated that the planner should utilize broadly representative techniques in the identification of alternative goals. In fact, the larger and more representative the group involved, the better.

Once alternative goals have been identified, the planner should assist in a thorough and systematic analysis of such goals. This goal analysis should serve to clarify the particular implications of individual goals and to delineate the relationships between goals, so that the ultimate goal selection process can be explicit and informed. Friedmann states that "Goals themselves are analyzed dispassionately for their relevance, internal compatibility, significance, and their relation to still more remote ends." Dakin believes "It is the planner's duty to isolate all the possible alternatives, estimate their significance, evaluate them, and advise on goals." The analysis of goals should also include a determination of which goals belong in which general time-frame (i.e. short-term, medium-term, or long-term). Further, the different time-frame goals should bear a logical relationship to each other. For example, Bruhn says that "short-term goals must be anchored to long-term ones." Finally, there is again, the need for ranking. At this step in the planning process we are most conscious of our wants, but we must also
remain cognizant of our resource limitations. Therefore, goals must be ranked. As Davidoff and Reiner put it: "This is the essence of the problem of priorities; we cannot achieve all things that need doing, or are desirable, at any one time."71

Third, high priority goals must be transformed into alternative objectives (targets) which must, ultimately, be ranked. Objectives (targets) serve as the bridge between goals and program recommendations. Objectives (targets) are quantified, time-related expressions of goals. Taylor states that "Targets should be specified according to quantitative indices of performance and within a clearly stated time framework."72 Michael et al. state that an "objective is stated in terms of achieving, during a specified period, a measured amount of progress toward a goal."73 Thus, objectives (targets) refer specifically to the system of interest, and provide a way of measuring progress toward reaching a goal in a specified way. Objectives (targets) provide a point around which policies and programs can be both compared a priori, and evaluated a posteriori. In regard to the former, Schultze states that "a careful consideration of objectives is a prerequisite to intelligent choice among program alternatives."74 In regard to the latter, Rosenthal states that:

Since planning is a process designed to affect the activities of an operational system, the objectives of planning must be stated in terms
of a desired set of changes. This degree of specification is essential if any meaningful evaluation of the effectiveness of policies is to be made. 75

Thus, it can be seen why objectives (targets) play such a pivotal role in the planning cycle. This makes the careful consideration of alternative targets an extremely important task in planning. Once alternative targets have been identified, they must be analyzed, compared, and ranked. Of course, the ultimate worth of a specific target depends upon the extent to which its fulfillment would make goal attainment that much more realizable. However, the practicability, feasibility, and preferability of targets must also be considered. After a thorough analysis of targets has been completed, they should be priority-ranked. Here again, the twin considerations of resource limitations and the need to focus the planning endeavor dictate the absolute necessity of ranking.

It should be noted that the importance of goal establishment as an integral part of the planning process is not universally recognized. In fact, some planning authors do not include goal setting, per se, in their planning paradigms (e.g., Litsios and Moore). 76 These authors view planning basically as a technical process. They focus on problems, and would have us move directly from problems to the consideration of intervention strategies. For example, Litsios includes the following activities in his planning system:
(a) gathering and analysis of basic information, (b) the determination of alternative tactics and strategies...; (c) the analysis of these tactics culminating in the choice of one to be implemented; (d) the specification of detailed methods for implementation, and (e) a retrospective evaluation...??

Such approaches to planning overlook three important considerations. First, problems are not objective. Problems arise from a disparity between what is wanted or valued, and what is perceived or experienced. Since explicitness is one of the cornerstones of planning, the "wanted or valued" component of this intellectual process should be clearly specified. Second, all identified problems do not necessarily result in a resolve to action. The reduction or elimination of specific problems become ends to be pursued, only after a conscious and deliberate choice to pursue such ends is made. Third, some ends spring from vision and inspiration, and not from existing or anticipated problems. To ground planning purely in problem solving is to fail to capitalize on man the dreamer and visionary. Thus, planning operations which neglect Ends Establishment leave some planning tasks veiled or hidden, ignore other planning tasks, and invite the containment of planning to short-run, relatively noncreative interventions.

Finally, the murkiness which does exist between the System Investigation and Ends Establishment steps, as outlined herein, must be acknowledged. It must be admitted that in reality it is difficult to think about problem id-
entification and goal choice as being in completely distinct steps, since problems arise from a disparity between "what is or what is anticipated" and "what is valued."

Thus, there is a degree of arbitrariness in putting problem identification before goal establishment. Here, it is done in that way because it seems logical that one would consider "where one was," before one would consider "where one wanted to go." At any rate, the really crucial element in all of this is the concept that ultimately problems and/or goals should be transformed into specific, and precise targets to be pursued.

Health focus—Ends in the health planning process can fall within two major categories: a) those relating directly to the health status of the population, and b) those relating to interventions aimed at the health status of the population. Navarro states: "In performance methods the required resources are determined by the amount and type needed to achieve a defined output measured in terms of performance, such as reduction or control of death, disease, disability, or discomfort; whereas in methods based on the system structure the output is given in terms of number of services provided." Thus, while some ends will certainly be stated in terms of the major subsystems or variables which affect health, the primary ends must be stated in terms of the ultimate output, health status, itself. Litsios says: "The key term in this is health, i.e., is it the
overall improvement of the population's health that is being specified in the form of well-defined objectives?"79 It must be recognized that service ends are intermediate in relation to health status ends, just as health status ends are intermediate to quality of life ends. The WHO Expert Committee on Health Statistics stated that "The principal concern of the health planner is with the health of the population, and he is consequently also concerned with the planning of health services; the overall objectives are similar."80 Thus, it is not a question of establishing one type of end or the other. It is imperative to set both types of ends. It is, also, imperative to keep the two types in proper perspective. Along these lines, Blum and Associates concluded that "A combined analytical attack on disease, community, overall delivery, and specific intervention systems is the approach of choice."81

Comprehensive scope—In planning comprehensive signifies that the total range or universe of possible goals and targets (i.e., objectives) will be identified. Kahn states that "Rational planning in this sense may be comprehensive, indicating the principal acts by which major ends are to be attained, or it may be partial, focusing only on some important or subordinate ends."82 Comprehensive also signifies that the relationships among goals, and among targets (i.e., objectives) will be taken into account. Davidoff and Reiner state "The many goals within a system
of values can be viewed in terms of their interrelations,... Considering an individual goal as a part, rather than as the entirety, of a system of ends has important analytic consequences." Friedmann says we should "point out inconsistencies among goals." Therefore, in comprehensive health planning the entire range of possible health goals should be identified and considered (e.g., both health status goals and health service goals). Also, the relationships between health goals should be weighed in order to ultimately establish a set of balanced, consistent goals. Likewise, before final selections are made, health targets (which are derived from selected health goals) should be examined in total with an eye for compatibility. In addition, health targets should be consistent with health goals.

Means Selection

Generic planning requirements--The next step in planning is to answer the question: How Do We Get There? It is at this stage of the planning process that ends are converted into means. First, a range of alternative means are identified. Second, the identified means are compared. Third, the compared means are ranked. Fourth, implementation strategies are devised for high ranking means. In the words of Grosse, the planner must "imagine how the actor may get from where he is to where he wants to be."
First, then, high priority objectives (targets) must be transformed into alternative means or intervention possibilities. Grosse puts it this way: "...one of the signal contributions of planning and analysis is to extend the range of search, to seek out and develop new, imaginative, and hopefully better alternatives."\textsuperscript{86} Means are derived from ends, and so Means Selection must follow Ends Establishment in logical sequencing. This relationship between means and ends is captured in the American Hospital Association's definition of an alternative: "one of various options available for realizing a goal or objective."\textsuperscript{87} Therefore, the task here is to identify a wide range of options for reaching selected objectives. This exploration of possible options should be rooted in a thorough review of existing knowledge, technology, and preferences. Kahn says "There is no way to avoid a considerable period of inventorying of: what we know, what we know how to do, and what we value."\textsuperscript{88} Thus, the emphasis should be on identifying alternative means which will be effective, rather than adhering to preconceived ideological stances. In this regard Campbell says we should advocate "the importance of the problem rather than the importance of the answer."\textsuperscript{89} If no effective alternatives can be identified, the research option should be specified. Hilleboe and Schaefer state, "If effective activities are not available to achieve program goals, what kinds of research activities are indi-
Second, the identified alternative intervention possibilities must be weighed. This weighing of alternatives should be based on criteria determined in an a priori fashion. As Davidoff and Reiner put it "The identification of a best alternative implies a need for operational criteria for such choices." As a minimum, such criteria should include the following elements.

The projected benefits or utilities of alternatives should be compared. Benefits can be measured in terms of the capacity to reach or produce the stated target (i.e., outputs). In terms of the "systems" view, targets represent desired levels of system output or outcome while alternative means represent possible system inputs. In planning, one attempts to select those inputs which will result in the closest approximiation of target attainment (i.e., maximization or optimization of benefits). The projected costs of alternative means should, also, be compared. Costs should be defined to include both direct costs and indirect costs. Direct costs would include the costs of required space, facilities, equipment, supplies, and manpower. Obviously, in order to estimate these costs, the resource requirements of alternative intervention strategies must be specified. Therefore, resource requirements (e.g., manpower and facilities) are derived from chosen interventions in the planning process. The totality of present and future re-
source requirements which are derived from selected interventions should be determined in order to avoid unnecessary bottlenecks in any future implementation efforts. Indirect costs would include other closely linked but not budgeted costs (e.g., the user's productive time foregone). Once the projected benefits and costs of alternatives have been identified some type of benefit/cost or cost/effectiveness analysis can be performed.92

In benefit/cost analysis, both benefits and costs are variable. The present values of benefit/cost ratios (i.e., discounted future streams of benefits and costs) of alternatives are compared. Usually in cost/effectiveness analysis the benefits are fixed (i.e., held constant) and the alternatives are compared on the basis of which one can reach the target at the lowest cost. However, it is also possible to hold the costs constant and compare variable benefits. Litsios says "selection of one tactic over others at a minimum requires ability to specify expected costs and expected benefits."93 Grosse contends that "it seems reasonable that a better understanding and measurement of costs and the effects of various possible courses of action will improve allocation decisions."94

It must be acknowledged that, at the present time, benefit/cost analyses are still extremely complex and difficult to carry out. This is especially true in regard to nonprofit, human service type interventions. Therefore, in
many circumstances the operationalization of such techniques will be highly restricted. However, planners should at least take a benefit/cost type of approach to means selection. There can be a gradual movement from primarily qualitative approaches to highly quantitative approaches.

In addition to their benefits and costs, alternatives should be compared with regard to anticipated feasibility. The relative feasibility of alternative intervention options can be determined by identifying the nature and strength of relevant constraints and impetuses. Anything that would either inhibit or stimulate the successful implementation and/or effectiveness of an alternative should be included in a feasibility check. Constraints and impetuses to successful implementation can be of a cultural, political, technological, or resource nature.

Finally, alternative intervention possibilities should be examined from the perspective of consistency with other goals and/or targets. That is, intervention alternatives should not only be assessed from the perspective of the targets at which they are aimed, but, also, from the perspective of other targets which have been established or are being considered. Litsios says the planning process must establish "the configuration of health programmes that is best suited for achieving the total set of objectives finally selected." Davidoff and Reiner state that "Means identification should be consistent. That is alternatives
selected as optional in the pursuit of a goal should be consistent with the alternatives employed in pursuit of another goal, or at least inconsistent with achievement of other goals."97

As a minimum, then, criteria relating to the following four areas should be formulated for weighing alternative means: benefits, costs, feasibility, and consistency.

Third, the weighed alternative means must be ranked. This ranking process is based on the results of the comparative analysis of alternatives. If the criteria used in weighing alternatives are given different weights in the ranking process, these differential weights should be made explicit. The ranking of alternatives will focus and crystallize the entire planning effort. Blum states that "Interventions or packages of interventions to be used against a problem need to be rank ordered so that the 'best' ones can be selected for implementation."98

Often the option receiving the highest ranking may actually consist of a mix of intervention actions. The selection of a mix of actions to reach a specific target, instead of a single action, can result in a solution which is closer to optimal. As Kahn puts it, it's "not A or B or C, but rather, given our objectives and resources, what is the optimum mix of A, B, and C?"99 It may, also, make more sense to select a number of actions for implementation because the ultimate effects of the different alternatives are
in doubt. Such an avoidance of monolectic interventions is advocated by Alice Rivlin. She proposes "systematic experimentation" as an alternative programming strategy:

The strategy involves several steps. The first is a major effort to identify new methods that show promise of increasing effectiveness. The second calls for systematically trying out new methods in various places and under various conditions. The final step is the evaluation of new methods under different conditions and their comparison with each other and with methods already in use. 100

In any event, regardless of the way in which options are constituted (e.g., single actions, or mixes of actions), recommended options must be determined on the basis of a ranking procedure (i.e., intervention priorities).

Fourth, implementation strategies for high priority intervention alternatives must be clearly laid out. This includes both operational specifics and incentive schemes. The recommended locus of responsibility for implementing each high priority alternative is probably the most important operational specific. In addition, the recommended time and place of implementation should be made explicit. Thus, the planner should indicate who should do what, where and when! Such specificity grounds planning in the realities of the existing system, and helps to insure a smooth movement from planning to decision-making to implementation.

Raffel indicates that the "plan should call for action by someone or some program agency..." 101 With such specific operational details in mind, the planner should recommend
incentives (i.e., penalties and rewards), which could accompany or be incorporated in the recommended actions, in an effort to increase the likelihood of implementation. The specification of such incentive schemes (i.e., both positive and negative) could be among the most important acts in the planning process, since implementation and, therefore, the attainment of objectives may hang in the balance. Blum and Associates mention "incentives and penalties" and Grosse mentions "incentives and regulations" as important considerations in the planning process.102

In drawing this generic discussion of Means Selection to a close, it can be pointed out that virtually all planning authors include this step in their models of planning. As far as this planning step is concerned, if there has been any conceptual shortcoming in the past it has been with regard to overemphasis, not neglect. That is to say, some planning authors have put almost exclusive emphasis on the selection of intervention strategies. For example, 12 of the 14 activities which Moore includes in his "normative definition" of planning are directly related to intervention alternatives, resource requirements, or implementation.103 Such approaches to planning highly restrict the scope of planning analysis. A preoccupation with means will, therefore, severely limit the planner's capacity to improve decision-making.
Finally, some general comments regarding the plan document might be appropriate at this point. The development of a plan document is not the reason why we plan. On the contrary, the plan document, rather than being the rationale for planning, is the record of completed planning steps and tasks. It is the black and white embodiment of the planning process. The plan document is a by-product of the planning process—a chronicle. Because of the continuous nature of the planning process, the plan document must be constantly updated. Thus, a plan document should be loose-leaf in nature. Because of the systematic, stepwise nature of planning, plan documents will often be partial in form. A partial plan document is one which incorporates completed tasks of only portions of the planning cycle (e.g. problems, goals, etc.). A whole plan document is one that incorporates all the completed tasks of a given planning cycle. The emphasis in planning, then, should not be on plan document development, but rather, on the requisite intellectual-logical steps of the planning process. To quote Friedmann: "The making of the plan, the exercise of planning thought, is infinitely more important than a neatly published book...."104 Hilleboe states, "A plan is only one of the products of the planning process, not an end in itself."105 This is an extremely important point since much of the current emphasis in planning circles is on the development of plan documents, rather than on planning.
Health focus—The kind of means examined in the health planning process will obviously depend on the type of ends being pursued. As Litsios points out, this is basically a question of "resource-oriented programmes" v. "health problem-oriented programmes."\textsuperscript{106} When ends are stated in terms of improvements in health status, intervention strategies must, obviously, be assembled from those factors which have been identified as determinants of health. In these cases, the primary criterion for means selection should be the maximum marginal increase in health status per unit of resource expended. Gentry states that "Of special concern are indices by which the effectiveness of specific services can be measured in order that meaningful concepts of cost-effectiveness and cost-benefit can be applied."\textsuperscript{107} For the purpose of measuring health status benefits, health planners will need to utilize information developed from epidemiological studies of the outcomes of various health intervention programs.\textsuperscript{108} Thus, the health planner is dependent upon applied and community health research in his efforts to select the most effective and efficient ways of reaching health level targets. By the same token, the applied and community health researchers should be sensitive to the information needs of health planners, especially when they set research priorities. Close coordination between community health planning and community health research is required if both activities are to
maximize their social utility.

Comprehensive scope—First, when planning is comprehensive, the total range of relevant means should be identified and considered. DHEW policies state that "Development of a comprehensive plan requires the selection of recommendations for action from among a large number of alternatives."\(^{109}\) Blum and Sully state that: "Modern planning techniques allow us to construct a system-model of the interlocking relationships...On this basis we can identify where it is possible to intervene."\(^{110}\) Therefore, in comprehensive health planning primary and secondary prevention interventions should be considered, as well as, tertiary prevention interventions (i.e., the total range of intervention possibilities).\(^{111}\) Chirikos stated that:

the technique to be used in meeting target improvements must be ascertained. For at least those disease categories in which improvements and reductions are possible, this involves assessing the extent to which preventive measures will be employed versus curative services or the extent to which environmental factors will be used rather than medical technology per se...this step should determine the policy mix or program content that is best suited to effect the targets postulated in the previous step.\(^{112}\)

Second, another important but extremely difficult aspect of comprehensive planning is the identification of anticipated secondary effects of interventions. Attempts should be made to analyze alternatives from the perspective of what effects they will produce in other components of the system of interest and in other systems. Thus, the
affect of the various types of interventions on each other should be identified and considered, so that at any point in time the totality of health interventions will mesh together in a coordinated fashion (i.e., avoiding duplications gaps, conflicts, etc.). Litsios states: "The problem of generating and allocating new health resources should be examined in its entirety so as to minimize avoidable inefficiencies. Inefficient operations result, in general, from not properly taking into account existing interactions among tactics." Further, attempts should be made to identify possible unwanted effects of interventions, now and in the future, in an effort to head off unanticipated, deleterious consequences (e.g., future iatrogenic effects of the personal health service subsystem). Banfield states that "If the plan is to be rational, all consequences—not merely those intended by the planner—must be taken into account." Blum and Sully state that "Comprehensiveness in planning calls not only for looking at the costs and benefits of various alternative courses of action but for looking ahead to see what spillover effects each intervention might lead to, either desirable or undesirable." Of course, the inadequacies of present prediction, simulation, and projection methods limit current analyses aimed at the question of anticipated secondary effects. These inadequacies, however, do not justify the neglect of these tasks. Planners will have to employ the best tools available to
conduct their tasks. They must, also, join the unending search for more accurate and precise planning methods.

**Intervention Evaluation**

**Generic planning requirements**—The next step in planning is to answer the question: *Did We Get There?* Assuming that some planning decisions have become final decisions and that such final decisions have been followed by execution, there is a need to evaluate the resulting interventions. Rosenthal states that "The evaluation process can be viewed as ongoing research designed to make the choice of policies better serve the objectives of the planning. This view of evaluation argues strongly that it must be an integral part of the planning process." Hilleboe and Schaefer agree. They say that evaluation which is not "integral" to the planning process "is likely to be irrelevant, expensive, and useless."117

Evaluation closes the loop of the planning cycle by feeding back to and overlapping with parts of the System Investigation step. That is to say, any particular assessment can be used to both: 1) judge progress made since the last assessment, and 2) provide a baseline for future assessments. Arnold says "Evaluation is best considered to be that systematic planned feedback of information needed for guiding future actions."118
Evaluation enables a system to be self-controlling or correcting. Thus, Blum and Associates describe evaluation as "the gyroscope of planning." Dyckman summarizes this cyclical process well:

The plan initiates a course of action which produces events experienced by the agent, in light of which he modifies the plan; so that, in a sequence of phases, the plan is continuously initiating action or being modified by the results of action; and this modification is not merely a more efficacious employment of means to an originally intended end (a continuous adjustment of the feedback principle) but also a modification of the end in view, a revision of intention, a recasting of desires, a development in understanding.

The criteria used in evaluation should be established on an a priori basis and made explicit. As a minimum these criteria should include compliance, effectiveness, and efficiency measures. A W.H.O. Expert Committee stated:

Evaluation is fundamental to administrative control and indispensable for ensuring that continuous planning is systematically based on experience gained. It measures the degree to which objectives and targets are fulfilled and the quality of the results obtained. It measures the productivity of available resources in achieving clearly defined objectives. It ascertains how much output or cost effectiveness is achieved. It makes possible the reallocation of priorities and of resources...

Intervention evaluation should measure whether the implemented intervention is in compliance with the plan (i.e., the chosen means). In other words, are the resulting actions congruent with the planned actions. In this regard, Kahn says: "One wishes to know, first, whether the planned
program has been produced at the quality sought...."122

Perhaps Litsios describes this type of measurement best when he says:

Initial evaluation efforts should concentrate on the timing, scheduling and magnitude of activities undertaken. The idea of this evaluation is to: 1) establish what has actually been accomplished, 2) identify major programming deficiencies, 3) suggest procedures for improving future programming efforts.123

Intervention evaluation must also measure whether implemented interventions have achieved the intended results (i.e., effectiveness). Petersen indicates the necessity for "evaluation against both targets and goals."124

Hilleboe and Schaefer state that "goals not only provide a foundation for actions relevant to desired results; they also establish standards against which these results can be measured."125 Michael et al. state that evaluation includes a determination of "the extent to which predetermined objectives...have been attained."126 Finally, evaluation must measure the use of resources in objective (target) directed activities (i.e., efficiency). Litsios defines efficiency "to imply least cost for a given level of effectiveness."127

A planner has the obligation to evaluate planned interventions on the basis of the best knowledge he can muster, and to then feed this evaluative information into the next cycle of the planning process. Thus, evaluation is the last step in the planning cycle, but it also precedes the first step in the planning cycle. This incorporation of a
feedback loop creates an intellectual, cybernetic, adaptation system for the society of man which resembles the biological, cybernetic, adaptation systems of the human body and other living systems (i.e., animals and plants). Silvester indicates that cybernetics can be viewed as "the new strength to be obtained through systems planning, thereby enabling closer correlation between the 'plan' and 'reality'." Of course, in the society of man this adaptation mechanism is combined with the ability for self direction. Therefore, the criteria (i.e., targets) that constitute the decision rules for this cybernetic process can be revised constantly (i.e., Ends Establishment). Thus, Silvester says that "with the inclusion of goals and goal formulation within a system one is moving from a technique which will run programmes which have been fed to it, to a self-regulating self-guiding model of human behavior." It must be acknowledged that not all planning authors include this step, Intervention Evaluation, in their versions of the planning process. About half of the planning authors reviewed specifically included intervention evaluation as a fundamental part of the planning process. The other planning authors either: 1) did not include intervention evaluation in their models, or 2) viewed it as a parallel but separate process in relation to planning. For example, Reinke makes no mention of evaluation in his delineation of the "essence" of planning.
evaluation as "the mirror image of planning—concurrent and continual." However, intervention evaluation which is not closely connected to planning runs a great risk of being merely an ad hoc, academic exercise—either because it has no a priori targets to use as criteria, or because its results are not effectively fed into the decision-making process. Further, if intervention evaluation is not an integral part of the planning process, planning will take on an air of unreality. It is intervention evaluation which ultimately clarifies ends—means relationships. In the absence of intervention evaluation, planning would be a simple, linear activity without any feedback loop. In such a situation, the learning component of planning would be severely restricted, and the system of interest would, most likely, be unable to exercise effective self-correction. Therefore, Intervention Evaluation is a natural and necessary part of planning.

