

DOCUMENT RESUME

ED 199 391

CE 027 760

AUTHOR Starr, Harold: And Others
TITLE Comprehensive Planning Task. Description of Procedures.
INSTITUTION Ohio State Univ., Columbus. National Center for Research in Vocational Education.
SPONS AGENCY Office of Vocational and Adult Education (ED), Washington, D.C.
BUREAU NO 498MH00014
PUB DATE 81
CONTRACT 300-78-0032
NOTE 47p.

EDRS PRICE MF01/PC02 Plus Postage.
DESCRIPTORS Coordination: *Data Analysis: *Data Collection: *Educational Planning: *Educational Research: Evaluation Criteria: Methods: Planning: Program Improvement: *Research Methodology: Research Projects: School Districts: Site Analysis: Site Selection: State Programs: Synthesis: *Vocational Education

ABSTRACT

This report presents an overview of the procedures used to produce the findings contained in three reports concerning vocational education coordination and planning. Following a summary of the findings of barriers and facilitators to coordination in vocational education planning, a description of the basic procedures for this research effort is provided. It includes the six specific selection criteria for selecting field site states from which to gather data, criteria for choosing pertinent documents containing information about planning coordination, a list of types of individuals selected for interviews, and an outline of procedures used for analyzing and synthesizing data. After a summary of the findings of a study on conditions affecting vocational education planning and improving the technology of vocational education planning, an overview of the procedures used to complete the study is provided. These procedures included identification of key issues and areas in planning; establishment of logistical arrangements; correction of information by visitation, observation, and document review; and information analysis and synthesis. (Appendixes contain sample documents secured from two states and from local schools and sample forms for summarizing field site evidence of planning activities.) (MN)

* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *

ED199391

COMPREHENSIVE PLANNING TASK
DESCRIPTION OF PROCEDURES

Harold Starr
Harold Merz
Jessica Jahnke

The National Center for Research in Vocational Education
The Ohio State University
1960-Kenny Road
Columbus, Ohio 43210

1981

U.S. DEPARTMENT OF HEALTH,
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION

THIS DOCUMENT HAS BEEN REPRO-
DUCED EXACTLY AS RECEIVED FROM
THE PERSON OR ORGANIZATION ORIGIN-
ATING IT. POINTS OF VIEW OR OPINIONS
STATED DO NOT NECESSARILY REPRESENT
OFFICIAL NATIONAL INSTITUTE OF
EDUCATION POSITION OR POLICY

FUNDING INFORMATION

Project Title: The National Center for Research in Vocational Education, Applied R&D Function, Comprehensive Planning

Contract Number: 300780032

Project Number: 498MH00014

Educational Act Under Which the Funds Were Administered: Education Amendments of 1976, P.L. 94-482

Source of Contract: U.S. Department of Education, Office of Vocational and Adult Education, Washington, D.C.

Contractor: The National Center for Research in Vocational Education, The Ohio State University, Columbus, Ohio 43210

Executive Director: Robert E. Taylor

Disclaimer: This publication was prepared pursuant to a contract with the Office of Vocational and Adult Education, U.S. Department of Education. Contractors undertaking such projects under Government sponsorship are encouraged to express freely their judgment in professional and technical matters. Points of view or opinions do not, therefore, necessarily represent official U.S. Department of Education position or policy.

Discrimination Prohibited: Title VI of the Civil Rights Act of 1964 states: "No person in the United States shall, on the ground of race, color, or national origin, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving Federal financial assistance." Title IX of the Education Amendments of 1972, Public Law 92-318, states: "No person in the United States shall, on the basis of sex, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any education program or activity receiving Federal financial assistance." Therefore, the National Center for Research in Vocational Education Project, like every program or activity receiving financial assistance from the U.S. Department of Education, must be operated in compliance with these laws.

The National Center Mission Statement

The National Center for Research in Vocational Education's mission is to increase the ability of diverse agencies, institutions, and organizations to solve educational problems relating to individual career planning, preparation, and progression. The National Center fulfills its mission by:

- Generating knowledge through research
- Developing educational programs and products
- Evaluating individual program needs and outcomes
- Providing information for national planning and policy
- Installing educational programs and products
- Operating information systems and services
- Conducting leadership development and training programs

TABLE OF CONTENTS

FOREWORD.	Page v
EXECUTIVE SUMMARY	vi
INTRODUCTION.	1
Organization of the Report.	1
SECTION I: COORDINATION IN VOCATIONAL EDUCATION PLANNING: BARRIERS AND FACILITATORS.	2
Summary of Findings	2
Overview of Procedures.	3
Selecting Field Site States.	3
Obtaining Pertinent Information.	4
Analyzing and Synthesizing Data.	9
SECTION II: CONDITIONS THAT AFFECT VOCATIONAL EDUCATION PLANNING, AND IMPROVING THE TECHNOLOGY OF VOCATIONAL EDUCATION PLANNING: FINDINGS AND PROCEDURES	10
Summary of Findings	10
Overview of Procedures.	11
Identification of Key Issues and Areas of Planning	11
Establishment of Logistical Arrangements	13
Collection of Information by Visitation, Observation, and Document Review	14
Information Analysis and Synthesis	17
APPENDIX A: PLANNING RELATED DOCUMENTS COLLECTED FROM TWO STATES	20
APPENDIX B: SAMPLE OF DOCUMENTS SECURED FROM A LOCAL SCHOOL	26