Health focus—The Intervention Evaluation step in health planning is basically the same as it is in any other form of planning. That is, the health planner should evaluate the level of compliance, effectiveness, and efficiency of health programs implemented as a result of health planning. In health planning the term "efficacy" is often used to refer to progress made in reaching targets which are stated in terms of health status changes (i.e., instead of the term "effectiveness" which is broader because it can
also refer to nonhealth status targets). In health planning, the evaluation of an intervention's efficacy is the penultimate type of evaluation because, as was stated before, health status change is the most important outcome of the health system. Along these lines Roemer says "Regardless of the immediate short-term ends or goals of a health program, it must ultimately be judged or evaluated by its success in saving lives or reducing disability or advancing health status in some way."132 Donabedian expressed the same idea in this way:

The effectiveness of care in achieving or producing health and satisfaction, as defined for its individual members by a particular society or subculture, is the ultimate validator of the quality of care. The validity of all other phenomena as indicators of quality depends, ultimately, on the relationship between these phenomena and the achievement of health and satisfaction.133

**Comprehensive scope**—When health planning is being conducted in a comprehensive manner at least two considerations should be underlined and stressed. First, every effort must be made to measure the unintended, as well as, the intended effects of planned interventions. Positive and/or negative unintended effects can have a strong influence on decisions concerning the net desirability of continuing present health interventions into the future.

Meyerson suggests "that we maintain a constant feedback of information on the intended and the unintended consequences of programs..."134 Second, there is the necessity
to attempt to determine whether the success or failure of implemented health planning decisions was primarily intrinsic to the planning decisions or primarily a result of exogenous forces. The requirement, in turn, generates the need to apply scientific research methods to health intervention evaluation efforts. Petersen states this analytic problem succinctly:

Successful planning means, at a simplistic level, planned change that is congruent with actual change; the question is when may we reasonably substitute 'the determinant of' for 'congruent with.' In any but the least complex social policies, establishing a causal link between purposive acts and their possible consequences involves a full-scale analysis.¹³⁵

A few general (i.e., relating to all steps) comments concerning "comprehensiveness" are in order. Comprehensive represents an ideal which should be pursued in planning. The ideal, however, must be tempered by resource, time, technological and other constraints. Even with the aid of the computer, there is a limit to the amount of information and the number of relationships which man can process in a given period of time. These constraints must not, however, serve as an excuse for not planning as comprehensively as possible. They do, however, impose the necessity of making hard choices regarding the scope of analysis. These choices must be made in light of existing planning resource levels, and analytic capacities. Further, "comprehensive" does not connote that everything (i.e., all aspects of the system)
will be planned for simultaneously. It does not alleviate the absolute necessity of setting priorities at virtually every step of the planning process. Planning is by nature a convergent process.
FOOTNOTES

1H.E. Hilleboe, "Health Planning on a Community Basis," Medical Care, VI (May-June, 1968), p. 213.


7Kahn, p. 133.


12Faludi, p. 75.


17 Handler, p. 148.

18 Schaefer, p. 11.


24 Schaefer, p. 16.

25 Blum and Sully, p. 6.


94

28 Blum & Associates, pp. 7-14.
34 Pan American Health Organization, p. 43.
38 Blum & Associates, pp. 1-5.
40 For an example of one such decision rule, See: Pan American Health Organization, op. cit., pp. 24-26.


Blum, p. 5.


53Blum & Associates, pp. 3-11.

54Handler, p. 148.


57Davidoff & Reiner, p. 111.


60Kahn, p. 102.


63Haro & Purola, pp. 28-29.


65American Hospital Association, p. 95.


69 Dakin, p. 22.


71 Davidoff & Reiner, p. 104.


75 Rosenthal, p. 295.


77 Litsios, "Towards a System of Comprehensive Health Planning," p. 3.


81 Blum & Associates, pp. 8-33.

82 Kahn, p. 333.


87. American Hospital Association, p. 95.


90. Hilleboe & Schaefer, Papers and Bibliography on Community Health Planning, p. 33.

91. Davidoff & Reiner, p. 106.


94. Grosse, p. 519.


98. Blum, p. 97.


99

103Moore, p. 306.
105Hilleboe, "Health Planning on a Community Basis," p. 212.
110Blum & Sully, p. 16.
114Banfield, p. 363.
115Blum & Sully, p. 9.
116Rosenthal, p. 313.


122Kahn, p. 325.

123Litsios, "The Principles and Methods of Evaluation of National Health Plans," p. 84.


126Michael, et. al., p. 1068.


129Ibid. p. 100.

130Reinke, p. 68.


133Donabedian, p. 169.


135Petersen, "On Some Meanings of Planning," p. 139.
III. A NATIONAL SURVEY

Introduction

A questionnaire survey of the State CHP agencies was conducted to determine to what extent their planning activities conformed to the conceptual statement on comprehensive health planning. The purposes of this Chapter are twofold. The first is to show how the survey instrument (See APPENDIX A) was derived from the conceptual statement (See Chapter II). That is, an explanation is given as to how the general criteria were transformed into a specific measuring device. The second and most important purpose is to report the findings generated from the survey.

The concept and practice of comprehensive health planning were also compared by means of a case study of a single State CHP agency (See Chapter IV). Thus, the survey represents only half of the empirical portion of this study. The survey was undertaken so that general inferences could be made about the practice of comprehensive health planning at the State level. While the case study can minimize non-sampling errors, the survey can minimize sampling errors. It is hoped that the utilization of these two types of studies in combination will result in a synergistic analysis.
To quote Babbie: "a comprehensive inquiry would profit from the use of different methods focused on a single topic."1

**Design Of The Survey**

**General Considerations**

It was decided that the 50 State CHP agencies would constitute the best survey population for the following two reasons. First, the remaining six 314(a) agencies (i.e., American Samoa, Guam, Puerto Rico, Trust Territories, and the Virgin Islands) were ruled out because of the difficulty and expense that would be involved in contacting them, and because they were viewed as being atypical compared to the other 50 314(a) agencies (i.e., on the basis of political, economic, social, and geographic characteristics). Second, given a defined population of 50, there seemed to be no compelling reason to conduct a sample survey, and so it was decided to contact the entire defined population.

A "personal interview" type of survey was rejected because of the great expense that would be involved in conducting a national survey in such a fashion. A "telephone interview" type of survey was also rejected because it was believed that this approach would lead to a relatively high level of nonsampling errors. The envisioned nature of the survey questions were such that it was thought that a moderate amount of thought and reflection would be required
in order to respond to the questions in a responsible manner. Thus, a "mailed questionnaire" type of survey instrument was chosen.

It was decided to make a conscious effort to design a simple, and brief questionnaire. This decision was in response to the belief that there would be resistance to the survey for the following two reasons: 1) many surveys and studies had been aimed at the same population over the preceding few years, and 2) at the time of the survey, the Federal government, CHPS, was conducting site assessments of all State CHP agencies. Thus, in order to reduce participation barriers, it was decided to employ a "multiple choice" type of format and to keep the instrument to a minimum length.

Instrument Development

The survey instrument (See APPENDIX A) is designed to probe three general areas. First, it was decided that the instrument should investigate some of the "structural" aspects of the agencies' operations. The material for this section of the instrument, Section I, is drawn from the framework for analyzing planning activities (See Chapter I).

Second, the instrument obviously had to investigate the "process" aspects of the agencies' operations since process is the main concern of the research. The material for this section, Section II, is drawn from the conceptual statement
on comprehensive health planning (See Chapter II). Third, it was decided that it would be useful to measure the directors' attitudes and perceptions with respect to some comprehensive health planning issues. The material for this section, Section III, is drawn from both Chapters I and II of this dissertation.

Before discussing, in detail, the three Sections of the survey instrument, their analytic interrelationships should be pointed out. Section II is designed so that its results can be used to construct an index of behavioral conformity with the conceptual standard. This index serves as the primary dependent variable for the study. Sections I and II are designed in such a way that their results can be used to construct independent variables. These independent variables are employed in an attempt to explain or illuminate possible variations in the dependent variable by agency.

Section I of the instrument consists of 6 question/response sets. Each question is designed to probe some important "structural" aspect of the surveyed planning activities (i.e., contextual characteristics). The first three questions in Section I deal with: 1) the length of time the current directors had been employed by the State CHP agencies, 2) the directors' training in planning methods, and 3) the staff sizes of the agencies. It was thought that continuity of leadership, formal exposure to planning
methods, and relatively large staffs might be important factors in planning progress. One question relates to various types of committee structures for comprehensive health planning. We wondered how many State CHP agencies were still using the standard "categorical" type of committee structure (i.e., facilities, manpower, services, environment, etc.), as opposed to some possibly more functional committee structure. It was believed that the "categorical" type of committee structure might not be conducive to the operationalization of important planning tasks such as the selection of over-all priorities.

Another question concerning organizational placement is included to determine if a "higher" bureaucratic position would be associated with greater planning achievement. Also, it was believed that the number of State CHP agencies located within State Health Departments might reflect how seriously the States were taking the concept of comprehensiveness. That is, it was thought that a full consideration of all options for promoting and protecting health levels almost necessitated the placement of State CHP agencies in some type of umbrella agency which would not by nature be prejudiced in favor of certain types of interventions.

Finally, it was believed that formal recognition of and backing for the planning function was critical to its advancement. Therefore, the last question in Section I probes with regard to the issue of State enabling legisla-
tion for State CHP agencies in an effort to gauge the degree of official State support for comprehensive health planning.

Section II of the instrument consists of 19 question/response sets. Each of these questions addresses some important aspect of the conceptual statement (i.e., Chapter II). These questions are designed to measure whether and to what extent comprehensive health planning steps and tasks were being operationalized by the State CHP agencies. These questions are not designed to measure the "quality" of completed planning steps and tasks. For example, the questions do not measure such things as whether selected means were logical and/or optimal in light of established ends, or whether projections and benefit/cost analyses were conceptually and technically sound.

These and other "quality" type issues are not addressed for the following two reasons. First, considering the relatively short history of comprehensive health planning in the U.S., it was believed that such analyses would be premature. It was thought that the existence of certain activities should be established before attempts are made to judge "quality" (i.e., first things first). Second, it was understood that such analyses would require a detailed examination of the agencies' planning activities. This was not feasible given the time and financial constraints of the survey.
Four questions in Section II are designed to address the first fundamental step of planning, Task Design. These questions (i.e., numbers 8, 7, 10, 18) address the issues of internal evaluation, planning definition, system definition, and planning horizons, all critical aspects of the Task Design step according to the conceptual statement. It was thought that if an agency recognized this planning step, one organizational outcome or manifestation would have been to delegate formally the task of internal evaluation to some group or person. Further, the delegation of this responsibility was considered to be more operationally significant if the assignment went to a permanent body. It was believed that the completion of a modus operandi for the development of a plan document might be a good proxy for the establishment of an agency definition for planning. At least, it would indicate that an agency was approaching plan development in a conscious and systematic way. A question aimed at measuring the level of progress an agency had made in terms of defining its system of interest was considered essential, since such a definition is a prerequisite to explicit and comprehensive system analyses. Finally, it was thought that it could be determined if the agencies were oriented towards the future in a specific way by probing whether planning horizons had been chosen, and if so, exactly what periods of time. It was believed that a future orientation had to be so operationalized in the planning
process before it could actually shape that process.

Four other questions in Section II (i.e., numbers 24[A-1], 19[B], 21[I-4], 9) are designed, at least in part, to explore the second fundamental step of planning, System Investigation. The breadth and depth of the agencies' system investigation is probed by inquiring as to what general data sets and what specific data elements were being utilized. The listed data sets were generated from the major components of the health system as defined by the conceptual statement. In an attempt to get an idea of the agencies' analytic capacities and technical orientation, information is sought about the nature and sophistication of their information systems. It was believed that the operationalization of planning required an ongoing source of well defined data which could be statistically manipulated. To continue the probe regarding the critical role of analysis in planning, one question asks whether certain technical studies had been completed. The four particular studies listed were selected to indicate whether the agencies were engaging in activities to assess the future, present, and etiological characteristics of the system of interest. As the conceptual statement indicates, these are the basic analytic requirements of the system investigation step of planning. Finally, the issue of problem priorities is addressed. The questionnaire is designed to determine whether the agencies recognized the importance of and
actually selected problem priorities. The lack of problem priorities would denote a certain low level of planning progress since they represent the culmination of the system investigation step.

Three questions in Section II of the instrument (i.e., numbers 11, 12, and 13) are designed to address the third fundamental step of planning, Ends Establishment. First, it is asked whether or not and, if so, what types of procedures had been instituted for selecting health goals. This particular question was formulated to measure the explicitness and representativeness of any goal setting procedures that had been instituted. It was believed that the lack of such formal procedures would indicate that the agencies were approaching goal setting less consciously and deliberately than they should. Second, we query whether goals had actually been established and, if so, whether they had been ranked. Finally, the instrument is designed to determine if ends had been stated in specific terms by asking if, in fact, goals had been transformed into targets. The lack of such targets would reflect an absence of the requisite explicitness and preciseness with which planning must be conducted.

Four additional questions in Section II (i.e., numbers 14, 21, 22, 15) are aimed, at least in part, at the investigation of the fourth fundamental step of planning, Means Selection. The central question of this group of
questions is designed to measure the degree of general progress made in terms of analyzing alternative courses of action (i.e., if identified, if compared, if ranked). Certain studies which would be relevant to the means selection step of planning are listed to see which of these studies, if any, the agencies had conducted. It was thought that the responses to these options would reflect the way in which, and the explicitness with which the agencies were approaching means selection.

An inquiry regarding the possible use of epidemiologic research findings by the agencies is included in the instrument for several reasons. First, it is believed that such findings are needed in health planning in order to transform ends into means because they supply measures of program output. Second, it was thought that the extent to which the agencies focused on health status might be reflected in the responses to this query since epidemiological studies typically measure outcomes in terms of health status changes (e.g., mortality, morbidity, or some other indicator of health status). Finally, the task of making action recommendations is probed with a couple of things in mind. On the one hand, we wondered if the action recommendations that the agencies had made, if any, were made in a formal and specific fashion. Specificity is particularly important to the appropriate implementation of changes in the operating system. On the other hand, it
was desired to gauge the range of interventions which were being recommended, in an effort to determine if the agencies as a whole over-emphasized certain types of interventions (i.e., tertiary prevention). From the perspective of the conceptual statement, one would hope to find a significant representation for primary prevention among the recommendations.

One question in Section II (i.e., number 16) addresses the fifth fundamental step of planning, Intervention Evaluation. This question asks whether formal, generic criteria and procedures for evaluating implemented action recommendations had been established. Basically, this question is included to determine if the agencies recognized intervention evaluation as a necessary planning step and, if so, whether they had progressed as far as adopting guidelines for the operationalization of this step. It was thought that questions relating to completed intervention evaluations might be premature, given the life spans of the State CHP agencies.

Lastly, five questions in Section II (i.e., numbers 19[A], 20, 23, 17, 25) are designed, at least in part, to probe some issues relating to all five fundamental steps of planning, general planning issues. The agencies are asked whether they primarily collected their own data or relied on some other agency with respect to data collection. This query is included in order to get an idea of how actively
the State CHP agencies were actually involved in the collection and processing of data versus data analysis. Another issue that is addressed concerns the proportion of the agencies' staff time which was devoted to research activities. It was thought that the responses to this question might reflect whether the agencies were taking a serious, analytic approach to health planning versus a nonrigorous, involvement approach. The issue of comprehensiveness is addressed in a general fashion by asking which of seven listed variables the agencies included in their deliberations. The variables listed are those general categories of agents which the conceptual statement includes as having an effect on health status change.

Finally, two questions in the instrument inquire regarding health plan documents. First, we wanted to know how many State CHP agencies had actually produced health plans. Second, we wanted to know how such plans, if any, were structured. It was thought that the responses to these questions might indicate: 1) whether the planning activities were being conducted in a partial or comprehensive fashion, and 2) whether a categorical or process framework was being utilized for the development of plan documents.

Section III of the instrument consists of 5 question/response sets. These questions (i.e., numbers 26, 27, 28, 29, and 30) are designed to probe the directors' attitudes and perceptions regarding some important planning concepts.
and their agency's performance. It was thought that there might be an association between these "subjective" type variables and planning performance. The first question in this section lists a number of possible functions for CHP agencies and asked the directors to rank the functions in terms of the three most important responsibilities of their agency. This question is included to determine if there was a national consensus as to the primary function of State CHP agencies. Also, we were curious to know how many directors would rank "conducting a continuous planning process" as the number one responsibility of their agency. It was thought that the ranking of that function might con­ note the planning consciousness of the State CHP directors.

The second question is designed to test the extent to which the directors were aware of the specific, operational planning tasks embodied within the concept of "comprehensive" planning. The third question is designed to test the extent to which they understood basic health planning concepts. It was believed that a good grasp of such concepts would be critical to the successful operationalization of the funda­ mental steps of comprehensive health planning.

The fourth question of Section III inquires as to whether the directors were satisfied with the planning progress made by their agency and, if not, what they saw as the contributing factors. We wanted to know whether the directors would indicate that a lack of preparation in
planning concepts and techniques was an obstacle. The last question of the instrument, an open-ended question, is included to get the directors' personal opinions of the survey. It was thought that an overwhelming, negative reaction to the general content of the survey would be an indicator of a low understanding of and/or appreciation of planning steps and tasks on the part of the State CHP directors.

Index Construction

As has already been stated, Section II of the instrument deals with the fundamental steps of comprehensive health planning. There are 19 separate question/response sets in this section. It was decided to form an index from this material for the three reasons put forth by Babbie. First, by combining several questionnaire items, an index can avoid the biases inherent in single items. Second, indexes can provide a wider range of variation on the phenomenon being studied (i.e., the dependent variable). Third, indexes can provide an efficient device for data reduction (i.e., a summary or composite measure).

Two basic conceptual assumptions provide the foundation for the construction of the "planning" index. First, each of the five fundamental steps of planning are considered to be equally important in terms of the operationalization of the planning process. Since planning is a continuous cyclical process, the completion of each step is
essential to the ongoing effectiveness of the total process. Therefore, in constructing the index it was decided to give each planning step equal weight or emphasis. Second, by the same token, the individual tasks within a step are viewed as being equally important in the sense that they all are essential to the successful completion of a step. Due to the deductive nature of the planning process, some tasks may bring a particular step to culmination. However, the adage that a chain is only as strong as its weakest link is applicable here. Thus, it was also decided to give the questions (i.e., tasks) which were assigned to each planning step, equal weight in the determination of a subscore for each of the five planning steps. While some may question the absolute appropriateness of the preceding two assumptions, no one can question that they have a logical foundation and that they greatly simplify the index construction process. Further, Babbie makes the following statement in regard to index scoring:

While there are no firm rules to be followed in this regard, I would suggest—and practice tends to confirm this—that items should be weighted equally unless there are compelling reasons for differential weighting. That is, the burden of proof should be on differential weighting; equal weighting should be the norm.3

In terms of the way in which responses to particular questions are weighted, an important point needs to be made. The weighting of response options is made more difficult by the fact that an early decision was made to stress qualita-
tive, rather than quantitative, analyses of the survey responses. It was believed that a strictly quantitative analysis based on a simplified questionnaire would invite nonsampling errors and belie the complexity of the phenomenon under investigation. This stance led to the use of various types of response patterns (e.g., "circle one" or "circle as many as apply", and varying numbers of response options: 2, 3, 4, 5). Obviously, the use of non-uniform response patterns makes the weighting of response options more complicated because it eliminates the possibility of utilizing the exact same weighting pattern for all response sets.

The employment of the previously noted two conceptual assumptions in the face of non-uniform response patterns led to the scoring method presented in Table 1. This scoring method is used to construct a summary index of compliance with the conceptual statement on the fundamental steps of comprehensive health planning. The scoring method can be explained and elaborated upon in the following ways.

First, the following response possibilities did not actually appear on the instrument as options for the directors to mark, but rather are created from the actual response choices: a) Question #24 - (A12), (B12), (C8), (D5), (E8), (F13), (G12), (H9), (I9); b) Question #11(a) - (8); and c) Question #15 - (9). All of these added response categories simply signify that the actual response option
### TABLE 1
THE SCORING METHOD

<table>
<thead>
<tr>
<th>Planning Step</th>
<th>Question Number</th>
<th>Weighting Type</th>
<th>Response Numbers And Weights</th>
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<td>7</td>
<td>SW</td>
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<tr>
<td></td>
<td>8</td>
<td>SW</td>
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<td></td>
<td>10</td>
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<td></td>
<td>18</td>
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<tr>
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<td>SW</td>
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<tr>
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</tr>
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<td></td>
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<td></td>
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<td></td>
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<td></td>
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<td></td>
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<td>CW</td>
<td>(1) 5, (2) 2, (3) 1, (4) 1</td>
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<td>SW</td>
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<td>TOTAL POSSIBLE SCORE = 160</td>
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*a "SW" signifies that only one weight can be assigned per case*
*"CW" signifies that all weights are eligible for assignment per case*
or options circled were of the "yes" or positive variety, not of the "currently in the process", "no--but", "no", or "not" types. That is, if an agency's response is placed in one of these special categories, it was engaged in the relevant activity at some level.

Second, the index questions are bifurcated by the symbols SW and CW. SW (Single Weight) indicates that the response set was usually of the "circle one" type, although questions #18,19B,11(5-8), and 15 were converted for scoring purposes into a single response type format. In SW type cases, only one of the possible weights can be added to each individual agency's score as a result of the inclusion of that question in the scoring system. Obviously, in these instances the specific weight added to the individual agency's score depends on which response option that particular agency actually selected. CW (Cumulative Weight) indicates that the response set was of the "circle as many as apply" type. In such cases, each individual agency is eligible to receive all of the separate weights assigned to the individual response options. In these instances, the exact number and magnitude of the weights actually assigned to each individual agency's score, obviously, depends on how many and which response options it selected.

Third, the weights assigned to response sets reflect the ordinal relationships between the response options of each particular set. These ordinal relationships are
drawn from the conceptual statement (i.e., Chapter II). For example, referring to Question #12, to have priority ranked health goals is to be in greater compliance with the conceptual statement than to have established goals but not to have ranked them. In those cases where such ordinal relationships may not be straightforward in light of the conceptual statement, an explanation will be given below.

Fourth, then, the "SW" type of response sets are generally weighted such that the response which is in best compliance with the conceptual statement receives a weight of 9, and the response in least compliance receives a 0. The intermediate response options are scored in a standard, uniform way for each response set having an equal number of options. However, a couple of explanatory notes are in order. First, Question #16 was weighted: 36(best compliance), 24, 12, 0(no compliance) because it is the only question designated for the 5th planning step which has to have an equal total possible subscore as the other four planning steps. Second, the response options for Question #18 are dichotomized for the purpose of scoring because this response set does not lend itself to a more discriminatory type of weighting. It would be impossible to rank order the total possible ways in which the first four response options of Question #18 could be marked.
Fifth, the CW type of response sets are weighted logically and ordinally in the following ways (i.e., within the constraint of the 9 point maximum allowed for each question). With regard to Question #21(1-4), the more analytically difficult and less readily available studies are given higher weights than the others, in order to reflect the analytic sophistication of the planning operations. In regard to Question #24, a weight of one is given to each data category in which the respondent registered activity, so that the comprehensiveness of its system investigation can be reflected in the final score. With respect to Question #11(1-4), the four alternative methods of selecting goals are weighted such that the more participatory and/or the greater the explicitness of the method, the higher is the assigned weight. The response usually supplied the "other" category was: "combined input of staff, committees, and council." An agency which used more than one method is rewarded. This is done because the present state of the art for ends establishment is relatively primitive and uncertain. An agency which experimented with different methods probably demonstrated that it was aware of the complexity and difficulty of the task, and the need to search for more satisfactory methods. With regard to Question #21 (5-8), the analytically more difficult type of studies are given greater weight in order to reflect, once again, the analytic capacities of the responding agencies.
Finally, it is important to point out that the total scores obtained using this scoring method should be interpreted vis-a-vis one another in an ordinal fashion. That is, the total scores can be used to rank order the scored agencies. The rankings will indicate which agencies' activities were in greater conformance with the conceptual statement than which other agencies, if any. For example, if one agency should receive a score of 80 and another a score of 20, it would be possible to say that the agency receiving the higher score was in greater compliance with the conceptual statement than was the other agency. However, it would not be appropriate to say that the higher scoring agency had made four times as much progress, in terms of the conceptual statement, than had the other agency. Of course, on an agency-by-agency basis the total score will reflect the degree to which each individual agency's activities are in compliance with the conceptual statement.