APPENDIX C: SAMPLE RECORDING FORMS FOR SUMMARIZING FIELD SITE EVIDENCE OF PLANNING ACTIVITIES	29
BIBLIOGRAPHY.	34

FOREWORD

Comprehensive planning has been identified as an essential ingredient in the collective efforts of state and local education agencies to increase the responsiveness of vocational education. This report describes in summary form, the procedures that were used to produce the findings and conclusions that are found in three related National Center reports dealing with aspects of comprehensive vocational education planning, and that were produced as a result of two years of research.

We would like to thank the approximately 500 persons in the states of Colorado, Texas, Georgia, Kansas, Oklahoma, Wisconsin, West Virginia, and Florida, who contributed their time, expertise, and knowledge to this effort.

Special appreciation is extended to Drs. Mary Ellis (President, Ellis Associates), Alberto Cardenas (Associate Professor, Pan American University), and James Hale (Associate Professor, University of Florida) who provided methodological assistance to staff in the conduct of this research.

Robert E. Taylor
Executive Director
National Center for Research
in Vocational Education

EXECUTIVE SUMMARY

This report describes the procedures used by the Comprehensive Planning Task during the past two years. Section I of the report presents a summary of the procedures that produced findings about coordination in vocational education planning. The description of procedures in Section I also includes a discussion about: (a) how field sites were selected; (b) how information about coordination in vocational education planning was obtained in the field sites; and, (c) how the obtained information was analyzed and synthesized. Section II presents a summary of the procedures that were used to produce findings about conditions affecting vocational education planning, and the context and realities of vocational education planning at the local level. The description of procedures in Section II also includes a description of: (a) how key issues in vocational education planning were derived; (b) how the Task established arrangements for collecting information about local level vocational education planning; (c) the scope of information used in generating the findings; and, (d) how the collected information was analyzed and synthesized. Lastly, factors affecting the findings are presented.

INTRODUCTION

This document presents an overview of the procedures that were used to produce the findings contained in three related reports. These reports are: Coordination in Vocational Education: Barriers and Facilitators,¹ Conditions Affecting Vocational Education Planning: Implications for Administration and Research,² and Improving the Technology of Local Level Vocational Education Planning.³

The first report resulted from research carried out during 1979. The two other reports resulted from research carried out during 1980. The 1980 research represented an effort to verify, modify, and extend the 1979 findings about coordination in vocational education planning, and about the process and practices of vocational education planning.

Organization of the Report

The present report consists of two sections in addition to the introduction. Section I presents a brief summary of the findings of the study about coordination in vocational education planning, and an overview of procedures used to formulate the findings. Section II presents a brief summary of the current year's findings about conditions affecting vocational education planning, and the context and realities of local level planning. This section also provides an overview of procedures used to formulate these findings.

1. Harold Starr, et al., Coordination in Vocational Education Planning: Barriers and Facilitators (Columbus, Ohio: The National Center for Research in Vocational Education, The Ohio State University, 1980).

2. Harold Starr, et. al., Conditions Affecting Vocational Education Planning: Implications for Administration and Research (Columbus, Ohio: The National Center for Research in Vocational Education, The Ohio State University, 1981).

3. Harold Merz, et. al., Improving the Technology of Local Level Vocational Education Planning: (Columbus, Ohio: The National Center for Research in Vocational Education, The Ohio State University, 1981).

SECTION I

COORDINATION IN VOCATIONAL EDUCATION PLANNING: BARRIERS AND FACILITATORS

Summary of Findings

This study focused on the process of coordination that results in a statewide vocational education plan.⁴ Such a plan represents a negotiation, accommodation, and integration of all the diverse interests and concerns of agencies and individuals involved in the future and direction of vocational education.

The establishment of effective coordinative relationships is an essential component of vocational education planning. This study describes numerous ways to facilitate the coordinative relationships. The examples that were described were found in the literature or were suggested by persons who are currently involved in coordination activities in support of vocational education planning.

Also identified were barriers to effective coordinative relationships for vocational education planning purposes. The reported barriers represent those that seemed to be common across the states participating in the research effort and that seemed to be most important in impeding effective coordination in planning.

Lack of direction and uncertainties about roles and responsibilities for coordination in support of statewide vocational education planning, the compliance orientation toward planning, excess specificity in legislation, restrictive funding, burdens associated with the collection and transmission of data, conflicting definitions and labeling of special populations, differences in planning cycles and scheduling, differences in organizational objectives, and the influences of environmental conditions surrounding vocational education planning were some of the major barriers reported by participants that affect coordination in vocational education planning at the local level, at the state level, and between local and state levels. These barriers and their effects upon coordination were described in an attempt to provide a better understanding of the current state of coordination in vocational education planning.

4. Note: For operational definitions of coordination and vocational education planning used in this study and the study described in section II see Coordination in Vocational Education Barriers and Facilitators, pp. 3, 28-31.

Overview of Procedures

The basic procedures for this research effort included: developing and implementing procedures to obtain pertinent information about coordination in vocational education planning, and developing and implementing procedures to analyze and synthesize the document reviews and information obtained from dialogues in the cooperating field site states.

Selecting Field Site States

Eight states were selected, using six specific selection criteria. The six criteria were intended to assure that states of varying characteristics were represented. The six selection criteria are described as follows:

- o Governance Structure: Addresses the location of the State Division of Vocational Education (SDVE) in the education administrative system of the state. This criterion was concerned with whether the state agency responsible for vocational education is an independent body or whether it is within the state department of education. Further, if it was in the state department of education, there was concern for its relative location within the administrative hierarchy.
- o Number and Characteristics of Local Education Agencies (LEAs): Reflects the concern for the relative number of LEAs in the state, the characteristics of those LEAs in terms of size, whether they were rural or urban, and their economic base.
- o Geographic Distribution of LEAs: Was concerned with the geographic density of LEAs within the state.
- o Degree of Industrialization of the State or LEAs: Was a concern since industrialization may promote a dynamism in the labor market and increase the need for coordination in planning vocational education.
- o Planning Capabilities of State Divisions of Vocational Education: Was concerned with the extent to which a formal attempt is made to rationally plan vocational education. This was a concern since there are varying levels of planning capabilities across states, and differences may give rise to different kinds of barriers and facilitators to coordination.

- o Emphasis on Evaluation: The evaluation function is integral to effective planning in vocational education. It was necessary to represent different levels of emphasis given to coordination in doing evaluation activities.

A list of candidate states were prioritized using the six criteria, and the following states were selected as field site states: Florida, Wisconsin, Colorado, Oklahoma, Kansas, Texas, Georgia, and West Virginia.

Each of the eight state divisions of vocational selected a staff person to coordinate project activities within the state.

Obtaining Pertinent Information

Two mutually supportive strategies were used to collect information about coordination in planning vocational education. These were document reviews and guided dialogues.

Prior to conducting dialogues in the states a variety of pertinent documents were collected from each state. The selection of these documents was based on the relevance of their content for several purposes including the following:

- o Gaining familiarity with the vocational education system in each state in order to understand the context for coordination
- o Developing acquaintance with the governance structures for vocational education in each state
- o Acquiring specific examples of facilitative mechanisms to coordination or examples which indicate successful or unsuccessful attempts to coordinate and
- o Identifying potential avenues for acquiring further information

A sample list of documents from two states appears in Appendix A.

The review of these documents, in addition to providing valuable information in preparation for the interviews, functioned as a preassessment of planning and coordination in each state. As a result, each interviewer went into the dialogue situation with an informed awareness of vocational education operations and concerns in the respective state.

Immediately after receiving documents from the states, the documents were cataloged, filed and prepared for data abstraction. Preparation for data abstraction required the development of recording sheets for recording abstracted data. Six types of recording sheets were developed and instructions for using these recording sheets were prepared. The title and focus of each recording sheet are listed in table 1.

Preparing for the dialogues required several preparatory activities. These activities included: (a) the selection of interviewers and interviewees; (b) reviewing materials in preparation for the dialogues; and, (c) preparing a topical outline to guide dialogue discussion. These are briefly discussed in the following paragraph.

Using specific criteria supplied by the project for guidance, field site coordinators selected a variety of persons to be interviewed. At the state level there were three kinds of individuals to be represented. The first group included individuals who were knowledgeable about, or who were working with information necessary to make planning decisions. These individuals included:

- o Individuals who were responsible for the preparation of the state's vocational education plan, or individuals who were responsible for the preparation of state vocational education budgets
- o Individuals whose assignments bridged the gap between state and local agencies in the area of planning and
- o Individuals who were responsible for obtaining information relative to state plan preparation

The next group of individuals were those functioning outside the state department of vocational education who represented groups at the state level that are immediately concerned with vocational education operations. These individuals included:

- o Representatives of the state advisory council for vocational education (SACVE)
- o Representatives of the state occupational coordinating committee (SOICC)
- o Members of the state plan group and
- o Representatives of the state board of education; representatives from the state agency for community colleges; and, representatives of regional education; human resource training groups (e.g., CETA), and the state employment services office

TABLE 1
RECORDING SHEETS.