Analysis Of The Survey Results

The implementation of the survey resulted in an eighty-four percent (84%) response rate (See APPENDIX C). The following descriptive and explanatory findings are drawn from those 42 returned questionnaires.
Primary Findings

Background characteristics—Planning practice is influenced and shaped to a great extent by its institutional makeup and surroundings, and by the perceptions of the planners themselves (See Chapter I). While the main focus of this survey is planning steps per se, some key organizational and attitudinal variables are also measured.

It would seem to be significant that over half of the State CHP agencies were not located in traditional health departments. This fact may reflect a growing recognition, on the part of the States, of the breadth and complexity of contemporary health policy issues. That is, the location of a State CHP agency in some type of umbrella agency (e.g., Department of Human Resources, or Office of Planning) would seem to indicate that the State in question understands that health status is affected by many nonhealth-service variables as is stressed in the conceptual statement.

It is noteworthy that 40 percent of the responding agencies did not have State statuatory authority, neither by way of legislation tailored specifically for CHP nor by way of legislation establishing a "certificate of need" program. The absence of State enabling legislation may reflect a lack of solid State support for comprehensive health planning. This, in turn, could prove to be an obstacle to the full operationalization of comprehensive
### TABLE 2

A SELECTED ORGANIZATIONAL PROFILE OF THE STATE CHP AGENCIES

<table>
<thead>
<tr>
<th>Attributes</th>
<th>Percent or Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percent located in State Health Departments</td>
<td>45</td>
</tr>
<tr>
<td>Percent Possessing State Statutory Authority</td>
<td>60</td>
</tr>
<tr>
<td>Percent with Facilities, Manpower, Services Environment Type Committee Structure</td>
<td>45</td>
</tr>
<tr>
<td>Percent with More than Half of the Staff Time Devoted to Research and Technical Activities</td>
<td>17</td>
</tr>
<tr>
<td>Percent whose Director Received Graduate Training in Planning Methods</td>
<td>31</td>
</tr>
<tr>
<td>Mean Number of Years Director Had Been Employed by State CHP Agency</td>
<td>3.8</td>
</tr>
<tr>
<td>Mean Number of Full-time Professional Employees</td>
<td>8.3</td>
</tr>
</tbody>
</table>

health planning concepts.

A number of points are worth noting with regard to committee structures. First, no State CHP agency signified that it organized its work on the basis of age groups (i.e., children and youth, adult, and old age committees), or geographic location (i.e., inner city, suburban, and rural committees). Second, the single most popular type of structure was the traditional categorical type (i.e., facilities, manpower, services, environment). The desirability of this type of structure is highly questionable from a
planning process point of view because it tends to isolate issues which should be analyzed in an integrated fashion at each step of the planning process. That is, this type of committee structure separates things which interact in reality, and which should be viewed as options or constraints to each other in the planning process. Third, a relatively small percentage of agencies (36%) reported utilizing some process oriented committee structure (i.e., 9 "Problems, Goals, Priorities, Tactics" type, and 6 "Executive, Areawide Agency, Project Review, Plan Document" type). Although the number of agencies using a process type of committee structure was relatively minor, the fact that some agencies were taking this approach to planning organization may indicate a growing recognition of the importance of planning per se.

It is noteworthy that 83 percent of the respondents indicated that less than 50 percent of their staff time was spent on applied research or technical activities. While this admittedly is not a great deal of evidence on which to base interpretations, it would seem to denote that the State CHP agencies were taking a nontechnical, non-rigorous approach to health planning, or at least that their work priorities emphasized such an approach at the time.

The fact that only 31 percent of the respondents indicated that they had received formal graduate training in planning methods would not seem to auger well for a con-
ceptually sound operationalization of planning methods by the State CHP agencies. Graduate level preparation in administration, community organization, medical care, and/or health education, etc. would certainly be of benefit to the director of a health planning operation. However, the director should first and foremost be a well trained planner.

It is, also, significant that ten (24%) of the respondents indicated that their agency employed less than 5 full-time equivalent professional employees. Given the magnitude and complexity of the job outlined by the conceptual statement, it doesn't appear that these agencies had a good chance of fully implementing the concept, regardless of the amount and quality of their volunteer input.

Based on an overall weighting and scoring system the respondents viewed the following functions as the three most important responsibilities of their agencies: 1) conducting a continuous planning process, 2) fostering area-wide health planning agencies, 3) making health policy decisions. It would seem to be highly significant that there was no clear consensus among the responding directors as to the most important responsibilities of State CHP agencies. None of the ten listed functions received even a simple majority of the "votes" for #1, #2, or #3. The function of "conducting a continuous planning process" received the highest number of votes. It received 45 percent of the "number one" votes. Also noteworthy is the fact
that the function of making health policy decisions was ranked third in the overall weighting and scoring procedure. This would appear to indicate that the respondents did not draw clear distinctions between the planning and decision-making functions. It could also signify that the responding directors were confused concerning the proper role for their agencies. Obviously, such a situation would be disastrous to the full implementation of the planning function.

TABLE 3
SOME SELECTED PERCEPTIONS OF THE DIRECTORS RELATED TO PLANNING PER SE

<table>
<thead>
<tr>
<th>Opinions of Some Directors</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Viewed conducting planning as the number one responsibility of their agency</td>
<td>45</td>
</tr>
<tr>
<td>Satisfied with their agency's planning progress</td>
<td>45</td>
</tr>
</tbody>
</table>

In the cases of those respondents who indicated that they were not satisfied with their agency's progress in operationalizing planning procedures (55%), 5 directors indicated that personal lack of preparation in planning concepts and procedures was one of the obstacles and 7 directors indicated that the lack of such preparation on the part of their staff was one of the obstacles. However, "other obstacles" was the most frequently cited of the listed obsta-
cles. The following obstacles were most often specified when "other obstacles" was marked: 1) lack of funds, 2) lack of adequate staff, and 3) lack of planning concepts and criteria. Thus, the majority of the respondents were satisfied with the progress their agency had made with respect to planning operations and procedures. Those who were not satisfied seemed to be saying that they did not think the lack of progress was due to deficiencies in professional preparation. Rather, they seemed to be complaining about the lack of resources (i.e., money, manpower, and conceptual materials). In other words, the responding directors preferred to place the responsibility for dissatisfying progress with others (e.g., State and Federal government), rather than with themselves or their existing staff. No doubt these general sentiments reflect a great deal of truth. However, the fact that only 31 percent of the responding directors reported having received graduate training in planning methods would seem to indicate that the directors as a group may not have been fully prepared for the task, as well.

Task design—The fact that 64 percent of the respondents indicated that their agency had not decided upon a health system definition does not portend well for the rest of their planning activities. A thorough and precise systems analysis requires a clear description of the system's boundaries and components. Thus, the lack of a specific
TABLE 4

TASK DESIGN: SELECTED RESPONSES

<table>
<thead>
<tr>
<th>Tasks Completed</th>
<th>Percent of Agencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formal, agreed-upon system definition</td>
<td>36</td>
</tr>
<tr>
<td>Modus operandi for the preparation of the State health plan</td>
<td>72</td>
</tr>
<tr>
<td>Fixed responsibility for the evaluation of the planning process</td>
<td>88</td>
</tr>
<tr>
<td>Selected planning horizons</td>
<td>74</td>
</tr>
</tbody>
</table>

health system definition leaves the planners without a common framework in which to ground their analyses. This would, most likely, lead to a nonsystematic, nonintegrated approach to health planning.

Although the State CHP agencies, in general, had not defined their system of interest, it does appear that they had defined the planning process (i.e., modus operandi). However, it must be noted that the existence of a planning definition is one thing, and the caliber of such definitions is quite another thing. As has already been discussed, this survey did not address such issues directly.

The fact that so many agencies had charged some person or group with the responsibility of evaluating and/or recommending changes in the agencies' planning cycles or plan development procedures, was an important positive finding. Introspection is a key element of Task Design.
Twenty-six percent (26%) of the respondents reported that their agency had not selected time frames as planning horizons. Thus, it would appear that at least one quarter of the responding agencies were not oriented to the future in a highly conscious and specific way.

System investigation—In terms of the types of data that were being collected and utilized by the responding State CHP agencies, the following categories were covered best: demographic data, health status data, health services data, health manpower data, and health facility data. However, with respect to these categories, the following results are noteworthy. Within the demographic category, net migration figures and age-specific State population projections were the least frequently marked items. These findings reflect a lack of hard analysis on the parts of the agencies which did not utilize such data. The size and composition of the population is an extremely important determinant of health needs and health service demands. Therefore, without net migration figures and age-specific population projections, it would be impossible to anticipate future health system problems. Of the types of health services data which were listed, the following were neglected the most by the State CHP agencies: environmental health services, detection and screening services, and health education services. This fact would seem to reflect that many State CHP agencies were viewing the health service subsystem in
only partial terms. In addition, it is significant that the services which were most neglected, in terms of data collection, are all aimed at prevention. Thus, the State CHP agencies appear to have had an undesirable bias in favor of curative services. Lastly, it is interesting to note that 36 percent of the responding agencies indicated that they had no data on inactive but nonretired R.N.s in their State. This fact may reflect a lack of depth in manpower data collection and analysis for those agencies.

### TABLE 5

**SYSTEM INVESTIGATION: SELECTED RESPONSES**

<table>
<thead>
<tr>
<th>Agency Attributes</th>
<th>Percent of Agencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Utilized the following general types of data:</td>
<td></td>
</tr>
<tr>
<td>1- demographic</td>
<td>100</td>
</tr>
<tr>
<td>2- health status</td>
<td>98</td>
</tr>
<tr>
<td>3- health facility</td>
<td>98</td>
</tr>
<tr>
<td>4- health service</td>
<td>95</td>
</tr>
<tr>
<td>5- health manpower</td>
<td>95</td>
</tr>
<tr>
<td>6- health costs and expenditures</td>
<td>83</td>
</tr>
<tr>
<td>7- health attitudes and behavior</td>
<td>69</td>
</tr>
<tr>
<td>8- environmental</td>
<td>53</td>
</tr>
<tr>
<td>9- genetic</td>
<td>31</td>
</tr>
<tr>
<td>Utilized five to ten year projections of the State population by age categories</td>
<td>76</td>
</tr>
<tr>
<td>Relied on another agency for data collection</td>
<td>74</td>
</tr>
<tr>
<td>Utilized a computerized record storage and linkage, data system</td>
<td>28</td>
</tr>
<tr>
<td>Established and documented agreed-upon, problem priorities</td>
<td>50</td>
</tr>
</tbody>
</table>
The following data categories are those which the survey indicated were covered least well by the responding State CHP agencies: attitudinal and behavioral data, genetic data, environmental data, and health expenditures and costs data. The following percentages indicate what percent of the respondents collected no data in the respective categories:

- genetic - 67 percent
- environmental - 45 percent
- attitudinal and behavioral - 31 percent
- expenditures and costs - 17 percent

Again, the previously listed four percentages would seem to indicate that many State CHP agencies were viewing the health system in only partial terms. All four of these categories represent important components of the health system as defined in the conceptual statement. Genetic, environmental, attitudinal and behavioral, and expenditures and costs variables all have at least an indirect effect on health status, and direct effect on health services utilization. Therefore, it would be impossible for an agency to plan for health comprehensively if it did not utilize data relating to these categories.

It is of interest to note that 74 percent of the respondents reported that their agency primarily utilized the services of a separate division or agency to fulfill its data collection responsibilities. This type of data collection arrangement is certainly not inappropriate for a State
health planning agency. However, it does raise important questions with regard to access and control. Since data collection is a derived function of planning and not the other way around, it is necessary for planners to have, at least, a strong voice in the formulation of policies governing health information systems.

Only 28 percent of the respondents indicated that the information systems which they were utilizing incorporated "computerized record storage and linkage." Thus, it would appear that in general the reporting agencies did not have a great facility to analytically manipulate their data. This is not a good sign from the systems analysis point of view. Planning requires the capacity to evaluate current system conditions, to uncover causal links, and to anticipate future events. In addition, 29 percent of the agencies reported that their information system was characterized by "manual, ad hoc collection of needed data." This would indicate that a sizeable proportion of the State CHP agencies had not selected a set of health system indices for continuous monitoring. Such a circumstance would reflect an undesirably loose approach to health planning. The conceptual statement points out the importance of selecting a set of indicators which can be monitored and analyzed on a continuous basis. A lack of standard indicators would prevent the requisite identification of health system trends.
Most significantly in terms of System Investigation, only one half (50%) of the responding agencies reported that they had established and documented problem priorities. This indicates that the requisite focusing-in and converging of the planning process was not occurring in the cases of at least half of the State CHP agencies. This lack of unified choice, on their parts, mirrors poor planning progress.

**TABLE 6**

HEALTH FOCUS: SELECTED RESPONSES

<table>
<thead>
<tr>
<th>Activities and Opinion</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agencies utilizing the following types of data:</td>
<td></td>
</tr>
<tr>
<td>1- Infant Mortality</td>
<td>90</td>
</tr>
<tr>
<td>2- General Mortality</td>
<td>86</td>
</tr>
<tr>
<td>3- General Morbidity</td>
<td>71</td>
</tr>
<tr>
<td>4- General Disability</td>
<td>45</td>
</tr>
<tr>
<td>Agencies having conducted the following types of studies:</td>
<td></td>
</tr>
<tr>
<td>1- Health Status Sample Surveys</td>
<td>26</td>
</tr>
<tr>
<td>2- Effect of Health Services on Health Status</td>
<td>29</td>
</tr>
<tr>
<td>3- Effect of the Environment on Health Status</td>
<td>17</td>
</tr>
<tr>
<td>Directors agreeing that &quot;Health Status&quot; should be the primary focus for health planning</td>
<td>62</td>
</tr>
</tbody>
</table>

Finally, it might be appropriate at this point to discuss the extent to which the responding agencies were concentrating on health status (i.e., health focus). The
survey results would seem to indicate that the health level of the population was not a primary focus for a sizable portion of the State CHP agencies. It appears that those health status indicators which were already available (e.g., from the vital statistics divisions of the State health departments) were being collected and utilized by the surveyed agencies. For example, 86 percent of the respondents indicated that they utilized data relating to the ten or so leading causes of mortality in the State. Also, State infant mortality rates were being utilized by 90 percent of the responding agencies according to the survey results. However, the survey indicates that the State CHP agencies were less likely to utilize health status data which were generally less available and accessible. For example, data concerning the ten or so leading types of morbidity in the States were not utilized by 29 percent of the responding agencies according to the survey results. Fifty-five percent (55%) of the responding agencies reported that they did not utilize data dealing with the ten or so leading causes of disability in the State.

The importance placed on health status data by a planning agency can, perhaps, be best gauged by the amount of effort such an agency is willing to expend in order to gather and analyze such data. Using such a criterion, the State CHP agencies did not appear to consider health status data as being extremely important. For example, seventy-
four percent (74%) of the respondents signified that their agency had not completed any type of State population sample survey to determine the existing magnitude of disease and disability. Since the National Center for Health Statistics does not take samples large enough for its morbidity and disability data to be of great use to State health planners and since State Health Departments generally only have good morbidity data on reportable diseases, the fact that the State CHP agencies by and large had not conducted health status surveys indicates that they probably did not have adequate morbidity and disability profiles. These profiles are essential to modern day health planning, since mortality data are no longer an accurate reflection of the most prevalent health problems.

Another important indication of the extent to which State CHP agencies were focusing on health status, per se, is the fact that 38 percent of the responding directors did not agree with the following statement: "The primary focus of health planning should be the health level of the population." Thus, it appears that many State CHP agencies were only focusing on health status to the extent that it was relatively effortless. The survey results indicate that a sizeable portion of the responding agencies were not giving the identification and analysis of population health levels the weight it should have in health planning.

Health planning programs which do not maintain a steadfast
eye on population health levels are bound to end up sub-optimizing.

**E nds establishment**—A high percentage of the responding agencies (86%) signified that they had instituted a formal procedure for selecting health goals. Of the listed methods of selecting health goals (i.e., opinion surveys, nominal groups, expert judgement, other), the nominal groups method was the most often marked (48% of all the respondents circled at least this response option). A much lower percentage of responding directors indicated that their agency had actually set and priority ranked health goals (41%). An additional 38 percent of the responding agencies signified that they had established a number of health goals but had not ranked them. Once again, we find that a large number of State CHP agencies were not operationalizing the critical planning task of focusing-in by separating the more important from the less important. That is, 59 percent had not chosen priority goals.

The survey produced one especially surprising result in regard to goals. Sixty percent (60%) of the responding directors reported that they did not agree with the following statement: "The formulation of goals is grounded primarily in values, not in facts." It is essential that all planners understand that there is no scientific way of deciding where it is you want to go. Thus, although values are an important ingredient in every planning step, they
are especially important in the Ends Establishment step. The low percentage of agreement with the above statement was particularly surprising in light of the heavy emphasis placed on consumer participation by the CHP programs.

Most of the respondents (74%) indicated that their agency had not established an agreed-upon set of health targets. This fact is extremely significant since without such quantified, time-related end statements, it is near impossible to weigh alternative actions and to measure progress in reaching goals. Such a general lack of target setting reflects an inadequate degree of preciseness and explicitness in planning activities.

Means selection—In the planning process, ends must be translated or transformed into means. In health planning, epidemiological research findings are a primary source of information about intervention possibilities. Thus, it is
disheartening that 84 percent of the respondents reported that their agency had no formal procedure for staying abreast of epidemiological research findings. Further, 12 percent indicated that they had no intention of staying abreast of such findings in the future, either formally or informally. Such an attitude would seem to be disastrous to the health planning process which requires a skillful utilization of applied health research.

TABLE 8
MEANS SELECTION: SELECTED RESPONSES

<table>
<thead>
<tr>
<th>Tasks</th>
<th>Percent of Agencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instituted a formal procedure for monitoring epidemiological research findings</td>
<td>14</td>
</tr>
<tr>
<td>Identified alternatives</td>
<td>74</td>
</tr>
<tr>
<td>Analyzed alternatives</td>
<td>29</td>
</tr>
<tr>
<td>Conducted Benefit/Cost analyses of alternatives</td>
<td>24</td>
</tr>
<tr>
<td>Ranked alternatives</td>
<td>19</td>
</tr>
<tr>
<td>Conducted studies of future health facility requirements</td>
<td>64</td>
</tr>
<tr>
<td>Conducted studies of future health manpower requirements</td>
<td>64</td>
</tr>
<tr>
<td>Made formal, specific action recommendations</td>
<td>73</td>
</tr>
</tbody>
</table>

Eighty-one percent (81%) of the respondents reported that their agency had not priority ranked alternative
courses of action. In addition, twenty-six percent (26\%) indicated that they had not even formally identified alternatives as yet.

On the other hand, 73 percent of the respondents indicated that their agency had made some formal, specific action recommendations. The survey indicated that most such recommendations were made in the areas of health facilities and manpower. In addition, 17 percent of the respondents reported that formal, but not specific, action recommendations had been made by their agency. Specificity, however, (i.e., who should do what, where, and when) is an extremely important attribute for action recommendations to possess. The absence of such specificity greatly reduces the probability that suggested system changes will be implemented.

In any event, it appears that action recommendations were being made without a detailed consideration of alternatives. Seventy-six percent (76\%) of the respondents reported that their agency had not completed studies concerning the benefit/cost ratios of certain program alternatives.

Further, it is interesting to note that 64 percent of the respondents indicated that their agency had completed technical studies regarding health facility and health manpower requirements for the future. Since resource requirements should be derived from chosen intervention strategies, it is disturbing that so many such studies had been completed. After all, most agencies had not ranked or even
analyzed alternative courses of action.

The juxtaposition of reported categorical action recommendations, and the lack of analysis and ranking of alternative interventions would seem to suggest that the State CHP agencies were approaching Means Selection in a nonintegrated, nontechnical, ad hoc manner. Thus, it does not appear that the responding agencies were approaching this step of planning from the logical, deductive perspective suggested by planning concepts. The mere existence of action recommendations does not necessarily signify that the Means Selection step has been successfully completed. The process by which such recommendations are arrived at is critical from a planning viewpoint.

At this point, it might be appropriate to discuss the issue of comprehensiveness as it relates to health planning (i.e., comprehensive scope). The survey findings seem to indicate that the State CHP agencies were conscious of the concept of comprehensiveness, and were attempting to operationalize it. However, the survey findings would, also, seem to indicate that the concept of comprehensiveness was not fully understood or implemented by the State CHP agencies.

The survey instrument listed seven ways in which the concept of comprehensiveness manifests itself in the health planning process (i.e., Question #27). At least two-thirds of the respondents agreed that each of these ways were,
### TABLE 9

**COMPREHENSIVE SCOPE: SELECTED RESPONSES**

<table>
<thead>
<tr>
<th>Activities and Opinions</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Agencies having included the following system components in their deliberations:</strong></td>
<td></td>
</tr>
<tr>
<td>1- demographic characteristics</td>
<td>95</td>
</tr>
<tr>
<td>2- socio-economic characteristics</td>
<td>93</td>
</tr>
<tr>
<td>3- health levels</td>
<td>67</td>
</tr>
<tr>
<td>4- environmental health services</td>
<td>64</td>
</tr>
<tr>
<td>5- attitudes and behavior</td>
<td>52</td>
</tr>
<tr>
<td>6- physical, chemical, and biological agents</td>
<td>31</td>
</tr>
<tr>
<td>7- genetic characteristics</td>
<td>24</td>
</tr>
<tr>
<td><strong>Agencies having made action recommendations related to the following categories:</strong></td>
<td></td>
</tr>
<tr>
<td>1- health facilities</td>
<td>64</td>
</tr>
<tr>
<td>2- health manpower</td>
<td>52</td>
</tr>
<tr>
<td>3- environmental health services</td>
<td>43</td>
</tr>
<tr>
<td>4- personal health services</td>
<td>38</td>
</tr>
<tr>
<td>5- health financing</td>
<td>29</td>
</tr>
<tr>
<td>6- the general environment</td>
<td>26</td>
</tr>
<tr>
<td><strong>Directors agreeing with all seven listed operational manifestations of &quot;comprehensiveness&quot; in the planning process</strong></td>
<td>45</td>
</tr>
<tr>
<td><strong>Directors agreeing that prevention is the intervention of choice</strong></td>
<td>69</td>
</tr>
</tbody>
</table>

Indeed, valid manifestations of the idea of comprehensiveness as it relates to health planning. However, only 45 percent of the respondents agreed with each and every listed consequence of conducting health planning in a comprehensive manner. This would seem to indicate that, for the most part, the State CHP directors had only a partial understanding of the implications of the word comprehensive when it modifies the word planning.
Further, the survey findings also revealed that the following large percentages of State CHP agencies were not including the following major health system components in their deliberations: Human health attitudes and behavior (48%), physical, chemical, and biological agents in the environment (69%), and genetic characteristics of the population (76%). Naturally, such omissions detract from the comprehensiveness of the health planning activities of the included agencies. This is so because these omissions unnecessarily and inappropriately delimit the planner's area for definition, identification, analysis, choice and ranking.