Focus of Recording Sheets	Information Recorded on Sheet
FACILITATORS TO COORDINATION	Facilitators to Coordination. Type of Facilitation. Functional areas or activities affected.
CONCERN FOR COORDINATION	Descriptive phrase reflecting concern. Intended action to address concern. Comments about concern e.g. source of statement, persons involved.
PLANNING OR COORDINATION-RELATED BARRIERS, PROBLEMS, OR CONSTRAINTS	Planning or coordination related barriers, problems or constraints. Type of barrier, constraint or problem. Functional areas/activities affected.
PLANNING ACTIVITIES	Planning activities. Decision-focus of planning activity. Evidence of coordination to accomplish data planning activity.
PLANNING CONCERNS	Planning concern. Decision-focus of each concern. Need for coordination to address each concern.
COORDINATION PATTERNS	Coordination with whom, by whom. Comments on the purpose and nature of coordination. Classification of coordination into categories; interunit, interagency or between state and local agencies.

A similar set of criteria was used to select interviewees at the local level. Application of the criteria for the selection of interviewees resulted in nearly 400 persons being selected by the field site coordinators in the eight states. A breakdown of the interviewees by position is found in table 2.

The project team conducting the dialogues usually was comprised of at least three persons: a representative from the National Center assigned to the project; the field site coordinator from a state other than the one in which the interviews were being conducted; and a consultant interviewer from the state in which the interviews were conducted. Each performed a specific function on the interview team. The project representative from the National Center served as team leader and controlled the direction of the dialogue. The field site coordinators used the experience acquired in their own states as a base for eliciting relevant information; while in-state consultant interviewers joined the discussion to clarify responses and ask follow-up questions based on their experiences in the state. The consultant interviewers were persons who were familiar to the interviewees and their presence contributed to a relaxed atmosphere in the interview situation. However, before the data collection strategies could actually be implemented, extensive preparations were made.

For each type of person interviewed an outline of topics for a dialogue discussion was prepared. The outline addressed anticipated responses and potential areas for probing. The outline was specifically for the use of the interviewers and was tailored to fit the experiences of the interviewees and the content of the abstracted documents. The topical outlines were developed from a review of the documents previously obtained from each state. The document reviews required reading documents to identify pertinent information, recording this information according to prescribed guidelines, cross-checking the categorization of information with other members of the project staff to ensure commonalities of perspectives, and, filing the abstracted information by state name, and title of the respective recording forms. The abstracted information was used to prepare for the interviews and was then stored for later data synthesis purposes.

The data collection via dialogues required the following five activities: predialogue briefings for interviews; postdialogue discussions among interviewers; comparing information across dialogue sessions in each state; comparing dialogue information with data acquired from other sources; and recording and transcribing the dialogues.

TABLE 2

PARTICIPANTS IN THE DIALOGUE SESSIONS

State Staff--Vocational Education	Total
State Directors/Assistant Directors/Section Directors	25
Program Area Supervisors/Consultants	38
Planning/Budgeting/MIS Staff	29
Evaluation Staff	6
Disadvantaged/Handicapped Specialists	7
Equity Coordinators/RCU/Affirmative Action	11
Miscellaneous SDVE staff	18
State Staff-Related Departments--State Agencies	
Department of Public Instruction (nonvocational)	6
Board of Regents/Postsecondary Administrators	6
Department of Labor/Employment Security staff	4
Department of Economic Development staff	2
State Occupational Information Coordinating Committee staff	8
Miscellaneous	7
Local Staff	
Local Vocational Education Directors/Assistants	66
Area Vocational Technical School Directors	23
Community College Directors/Deans/Presidents	45
School Superintendents/Assistants	17
Principals/Assistant Principals	6
Guidance Counselors	6
CETA/Skill Center Administrators	5
Advisory Council/Involved Citizens	
State Advisory Council for Vocational Education members	16
Local Advisory Councils for Vocational Education members	13
School Board members	3
Miscellaneous business and industry representatives	1
State plan group members	4
Other Groups	
Teacher Educators	8

Analyzing and Synthesizing Data

The interview dialogues were recorded by hand in two states and on cassette tapes in six states. The recorded dialogues were later synthesized. The end result was an abundance of data from the states pertaining to barriers and facilitators to coordination in planning vocational education, and data about a range of vocational education problems and concerns.

The data transcripts were used to develop terse statements representing the coordination barriers and facilitators elicited, and to summarize the planning activities, problems, and concerns that were raised in the dialogues. This information was placed into pertinent and explanatory categories for reporting purposes. In order to reflect the appropriate context, however, these facts had to be accompanied by information that showed the limitations and exceptions of the data. The dialogue data were then combined with the data obtained from document reviews to more adequately reflect the barriers and facilitators to coordination in vocational education planning.