Finally, the types of formal, specific action recommendations which had been made by the State CHP agencies probably reflect the extent to which the agencies were comprehensive in selecting means. Only two of the six listed action recommendation categories had been circled by over half of the respondents: 1) health facilities (64%), and 2) health manpower (52%). The fact that "general environment (e.g., land use, etc.)" type intervention strategies were recommended least by the State CHP agencies would seem to indicate that they viewed health interventions primarily from a traditional medical care perspective. Therefore, it would appear that primary prevention possibilities were not being given the weight they should by the State CHP agencies. In fact, 31 percent of the responding directors
disagreed with the following statement: "When prevention is feasible, it is in most cases the intervention or action of choice (v. detection, treatment, rehabilitation)."

**Intervention evaluation**—The survey instrument did not include questions with respect to whether and to what extent evaluations of implemented recommendations had been carried out. It was decided that such questions might be premature given the life spans of State CHP agencies. However, a single question was posed relating to conscious preparation for the conduct of this planning step.

<table>
<thead>
<tr>
<th>Criteria and Procedures for Intervention Evaluation</th>
<th>Percent of Agencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Established</td>
<td>43</td>
</tr>
<tr>
<td>In process</td>
<td>19</td>
</tr>
<tr>
<td>Intended</td>
<td>24</td>
</tr>
<tr>
<td>Not intended</td>
<td>14</td>
</tr>
</tbody>
</table>

Accordingly, less than half of the respondents (43%) reported that their agency had formally established generic criteria and procedures for the Intervention Evaluation step. Even more disturbing, 14 percent indicated that they had no intention of establishing such criteria and procedures in the future. Thus, it appears that most State CHP agencies
had not seriously approached this planning step as yet, and that many did not recognize its importance.

**Plan documents**—Progress made in the development of a plan document may reflect: the number of planning steps completed, the scope of the planning effort, and the general approach to planning per se.

**TABLE 11**

**PLAN DOCUMENT DEVELOPMENT: SELECTED RESPONSES**

<table>
<thead>
<tr>
<th>Level of Accomplishment</th>
<th>Percent of Agencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Comprehensive health plan completed</td>
<td>31</td>
</tr>
<tr>
<td>Partial health plan completed</td>
<td>57</td>
</tr>
<tr>
<td>No health plan completed</td>
<td>12</td>
</tr>
</tbody>
</table>

If the statistics in TABLE 11 do, indeed, reflect the degree of progress in operationalizing comprehensive health planning at the State level, the following points would seem to be true. Less than one third of the State CHP agencies have wholly implemented the concept of comprehensive health planning. The majority of the State CHP agencies have taken a partial approach to health planning (i.e., working on categorical issue areas as components or separately). A small but not unimportant number of State CHP agencies have failed to come to grips with planning even in a partial way. These conclusions are, of course,
based on the premise that the plan document is the black and white embodiment of completed planning tasks and steps. It is possible, however, that the State CHP agencies viewed plan documents differently. For example, they may have consciously avoided producing such documents in order to shun the appearance of master planning.

In addition, as part of the survey the State CHP directors were asked to submit the Table of Contents of any comprehensive health plan document which their agency might have produced. Eighteen (43%) of the respondents actually submitted outlines in response to this particular request. These outlines were examined to see what they might reflect about the planning processes which gave rise to them. Eight of the eighteen outlines (44%) seemed to reflect a "process" orientation to planning (i.e., the key section headings mirrored the major steps in planning). Ten of the eighteen outlines (56%) were "categorical" in nature (i.e., the key section headings revolved around categorical issue areas).

These figures would seem to indicate the same types of things that the preceding figures did. That is, it would appear that a very substantial number (i.e., well over half) of the State CHP agencies had not, as yet, developed a comprehensive health plan. This reflects a generally slow rate of progress in planning per se. Also, the plans that had been completed seemed to indicate that, for the most part, the State CHP agencies were taking a categorical, noninte-
comprehensive health planning.

**Composite profile**—Using the computed percentages associated with certain responses, it was possible to construct a "process" description of the typical State CHP agency. That is, the modal responses to key questions were used to produce the following description of the "modal" agency.

The typical State CHP agency had disseminated among its staff and council members an agreed-upon modus operandi for preparation of the State health plan. It had discussed the issue of a health system definition, but it had not arrived at a formal, agreed-upon definition of the health system which could be utilized in conjunction with its ongoing planning activities. The typical agency had established and documented health and health service problem priorities. While it did not have an agreed-upon set of health targets, it was in the process of deriving such quantified, time-related expressions of goals. The typical State CHP agency had identified various alternative courses of action, (i.e., options for reaching a target), but had not completely analyzed or priority ranked them. It had established generic criteria and procedures for evaluating those action recommendations which are actually implemented. Finally, the typical State CHP agency had not completed a comprehensive health plan document (e.g., both goals and alternative actions, and covering many categorical issue areas), but it
had completed a partial health plan document (e.g., environmental health plan, or goals statement, etc.).

Without repeating observations which have already been presented, a couple of points are worth making about this "typical" agency. It is clear that the "modal" agency has not fully operationalized the fundamental steps of planning as defined by the conceptual statement. In particular, the central or pivotal tasks had not been completed. With regard to ends, although goals had generally been established, they had not been transformed into workable targets. With regard to means, alternative interventions had not been analyzed in a meaningful way. Thus, it appears that the typical agency had not yet stated ends with enough specificity or analyzed means thoroughly enough to be of great assistance to resource allocators and decision-makers in general.

In addition, it should be noted, again, that only half the agencies had selected problem priorities, less than half had chosen goal priorities, and less than one-quarter had selected intervention priorities. The choice of such priorities is one of the most important contributions which health planners can make to health decision-making. Thus, the fact that the majority of State CHP agencies had not selected such priorities is a serious negative finding.
Index scores—The degree to which each agency complied with the conceptual statement was summarized in the form of an index. The process by which the summary index was constructed is described in the "Index Construction" subsection of this Chapter. Accordingly, a total raw score was computed for each agency. These index scores ranged from 67(low) to 162(high). The median score was 118. The frequency distribution of the total raw scores can be found in Figure 4. Since it would have been possible for the agencies to have scored anywhere from 0 to 180, we can see that 61.9 percent of the agencies scored within the upper, third quarter of the possible scoring range. However, only 16.6 percent of the agencies scored within the top quarter of the potential scoring range. This is roughly the portion of the range which reflects substantial compliance with the conceptual statement. These percentages can be interpreted to signify that: 1) the majority of the agencies seemed to be involved in activities which might eventually bring them into compliance with the conceptual statement, but 2) at the time only a relatively few agencies appeared to be in close compliance with the conceptual statement.

As was previously explained, the total raw score was based on five subscores, one for each of the five fundamental steps of planning. In order to ensure that each subscore was independently contributing to the total score,
Fig. 4.—Histogram for the Raw Planning Scores
Spearman correlation coefficients were calculated to test the association between each of the subscores and the total raw score. The following correlation coefficients were so generated: Task Design (.56), System Investigation (.57), Ends Establishment (.66), Means Selection (.72), and Intervention Evaluation (.74). All of these coefficients were statistically significant at the 0.1 percent level. Thus, all of the subscores were found to contribute to the total score's power. Therefore, none of the subscores was excluded from further analyses.

Secondary Considerations

It is not the purpose of this study to explain the spread of index scores described in the previous subsection. The purpose of the empirical portion of this study is to identify the extent to which the State CHP agencies were in conformance with the conceptual statement. However, having obtained the spread of scores depicted in Figure 4, we were naturally curious to see whether or not the spread could be explained. Therefore, some limited bivariate and multivariate analyses were undertaken.

For purposes of explanation, it was decided to utilize linear regression techniques because they seemed best suited to the question and data at hand. Regression analysis should employ a continuous dependent variable when the independent variable or variables are non-continuous.
However, the raw index scores could only be interpreted in an ordinal fashion. Therefore, the forty-two responding agencies were rank-ordered on the basis of their raw index scores. This rank ordering was then transformed into a continuous dependent variable by utilizing the "normalized rank method." This transformation produced a total normal score for each of the forty-two agencies.

The independent variables are mainly drawn from the survey findings. A brief outline of the eleven independent variables can be found in TABLE 12. A description of the creation of most of the independent variables is located in the Instrument Development subsection of this Chapter, i.e., specifically those parts dealing with Sections I and II of the survey Instrument. Further, the descriptive findings concerning most of the independent variables can be found in APPENDIX D5, Sections I and II. Two of the independent variables, State Per Capita Personal Income and Total State Population, were drawn from outside (i.e., non-survey) sources. Most of the independent variables had to be transformed into dummy variables, since they are nominal level data in their raw form.10,11

The dependent variable—total normal score—was regressed separately against each of the independent variables to determine how much variance might be explained by each variable. None of these eleven regressions explained more than 30 percent of the variance, and most runs accounted
<table>
<thead>
<tr>
<th>Dimension Measured</th>
<th>Source</th>
<th>Type</th>
<th>Coefficient of Determination&lt;sup&gt;a&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Director's Knowledge of Planning Concepts</td>
<td>Survey Question #23</td>
<td>Dummy?</td>
<td>.27</td>
</tr>
<tr>
<td>No. of Years Director Employed by Agency</td>
<td>Survey Question #1</td>
<td>Dummy</td>
<td>.22</td>
</tr>
<tr>
<td>Structure of Committees</td>
<td>Survey Question #4</td>
<td>Dummy</td>
<td>.14</td>
</tr>
<tr>
<td>Director's View of Planning Responsibility</td>
<td>Survey Question #26</td>
<td>Dummy</td>
<td>.12</td>
</tr>
<tr>
<td>Organizational Location</td>
<td>Survey Question #5</td>
<td>Dummy</td>
<td>.03</td>
</tr>
<tr>
<td>No. of Professional Employees</td>
<td>Survey Question #3</td>
<td>Continuous</td>
<td>.02</td>
</tr>
<tr>
<td>State Enabling Legislation</td>
<td>Survey Question #6</td>
<td>Dummy</td>
<td>.02</td>
</tr>
<tr>
<td>Director's Education in Planning Methods</td>
<td>Survey Question #2</td>
<td>Dummy</td>
<td>.02</td>
</tr>
<tr>
<td>State Per Capita Personal Income</td>
<td>World Almanac, 1974&lt;sup&gt;8&lt;/sup&gt;</td>
<td>Continuous</td>
<td>.01</td>
</tr>
<tr>
<td>Total State Population</td>
<td>Atlas/Yearbook, 1973&lt;sup&gt;9&lt;/sup&gt;</td>
<td>Continuous</td>
<td>.01</td>
</tr>
<tr>
<td>Director's Satisfaction with Planning Progress</td>
<td>Survey Question #29</td>
<td>Dummy</td>
<td>.01</td>
</tr>
</tbody>
</table>

<sup>a</sup> None of the P values are statistically significant at the 5% level.
for less than 5 percent. For all intents and purposes, these are disappointing results. In any event none of these results were statistically significant at the 0.05 level (See TABLE 12). In addition, one multiple regression was run using the three independent variables which individually produced the highest coefficients of determination (i.e., Director's Knowledge Of Planning Concepts (x₁), Number Of Years Director Employed By Agency (x₂), and Structure Of Committees (x₃)). This multiple regression did not produce significant results either (r² = .22, Not Significant at the 0.05 level). Thus, both the bivariate and multivariate analyses were disappointing in that they were not able to explain variance in the dependent variable, i.e. level of compliance with the conceptual statement.

In order to test the possibility that the dependent variable was weighted inappropriately, a different weighting scheme was employed to produce a new, total raw score. This new weighting scheme gave increasingly greater weight to: 1) the earlier planning steps in the planning sequence (e.g., Ends Establishment received more weight than Means Selection), and 2) the later tasks in the sequencing of tasks within each of the planning steps (e.g., target setting received more weight than goal setting). This new weighting scheme produced practically the same rank ordering of agencies as did the original weighting procedure. A Spearman's correlation coefficient of .93 (statistically
significant at the 0.1 percent level) was calculated for the association between the original, total raw score and the new, total raw score. Thus, the dependent variable was found to be insensitive to a different weighting procedure. As a result, it does not seem likely that the weighting procedure could account for the disappointing regression results.

Our inability to "explain" the variance in planning scores may stem from the following considerations. First, much more confidence may be attached to the dependent variable than to the independent variables. The development of the index was based on the logic of the conceptual statement, and so outside professional validation of the index was not considered necessary. Therefore, assuming that the survey questionnaires were completed by the respondents in a correct and straightforward manner, the primary—univariate—survey findings are considered to be valid and important in their own right, despite the secondary—bivariate and multivariate—results. At the same time, however, it must be admitted that the index represents a first, primitive attempt to summarize performance in operationalizing the process of comprehensive health planning. The construction of such indices need to be explored further and refined. For example, the kinds of things included in the calculation of the index could be improved so that it would be an even better reflection of
the conceptual statement. Improvements in the index itself, then, may be required before the variance in the scores can be explained. Also, certain techniques could be used in the future to validate the survey responses (e.g., asking staff members ex post which of several planning profiles is most like their own agency's planning performance).

Second, less confidence is attached to the independent variables because they were not a high priority concern of the research. That is, emphasis was placed on process, not structure. Admittedly, the independent variables are rather crude in concept and construction. Unquestionably, the independent variables need further conceptual and structural work. For example, how can staff members' knowledge of planning methods be measured validly and precisely in a brief fashion? If future studies give more equal emphasis to the independent variables in terms of design, more satisfactory explanatory results might be obtained. Further, the use of dummy variables inhibited the search for a web of association or explanation. Dummy variables constrain the number of independent variables that can be entered in any one multiple regression equation, by using up two or more degrees of freedom. If in the future the independent variables could be constructed as interval level data, more than two or three independent variables could be entered in a multiple regression equation at the same time. This would facilitate attempts to
explain dependent variable variance.

Third, it must be acknowledged that this whole area of inquiry is highly abstract and complex, making the identification of relationships extremely difficult. In a mailed survey type of situation it is difficult to determine whether or not the respondents have correctly interpreted the instrument. Future efforts along these lines should probably utilize more personal contact between the investigator and the study population either by way of supplementary telephone conversations or site visits. This will help to guard against nonsampling errors arising from definitional questions.

Finally, the fact that control variables, such as "the agency's length of time under the same leadership," were not designated and utilized may have contributed to the poor explanatory results. In future studies such as this one, careful thought should be given to what variables should be matched or controlled.
FOOTNOTES


2Ibid. pp. 277-278

3Ibid. pp. 264

4Functions ranked #1 receiving 3 points, functions ranked #2 receiving 2 points, and functions ranked #3 receiving 1 point.

5Statistical Package For The Social Sciences SPSSH - Version 5.01, Codebook.

6Statistical Package For The Social Sciences SPSSH - Version 5.01, Spearman Correlations.


11BMDX77 - Transgeneration - Revised December 26, 1968, Health Sciences Computing Facility, UCLA.

12BMD03R - Multiple Regression With Case Combinations - Revised August 22, 1969, Health Sciences Computing Facility, UCLA.

13Statistical Package For The Social Sciences SPSSH - Version 5.01, Spearman Correlations.
IV. A CASE STUDY

Introduction

The survey findings presented in the previous Chapter identified a substantial disparity between the conceptual statement on the process of comprehensive health planning and the activities of the State CHP agencies. The following case study of one State CHP agency was carried out to determine if the survey results were merely a function of the measuring device, or if they were in fact an accurate reflection of reality. Thus, the case study was conducted irrespective of the survey for the purpose of determining the extent to which the practice of comprehensive health planning in a presumably representative state was congruent with the normative criteria formulated in Chapter II. The case study is intended to supplement and complement the national survey. (See Chapter III.) In this regard, Babbie points out the desirability of combining research methods:

The social researcher who limits himself to a single method, survey or other, severely limits his ultimate ability to understand the world around him. Survey research can be used profitably in the examination of many social topics and can be especially effective when combined with other methods.
In short, we hope that the case study enhances the survey work, both efforts having the same primary goal: to compare concept and practice.

**Method**

The case study is a primitive form of science, primarily because it is based on a sample of one. Thus, case-study findings are open to considerable sampling error. However, the case study is still a valuable research method because the high degree of penetration associated with a case study works to minimize nonsampling errors, and often provides the necessary environment for creative insights.

Babbie describes the case-study approach in this way:

Whereas most research aims directly at generalized understanding, the case study is directed initially at the comprehensive understanding of a single, idiosyncratic case. Whereas most research attempts to limit the number of variables considered, the case study seeks to maximize them. Ultimately, the researcher executing a case study typically seeks insights that will have a more generalized applicability beyond the single case under study, but the case study itself cannot assure this.

The case-study research method almost always involves direct observation of the phenomenon under study by the researcher. As Lofland points out this direct observation can be of the "unknown observer" type or of the "known observer" type. The "unknown observer" does not identify himself as an observer, while the "known observer" does. Different styles of direct observation can be further elucidated by
adding the categories of "participant" and "nonparticipant" observer. The "participant" observer has an active role in the activity being studied. The "nonparticipant" observer is merely a spectator to the activity being studied.

The following case-study was conducted in a "non-participant-known observer" fashion. This type of direct observation was selected in order to protect and promote the objectivity and integrity of the study. It was thought that if the researcher was a "nonparticipant," his objectivity in observing and reporting would be less likely to be skewed by an identification with and attachment to the observed group. It was, also, thought that the ethical approach would be to make it "known" to the study group that the author desired to observe their activities as part of a study that would be reported, so it would be possible for them to give an informed consent to the case study. Lofland states that "it is out of this circumstance of being the marginal man--the simultaneous insider/outsider--that creative insight is best generated."4

Direct observation can be conducted in three ways. Lofland states that "Observation may be regarded as a complex process of interweaving the activities of looking, listening, and asking."5 In fact, the following case study utilized all three of these modes of direct observation. These activities were conducted over the six month period from October 1973 to March 1974.
In regard to "looking," the major publications and printed material of the study agency were carefully reviewed. The following list indicates the principal documents which were studied:

a) Advisory Council Minutes, July 1972-November 1973 (8 editions)
b) Advisory Council Policies
c) Work Programs, FY'73 and '74
d) Data Profiles
e) Activities Report, FY'72
f) Draft State Health Plans, 1970 and 1973
g) Monthly Information Bulletins, April 1972-March 1974 (22 editions)

With regard to "listening," all of the major meetings of the study agency which took place during the study time period were attended and notes were taken. The following nine meetings were attended:

a) 3 Advisory Council meetings
b) 3 Environmental Health Section meetings
c) 1 Health Care Delivery Systems Committee meeting
d) 1 Mental Health and Mental Retardation Committee meeting
e) 1 Health Manpower Committee meeting

With regard to "asking," the key professional staff members of the study agency were interviewed. Questions were prepared before these interviews and answers were recorded in writing. The following five persons were so
interviewed:

a) Systems Analyst
b) Environmental Health Coordinator
c) Personal Health Coordinator
d) Assistant Chief
e) Chief

In addition, many other staff, council, and committee members were queried on an informal basis.

Finally, it must be pointed out that it was decided on an a priori basis to present the case study perceptions in a confidential fashion (i.e., deleting specific identification of agencies, people, documents, etc.). It was understood that this procedure would detract somewhat from the preciseness and credibility of the study. However, it was thought that such sacrifices were justifiable for the following reasons. It was believed that confidentiality would serve to emphasize that the case study was being conducted for scholarly, not control, purposes. It was considered essential to avoid any possible undesirable repercussions for the case agency with its funding sources or the public-at-large. It was believed that such an approach would be less threatening to the case agency than would a completely explicit approach. It was hoped that the assurance of confidentiality would, therefore, increase the candor of the case agency. In this way, confidentiality could serve to promote the accuracy of the entire case study. That is, it
was believed that the case agency would give the investigator more freedom of inquiry and would be more open with the investigator, if it was assured that its identity would not be reported.

**Perceptions**

**Background Characteristics**

This case-study is based on the activities of a single state, 314(a), Comprehensive Health Planning Agency. This agency was established in November 1967 in accord with the provisions of P.L. 89-749. The study agency was located within a State Department of Health, and was organized as an Office reporting to the Director of Health.

The study agency consisted of clerical and professional staff members, and an Advisory council. All together there were 18 professional staff members who came from a wide variety of experiential and educational backgrounds. Approximately half of the professional staff members did not have graduate degrees. Of those who did have such degrees, the following fields were represented: Public Health Administration (1), Health Education (3), Sanitation (1), Medical Care Organization (1), Occupational Therapy (1), City and Regional Planning (1). The Chief and Assistant Chief of the study agency had held those positions practically from the beginning of the agency. However, with respect to the junior professional staff positions, there had been a constant and
rapid turnover which upset the continuity of the agency's activities.

There were 39 Advisory Council members, the majority of whom were consumers (as opposed to providers) of health services. The Advisory Council included representatives from all parts of the state, from a variety of health occupations and interests, and from a number of state government agencies. The Advisory Council was scheduled to meet six times per year. It had six standing committees reporting to it: Steering, Environmental Health, Areawide Project Application Review, Mental Health and Mental Retardation, Health Manpower, and Health Care Services Delivery.

A couple of situations which existed at the time of this study may provide reflections of how the case agency was viewed by the state government structure within which it existed. First, the agency in question had no state enabling legislation. It was designated by the Governor, and supported primarily by a continuing Federal formula grant (i.e., P.L. 89-749, Section 314(a) as amended). Second, a citizens task force on health care had been appointed by the Governor. This task force was instructed to consider some of the same basic issues that the study agency was required to examine (e.g., the availability, accessibility, and quality of health services in the state). However, the task force was organizationally and functionally separate from the case agency. In addition, the task force
was asked to consider the overall planning process in the state to determine its responsiveness to the issues of availability, costs, and quality. The existence of these two circumstances might lend support to one agency staff member's view that the case agency was considered to be an instrument of the Federal government and was, therefore, not given much support or acceptance by state officials. Of course the same set of circumstances could have, also, resulted from a lack of achieved progress on the part of the case agency itself.

Within this state government there were separate Departments of Mental Health and Mental Retardation, and Environmental Protection. Thus, the Comprehensive Health Planning Agency was located within one of three major departments operating in the health arena. This situation made the organization and coordination of the comprehensive planning activity difficult at best.

Finally, there were 11 operating areawide health planning agencies within the state at the time of this study. The study agency had been active in the development of these agencies, and was responsible under Federal guidelines for the periodic review and approval of these agencies' work programs. In addition, there was a moderate degree of informal information exchange which took place between the study agency and the areawide agencies. However, no formal, systematic planning system incorporating the study agency
and the areawide agencies had been established in the state. It appeared that the areawide health planning agencies prized very highly their prerogatives and independence.

Planning Steps

The primary focus of this case study was the operationalization of planning concepts by the study agency. In general, it was found that planning, per se, was not well understood or executed by the study agency. This conclusion is based on the following perceptions which, for the sake of clarity and usefulness, are organized around the five fundamental steps of planning.

Task design—The first step in the planning process, Task Design, is perhaps the most important step, because it sets the tone for the rest of the planning process. If there isn't an explicit and logical plan for planning, it is unlikely that planning, itself, will embody such characteristics. The following perceptions relate to the study agency's planning for planning.