SECTION II

CONDITIONS THAT AFFECT VOCATIONAL EDUCATION PLANNING, AND IMPROVING THE TECHNOLOGY OF VOCATIONAL EDUCATION PLANNING: FINDINGS AND PROCEDURES

Summary of Findings

The report about conditions affecting vocational education planning identified the legislative and environmental contexts under which vocational education takes place. The federal legislative framework for vocational education planning was described, and key environmental context conditions affecting planning under this framework were discussed.

The context conditions set the background for a discussion of five basic issues in vocational education planning:

- o Preparation for specific available jobs should/should not be the major basis for planning vocational education.
- o The federally mandated state plan for vocational education does/does not serve as an adequate planning document for state vocational education agencies and local schools.
- o The mechanisms for coordination prescribed in the federal law do/do not improve vocational education planning.
- o A wide range of demographic, economic, and employment data are/are not used in vocational education planning.
- o The federal thrust for evaluation has/has not resulted in evaluation information being used in the planning process.

Each of the five issues was followed by a discussion. The discussion included key findings from fieldwork. Then, correct issue implications for research or administration were discussed. The report concluded with an overview of the current status of vocational education planning.

The report about improving the technology of local level vocational education planning identified the legislative and environmental contexts under which local vocational education planning takes place and noted context conditions that affect such planning. The context conditions served as a background for descriptions of the nature of interagency coordinative and collaborative relationships in support of planning, ways that data and evaluation are used in local planning, and local level planning and processes. The last section of the report listed a sample of suggested techniques, and training materials whose development could potentially improve the technology of local

vocational education planning and capacitate the skills of persons who do this planning.

Overview of Procedures

In the preceding year's effort conclusions about coordination in vocational education planning and about planning practices and issues were principally derived from opinions and judgments of a cross-section of persons involved with, or concerned about, the delivery of vocational education. This year it was decided that in order to verify, modify, or amplify, upon last year's findings, it was necessary to develop a different approach to deriving findings about vocational education planning.. This year the approach focused on seeking evidence that could support the previous year's findings about vocational education planning. In this instance, evidence was to be established from planning documentation and from detailed and credible descriptions from persons with vocational education planning, advisory, and supportive responsibilities.

Identification of Key Issues and Areas of Planning

The specification of the domain of inquiry was the first task that the project team faced. Basically, the aim of the study was to identify and describe local-level practices for planning and evaluation of vocational education programs, and to clarify key issues for research and administration that are posed by analysis of current practices. In essence, the study had both a descriptive and a normative thrust. The descriptive thrust embodied an observational analysis while the normative thrust required issue analysis.

The potential scope of the study was thus very broad: examination of planning processes, information utilization, and evaluation activities. However, the 1979 findings served to narrow the kinds of observations and issues that were ultimately selected for analysis.

In the previous year, the study team had identified six functional areas of planning. These function/areas are enumerated and described as:

- o Resource Allocation: The distributing of resources among competing users
- o Resource Acquisition: Obtaining resources to maintain effective system operations

- o Determining Instruction Program Mix: Determining the adequate mix of programs to meet the needs of clients within the constraints of limited resources and legislative requirements. Operationally, this function addresses the process used to determine what programs will be added
- o Program Improvement and Maintenance: Procedures for modifying programs to maintain or improve their adequacy and relevance
- o Instructional Supportive Services: Determining the noninstructional services provided to students to enable them to satisfactorily complete vocational programs and obtain employment (e.g., guidance, counseling, placement, tutorial services)
- o System Maintenance and Support: Ensuring the satisfactory operation of the administrative, instructional, and physical environments. This function addresses the activities and considerations needed to ensure continued operation of, and support for, the vocational education system

Because of resource and time constraints, the study team did not deem it advisable to fully investigate all of the six functional areas in depth. To delimit the scope of investigation, it was decided to place greatest emphasis on two functional areas: determining instructional program mix and program improvement and maintenance. Also, the study team determined that the selection of topics for inquiry would depend to a certain extent on the circumstances surrounding each institution to be visited. Rather than attempting to collect a complete set of information on all six functions or activities, the team visiting any particular institution would focus on these planning operations in which the administrator had been most active or recently involved. For example, there would not be much sense in going over program mix planning at an institution that had maintained the same programs and courses for twenty-five years. Forcing administrators to discuss activities minimal or nonexistent at these institutions would tend to introduce bias.

The next task consisted of specifying topical areas of planning to be researched. On the basis of the 1979 findings, the study staff identified five different topical areas of planning for investigation. The topical areas were: planning process and context concerns; information utilization; evaluation practices; interagency coordination linkages and relationships; and planning for special populations.

An information-gathering approach was then developed for determining evidence about planning processes and procedures actually used in the local areas visited. To accomplish this, staff reviewed summary findings from the 1979 effort, examined state and local planning documents, and read research reports on vocational education planning and related areas. Appendix B lists a sample of documents secured from local schools.

Then, procedures were designed for collecting observations about the five topical areas in the field site states. An important component of this design was the formulation of a procedure to collect data about each topical area and then to integrate the observational requirements into one overall approach. It was decided that an open-ended discussion format could be used to determine the planning operations of a local vocational education institution. Because of time constraints, it would be impractical to conduct five separate strands of information gathering in a local institution. The resulting process was designed to account for the type of staff (and their functions) that would be encountered in vocational education institutions. This process was tested by having staff role-play various levels of vocational education staff and observing their reactions and responses to the open-ended discussion format. Through several iterations, the format was revised and brought to a final form. The subsection on information collection describes the application and utilization of this technique in the field.

Establishment of Logistical Arrangements

Four of the eight states participating in the study of coordination in vocational education planning were invited and agreed to participate in the current study. These states were Florida, West Virginia, Wisconsin, and Oklahoma.

For the purposes of the study, local areas within each state needed to be selected for intensive visitation. These local areas were chosen on recommendation of the respective state division staff according to certain criteria. The local area would have to contain an appropriate mix of secondary and postsecondary institutions offering vocational education programs. It would encompass both urban and exurban geography. The boundaries of visitation would be constituted so that study staff would not have to travel more than a fifty-mile radius from the central city. The selection of area sites also took into account variations in economic stability and industrial mix in order to pose varying environmental contexts. As a result four primary regions of the country were chosen with the following characteristics:

- o An area with a stable, primarily Anglo-Saxon population base, experiencing below average unemployment, dependent on primary metal processing, chemical, and mining industry.
- o An area of dynamic population growth, with racial-ethnic characteristics similar to the United States average, experiencing average unemployment with considerable immigration, depending increasingly on tourism and service industries with little heavy industry and a substantial agricultural base.
- o An area of above-average population growth, with an above-average population of Native Americans, experiencing Americans, experiencing a long-term labor shortage resulting in an exceptionally low unemployment rate, depending on petroleum extraction and related industries.
- o An area of stable or slightly declining population, having a broad mixture of racial and ethnic representation, experiencing high unemployment (especially among minority youth), depending on heavy manufacturing industries.

Within these four regions comprising thirteen counties, a total of ninety-one persons were interviewed in thirty-one different secondary and postsecondary schools. In addition, seventy persons representing twenty-one noneducational agencies were also interviewed. Table 3 provides a breakdown of types of persons participating in the dialogue sessions from both educational and noneducational agencies in each of the four states.

With the assistance of staff from the state divisions of vocational education in the four states, the project team contacted administrators in school districts and postsecondary institutions in each geographic area. Project staff were given permission to have discussions with administrative and instructional staff at all levels of each institution. Appointments with key staff were arranged before field visitations took place. Appointments with other administrative and instructional staff were left open, to be arranged onsite. This was also the case regarding visits with other providers of vocational education-related services, such as CETA prime sponsors, vocational rehabilitation, economic development agencies and so forth.

Collection of Information by Visitation, Observation, and Document Review

Upon their arrival at the local institutions, the study team held an open-ended discussion with the chief administrative

TABLE 3

CATEGORIES OF PERSONS PARTICIPATING IN
DIALOGUE SESSIONS

<u>CATEGORY</u>	<u>STATE</u>				<u>TOTAL</u>
	WI	OK	WV	FL	
Local Director and/or Assistant Directors	6	4	10	10	30
Administrators of Postsecondary Vocational Institutions e.g. Presidents, Deans		1		2	3
Superintendents	2	5	6	2	15
Principals	2	2	2	4	10
Teachers	4		5		9
Local Vocational Coordinators	5				5
Placement Coordinator			4		4
Administrators- Student Services	3		1	1	5
Administrators- Instructional Services	1	1			2
Administrators- Community Services	1			1	2
Personnel in Research & Planning	4	2			6
Advisory Council Members (State/Local)	2		2		4
County Board of Education Members			3	7	10

TABLE 3 (Continued)

<u>CATEGORY</u>	<u>STATE</u>				<u>TOTAL</u>
	WI	OK	WV	FL	
Representatives of Business and Industry	3	6	3	3	15
CETA Directors	1	2		1	4
Personnel from Community Based Organizations	10	2	14		26
Employment Service		2		1	3
Vocational Rehabilitation	1	1	1	1	4

officers, or if those persons were unavailable, with the top administrators responsible for vocational education. These persons would be asked to describe the environmental context surrounding the institution, describe its vocational programs, and talk about their perspectives about the planning and administrative issues and activities related to vocational education. Through this discussion, study team members were introduced to the institution and were able to identify salient planning activities that were occurring or had occurred in the recent past. After the initial discussion, team members were able to identify other district or school staff who had significant roles in planning or evaluating vocational education. The team attempted to visit such individuals, whose role and title varied considerably from institution to institution and from state to state. For example, in one school district, most of the decisions were handled by the superintendent. In another district a vocational director and subordinates were delegated the responsibility for vocational programs. In addition to middle-management, the team also held open-ended discussions with teachers, whenever possible.