First, the case agency did not appear to recognize system definition as a formal, explicit part of the planning process. That is, the agency had no document which made the direct statement: this is our health system definition. However, it did have a loose definition of its system of interest. The case agency's documents made it
clear that this agency was focusing its attention on both the health care services system and the environment. The Advisory Council adopted a policy which stated in part that "the process of determining a community's requirements for health services includes the identification of the ways in which environmental factors are affecting (sic) a person's health status." Also, because information systems are instituted to monitor systems of interest, one can determine indirectly a planning agency's system of interest by examining its information system components. The case agency had specified the variables which it was primarily interested in monitoring. The files of the data system included: total population and housing data; an inventory of hospitals, nursing homes and rehabilitation facilities; total vital statistics; morbidity statistics on reportable communicable diseases; licensed health manpower; mental health inpatient statistics; data from air pollution monitoring stations; water and waste-water facilities; and an inventory of health services reported by local health departments. Thus, the agency had not defined its system as consciously and explicitly as would be desirable, but it had arrived at a system definition of sorts. The danger in such a situation is that not everyone involved in the planning process will operate from the same set of assumptions. This can lead to confusion and conflict during even basic planning tasks and analyses.
With respect to the scope of planning activity, this agency had not identified and analyzed the totality of the health system. It had included demographic, health status, environmental, health service, health manpower, and health facility data components in its information system. However, the areas of health attitudes and behaviors, genetic problems, and health costs and expenditures were not included in this agency's health information system. Thus, important aspects of the health system were not taken into account.

Second, a formal agreed-upon definition of planning including its major steps had not been formally adopted by the study agency although an early draft plan document of the agency defined the planning process as "a logical sequence of steps leading to the establishment of priorities which become the framework and guidelines for program and project planning." This definition is vague (e.g., what type of priorities?), and it does not indicate the central focus of planning (i.e., ends-means relationships). In addition, the case study did not produce any evidence that this definition of planning, or any definition of planning, had been agreed upon and utilized on an agency-wide basis.

In fact, it appeared that many members of the organization had never come to grips with the question of a definition for planning. Of those who had thought consciously and explicitly about a definition for planning, a few
thought about it in terms of determining ends-means relationships in a systematic manner. However, most staff members seemed to define planning as a process of "involvement." That is, for them the heart of planning was "participation" and "input." Thus, in this agency the question of "involvement" took precedence over the question of "involvement in what." On the whole, this agency seemed to view problem and recommendation statements as the logical and appropriate products of this "involvement" process. Thus, this agency appeared to have confused the organizational and participatory aspects of planning with planning per se. In a sense, the "medium had become the message."

Further, planning terms were not well defined. Different agency members were using the same terms in different ways. For example, the word "priorities" was rarely modified by an adjective. When the need for priorities was discussed, it could variously refer to problems or to means, and no clear distinction would be drawn between the two. Also, the word "objective" was used variously to mean an end or a means.

Actually, the agency as a whole did not appear to be very conscious of planning, per se. In fact, the agency's "Purpose and Goal" statement which appeared in a FY'74 Program Report did not even use the word "planning" (with a small p) at all. It used such words as "lead," "facilitate," "coordinate," "establish," and "involve." Thus,
it appeared that the agency really did not view "planning" as one of its primary functions. At least, it did not think about planning as a conceptually distinct function from these other functions such as "coordination." The study agency seemed to be mainly oriented to categorical issues in a methodologically-free manner. Many members of the agency even seemed to equate categorical issue analysis with planning. Of course, all of these definitional undercurrents worked to throw a cloud around the agency's entire operation. The following quotes reflect the confusion which existed within the agency with respect to the definition of planning:

"we haven't developed the expertise of planning in this State!" (council member)

"we haven't known how to do this thing called health planning!" (council member)

"don't know if it is 4, 5, or 6 steps?" (staff member)

"not aware of elements that should be in a plan?" (council member)

"how structured is the plan?" (council member)

Of course, such statements also indicate a growing awareness of the need to be more explicit about the planning process. In fact, one council member recommended a conference "for the purpose of getting more knowledge together about the planning process as it relates to the state health plan." However, at the time of this study neither the staff nor the volunteers of this agency seemed to be fami-
liar with the growing literature on the health planning process. Further, as of this time no consultants had been hired for the sole and specific purpose of assisting in defining and upgrading the agency's planning procedures.

Third, this agency had not developed an agreed-upon sequencing for planning steps (i.e., an explicit, conceptual ordering of planning activities). A few individual committees had laid out a sequence of steps, but the agency as a whole had not done so. For example, the environmental health committee utilized one sequencing of steps (i.e., Goal, Problems, Resources, Recommendations, Priorities), while the emergency health service plan utilized another (i.e., Background Information, Goal Statement, System Description, Situation Statements and Recommendations). This lack of an overall agency sequence for planning steps is reflected in the following comments made by council members:

"is there an overall outline for the overall state health plan?"

"we have a shaky idea of what we want to accomplish!"

"how are council meeting agendas determined?"

"I don't know what we are doing here!"

"we need an understanding of where we are."

Fourth, there was almost no discussion within the agency as a whole concerning what techniques (e.g., projections, sample surveys, benefit/cost analyses, etc.) would be required in order to operationalize the planning
process. There was recognition on the part of the environmental health staff that a technique for establishing priorities needed to be developed and utilized. Also, the health manpower committee volunteers advocated the need for the agency to develop quantitative models for determining health manpower requirements. However, there was no overall agency list of required techniques for the operationalization of the planning process. Actually, it seemed as though the agency as a whole had not begun to think about planning in such concrete and sophisticated terms, as yet.

Fifth, this agency was not explicit with regard to two key time dimensions in planning. There was no clear statement as to how long any given planning cycle should take. The deadline, which the agency was using with regard to the development of a plan document, was arbitrarily imposed from outside the agency's planning process (i.e., federal government directives). Also, target dates or terminal periods to be utilized within the planning process were not formally established (e.g., short-term, long-term periods). Although the recommendations of the environmental health section were time-phased, no planning horizons had been selected for the agency as a whole. In fact, there was very little future orientation in the agency's work (i.e., the focus was primarily on present conditions).
Sixth, in planning there is always the necessity of fixing responsibility for the planning process, and deciding how planning activities will be delegated and coordinated (i.e., an administrative plan). In terms of direction, responsibility for the operationalization of the planning process was not clearly fixed in the study agency. There was no one Principal Planner as such. The Director, Chief, Assistant Chief, and Council Chairman all shared in some substantial but vague way the responsibility for planning direction. Further, none of these individuals appeared to have had specific training in generic planning concepts and procedures. Also, the Steering Committee of the Advisory Council did not appear to concern itself too greatly with the planning process, per se. Its activities were not very visible, but it seemed to be most interested in questions of organizational functioning and survival (i.e., housekeeping). With regard to the Advisory Council as a whole, it seemed ill-prepared to direct a planning operation. It appeared that the areawide planning application review process had shaped the Advisory Council into a reacting rather than acting body. In fact, the Advisory Council's official policies describe its functions in terms of "review" and "reaction." Consequently, there was a general lack of specific direction for planning activities.

The following comments reflect this fact and the ensuing frustration:
"trying hard not to lead them (i.e., areawide health planning agencies)." (staff member)

"Council should be free to do their own thing—give them help when they ask for it." (staff member)

"Each person was asked to list those things which he felt the Council should do in the next six months." (council minutes)

"The first Chairman did not give charges." (staff member)

"no leadership" (council member)

"advisory council reacts—it gives no direction" (council member)

"advisory council's executive committee is not active" (council member)

In terms of task delegation, there seemed to be very few specific committee assignments. Further, the adopted committee structure did not seem to be conducive to the planning function. The advisory council gave committees very general charges accompanied by much freedom and independence to carry them out. Then, these autonomous committees did likewise with their task forces. At the same time, the professional staff took a nondirective, passive stance vis-a-vis the committees and task forces. Therefore, the organization resembled a loose federation which conducted its activities in an inductive rather than deductive fashion. Most of the agency's actual work was generated and completed at the lower/peripheral levels, and was then either approved or disapproved at the higher/more central levels. Sometimes the agency, as a whole, appeared to be
in a general state of anarchy. That is, many different factions were going off in their own directions without a strong overall unifying force. Further, although the agency was desirous of developing a viable procedure for integrating areawide health planning activities into its own planning operations, no such procedure had been worked out as yet.

The sections of the draft plan document were organized in a different fashion than were the committees, although both the plan document and the committees were organized along categorical issue lines (e.g., the draft plan document included sections on Preventive, Ambulatory, Acute, Chronic, and Emergency Services). This lack of symmetry resulted in misunderstanding, frustration, and friction within the agency. One staff member stated that "the committee structure is not functional—the categories are ridiculous." In fact, the leadership of the agency was considering a complete change in the committee structure at the time this study was being conducted. In terms of planning coordination, the lack of an explicit, overall director for planning activities, and the categorical nature of the draft plan document and committee structures retarded and obstructed the coordination of planning activities. The fact that the direction of the agency's work flowed from bottom to top made it very difficult to rationalize activities on an agency-wide basis.
For example, manpower planning was being generated by two different committees (i.e., the Health Manpower Committee, and the Environmental Health Committee). The categorical nature of the committees tended to shift emphasis away from planning steps (e.g., ends and means), and concentrate attention on particular problems and avenues of intervention in an a priori fashion (e.g., Mental Health and Mental Retardation Committee, and Health Manpower Committee). The following comments reflect the unsatisfactory level of coordination within the agency itself:

"we need more organization" (council member)

"not getting closure on activities" (staff member)

Seventh, evaluation of the planning process itself was recognized by this agency as being necessary. One of the agency's official documents stated that "The Steering Committee will continue to review the implicit and stated policies and procedures of the Advisory Council, making recommendations to that body." However, it didn't appear as though there actually was a great deal of formal introspection taking place. There was a degree of process evaluation that took place on an informal basis. A number of staff and council members did express their dissatisfactions with the modus operandi. For example, one council member stated that the agency should "stop playing charades." The volunteers, however, were more vocal about their frustrations
and suggestions than were the professional staff. Thus, there was encouragement in the fact that a relatively small number of agency members realized what wasn't being done. However, there was, also, danger in the fact that many didn't know the basics of the planning process, and therefore were not in a position to critique the agency's procedures.

System investigation--The next step in the planning process is to analyze and assess the past, existing, and anticipated status of the system of interest.

Descriptive and judgmental analyses of a system require a good information base. The development of a data system had been one of this agency's high priority work items for some time. The study agency designed a computerized health information system with the aid of consultants. The information system operated from a computer which was shared with other state agencies. As the previously mentioned file list indicated, the agency had a rather broad array of information sets stored in the computer. Thus, a reasonably good initial start had been made on the development of a health information system. However, there were a number of problems which severely limited the capacity of the information system to buttress the planning process.

First, from the vantage point of the data suppliers there were the following kinds of problems. The information unit experienced great difficulties in obtaining needed
data. Bureaucratic rigidities and fears made the central collection and storage of health information extremely difficult. This was true not only with regard to outside State and nongovernmental agencies, but also with respect to divisions within the Department of Health. Further, although the data system was used quite frequently both internally and by outside agencies, it appeared as though many segments of the agency did not appreciate the importance of data. That is to say that the leadership of the organization did not seem to put a high premium on the utilization of quantitative information. This orientation was consistent with the agency's general focus on the participatory rather than the technical aspects of health planning. Thus, the agency as a whole had not thought very consciously or explicitly about what questions it wanted the data system to answer on an ongoing basis. For the most part, the data system was viewed by agency members as an ad hoc, supplementary part of the agency's activities, not an integral part of the planning process. Therefore, the information unit was forced to conduct its day-to-day operations without clear-cut directions. Primarily, it reacted to requests when and if they came.

Second, from the vantage point of the data users (i.e., agency staff, agency committees, health department personnel, areawide planning agencies) there were the following kinds of problems. Some data users complained
about the validity, reliability, and up-to-dateness of data files. Also, some users complained about the incompleteness (i.e., gaps) in some existing files. Further, some important files did not exist. For example, the most important omissions of the information system were in the areas of morbidity, behavioral, and economic data.

In regard to health focus, this agency did keep data files on mortality and communicable diseases. However, it had little or no data on the incidence and prevalence of chronic morbid conditions or permanent disabilities in the state. This situation was recognized to some extent by the agency itself. Council minutes quote the advisory council chairman as saying, "There is very little morbidity data, which area needs more research." However, during the time of the case study there were no major, concerted efforts to research methods for the collection of morbidity and disability statistics, or to collect morbidity and disability figures on a sample, or any other, basis. The lack of adequate morbidity and disability indicators was a serious gap in the agency's health focus.

Finally, and perhaps most importantly, there was a serious degree of inflexibility in data output. The data files could be cross-tabulated by the computer. However, the information system did not have the capacity to perform statistical techniques (e.g., correlation, regression), sophisticated record linkages, or mapping procedures.
These shortcomings critically limited the information system's usefulness for planning which requires a highly analytic approach to problem solving.

In terms of descriptive analyses, the information section of the agency's staff prepared a series of state maps which indicated the distribution of a wide range of population, health status, health service, and environmental characteristics by county (e.g., population over age 65, number of hospital beds per thousand population, percent of housing units by estimated value, etc.). These displays were useful in terms of acquainting agency members with gross distributions, and in terms of providing a rough baseline. In addition, the environmental health section of the agency had prepared descriptions of "problems" and "resources" with regard to air, water/waste water, solid waste, and other categories. The personal health section prepared a "situation statement" with regard to emergency health services. Also, the personal health section prepared brief "resources and needs" statements on many types of services, as part of the agency's efforts to prepare for Section 1122 (of the Social Security Act) reviews (e.g., nursing homes, ambulatory surgical care, renal disease services and facilities, coronary care units, etc.). Thus, there was much activity taking place within the agency that could be described as descriptive analyses of the existing state of the system.
With regard to analyzing critically the existing system, much of this was done on an informal or ad hoc basis during committee or task force meetings. However, some formal work in this regard had been undertaken in the form of "Committee Reports." Such formal critical analyses related principally to the areas of water/waste water, air, solid waste, and emergency health services. The criteria for such critical analyses were not always explicit, although the agency had gone on record stating that (1) the environment should "foster the prevention of illness, injury and disease," and (2) the system of health services delivery should be characterized by optimal "comprehensiveness, quality, accessibility, acceptability, continuity, coordination, and effectiveness."

Two tasks associated with System Investigation seemed to be almost totally ignored. First, there was very little discussion and study of the historical antecedents of the present state of the system (i.e., etiology). This was true both with regard to the socio-political aspects of the system and its health status aspects. Second, there was relatively little discussion or study of the anticipated future state of the system. The words "projection" and "forecasting" were almost never seen or heard. Naturally, then, it is not too surprising that the importance of "trending" did not seem to be recognized by this agency.
The culmination of the System Investigation step should be a set of problem priorities. This agency had identified numerous health and health service problems in the course of its deliberations (e.g., inadequate storage and collection of solid waste, lead paint poisoning, hazardous air quality, etc.). However, at the time of this study, agreed-upon, overall problem priorities had not been established. On different occasions council members were heard to say: "how are problem priorities selected," and "what are the committees priorities," and "we need to highlight certain problems." Thus, the need to set problem priorities was at least recognized if not acted upon.

For example, some council members were disturbed when the environmental health committee asked the council to adopt a set of lead paint poisoning recommendations before establishing that lead paint poisoning was indeed a priority problem. The agency had familiarized itself with existing areawide health planning agency priorities, and evidently in the past it had solicited "initial" environmental health priorities from the areawide agencies. However, these environmental problem priorities were extremely general (i.e., air, water, solid waste, and housing).

The agency (i.e., ad hoc Services/Facilities Committee) had, also, developed a "Health Problem Evaluation Sheet" which included the following criteria: nature of problem, population affected, impact on individual, cost to society.
Three versions of the "Evaluation Sheet" were circulating around the agency. However, only the Environmental Health Committee appeared to be making a serious attempt to operationalize it. Certainly, the council or agency as a whole had not, as yet, come to grips with the question of problem priorities.

**Ends establishment**—The third step in planning is to identify and rank ends. The ends should be stated both in the form of general goals, and highly specific objectives or targets.

With regard to goal statements, the agency had established primary goals and subgoals. One main, general goal had been established for both "Health Services and Facilities" and "Environmental Health." The Health Services and Facilities Goal (i.e., "all health services promoting and assuring the attainment and maintenance of the optimal level of health of each person") was accompanied by 12 subgoals which were listed under the following headings: (1) "functioning health service system," (2) "all health services," (3) "all health facilities." These subgoals dealt with accessibility, efficiency, quality, and needs. Likewise, the Environmental Health Goal (i.e., "An environment which assures for every person, in this generation and in those that follow, a quality of life characterized by optimal health, safety, comfort, and maximum opportunity for personal fulfillment") was accompanied by individual
categorical goals (i.e., Air Quality Management, Solid Waste Management, Water and Waste Water goal statements). No special techniques were used in the process of establishing these goals and subgoals (e.g., opinion surveys, public hearings, or nominal groups).

The goals were established in an undefined process of give-and-take which included the staff, committees, and the advisory council. Such a process is inadequate for many reasons. First, it is not as deliberate and explicit as it could be if some method were used to give the process more structure. Second, there is no way to insure that all the ostensible participants actually are able to register their sentiments when the process is free style by nature. Third, the goal setting process should be as broadly participatory as possible. Here it seemed to be primarily confined to committees of the council.

In regard to health focus, this agency did maintain a proper focus on health status when it set goals and subgoals. For example, the subgoal on air quality management begins in this way: "A level of air quality that will preserve and promote human health and safety, ...."

Further, the goals and subgoals were not ranked in any way. Consequently, there was no way of knowing if certain goals were considered more important than others by the agency as a whole. In fact, the agency did not appear to have even considered the possibility of ranking goals!
With regard to target statements, the agency had not transformed any of its general goal statements into quantified, time-related targets which would indicate how much change, in what direction, should be accomplished over what period of time. In fact, there was no discussion of the concept of targets or their need. The absence of targets makes the formulation of appropriate means, and the eventual evaluation of progress toward reaching goals difficult at best. The specification of targets is a pivotal task in the planning process. Its absence must necessarily throw the usefulness of succeeding planning steps and tasks into doubt.

Means selection—The means selection process involves identifying, weighing, and ranking alternatives, and devising implementation strategies.

First, with regard to identifying alternative intervention strategies, there was much consideration of alternative means but it was categorical in nature. In its work, this agency did not draw clear distinctions between outputs and inputs (i.e., ends and means). Therefore, many deliberations started with a discussion of means in the absence of a priori ends. Also, alternatives were identified within categories, but generally not across categories. This agency clearly recognized that environmental and preventive interventions constituted options to clinical interventions. However, these options were not considered simultaneously
as alternative methods for reaching any single specific target. On the contrary, they were considered simultaneously in an unrelated fashion. For example, alternative ways of changing the environment and health services were considered, but change in one area was rarely discussed as an option to change in the other. That is to say, the environmental health section and the personal health section of the agency operated separately and independently. The need for a more integrated approach to the identification of alternative means was, however, recognized by some. For example, a council member is quoted in meeting minutes as saying: "alternative solutions to problems should be identified." Further, in this agency's rather loose and categorical identification of alternative means, environmental type interventions were given more emphasis and study than other types of interventions. Evidently, there had been an influential individual who successfully pushed for this slant during the very early development of the agency. Also, the environmental health section appeared to have had a stronger, more stable history of leadership.

Second, in regard to the weighing of alternatives, much of this appeared to be done on an informal, nonrigorous basis. That is to say, the agency's weighing of alternatives was generally not conducted explicitly or quantitatively. Council minutes quote one member as suggesting "that cost/benefit analysis be incorporated where possible." However,
no formal benefit/cost or cost/effectiveness analyses had been completed by this agency. In fact, there was an extremely low recognition of the need for such analyses. The agency did consider the question of feasibility in its weighing of alternative means, but this activity was, also, largely informal (i.e., not very explicit or thorough). Further, this agency as a whole did not seem to recognize that resource requirements (e.g., facilities and manpower) should be derived from intervention strategies. At least, this concept was not operationalized in the agency's work. For example, the manpower committee operated as a functionally separate and independent unit. Although several of its members did recognize what needed to be done in order to approach effective health manpower planning, they did not seem to be able to influence the agency as a whole. As a possible exception to the agency's overall approach to resource requirements, the environmental health committee did follow-up its "service" recommendations with recommendations on "manpower," "facilities," "training," etc.

Third, in regard to means selection and ranking, there was generally poor progress. The categorical planning documents that were being produced by the environmental health committee did rank intervention recommendations. For example, the Air Quality Management report listed "legislation to inspect motor vehicle emissions" and "adequate funds for state and local air pollution abatement" as priority "Imme-
diate" recommendations. However, the draft emergency health services plan did not rank suggested actions. Certainly, the agency as a whole did not have a set of prioritized action recommendations. In this connection, council minutes quotes a member as suggesting that "more evidence of priority recommendations is needed."

Fourth, in regard to implementation strategies, recommendations made by the environmental health committee sometimes indicated who should do what. For example, one environmental health recommendation reads: "The Department of Health should coordinate regional and state monitoring programs and coordinate an expanded statewide monitoring system to establish pollution levels in different areas of the State." Also, they usually indicated when things should be done (i.e., "immediate," or "intermediate" or "long range"). However, the agency as a whole had not made very many specific (i.e., detailing who should do what, where, and when) action recommendations. The study agency had made no specific recommendations in regard to personal health services and resources. The agency had designated the steering committee as the "action committee" to meet occasionally with the director of health for the purpose of stimulating the implementation of agency recommendations. The agency as a whole was, however, prohibited from making direct recommendations to the legislature. Finally, the agency's deliberations and documents did not reflect a
conscious attempt to formulate ways of enhancing recommendations. There was no exploration of positive and negative incentive schemes for high priority recommendations.

In regard to health focus, this agency often seemed to lose sight of health effects when it discussed intervention strategies. For the most part, neither of the agency's largely separate discussions of environmental and personal services types of interventions would be started with the identification of a specific health status problem or target. Rather, these two types of analyses usually started with a discussion of alternative actions (i.e., means, not problems or goals). Environmental health discussions often drifted off into environmental quality discussions (i.e., how to protect nature from man). Personal services discussion revolved mainly around the questions of organizational arrangements and equitable distributions. Thus, it is not too surprising that this agency put little emphasis on epidemiologic research findings. That is to say, there was very little recognition of the need to stay abreast of and utilize such research findings. There were a few personal exceptions to this general lack of "efficacy-consciousness" in the examination of interventions (e.g., a council member who completed guidelines for coronary care and open-heart surgery units, and a junior staff member who worked in the environmental health section). However, these exceptions were ad hoc in nature and ran against the prevailing trend.
With regard to comprehensive scope, all types of interventions were considered by this agency, but some received greater emphasis than others. Also, the full range of intervention strategies were not considered as such when a particular problem was being considered. In general, this agency gave the greatest emphasis to primary prevention strategies. This particular emphasis can be attributed to its stronger environmental component. On the other hand, this agency gave practically no attention to rehabilitative forms of intervention. Further, the range of intervention strategies were not treated as such, but rather were treated in a separate and distinct fashion. For example, while the personal health section was developing a plan for emergency health services, nobody was simultaneously considering how emergency situations might possibly be prevented (e.g., the prevention of highway crash deaths and injuries). This was due to the fact that the personal health and environmental health sections operated in a completely independent and uncoordinated fashion. This lack of viewing intervention alternatives in terms of a spectrum of possibilities running parallel to the natural history of disease is reflected in the following comments:

"comprehensive means putting components together" (staff member)

"environmental health and personal health are not integrated" (staff member)

"we don't pay attention to what goes on over
At this point, it would be well to reiterate that the study agency was developing standards and criteria for Section 1122 (of the Social Security Act) reviews. These criteria addressed a wide range of service and facility categories. However, they were not derived from intervention strategies which had been developed in the planning process. Rather, they were derived apart from normal planning procedures. The criteria were primarily based on already existing professional guidelines such as JCAH (Joint Commission on Accreditation of Hospitals) standards and the Hill-Burton formula. The agency intended to attach these review documents to an overall state health plan as supplements. The process of developing these 1122 criteria generated much bewilderment among the agency's volunteers. Initially, many did not understand the distinction between these documents and the "plan." There was confusion and disagreement over the purpose and nature of such criteria, and how they should be derived. Several staff members told the volunteers that "we are doing what is expedient." Several volunteers responded that the criteria were being developed by a "backwards technique."