In all discussions, the study team attempted to secure information to confirm and complement that which it had learned from other persons. In most instances more than one study staff member participated in a dialogue. Written notes were kept by each member of the team participating in a particular discussion.

In addition to discussions, team members also observed administrative behavior. They attended certain meetings where planning activities were taking place. For example, in one area, project staff attended a meeting of a regional vocational education planning council. On another occasion, a staff person attended (by invitation) a state agency conference on developing interagency program linkages for human resource and vocational education. Observations of administrative behavior were complemented by demonstrations of administrative concern. For example, if someone was commenting about the burden of paperwork required to fulfill legislative compliance, project staff would ask to see the forms and how and when they were to be completed.

A third feature of the visitation was collection and review of appropriate local planning and evaluation documents. Review of those documents allowed subsequent discussions to be more focused and pointed. By doing so, the project team was also able in many cases to determine whether certain kinds of data were important or unimportant in planning.

Information Analysis and Synthesis

Upon their return from field visitation, staff edited their discussion notes.

This resulted in multiple sets of edited notes from each institution visited and from the majority of persons contacted in each institution. These notes were subjected to a content analysis, first by person; second by institution, and finally by state to derive cumulative totals.

The content analysis was conducted by summarizing the notes and transferring findings to a set of recording sheets. Staff developed recording sheets for each of the five topical areas included in the investigation. The items listed on the recording sheets are designed to identify administrative practices, the outcomes of these activities, problems or constraints, and other notes and comments. Appendix C presents a sample of the recording sheets for analysis conducted for the topical areas. At the individual institution level, appropriate categories were check-marked. Multiple responses were possible in all categories. Responses were totaled for school districts and institutions in each state and for all schools and agencies in the four states.

An exception to this procedure occurred in the analysis of coordination patterns. To provide the most meaningful analysis, a complete set of recording sheets was compiled for each of a number of relationships. For example, for each vocational institution, one sheet was used to record the relationship with other local vocational education institutions. Another sheet was utilized to record the vocational education relationship with CETA, and additional sheets were used for vocational education and other agencies visited by the study team. An analysis was derived for each relationship, rather than the sum total of all relationships.

After one member of the staff had compiled recording sheets, other staff persons who had visited the same agencies reviewed the sheets for accuracy of classification and completeness. Some follow-up phone calls to schools and agencies visited in the field were made to clarify information items.

When the recording sheets had been completed for each topical area, it was then possible to summarize activities, outcomes, constraints, and benefits that resulted from planning and evaluation activities in a sample of vocational education institutions. Utilizing the completed recording sheets, staff members prepared brief written summaries of the state-of-the-art of each topical area. These summaries were shared among staff for review and commentary.

The findings of the study were assembled using the written summaries. The report, The Technology of Vocational Education Planning, is a fairly straightforward exposition of material contained in the summaries. The other report, Conditions

Affecting Vocational Education Planning, required that staff analyze the findings about coordination in vocational education planning, current vocational education legislation, and recent literature about vocational education planning in order to identify a set of currently salient vocational education planning issues. Appendix D lists a bibliography pertinent to the study. The discussion and implication sections of the issue analysis in Conditions Affecting Vocational Education Planning depends heavily on material summarized from recording sheets, although not presented in so linear a fashion as in the other, more descriptive report.

The findings that are contained in the reports, Improving the Technology of Vocational Education Planning and Conditions Affecting Vocational Education Planning, are presented with the realization that the findings are influenced by at least two factors:

- o Areas of substantive focus and emphasis given to them were influenced to an unknown extent by the findings of the previous year's study about coordination in vocational education planning.
- o The process of analyzing and synthesizing the extensive volume of documentation and dialogue commentary that was secured in the field required many subjective decisions about their credibility and importance. As a consequence, the reported findings are subject to unintended errors in judgment by study team members.

APPENDIX A
PLANNING RELATED DOCUMENTS
COLLECTED FROM TWO STATES

Information from Colorado

"State Level" Documents

1. 1979-80 Annual Program Plan of Colorado State Plan
2. 1978-79 Annual Program Plan of Colorado State Plan
3. 1978-82 Annual and Five-Year State Plan
4. Accountability Report; Colorado State Plan 1978
5. 1976-77 Vocational Graduate Follow-up Analysis
6. State Assistance for Vocational Education (Colorado law)
7. (2) Personnel Listing, State Board for Community Colleges
8. Organization Chart, State Board
9. (2) Insight-Newsletter of State Board