**Intervention evaluation**—This agency's position with regard to the evaluation of recommended and implemented interventions can be summarized quite quickly. No such evaluation emphases,
criteria, or procedures had been formally adopted. In fact, there was practically no discussion of this planning step. This situation may have been due to the fact that this step had not been reached as yet, since not very many specific action recommendations had been made. However, the complete void in this area must have resulted, at least in part, from the lack of conscious recognition of the importance of this step in the planning process.

Plan Document Development

A plan should be the black and white embodiment of the planning process (i.e., a written record of findings and decisions). Thus, it should be a continuously changing product of the planning process.

At the time of this study, the subject agency had not produced an official health plan document. This was in part due to the slowness with which planning procedures were being operationalized by the agency. It was, also, due to two other important factors.

First, the development of a state health plan document was initially halted as a result of adverse reactions from the areawide health planning agencies in the state. In fact, the study agency had produced a draft plan document in May of 1970. This document was divided into three main components: environmental health, physical health, and mental health. The environmental and physical health sec-
tions both included two subsections: (1) "goals, problems, and resources," and (2) "assessments." The mental health section simply footnoted the comprehensive community mental health plan which had been put together under the direction of the Department of Mental Hygiene and Corrections.

The areawide health planning agencies completely rejected this document for the following reasons. First, they felt the state planning agency had let them down by not significantly involving them in the process which led up to the draft plan. The state agency had developed the draft plan mostly with the input of state government agencies. However, the state planning agency viewed the draft plan as a prototype which the areawide planning agencies could react to and possibly emulate. Second, the areawide planning agencies didn't like the draft plan's concept of priorities which was "preferential rating of an activity required to eliminate a gap identified in an assessment." Also, the areawide planning agencies thought that it was too early to begin to establish priorities of any type. They wished to begin by identifying common problems. Third, the areawide planning agencies felt the development of a state health plan document should start with them. That is, they advocated a bottom-up process rather than the reverse. This position was probably grounded in both methodological and egotistical concerns. At any rate, good relationships with the areawide health planning agencies was very impor-
tant to the case agency. Therefore, it dropped its efforts to produce an official plan document at that time.

Second, just prior to the time this study was initiated there was a renewed interest in the development of a plan document on the part of the study agency. This renewed interest was primarily flamed by new Federal interest in and requirements concerning plan documents. However, at the time of this study, the renewed interests were being put aside once again. This time the development of a plan document was being delayed in order to allocate agency work time to the development of project review criteria. Such criteria were required in order for the agency to participate in the Federal limitation of capital expenditures program (i.e., Section 1122 of the Social Security Act).

Therefore, at the time of this study the agency had only a draft plan document, which in fact was on the back burner for the near future. As was mentioned previously, this draft document was divided into five categorical sections (i.e., Preventive, Ambulatory, Acute, Chronic, and Emergency Services). The agency viewed the plan document as the physical compilation of separate categorical plans. Thus, the draft plan document mirrored the agency's preoccupation with categorical issues to the neglect of a process or procedural consciousness.
FOOTNOTES


2Ibid., p. 37.


4Ibid., p. 97.

5Ibid., p. 110.
V. DISCUSSION

This final Chapter of the dissertation is aimed at summarizing the study, drawing its principal conclusions, and exploring its primary implications.

Summary

The purpose of this dissertation is to compare comprehensive health planning concepts with the practice of comprehensive health planning in the U.S. This comparison is limited to the process aspect of comprehensive health planning because this aspect of health planning has been largely neglected in previous health planning studies. Also, it seems logical to pursue this aspect of health planning before investigating the outcome aspect of health planning. Thus, this dissertation is mainly concerned with the Fundamental Steps of comprehensive health planning, not its Contextual Characteristics or Ultimate Results.

This study compares the concept and practice of comprehensive health planning at the State level. State level comprehensive health planning was chosen for study because one of the original intents of the Comprehensive Health Planning legislation, P.L. 89-749 as amended, was to strengthen the capacity of State governments to wisely allocate
health resources. Also, State level comprehensive health planning was selected for study because it had close and visible ties to decision-makers, while areawide comprehensive health planning had no such relationships with local decision-makers.

The first step of this dissertation was to construct a conceptual statement on the fundamental steps of comprehensive health planning which could be used as the criterion for appraising the practice of comprehensive health planning. This step was necessitated by the fact that no such explicit process criteria were available at the outset of this study. The conceptual statement was generated through the selected utilization of the planning and health planning literature. The following five fundamental steps of comprehensive health planning are described in the conceptual statement: 1) Task Design, 2) System Investigation, 3) Ends Establishment, 4) Means Selection, and 5) Intervention Evaluation. The description of each step incorporates generic planning, health focus, and comprehensive scope concepts in that sequence.

The second step of the dissertation was to compare the conceptual statement with the practice of comprehensive health planning at the State level. In an effort to conduct the most accurate appraisal possible within the existing time and resource constraints, it was decided to employ two empirical research methods.
On the one hand, a mailed questionnaire survey was sent to all 50 State CHP agencies. The survey instrument served as the bridge between the conceptual statement and the practice of comprehensive health planning which was being measured from afar. The executive directors of the State CHP agencies were specifically requested to respond to the primarily multiple choice type questions of the survey instrument. While the mailed questionnaire dealt mainly with facts related to the fundamental steps of comprehensive health planning, a number of questions probed the areas of organizational-institutional characteristics and the directors' personal perceptions. The survey instrument proved to be capable of discriminating between different levels of planning performance on the basis of self reporting. The standardized survey results permitted quantitative analyses.

On the other hand, a case study of one State CHP agency was conducted. This additional method was utilized in an effort to compliment and enhance the survey method. The case study was carried out over a six month period. During this time the investigator: 1) read the case agency's written reports, 2) attended its meetings, and 3) interviewed its key personnel. For this method no bridging instrument was used. That is, the investigator mentally compared criteria and practice in toto. The case study perceptions were analyzed in a nonquantified, qualitative,
Conclusions

The completion of the previously discussed two primary steps of this dissertation leads to two main types of conclusion, conceptual and empirical. The conceptual conclusions relate directly to the conceptual statement itself.

First, it has been found that the quantity and convergence of the material written on the process of comprehensive health planning permits the assembly of general principles or concepts at this time. A thorough search of the literature identified a substantial amount of material relating to the procedural and technical aspects of comprehensive health planning. In addition, the literature reflected a growing consensus with regard to the fundamental steps of comprehensive health planning. Thus, lack of general, conceptual guidelines should not be a major problem for comprehensive health planners in the future. In fact, the construction of the study's conceptual statement has useful value in itself. Such statements can inject a healthy amount of formalism into a relatively new and ambiguous field.

Second, however, it must be conceded that the way in which the process of comprehensive health planning was organized or structured in this dissertation (i.e., the five
fundamental steps of Task Design, System Investigation, Ends Establishment, Means Selection, and Intervention Evaluation) includes an element of arbitrariness. The tasks which are contained within these steps are clearly essential. There may, however, be other equally and/or more appropriate ways to organize these tasks into distinguishable steps. The five steps which were employed in this dissertation were selected for their logical appeal, their ability to simplify the argument, and their similarity to concepts established in the literature.

Third, it must also be acknowledged that a continued extension and refinement of such concepts is required. For example, more thought needs to be given to the functional relationships between the identification and ranking of problems, and the selection and ranking of goals in the cyclically repeating planning process. Also, it is clear that much more work is needed in terms of identifying specific techniques to facilitate the operationalization of health planning steps and tasks. For example, much work is required with regard to the technology of choosing goals in a democratic and explicit manner, and selecting means which optimize benefit/cost ratios within existing and anticipated constraints. Further, much of the future utility of general, conceptual statements on comprehensive health planning will depend on the resolution of the theoretical and operational problems which presently plague the development of
a practical health status index.

In sum, while it is possible at this time to set sound criteria for the process aspects of comprehensive health planning, such criteria are by no means refined enough or sufficiently specific to be permanently fixed. Next, the empirical conclusions are based on both the survey findings and the case study perceptions.

First, there are a set of conclusions which relate to each of the five fundamental planning steps. As far as Task Design is concerned, the survey and the case study reveal slightly different results. Over two-thirds of the survey respondents indicated that they had established an agreed-upon plan for planning (i.e., modus operandi for the State health plan). In contrast, the case agency was found to have no detailed agency definition of planning, or agency plan for operationalizing planning steps. In the author's mind there is a serious question concerning the actual explicitness and relevance of the modus operandii reported by the survey respondents. This question arises from the case study observations and, also, the responses received to other survey questions (i.e., subsequent poor conformance to planning concepts). The survey and case study results regarding another definitional requirement of Task Design were similar. Almost two-thirds of the survey respondents had not chosen a formal definition for their system of interest (e.g., the health system). By the same token, the
case agency had not explicitly and collectively defined its system of interest. As has been mentioned previously, the lack of an explicit system definition is extremely detrimental to the planning process because it precludes the logical integration of analytic efforts.

In regard to System Investigation, both the survey and the case study seem to indicate that the State CHP agencies did not have the capacity to analyze the health system in a rigorous fashion (i.e., to develop associations, causal relationships, projections, and trends). Not only were the State CHP agencies approaching System Investigation in a nontechnical fashion, at least half of them had failed to come to grips with the heart of this planning step. That is, fifty percent of the surveyed agencies including the case agency had not chosen problem priorities.

The survey and the case study produced exactly the same results with respect to the Ends Establishment step of planning. By and large, the following situation existed. The State CHP agencies had established goals. However, they had not ranked those goals. In addition, the most pivotal task of this step had not been carried out by most State agencies. That is, they had not established quantified, time-related end statements (i.e., targets).

With regard to Means Selection, the survey results emphasize that the State CHP agencies were identifying alternatives and making action recommendations, but that
these activities were not backed up by thorough studies and deliberations. About three-quarters of the survey respondents indicated that they had not analyzed alternatives in depth. Further, more than four-fifths of the responding agencies had not ranked alternatives. The case study suggests that the lack of hard analysis of intervention alternatives was due, at least in part, to the categorically separate and fragmented way in which alternatives were being considered. That is, in the planning process alternatives were not actually viewed and treated as such but rather as separate areas for investigation and recommendation.

The survey and the case study both indicate that the State CHP agencies had placed very little emphasis on Intervention Evaluation. This was the most neglected of the five fundamental planning steps. While this fact could be rationalized because Intervention Evaluation is the last of the planning steps, it is important to note that approximately three-fifths of the responding agencies had not even established criteria and procedures for Intervention Evaluation. In fact, more than one-fifth of the responding agencies indicated that they had no intention of establishing such criteria and procedures. The case agency gave no evidence of even being cognizant of this planning step. Admittedly, not all theorists include evaluation in their planning paradigms. However, the inclusion of the Inter-
vention Evaluation step among the fundamental steps of comprehensive health planning is believed to reflect a growing recognition of the importance of closely connecting the target setting and action evaluation functions.

Second, a careful review and comparison of the survey findings and the case study perceptions reveal a number of common, problematic threads or themes. The State CHP agencies did not appear to be engaged in technical analyses to any great extent. Since analysis is the core of planning, this is a particularly disturbing finding. For example, the survey respondents reported that relatively little of their staff time was spent on applied research or technical activities. Also, less than one-quarter of the responding agencies had completed benefit/cost type of studies. In fact, less than half of the State CHP agencies were utilizing unit-cost type of data at all. The case study would seem to indicate that the staffs of these agencies were primarily allocating their time to information gathering and the maintenance of committees. Thus, the staff members did not become actively involved with data beyond the primarily descriptive level.

The activities of the State CHP agencies appeared to lack preciseness. For example, the fact that the agencies were not transforming goals into targets mirrors a definite generalness in approach. This lack of specificity was reflected in many other activities such as the widespread
neglect of system definition and the more limited neglect of planning horizons. Explicitness should be one of the cornerstones of planning. It should distinguish planned decisions from unplanned decisions. Thus, the lack of exactness on the part of State CHP agencies throws their effectiveness into serious question.

It is especially troubling that, in general, the State agencies were not setting overall problem, end, or means priorities. Choice is an essential part of planning, necessitated by resource constraints. Priority setting is the practical adaptation to the reality of such limitations. The lack of priorities makes planning of dubious value to decision-makers. To fail to set priorities is to live in an unreal world where hard choices don't have to be made.

The planning process should be convergent. That is, analysis should lead to the selection of: 1) the most critical problems, 2) the most preferred ends, and 3) the most satisfying means.

The State CHP agencies appeared to view the health system in only partial terms, and they seemed to have limited interests in these partial systems or subsystems. They seemed, for the most part, to have excluded genetic, environmental, and behavioral agents or variables from consideration. Such exclusions severely limit the range of possible ends and means in health planning. Specifically, such an orientation precludes an appropriate amount of attention to
prevention. The survey and case study indicate that the State agencies were primarily interested in health services, especially curative health services. Further, in focusing on curative health services the State CHP agencies seemed to be most interested in inputs and activities, and not very concerned about outcomes. This is reflected by their concentration on facilities and manpower with respect to data collection and studies, and the only minimal interest in health status indices. Such an orientation is dangerous in that it runs the risk of perpetuating interventions which are no longer efficacious and/or efficient.

Both the survey and the case study indicate that the State CHP agencies were taking a categorical or patchwork approach to their planning activities. That is, for the most part committees and plan documents were organized on the basis of a categorical framework (i.e., facilities, manpower, services, and environment). This categorical approach appeared to be interfering with planning progress in the instance of the case study agency. It appears that a categorical framework tends to shift the emphasis away from planning steps and tasks, and focuses attention on problems, issues, and recommendations in a methodologically-free manner. Thus, categorical committee and document frameworks appear to be nonfunctional in terms of promoting the planning process. That is, they appear to impede the requisite systematic unity of planning operations. If
planning steps were utilized as the conceptual framework, categorical issues could be dealt with in a more integrated fashion, and the process of operationalizing the fundamental steps of planning could be enhanced at the same time by giving added emphasis to the planning agenda.

Third, the summary conclusion which this appraisal leads to is that the State CHP agencies generally had not operationalized the fundamental steps of comprehensive health planning as they were defined by the conceptual statement. To all those who find merit in the conceptual statement, this primary conclusion should be cause for serious concern.

This appraisal effort has identified a substantial disparity between the concept of comprehensive health planning and the practice of the same at the State level. The empirical findings would seem to indicate that the planning function was being confused with or overshadowed by other functions. State CHP agencies may have been involved in community organization, information gathering, health forum, health politics, and coordination. However, this appraisal would indicate that, by and large, they had not made a great deal of progress in terms of planning.

From the case study it appeared that "participation", "input", and "involvement" had been equated with "planning". This confusion of "participation" with "participation in what" was probably due, at least in part, to the heavy
emphasis placed on partnership and consumer participation by the CHP program. That is, it appears that comprehensive health planning came to be defined by CHP's program requirements (i.e., 314(a) and (b) regulations and guidelines). Thus, it appears as though CHP organizational and participatory requirements became confused with, or took precedence over, the methodological and technical requirements of comprehensive health planning.

In terms of more proximal conditioning factors, the case study revealed a critical lack of "planning" consciousness on the part of the case agency's members. Almost none of the staff members appeared to be thoroughly familiar with either planning or health planning concepts and methods. This absence of a planning orientation, especially on the part of the agency's leadership, was probably the single most important factor associated with the agency's poor planning performance.

With respect to the survey, the inability to identify any statistically significant explanatory or predictor variables probably can best be attributed to the crudeness of the independent variables. It appears that the large number and the measurement level (i.e., dummy variables) of the independent variables obstructed the search for variables which could help explain variation in the planning scores. If a limited number of well-constructed, continuous, independent variables could be devised, the
search for explanatory or predictor factors would certainly be enhanced. It seems that a "rifle" approach would be more effective than the "shot gun" approach utilized in this dissertation. Of course, the inherent complexity and abstractness of the planning phenomenon, as well as definitional problems, will always make such investigations extremely difficult.

Finally, the actual variance in the survey's planning scores may provide hope regarding future progress in operationalizing comprehensive health planning concepts at the State level. A small number (i.e., 5) of the State CHP agencies received very high planning scores (i.e., between 150 and 180). If this group of agencies represents the vanguard in a progressively improving State health planning movement, then we can expect wider and greater conformance with the conceptual statement in the future. In any event, the findings of this study constitute an important baseline against which future health planning activities can be measured. Similar process appraisals should be conducted in the not too distant future to identify health planning progress or deterioration.

Implications

If State, or any other level, health planning is to move well beyond the rhetoric of planning to fully implement planning concepts and thereby be of substantial assistance
to decision-makers, a number of things are in order.

First, there is a need to establish and sustain educational programs, both degree and continuing, which will emphasize generic health planning steps and tasks. Certainly, health planners need to be familiar with concepts of community organization and agency administration. They, also, need to be knowledgeable regarding current health and health service problems and prospects. However, a health planner should, most of all, be an expert in planning methods and techniques. This concept should be reflected in the curricula of health planning training programs.

Second, more emphasis needs to be placed on the process aspects of planning in the allocation of health planning research funds. In the past, health planning research in the U.S. has concentrated on the organizational and participatory aspects of health planning. In the immediate future, health planning research should give greater attention to the technical aspects of health planning. Such research should be aimed not only at whether requisite planning steps and tasks are being completed, but also the caliber of completed steps and tasks. For example, major research projects could and should be devoted to refining each of the critical tasks in the planning process, such as priority setting. Also, the technical competence of projections, sample surveys, and benefit/cost analyses, etc. should be assessed and improved. Further, the up-to-date-
ness, validity, reliability, and adequacy of information systems should be evaluated and upgraded. This is not to say that the organizational and participatory aspects of health planning should be neglected in the future. However, it is intended to say that a participatory health planning facade is still a facade.

Third, a limited number of demonstration projects are needed. Several States could be selected for a concentrated infusion of planning resources (i.e., money, technical materials, consultants, and equipment). The findings of this and other related studies could be used to identify areas requiring program development and technical assistance. With a critical mass of energy and expertise available, health planning systems could be operationalized rapidly in these demonstration States. Such demonstration projects could hasten the development and dissemination of planning methods and techniques.

Fourth, the functional priorities of the CHP agencies or their successors need to be clearly established. That is, agency members should be certain regarding the agency's primary mission. If planning is to be the primary mission, then agency resources (e.g., manpower time) should be allocated accordingly.

Fifth, the importance of State level health planning in a nation-wide system of health planning needs to be re-affirmed, and this importance should be reflected in health
planning development efforts. With the world getting smaller and smaller, as a result of advances in communications and transportation, the State as a geo-political unit for health planning is becoming more and more sensible. Also, efforts to create subnational health information systems have already begun on State-wide bases. Further, many current health planning problems such as health manpower problems do not lend themselves to areawide solutions. As a result, State health planning should not consist of the mere piecing together of areawide health plans. Thus, great emphasis should be placed on State level health planning in any new health planning legislation.

Finally, there is a need to encourage health planning agencies to approach their planning tasks in a broad gauged manner. That is, health planning agencies should be required to define their system of interest in such a way that all factors which affect health are included, and positive health status change itself is clearly designated as the primary output. To limit the analytic scope of health planning agencies would be to take a step backward. Confining health planning to health or medical services would result in the following analytic consequences: 1) the range of legitimate problems would be narrowed, 2) the breadth of possible goals would be reduced, and 3) the array of potential interventions would be restricted. Such an abridgement of analysis might produce more consistency in
health planning activities and priorities in the short run, but it would, also, result in a less effective and less efficient production of health in the long run. Therefore, any new health planning legislation should encourage health planning agencies to pursue their analyses in a comprehensive manner.\(^2\)

**Final Comments**

In bringing this study to an end, it would be well to reiterate where it started. First of all, it is important to remember that the empirical portion of the study was limited to State CHP agencies. Obviously, the conclusions might have been different if Areawide CHP agencies had been chosen for study. This process type of appraisal should be extended to areawide and national health planning agencies in the future.

Second, it should be re-emphasized that this appraisal dealt seriously with only one aspect (i.e., process) of a three pronged planning evaluation model (i.e., structure, process, and outcome). While this simplification made the task at hand more manageable, it also serves to distort reality. In fact, the structure, process, and outcome aspects of all planning operations are intimately connected, inseparable phenomenon. This fact is clearly recognized by the author. The focus of this dissertation was delimited for purposes of scholarship, not naiveté. There is a need
to study the process aspects of health planning not only in more depth as has already been discussed, but also in conjunction with structural and outcome aspects. For example, with respect to process-outcome studies it would be of great interest to know whether there is a high or low, positive or negative correlation between: 1) planning performance, and 2) decision-making style and/or system change.

Lastly, it should be reiterated that the main purpose of this dissertation was to highlight discrepancies between concept and practice in an effort to contribute to the improvement of the practice of comprehensive health planning. The generally negative tone of the empirical perceptions and findings stems from this purpose, not from the author's proclivities in regard to the CHP programs.
FOOTNOTES


2Some current health planning legislative proposals would narrow the scope of health planning analysis by eliminating environmental agents from the legitimate pur-view of health planning agencies. Again, see the House's Comparison.
APPENDIX A

THE SURVEY QUESTIONNAIRE
SURVEY
OF
COMPREHENSIVE HEALTH PLANNING
AT THE STATE LEVEL

to be completed by
the executive directors of
the 50 State CEP agencies

THE OHIO STATE UNIVERSITY
Department of Preventive Medicine
Division of Community Health
440 NORTH.tick Avenue
COLUMBUS, OHIO 43210

February 1974
INSTRUCTIONS:

PLEASE READ EACH QUESTION CAREFULLY

AND

RESPOND IN THE INDIVIDUALLY INDICATED MANNER

In most cases you will be asked to circle the appropriate response or responses. For example:

How many years has your State CEP Agency been in existence? (Circle one)
1. 7 years
2. 6 years
3. 5 years
4. 4 years

CONTENTS:

Section I - Some Background Questions Concerning You And Your Agency

Section II - Some Factual Questions About Your Agency's Planning Activities

Section III - Some Questions About Your Perceptions Of Planning And Your Agency
1. How many years have you been employed by the State Crip Agency for which you currently serve as director? (Fill-in the appropriate number)

________________ years

2. Have you had training in the formal field or subject matter of planning (i.e., concepts, and methodology)? (Circle one)
   1. yes—as part of my graduate education
   2. yes—as part of a continuing education program
   3. no

3. How many full-time (or full-time equivalent) professional staff members are currently employed by your Agency? (Fill-in the appropriate number)

________________ persons

4. Which one of the following alternative committee structures best characterizes the organization of your Agency's work? (Circle one)
   1. problems, goals, priorities, and tactics committees
   2. children and youth, adult, and old-age committees
   3. inner-city, suburban, rural committees
   4. facilities, manpower, services, and environment committees
   5. other (specify) ____________________________________________________________

5. Which one of the following types of agencies best characterizes the agency within which your organization is located? (Circle one)
   1. Governor's office
   2. Departments of Planning, Urban Affairs, or Development
   3. Interdepartmental commission
   4. Department of social or human services
   5. Health Department
   6. Other (specify) ____________________________________________________________

6. Has your Agency received statutory authority (i.e., legislative recognition and mandate) from your State Government? (Circle as many as apply)
   1. yes—by way of legislation tailored specifically for Crip
   2. yes—by way of legislation establishing a "certificate of need" program
   3. no
11 - SOME FACTUAL QUESTIONS ABOUT YOUR AGENCY'S PLANNING ACTIVITIES

2. Has your Agency disseminated (e.g., by way of a memorandum, position paper, or work plan) among its staff and council members an agreed-upon rules operandi (i.e., procedures) for preparation of the State health plan? (Circle one)
   1. yes
   2. currently preparing to do so
   3. no—but intend to in the future
   4. no

3. Has your Agency formally charged a professional staff member, a task force, or a committee with the responsibility of evaluating and/or recommending changes in the planning cycle or plan development procedures of your Agency? (Circle one)
   1. yes—a standing committee
   2. yes—a task force
   3. yes—a staff member
   4. no—but intend to in the future
   5. no

4. Which of the following situations best characterizes your Agency's position with respect to the formulation of health and health service problem priorities (e.g., the relative priority of stroke vs. auto accidents, or inadequate financing vs. maldistribution, etc.)? (Circle one)
   1. agreed-upon problem priorities have been established and documented (i.e., included in the health plan, or communicated to the Governor).
   2. formal methods and criteria for establishing problem priorities have been agreed upon, but problem priorities have not, as yet, been established.
   3. the question of problem priorities has been discussed but no formal methods and criteria for establishing them have been agreed upon, as yet.
   4. the question of problem priorities has not been formally addressed, as yet.

5. Which one of the following choices best characterizes your Agency's position with regard to defining the "health system" (i.e., the set of activities and events which constitute the object of your planning activities)? (Circle one)
   1. Our Agency has arrived at a formal, agreed-upon definition of the "health system" which we utilize in our ongoing planning activities.
   2. The issue of a "health system" definition has been brought up and discussed in our Agency, but no formal resolution of the question has been reached.
   3. The task of establishing an agreed-upon definition of the "health system" has not, as yet, been addressed by our Agency.
11. Has your Agency instituted a formal procedure for selecting health goals? (Circle as many as apply)
   1. yes—opinion surveys method
   2. yes—nominal groups method
   3. yes—expert judgement method
   4. yes—other (specify) ______________________________
   5. currently in the process of establishing such procedures
   6. no—but intend to in the future
   7. no

12. Which one of the following situations best characterizes your Agency's present position with regard to the establishment and ranking of health goals? (Circle one)
   1. Our Agency has selected a set of health goals, and has formally priority-ranked them.
   2. Our Agency has established a number of health goals but we have not ranked them.
   3. One broad, general health goal statement has been formally adopted by our Agency.
   4. Health goals, per se, have not as yet been established by our Agency.

13. Does your Agency currently have an agreed-upon set of health objectives or targets (i.e., quantified, time-related expressions or translations of goals which are used to measure progress toward reaching goals, for example: Reducing by 75 percent the number of highway crash deaths in the State by 198X)? (Circle one)
   1. yes
   2. currently being derived
   3. no—but intend to derive such in the future
   4. no

14. In general, which one of the following statements best characterizes your Agency's program in terms of analyzing alternative courses of action (i.e., various options available for reaching a goal or objective)? (Circle one)
   1. Alternatives have been identified, and analyzed, and priority ranked.
   2. Alternatives have been identified and analyzed (via benefit/cost analysis, feasibility checks, and other procedures), but not priority ranked.
   3. Various alternatives have been identified, but not completely analyzed or priority ranked.
   4. Alternatives have not formally been identified in our planning process, as yet.
15. In which of the following areas, if any, has your Agency formally (i.e., on record) made specific (i.e., detailing who was to do what, where, and when) action recommendations? (Circle as many as apply)
   1. the general environment (e.g., land use, etc.)
   2. environmental health services (e.g., sanitation, etc.)
   3. personal health services (e.g., medical checkups, etc.)
   4. health facilities
   5. health manpower
   6. health financing
   7. no specific action recommendations have been formally made, as yet, but some nonspecific action recommendations have been formally made.
   8. no formal action recommendations (specific or otherwise) have been made as yet.

16. Has your Agency formally established generic criteria and procedures for evaluating those action recommendations which are actually implemented? (Circle one)
   1. yes
   2. currently doing so
   3. no—but intend to do so in the future
   4. no

17. Which one of the following choices best characterizes your Agency with regard to health plan document development? (Circle one)
   1. comprehensive health plan document completed (e.g., both goals and alternative actions, and covering every category of issue areas)
   2. partial health plan document completed (e.g., environmental health plan, or goals statement, etc.)
   3. no health plan document completed

18. Which, if any, of the following time frames have been formally adopted by your Agency as planning horizons (i.e., not the target date for completion of the plan, but that time in the future which serves as the temporal planning target or reference point)? (Circle as many as apply)
   1. one year
   2. five years
   3. ten years
   4. other ________________
   5. no time frame formally selected as yet

19. Which of the following items are characteristic of your Agency’s health information system?
   A. Auspice of your data system (Circle one)
      1. Our Agency primarily collects its own data.
      2. Our Agency primarily utilizes the services of another division or agency to fulfill its data collection responsibilities.
10. Continued

B. Nature of your data system (Circle as many as apply)

1. computerized record storage and linkage
2. computerized record storage
3. manual routine compilation of standard sources of data
4. manual ad hoc collection of needed data
5. little quantified data presently being collected

20. Which one of the following percentage categories best approximates the percentage of your staff's total time that was devoted to applied research or technical activities (i.e., special study and "homework" or committee, committee, community, coordinating, liaison, grant, supervisory, clerical and other types of activities) during the past three months? (Circle one)

1. 0 - 5 percent
2. 6 - 10 percent
3. 11 - 20 percent
4. 21 - 30 percent
5. 31 - 50 percent
6. more than 50 percent

21. Which of the following types of technical studies has your Agency completed either internally or by way of contract? (Circle as many as apply)

1. age and county-specific population projections for the 1980s.
2. state population sample survey (either examination or interview) to determine the present magnitude of disease and disability.
3. the effect of health services in the State on the health level of the population.
4. the effect of certain environmental agents or variables in the State on the health of the population.
5. methods for containing health care costs.
6. benefit/cost ratios of certain program alternatives.
7. health manpower resource requirements for the future.
8. health facility resources requirements for the future.
9. no technical studies completed as yet.

22. Does your Agency make a conscious and deliberate attempt to stay abreast of epidemiologic research findings (e.g., causes of diseases, efficiency of treatments)? (Circle one)

1. yes—we have a formal procedure for doing so (e.g., staff assignment, or task force appointment)
2. yes—we keep abreast informally
3. no—but intend to in the future
4. no
22. Which of the following variables have been included in your Agency's deliberations to date (i.e., scope of study)? (Circle as many as apply)

1. demographic characteristics
2. socio-economic characteristics
3. the health level of the population
4. genetic characteristics of the population
5. human health attitudes and behavior
6. the personal health service system
7. the environmental health service system
8. physical, chemical, and biological agents in the environment
9. none of the above

24. Circle each of the following reasonably up-to-date data sets which are readily accessible to your Agency, and which are presently being utilized by your Agency. (Circle as many as apply in each of the following sections, A - I)

A. Demographic Data
   1. Total State population
   2. Total population for each county in the State
   3. State population by age, sex, race, and socio-economic status
   4. County populations by age, sex, race, and socio-economic status
   5. Death rates within the State
   6. Birth rates within the State
   7. Net migration figures for the State
   8. Five to ten year projection of the State population by age categories
   9. Other (Specify) ____________________________________________
   10. No demographic data presently being collected and utilized
   11. Demographic data not considered important

B. Health Status Data
   1. The ten or so leading causes of mortality in the State
   2. The ten or so leading causes of morbidity in the State
   3. The ten or so leading causes of disability in the State
   4. The State infant mortality rate
   5. Incidence and prevalence of communicable diseases in the State
   6. Age-specific State mortality rates
   7. Race-specific State mortality rates
   8. Mortality and morbidity by geographic location in the State
   9. Other (Specify) ____________________________________________
   10. No health status data presently being collected and utilized
   11. Health status data not considered important
C. **Attitudinal and Behavioral Data**
   1. Level of personal illness discomfort experienced by the State's population
   2. Level of satisfaction on the part of the State's population with the way in which health services are organized, financed, and delivered
   3. Opinion of the State's population with regard to the most pressing State health problems (e.g., mental illness, fatal auto accidents)
   4. Proportion of the State's population that engage in certain health promoting or protecting practices
   5. Other (Specify) ______________________________________________________
   6. No attitudinal and behavioral data is presently being collected and utilized
   7. Attitudinal and behavioral data not considered important

D. **Genetic Data**
   1. Incidence and prevalence of genetic disorders in the State
   2. Other _____________________________________________________________
   3. No genetic data presently being collected or utilized
   4. Genetic data not considered important

E. **Environmental Data**
   1. State air quality
   2. State water quality
   3. State food quality
   4. State housing quality
   5. Other (Specify) ___________________________________________________
   6. No environmental data presently being collected or utilized
   7. Environmental data not considered important

F. **Health Services Data** (by type, and/or location, and/or utilization in the State)
   1. Medical (curative) services
   2. Environmental health services
   3. Emergency health services
   4. Home care services
   5. Rehabilitation services
   6. Laboratory services
   7. Detection and screening services
   8. Health education services
   9. Psychiatric services
   10. Other (Specify) _________________________________________________
   11. No health service data presently being collected and utilized
   12. Health service data not considered important
G. Health Human Resources Data (by total number, and/or specialty, and/or location in the State)

1. Active M.D.s
2. Active D.O.s
3. Active R.N.s
4. Inactive but nonretired R.N.s
5. Active Dentists
6. Active Pharmacists
7. Active allied health personnel
8. Health manpower education and training programs
9. Other (Specify)
10. No health manpower resource data presently being collected or utilized
11. Health manpower data not considered important

H. Health Facility Resources Data (by number, and/or location, and/or beds, and/or bed utilization, in the State)

1. General hospitals
2. Psychiatric hospitals
3. Nursing homes
4. Community Mental Health Centers
5. Neighborhood health centers
6. Other (Specify)
7. No health facility resources data presently being collected
8. Health facility resources data not considered important

I. Health Expenditures and Costs Data

1. The total annual expenditures on health in the State by all public and private sources.
2. The proportion of the total annual health expenditure in the State that fall within the major subdivisions of the health sector.
3. The average unit cost of the major health services and their component parts within the State.
4. The breadth and depth of health insurance coverage in the State.
5. The cost in lost productivity by the major causes of mortality and morbidity in the State.
6. Other (Specify)
7. No health expenditures and costs data presently being collected and utilized.
8. Health expenditures and costs data not considered important.
25. If your Agency has written a comprehensive health plan document, please list its major section headings or attach a photocopy of the plan's table of contents:

26. Please rank the three most important responsibilities of your Agency, as you see them. (Mark the most important 1 and so on, 2, 3)

1. _____ coordination of health programs
2. _____ securing additional health funds for the State
3. _____ establishing and promoting a health forum
4. _____ making health policy decisions
5. _____ conducting a continuous planning process
6. _____ regulating the health service system
7. _____ implementing recommended health service programs
8. _____ fostering statewide health planning agencies
9. _____ reviewing and commenting on health service proposals
10. _____ containing health care costs and expenditures

27. Which of the following concepts would you include in the idea of "comprehensive" as it relates to health planning? (Circle as many as apply)

1. monitoring the total health system
2. weighing all health problems of the total State population
3. considering the full range of possible health goals and targets
4. balancing selected health goals and targets in order to insure consistency
5. weighing all action or intervention alternatives
6. taking into account spill-over or secondary effects of action or intervention alternatives
7. integrating recommended actions or interventions
8. none of the above
28. Please indicate which of the following statements related to comprehensive health planning you agree with. (Circle each with which you agree)

1. The primary focus of health planning should be the health level of the population.
2. Evaluation of implemented planning recommendations is a necessary and critical part of the planning process.
3. The formulation of goals is grounded primarily in values, not in facts.
4. Planning is a continuous, cyclical process.
5. The order or sequence of planning steps is an important consideration in the planning process.
6. Problems, goals, objectives and action recommendations all need to be prioritized in the planning process.
7. When prevention is feasible, it is in most cases the intervention or action of choice (e.g., detection, treatment, rehabilitation).
8. The planner must be concerned with both ends, means, and their relationship in the planning process.
9. Projecting or forecasting the "health system" is an essential part of the health planning process.
10. The direct purpose of planning is to improve decision-making.

29. Are you personally satisfied with your Agency's progress with respect to planning operation and procedures? (Circle as many as apply)

1. yes
2. no—personal lack of preparation in planning concepts and procedures has been an obstacle.
3. no—staff lack of preparation in planning concepts and procedures has been an obstacle.
4. no—other obstacles (specify) _______________________________

30. Do you have any brief comments in regard to this survey questionnaire in general, or any of its specific questions?

Date: ____________________________
APPENDIX B

IMPLEMENTATION OF THE SURVEY:
A DESCRIPTION OF PROCEDURES
AND RETURNS
IMPLEMENTATION OF THE SURVEY

A. Pretest

Once a draft survey instrument had been developed, it was decided to pretest it. It was hoped that the pretest would indicate whether or not the instrument was understandable, easy to complete, and brief from the point of view of the respondent. Since all 50 active State CHP directors would be surveyed, it was decided not to use any of them in the pretest. This would avoid any bias in the actual survey results that might arise as a result of giving some of the respondents a preview of the instrument. Therefore, it was decided to send the draft instrument to five former State and five current Areawide CHP directors who enjoyed respectable national reputation. It was believed that the combination of these two groups would provide the closest desirable approximation to the ultimate survey population.

The pretest yielded a 90% response rate. All five of the Areawide directors and four of the former State directors eventually responded to the mailed pretest. The pretest respondents offered many good suggestions for improving the questionnaire (e.g., wording, question construction, response categories, instrument layout, etc.) More importantly, the pretest respondents indicated in
general that: 1) the instrument was intelligible, 2) it did not take a relatively exorbitant amount of time to complete (e.g., over 30 minutes), and 3) it seemed to be a worthwhile venture. The confirmation of the intelligibility of the instrument was particularly welcomed, since there was some a priori concern that it might be too abstract.

B. Initial Mailing

The printed (i.e., photo-ready) questionnaires were mailed out, special delivery, to all 50 State CHP directors on February 14, 1974. (See APPENDIX C) The mailed packet included: 1) a cover letter (See APPENDIX D1), 2) an endorsement memorandum (See APPENDIX D2), 3) the questionnaire, and 4) a stamped, addressed, return envelope. The questionnaires which were sent out were marked with a code number on the front and back in order to: 1) permit the identification of non-respondents so that a follow-up mailing could be launched, and 2) insure the confidentiality of information supplied by the respondents throughout the collection, analysis, and reporting stages of the survey.

C. Telephone Contact

For approximately four days after the initial mailing, telephone calls were placed to all 50 State CHP directors except those in Alaska and Hawaii. It was hoped that this kind of personal contact, at roughly the arrival time of
the questionnaires, would help to improve the response rate. After a maximum of three telephone calls to any single agency, 90% of the directors were personally reached. In the cases of the remaining ten agencies, some other professional employee was spoken with (5), or a message was left for the director with a secretary (5). All telephone conversations were very brief. Basically, they stressed the importance of the study in general, and the need for each director's personal participation.

D. Follow-up Mailing

Nineteen days after the initial mailing, a second packet was sent to those directors who had not yet responded (i.e., 38%). This second packet included: 1) a brief cover letter (See APPENDIX D3), 2) a second copy of the questionnaire, and 3) a second stamped, addressed, return envelope. Following this second mailing, no further contact, for the purpose of improving the response rate, was made with the target population. However, descriptive findings were sent to all the directors, on May 21, as was promised in the first cover letter. (See APPENDIXES D4 and D5)

E. Responses

Forty-two (42) questionnaires were returned before the deadline date of April 15. This 84 percent response rate is considered to be very good (i.e., one which justifies inferences about the total population). Over
half of the questionnaires (54%) were returned within two weeks of the initial mailing. Eighty-two percent (82%) of the questionnaires were returned within four weeks after the first mailing. (See Figures 5 and 6) One (1) questionnaire was returned after the deadline date.

Of the eight States which did not return questionnaires by the deadline, four are located in the northeast section of the country; three are midwestern States; and one is a northwestern State. Thus, the nonresponses were not randomly distributed on a geographic basis.

The 42 questionnaires which were analyzed had very little missing data. In those few instances where there was missing data, the holes were plugged with a mean or mode as appropriate.
Fig. 5. --Daily Return Rate After Initial Mailing
By Number
Fig. 6.—Daily Return Rate After Initial Mailing
By Cumulative Per Cent
APPENDIX C

THE SURVEY POPULATION
DIRECTORS AND ADDRESSES OF THE FIFTY STATE CHP AGENCIES
AS OF FEBRUARY 1974*

C. Preston Blanks, Jr.
Health Planning Administrator
Comprehensive Health Planning Administration
State Department of Public Health
State Office Building
Montgomery, Alabama 36104

Jerry L. Madden, Director
Office of Comprehensive Health Planning
Department of Health and Social Services
Pouch H
Juneau, Alaska 99801

Melvin H. Goodwin, Jr., Ph.D.
Director
Arizona Health Planning Authority
2980 Grand Avenue
Phoenix, Arizona 85017

Michael Cleary, Administrator
Arkansas Comprehensive Health Planning
Department of Planning
400 Train Station Square
Victory at Markham
Little Rock, Arkansas 72201

Robert L. Jackson, Program Manager
State Comprehensive Health Planning Program
State Department of Public Health
546 Office Building #6
744 "P" Street
Sacramento, California 95814

Emmett G. Zerr, Jr., Director
Division of Comprehensive Health Planning
Department of Health
1550 Lincoln Street
Denver, Colorado 80203

Mrs. Sarah S. Hirakis, M.P.H.
Director
Comprehensive Health Planning Agency
Health Services Division
79 Elm Street
Hartford, Connecticut 06115

Harry F. Camper, Director
Bureau of Comprehensive Health Planning
Department of Health and Social Services
Dover, Delaware 19901

Jerry Conger, Chief
Bureau of Comprehensive Health Planning
Division of Planning and Evaluation
Department of Health & Rehabilitative Services
Building #2
1323 Winwood Boulevard
Tallahassee, Florida 32301

Mrs. Patricia C. Leet, Director
Office of Comprehensive Health Planning
State Department of Human Resources
1280 Peachtree Street, N.W.
Atlanta, Georgia 30309

Mrs. Sylvia L. Levy, M.S.W.
Director
Comprehensive Health Planning
State Department of Health
Kinau Hale, P. O. Box 3378
Honolulu, Hawaii 96801

Richard Adams, Acting Director
Comprehensive Health Planning Agency
Department of Environmental Protection and Community Services
State House
Boise, Idaho 83720

Mark H. Lepper, M.D., Director
Comprehensive State Health Planning Agency
525 W. Jefferson Street
Suite 320
Springfield, Illinois 62706

Richard E. Thompson, Director
Comprehensive Health Planning State Board of Health
1330 West Michigan Street
Indianapolis, Indiana 46206

Frank Fair, Director
Office of Comprehensive Health Planning
State Office of Planning & Programming
523 East 12th Street
Des Moines, Iowa 50319

Raymond R. Solee, Director
Office of Comprehensive Health Planning
Kansas State Board of Health
535 South Kansas Ave. - 3rd Floor
Topeka, Kansas 66603

George J. Pogan, III, Director
Office of Comprehensive Health Planning
Kentucky Program Development Office
State National Bank Building
130 W. Main Street
Frankfort, Kentucky 40601

Ronald F. Falgout, Chief Administrative Officer
State Office of Comprehensive Health Planning
150 Riverside Mall, Suite 410
Baton Rouge, Louisiana 70801

Mark R. Knowles, Director
Comprehensive Health Planning Department of Health and Welfare
295 State Street
Augusta, Maine 04330

Eugene H. Guthrie, M.D., M.P.H.
Executive Director
Maryland Comprehensive Health Planning Agency
Suite 825 - Medical Arts Building
101 W. Read Street
Baltimore, Maryland 21201

Charles Stover, Interim Director
Comprehensive Health Planning Agency
Leverett Saltonstall Building
100 Cambridge Street
Boston, Massachusetts 02203

Donald C. Smith, M.D.
Principal Advisor on Health & Medical Affairs
Comprehensive State Health Planning Office
Lewis Cass Building
Lansing, Michigan 48913

John Dilley, Director
Comprehensive Health Planning
802 Capitol Square Building
550 Cedar Street
St. Paul, Minnesota 55101

F. Lindsey Risher, M.D.
Director
Division of Comprehensive Health Planning
100 Watkins Building
510 George Street
Jackson, Mississippi 39202

William Mitchell, Director
Comprehensive Health Planning
505 Missouri Boulevard
P. O. Box 1157
Jefferson City, Missouri 65101
S. J. Ulmer, Jr., Director
Office of Comprehensive Health Planning
State Department of Health & Environmental Control
2600 Bull Street
Columbia, South Carolina 29201

Donald G. Kurvink, Director
Division of Comprehensive Health Planning
Department of Health
East Office Building
Pierre, South Dakota 57501

Boris Georgeff, Director
Office of Comprehensive Health Planning
360 Capitol Hill Building
301 Seventh Avenue, N.
Nashville, Tennessee 37219

Ervin E. Baden, M.D., Acting Director
Office of Comprehensive Health Planning
Division of Planning Coordination
Executive Department
One Highland Center, Suite 450
314 Highland Mall Boulevard
Austin, Texas 78752

Stewart C. Smith, Director
Comprehensive Health Planning Department of Social Services
243 E. 4th Street
Salt Lake City, Utah 84114

Alan J. Charron, Director
Comprehensive Health Planning Agency
State of Vermont
114 Main Street
Montpelier, Vermont 05602

Edward E. Springborn, Director
Office of Comprehensive Health Planning
State Department of Health
109 Governor Street
Richmond, Virginia 23219

Verne A. Gibbs, Acting Administrator
Comprehensive Health Planning Office
State Planning & Community Affairs Agency
106 Insurance Building
Olympia, Washington 98501

Harry A. Stansbury, Ph.D., Director
Office of Comprehensive Health Planning
Governor's Office, State Capitol
Charleston, West Virginia 25305

James R. Kimmey, M.D., Administrator
Division of Health Policy and Planning
1 W. Wilson Street
P. O. Box 309
Madison, Wisconsin 53702

Larry Bertilson, Director
Comprehensive Health Planning Division of Health and Medical Services
Wyoming Department of Health & Social Services
Cheyenne, Wyoming 82001
APPENDIX D

CORRESPONDANCE WITH THE STATE CHP DIRECTORS
We seek your participation in a new kind of health planning study, one that focuses on an aspect of health planning that is receiving increasing attention among health planning professionals. Mr. Waters is directing this study. He was formerly employed by CHSP in Rockville, and has considerable additional experience with CHP programs.

We are all aware that there have been many studies of CHP Agencies over the last six years, most of them concerned with the organizational and participatory aspects of planning. There now appears to be a pressing need to explore and develop the area of planning procedures and techniques.

In order to accommodate to your heavy schedule, we attempted to keep our questionnaire as short as possible through careful editing and pretesting. We hope you will enjoy completing the questionnaire. We know you share our keen interest in the advancement of health planning, and we are confident that our study will be of practical value in the formulation of effective technical assistance strategies for State CHP Agencies.

You may rest assured that under no circumstances will your particular responses be identified, or shared with any other agency or organization. Accordingly, all responses will be coded and held in the strictest confidence. Please complete the enclosed questionnaire openly and fully, and return it to us within one week. We, in turn, will report the results of this study to you by May 31. If you have any questions, please call Mr. Waters (collect) at (614) 422-1567.

With warm regards and best wishes.

Very truly yours,

Martin D. Keller, M.D., Ph.D.
Head, Division of Community Health
Professor, Preventive Medicine

Enclosures
February 8, 1974

TO: Directors, State Comprehensive Health Planning Agencies

FROM: Sewall Mnolton, Chief, Ohio Office of Comprehensive Health Planning

SUBJECT: Survey Questionnaire by Mr. Waters, Department of Preventive Medicine, Ohio State University

Needless to say, Comprehensive Health Planning is in urgent need of documented information that can be of help in determining the future role of comprehensive health planning and in particular the role of the 314(a) agencies. Mr. Waters has had considerable experience, academically and in the field, in regard to comprehensive health planning functions. Dr. Martin Keller and I, as well as many others, are pleased that Mr. Waters is addressing himself to the practical approach of studying the past, present, and future concepts and potentials for comprehensive health planning and the 314(a) role.

Therefore, I would like to recommend that all of you cooperate with this study. I encourage you to complete the enclosed questionnaire in a candid manner and return it as soon as possible. I certainly will do so myself.

SM/Jh

Enclosure
On February 14, 1974 we wrote to you regarding a new health planning study, one which we believe if successfully carried out will contribute to the advancement of health planning. If you have already done so, we would be most appreciative if you would set aside a little time to complete and return the questionnaire as soon as possible. In case it is needed, we are enclosing another questionnaire for you.

Most of your counterparts have already returned the questionnaire to us. However, unless we receive a response from every State, we will have no way of determining whether the aggregate of responses is representative of all State CIP Agencies.

Please help us to make this study truly representative. We are most grateful to you for your prompt attention to this matter.

Warmest regards.

Very sincerely yours,

William J. Waters
Teaching Associate

Martin D. Keller, M.D., Ph.D.
Head, Division of Community Health
Professor, Preventive Medicine

Enclosure
May 21, 1974

TO: Directors, State Comprehensive Health Planning Agencies

FROM: William J. Waters, Teaching Associate

RE: Survey of Comprehensive Health Planning at the State Level

We are pleased to report that 42 of the 50 State CHIP Agencies (i.e., 84 percent) responded to our survey by April 15th, the reporting deadline. To those of you who participated, we extend our sincere thanks for your cooperation.

In Dr. Keller's introductory letter of February 14th, we promised to report the results of the survey to you by May 31. Please find enclosed that report which we have entitled: "Preliminary Descriptive Report". This report consists of summary descriptions (i.e., means and percents) of the response frequencies which we tabulated. The results are presented on the questionnaire format that was originally sent to you.

This survey is a component of a larger dissertation research project. A statistical and conceptual analysis of the survey results is presently in progress. It is hoped that the total research project can be completed by August of this year.

The enclosed Preliminary Report is being forwarded to you for the private use of the State CHIP Agency. Please do not publicly review, abstract, or quote it without the agreement of the author.

If you have any questions please contact me at (614) 422-1937.
Survey
of
Comprehensive Health Planning
At The State Level

PRELIMINARY DESCRIPTIVE REPORT

THE OHIO STATE UNIVERSITY
Department of Preventive Medicine
Division of Community Health
410 WENT WORTH AVENUE
COLUMBUS, OHIO 43210

*The issue of this document does not constitute a formal publication. It should not be reviewed, abstracted, or quoted without the agreement of the author.
CONTENTS:

Section I - Background Questions

Section II - Factual Questions About Planning Activities

Section III - Questions About Personal Perceptions
Percent WhichResponded Affirmatively To Each Response Option

1. How many years have you been employed by the State CHP Agency for which you currently serve as director? (Fill-in the appropriate number)

$$\bar{x} = 3 \cdot 8$$ years
$$s = 2 \cdot 2$$

2. Have you had training in the formal field or subject matter of planning (i.e., concepts, and methodology)? (Circle one)

1. yes—as part of my graduate education
2. yes—as part of a continuing education program
3. no

3. How many full-time (or full-time equivalent) professional staff members are currently employed by your Agency? (Fill-in the appropriate number)

$$\bar{x} = 8 \cdot 3$$ persons
$$s = 6 \cdot 2$$

4. Which one of the following alternative committee structures best characterizes the organization of your Agency's work? (Circle one)

1. problems, goals, priorities, and tactics committees
2. children and youth, adult, and old-age committees
3. inner-city, suburban, rural committees
4. facilities, manpower, services, and environment committees
5. other (specify) (e.g., Agency, Plan Document, Project Review, and Executive Committees)

5. Which one of the following types of agencies best characterizes the agency within which your organization is located? (Circle one)

1. Governor's office
2. Departments of Planning, Urban Affairs, or Development
3. Interdepartmental commission
4. Department of social or human services
5. Health Department
6. Other (specify) (e.g., separate state agency)

6. Has your Agency received statutory authority (i.e., legislative recognition and mandate) from your State Government? (Circle as many as apply)

1. yes—by way of legislation tailored specifically for CHP
2. yes—by way of legislation establishing a "certificate of need" program
3. no
4. $1$ and $2$

*Percent rounded to the nearest whole percent.
11 - SOME FACTUAL QUESTIONS ABOUT YOUR AGENCY'S PLANNING ACTIVITIES

2. Has your Agency disseminated (e.g., by way of a memorandum, position paper, or work plan) among its staff and council members an agreed-upon modern operational (i.e., procedures) for preparation of the State health plan? (Circle one)

72% 1. yes
19% 2. currently preparing to do so
7% 3. no—but intend to in the future
2% 4. no

8. Has your Agency formally charged a professional staff member, a task force, or a committee with the responsibility of evaluating and/or recommending changes in the planning cycles or plan development procedures of your Agency? (Circle one)

45% 1. yes—a standing committee
10% 2. yes—a task force
33% 3. yes—a staff member
10% 4. no—but intend to in the future
2% 5. no

9. Which of the following situations best characterizes your Agency's position with respect to the formulation of health and health service problem priorities (e.g., the relative priority of stroke vs. auto accidents; of inadequate financing vs. maldistribution, etc.)? (Circle one)

50% 1. agreed-upon problem priorities have been established and documented (i.e., included in the health plan, or communicated to the Governor).
26% 2. formal methods and criteria for establishing problem priorities have been agreed upon, but problem priorities have not, as yet, been established.
24% 3. the question of problem priorities has been discussed but no formal methods and criteria for establishing them have been agreed upon, as yet.
0% 4. the question of problem priorities has not been formally addressed, as yet.

10. Which one of the following choices best characterizes your Agency's position with regard to defining the "health system" (i.e., the set of activities and events which constitute the object of your planning activities)? (Circle one)

36% 1. Our Agency has arrived at a formal, agreed-upon definition of the "health system" which we utilize in our ongoing planning activities.
52% 2. The issue of a "health system" definition has been brought up and discussed in our Agency, but no formal resolution of the question has been reached.
12% 3. The task of establishing an agreed-upon definition of the "health system" has not, as yet, been addressed by our Agency.
11. Has your Agency instituted a formal procedure for selecting health goals? (Circle as many as apply)

26% 1. yes—opinion surveys method
g 8% 2. yes—nominal groups method
g 5% 3. yes—expert judgement method
317 4. yes—other (specify) (e.g., combined front of staff, committees, and council)
12% 5. currently in the process of establishing such procedures
27 6. no—but intend to in the future
6% 7. no

12. Which one of the following situations best characterises your Agency's present position with regard to the establishment and ranking of health goals? (Circle one)

41% 1. Our Agency has selected a set of health goals, and has formally priority-ranked them.
38% 2. Our Agency has established a number of health goals, but we have not ranked them.
14% 3. One broad, general health goal statement has been formally adopted by our Agency.
7% 4. Health goals, per se, have not as yet been established by our Agency.

13. Does your Agency currently have an agreed-upon set of health objectives or targets (i.e., quantified, time-related expressions or translations of goals which are used to measure progress toward reaching goals, for example: a decrease by 75 percent the number of highway crash deaths in the State by 1986)? (Circle one)

26% 1. yes
40% 2. currently being derived
17% 3. no—but intend to derive such in the future
17% 4. no

14. In general, which one of the following statements best characterises your Agency's progress in terms of analysing alternative courses of action (i.e., various options available for reaching a goal or objective)? (Circle one)

19% 1. Alternatives have been identified, and analyzed, and priority ranked.
10% 2. Alternatives have been identified and analyzed (via benefit/cost analysis, feasibility checks, and other procedures), but not priority ranked.
45% 3. Various alternatives have been identified, but not completely analyzed or priority ranked.
26% 4. Alternatives have not formally been identified in our planning process, as yet.
15. In which of the following areas, if any, has your Agency formally (i.e., on record) made specific (i.e., detailing who, what, where and when) action recommendations? (Circle as many as apply)

Total yes = 77%

1. the general environment (e.g., land use, etc.)
2. environmental health services (e.g., sanitation, etc.)
3. personal health services (e.g., medical checkups, etc.)
4. health facilities
5. environmental health services (e.g., sanitation, etc.)
6. health finance
7. no specific action recommendations have been formally made, yet, but some non-specific action recommendations have been formally made
8. non-final action recommendations (specific or otherwise) have been made as yet.

16. Has your Agency formally established generic criteria and procedures for evaluating those action recommendations which are actually implemented? (Circle one)

1. yes
2. currently doing so
3. no—but intend to do so in the future
4. no

17. Which one of the following choices best characterizes your Agency with regard to health plan document development? (Circle one)

1. comprehensive health plan document completed (e.g., both goals and alternative actions, and covering many categorical issue areas)
2. formal health plan document completed (e.g., environmental health plan, or goal statement, etc.)
3. no health plan document completed

18. Which, if any, of the following time frames have been formally adopted by your Agency as planning horizons (i.e., not the target date for completion of the plan, but that time in the future which serves as the temporal planning target or reference point)? (Circle as many as apply)

1. one year
2. five years
3. ten years
4. other
5. no time frame formally selected as yet

19. Which of the following items are characteristic of your Agency’s health information system?

A. Auspice of your data system (Circle one)

1. Our Agency primarily collects its own data.
2. Our Agency primarily utilizes the services of another division or agency to fulfill its data collection responsibilities.
### 19. Continued

#### B. Nature of your data system (Circle as many as apply)

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>28%</td>
<td>Computerized record storage and linkage</td>
</tr>
<tr>
<td>24%</td>
<td>Computerized record storage</td>
</tr>
<tr>
<td>19%</td>
<td>Manual routine compilation of standard sources of data</td>
</tr>
<tr>
<td>25%</td>
<td>Manual ad hoc collection of needed data</td>
</tr>
<tr>
<td>0%</td>
<td>Little quantified data presently being collected</td>
</tr>
</tbody>
</table>

#### Percentages based on the highest number circled

---

#### 20. Which one of the following percentage categories best approximates the percentage of your staff's total time that was devoted to applied research or technical activities (i.e., special study and "homework" as opposed to council, committee, community, coordinative, liaison, grant, supervisory, critical and other types of activities) during the past three months? (Circle one)

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>9%</td>
<td>0 - 5 percent</td>
</tr>
<tr>
<td>14%</td>
<td>6 - 10 percent</td>
</tr>
<tr>
<td>24%</td>
<td>11 - 25 percent</td>
</tr>
<tr>
<td>19%</td>
<td>26 - 30 percent</td>
</tr>
<tr>
<td>16%</td>
<td>31 - 50 percent</td>
</tr>
<tr>
<td>17%</td>
<td>More than 50 percent</td>
</tr>
</tbody>
</table>

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#### 21. Which of the following types of technical studies has your agency completed either internally or by way of contract? (Circle as many as apply)

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>57%</td>
<td>Age and/or county-specific population projections for the 1980s.</td>
</tr>
<tr>
<td>26%</td>
<td>State population sample survey (either examination or interview) to determine the present magnitude of disease and disability.</td>
</tr>
<tr>
<td>29%</td>
<td>The effect of health services in the State on the health level of the population.</td>
</tr>
<tr>
<td>17%</td>
<td>The effect of certain environmental agents or variables in the State on the health level of the population.</td>
</tr>
<tr>
<td>38%</td>
<td>Methods for containing health care costs.</td>
</tr>
<tr>
<td>24%</td>
<td>Benefit/cost ratio of certain program alternatives.</td>
</tr>
<tr>
<td>64%</td>
<td>Health manpower resource requirements for the future.</td>
</tr>
<tr>
<td>64%</td>
<td>Health facility resources requirements for the future.</td>
</tr>
<tr>
<td>12%</td>
<td>No technical studies completed as yet.</td>
</tr>
</tbody>
</table>

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#### 22. Does your Agency make a conscious and deliberate attempt to stay abreast of epidemiologic research findings (e.g., causes of diseases, efficacy of treatments)? (Circle one)

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>14%</td>
<td>Yes—we have a formal procedure for doing so (e.g., staff assignment, or task force appointment)</td>
</tr>
<tr>
<td>60%</td>
<td>Yes—we keep abreast informally</td>
</tr>
<tr>
<td>14%</td>
<td>No—but intend to in the future</td>
</tr>
<tr>
<td>12%</td>
<td>No</td>
</tr>
</tbody>
</table>
23. Which of the following variables have been included in your Agency's deliberations to date (i.e., scope of study)? (Circle as many as apply)

- [95%] 1. demographic characteristics
- [93%] 2. socio-economic characteristics
- [67%] 3. the health level of the population
- [24%] 4. genetic characteristics of the population
- [52%] 5. human health attitudes and behavior
- [90%] 6. the personal health service system
- [64%] 7. the environmental health service system
- [31%] 8. physical, chemical, and biological agents in the environment
- [2%] 9. none of the above
- [10%] 10. all of the above

24. Circle one of the following reasonably up-to-date data sets which are readily accessible to your Agency and which are presently being utilized by your Agency. (Circle as many as apply in each of the following sections, A – I)

**A. Demographic Data**

- [98%] 1. Total State population
- [95%] 2. Total population for each county in the State
- [93%] 3. State population by age, sex, race, and socio-economic status
- [93%] 4. County populations by age, sex, race, and socio-economic status
- [98%] 5. Death rates within the State
- [98%] 6. Birth rates within the State
- [71%] 7. Net migration figures for the State
- [76%] 8. Five to ten year projection of the State population by age categories
- [12%] 9. Other (Specify) ____________________________

- [0%] 10. No demographic data presently being collected and utilized
- [0%] 11. Demographic data not considered important

**B. Health Status Data**

- [86%] 1. The ten or so leading causes of mortality in the State
- [71%] 2. The ten or so leading causes of morbidity in the State
- [45%] 3. The ten or so leading causes of disability in the State
- [90%] 4. The State infant mortality rate
- [79%] 5. Incidence and prevalence of communicable diseases in the State
- [79%] 6. Age-specific State mortality rates
- [71%] 7. Race-specific State mortality rates
- [76%] 8. Mortality and morbidity by geographic location in the State

- [7%] 9. Other (Specify) ____________________________

- [2%] 10. No health status data presently being collected and utilized
- [0%] 11. Health status data not considered important
C. Attitudinal and Behavioral Data

19%  1. Level of personal illness discomfort experienced by the State’s population
43%  2. Level of satisfaction on the part of the State’s population with the way in which health services are organized, financed, and delivered
50%  3. Opinion of the State’s population with regard to the most pressing State health problems (e.g., mental illness, fatal auto accidents)
29%  4. Proportion of the State’s population that engage in certain health promoting or protecting practices
12%  5. Other (Specify) ______________________________________________________
31%  6. No attitudinal and behavioral data is presently being collected and utilized
0%   7. Attitudinal and behavioral data not considered important

D. Genetic Data

29%  1. Incidence and prevalence of genetic disorders in the State
5%   2. Other ______________________________________________________
67%  3. No genetic data presently being collected or utilized
2%   4. Genetic data not considered important

E. Environmental Data

48%  1. State air quality
50%  2. State water quality
48%  3. State food quality
45%  4. State housing quality
12%  5. Other (Specify) ______________________________________________________
45%  6. No environmental data presently being collected or utilized
2%   7. Environmental data not considered important

F. Health Services Data (by type, and/or location, and/or utilization in the State)

88%  1. Medical (curative) services 59% 8. Health education services
55%  2. Environmental health services 71% 9. Psychiatric services
93%  3. Emergency health services 5% 10. Other (Specify) ______________________________________________________
71%  4. Home care services
69%  5. Rehabilitation services 52 11. No health service data presently being collected and utilized
74%  6. Laboratory services
55%  7. Detection and screening services 0% 12. Health service data not considered important
G. **Health Manpower Resources Data** (by total number, and/or specialty, and/or location in the State)

<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>93%</td>
<td>1. Active M.D.s</td>
<td>79%</td>
</tr>
<tr>
<td>93%</td>
<td>2. Active D.O.s</td>
<td>79%</td>
</tr>
<tr>
<td>90%</td>
<td>3. Active R.N.s</td>
<td>17%</td>
</tr>
<tr>
<td>64%</td>
<td>4. Inactive but nonretired R.N.s</td>
<td>5%</td>
</tr>
<tr>
<td>93%</td>
<td>5. Active Dentists</td>
<td></td>
</tr>
<tr>
<td>61%</td>
<td>6. Active Pharmacists</td>
<td>0%</td>
</tr>
<tr>
<td>76%</td>
<td>7. Active allied health personnel</td>
<td></td>
</tr>
</tbody>
</table>

8. Health manpower education and training programs

9. Other (Specify)

10. No health manpower resources data presently being collected or utilized

11. Health manpower data not considered important

H. **Health Facility Resources Data** (by number, and/or location, and/or beds, and utilization in the State)

<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>98%</td>
<td>1. General hospitals</td>
<td>29%</td>
</tr>
<tr>
<td>90%</td>
<td>2. Psychiatric hospitals</td>
<td></td>
</tr>
<tr>
<td>95%</td>
<td>3. Nursing homes</td>
<td>2%</td>
</tr>
<tr>
<td>90%</td>
<td>4. Community Mental Health Centers</td>
<td>0%</td>
</tr>
<tr>
<td>70%</td>
<td>5. Neighborhood health centers</td>
<td></td>
</tr>
</tbody>
</table>

6. Other (Specify)

7. No health facility resources data presently being collected

8. Health facility resources data not considered important

I. **Health Expenditures and Costs Data**

<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>55%</td>
<td>1. The total annual expenditures on health in the State by all public and private sources.</td>
<td></td>
</tr>
<tr>
<td>45%</td>
<td>2. The proportions of the total annual health expenditure in the State that fall within the major subdivisions of the health sector.</td>
<td></td>
</tr>
<tr>
<td>43%</td>
<td>3. The average unit cost of the major health services and their component parts within the State.</td>
<td></td>
</tr>
<tr>
<td>43%</td>
<td>4. The breadth and depth of health insurance coverage in the State.</td>
<td></td>
</tr>
<tr>
<td>12%</td>
<td>5. The cost in lost productivity by the major causes of mortality and morbidity in the State.</td>
<td></td>
</tr>
<tr>
<td>12%</td>
<td>6. Other (Specify)</td>
<td></td>
</tr>
</tbody>
</table>

7. No health expenditures and costs data presently being collected and utilized.

8. Health expenditures and costs data not considered important.
26. If your Agency has written a comprehensive health plan document, please list its major section headings or attach a photocopy of the plan's table of contents:

432 responded to this question

III - SOME QUESTIONS ABOUT YOUR PREFERENCES OF PLANNING AND YOUR AGENCY

26. Please rank the three most important responsibilities of your Agency, as you see them. (Rank the most important first, then 2, 3, 4, etc.)

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<table>
<thead>
<tr>
<th>Rank</th>
<th>Description</th>
<th>Weighted Ranking</th>
<th>Unweighted Ranking</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Managing or developing health programs</td>
<td>12</td>
<td>12</td>
</tr>
<tr>
<td>2</td>
<td>Securing additional health funding for the State</td>
<td>6</td>
<td>6</td>
</tr>
<tr>
<td>3</td>
<td>Establishing and promoting a health service</td>
<td>4</td>
<td>4</td>
</tr>
<tr>
<td>4</td>
<td>Making health policy decisions</td>
<td>17</td>
<td>17</td>
</tr>
<tr>
<td>5</td>
<td>Conducting a continuous planning process</td>
<td>63</td>
<td>17</td>
</tr>
<tr>
<td>6</td>
<td>Regulating the health service system</td>
<td>20</td>
<td>20</td>
</tr>
<tr>
<td>7</td>
<td>Implementing recommended health service standards</td>
<td>0</td>
<td>10</td>
</tr>
<tr>
<td>8</td>
<td>Fostering an active health planning program</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>9</td>
<td>Reviewing and commenting on health service programs</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>10</td>
<td>Controlling health care costs and expenditures</td>
<td>6</td>
<td>0</td>
</tr>
</tbody>
</table>

---

27. Which of the following concepts would you include in the idea of "comprehensive" as it relates to health planning? (Circle as many as apply)

1. Monitoring the total health system
2. Weighing all health problems of the total State population
3. Considering the full range of possible health goals and targets
4. Balancing selected health goals and targets in order to insure consistency
5. Weighing all actions or intervention alternatives
6. Taking into account roll-over or secondary effects of action or intervention alternatives
7. Integrating recommended actions or interventions
8. None of the above
9. All of the above
Please indicate which of the following statements related to comprehensive health planning you agree with. (Circle each with which you agree)

62% 1. The primary focus of health planning should be the health level of the population.
86% 2. Evaluation of implemented planning recommendations is a necessary and critical part of the planning process.
40% 3. The formulation of goals is grounded primarily in values, not in facts.
95% 4. Planning is a continuous, cyclical process.
79% 5. The order or sequence of planning steps is an important consideration in the planning process.
69% 6. Problems, goals, objectives and action recommendations all need to be prioritized in the planning process.
69% 7. When prevention is feasible, it is in most cases the intervention or action of choice (vs. detection, treatment, rehabilitation).
83% 8. The planner must be concerned with both ends, means, and their relationship in the planning process.
79% 9. Projecting or forecasting the "health system" is an essential part of the planning process.
81% 10. The direct purpose of planning is to improve decision-making.

Are you personally satisfied with your Agency's progress with respect to planning operations and procedures? (Circle as many as apply)

45% 1. yes
12% 2. no—personal lack of preparation in planning concepts and procedures has been an obstacle.
17% 3. no—staff lack of preparation in planning concepts and procedures has been an obstacle.
43% 4. no—other obstacles (Specify)(e.g., lack of funds, lack of planning concepts and criteria, lack of available or accessible staff)

Do you have any brief comments in regard to this survey questionnaire in general, or any of its specific questions?

38% responded to this question

Date: May 1974
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Health Planning Studies


State Comprehensive Health Planning Program Validation.


Generic Research Methods