Local Documents -- Postsecondary and Adult

10. (2) Operating and Approved Postsecondary Vocational Programs
11. Colorado Postsecondary Data Collection System
12. Colorado Postsecondary Data Collection System, Corrections/ Addition/Instructions
13. VE-117 Adult Vocational Apprenticeship Program Data form
14. VE-137 Vocational Education Postsecondary Course Information

Local Documents -- Secondary

15. Indexed calendar for LEA to submit planning forms
16. Section on Vocational Education Planning from new Local Administrator Handbook (under revision)
17. Form VE-115 Long-Range Local Plan and instruction
18. Form VE-120 (a) Institutional Application instructions and review criteria
19. Form VE-120 (b) Program Proposal Plan instructions and review criteria
20. Form VE-120 (g) Proposal for Vocational Guidance or Job Development Specialist Programs
21. Form VE-135 Student Accountability Data Tool
22. Form VE-116 Request for Supplemental Services Funds
23. Form VE-101 Equipment-Materials Application
24. Form VE-103 Request for Inventory Adjustment of Property
25. Form VE-120 (h) Funds for Submitting Work Experience and Study Proposals
26. Form VE-123 Additional Information Guideline for Submitting Proposals to Special Cooperative Programs
27. Form VE-130 Vocational Staff Information
28. Form VE-159 Colorado Resident-Student Enrollment

29. Form VE-160 Quarterly or Semester Report of Entitlement for Vocational Education
30. Form WS-1 Application to Participate in Work-Study Program
31. Form VE-312 Equipment Purchased for Vocational Programs
32. Form for Reimbursement of Contracted Programs
33. Form WS-2 Quarterly Report on Vocational Work-Study Hours and Wages
34. Local Plan School District 50, Westminster, Colorado
35. Local Plan District 12, Thornton, Adams County, Colorado
36. Curriculum Guide, Boulder Valley Area Vocational Technical Center

Advisory Council and Other Organizations Documents

37. Agreement between State Department of Corrections and Vocational Education
38. 8th Annual Report, Colorado Advisory Council for Vocational Education
39. Brochure: The Vocational Education Advisory Committee
40. Memo from State Department to locals regarding advisory councils
41. Colorado Commission for Vocational Education Planning Minutes 3/29, 4/4, 4/13/77

Miscellaneous Materials

42. (2) Denver Business (Chamber of Commerce)
43. Seven Counties of Denver: Regional Business Data

Information from Wisconsin

"State Level" Documents

A. Reports, Position Papers

1. 1978-1979 State Plan
2. Procedures Manual to implement "Plan for Comprehensive VTAE to Wisconsin through 1980"
3. Wisconsin Five-Year State Plan for VTAE 1978-1982
4. 1979-1980 Plan Highlights
5. 1977-1978 Accountability Report, and 1979-1980 Annual Plan
6. Plan for Comprehensive VTAE to Wisconsin through 1980
7. Report to Governor for Development of VTAE 1973-1977
8. Cost Allocation Summary 1978-1979 (Projected)
9. Cost Allocation Summary 1977-1978 (Actual)
10. Financial Accounting
11. 1975-1976 Statewide Student Follow-up Report
12. Report by RCU on Planning for Equity
13. 1977-1979 Budget
14. Report on Financing Local VTAE System
15. Wisconsin Administrative Code--Rules of VTAE
16. Draft Timetable--1980 Annual State Plan Development, Review, and Approval
17. Status of VTAE Administrator's Association Task Forces
18. Report of Joint Adm. Comm. on Physical Facilities
19. VTAE System Position Paper: District Cost Control Appeals

20. Assessment of Vocational Education in Wisconsin 1977, by Advisory Council
21. Letter from State Director to U.S. Senator with Report
22. Review of VTAE Joint Adm. Comm. on Academic Programs
23. Report of VTAE Joint Adm. Comm. on Continuing Education
24. Facilities Inventory and Utilization Report 1976-1977
25. Environmental Impact Statement--Site Selection for Skill Center
26. Assessment of Vocational Education in Wisconsin 1976, by Advisory Council
27. Paper titled: Planning, Research and Evaluation
28. District Plan/Application Guidelines
29. Calculation of FY 1979-80 Vocational Education Allocation
30. Policy Statements for Vocational Education in Wisconsin
31. Memo to District Directors on District Budget Process
32. Examples District Plan/Application

B. Memos

33. Memo from State Director (6/8/79)--Program Development
34. Memo from State Director--North Central VTAE District T&I Division Review, March 13-15, 1979
35. Memo from State Director--Workshop on 1980-1981 VEA District Plan/Application Preparation
36. Memo on Goal Setting
37. Memo from State Director to Affirmative Action Committee

C. Minutes

38. Minutes-UWS-VTAE Joint Administrative Committee on Continuing Education
39. Minutes: State Advisory Committee Hospitality Management
40. Minutes: State Data Processing Advisory Committee
41. Minutes: State Distributive and Marketing Advisory Committee
42. Minutes: VTAE Administrator's Meeting
43. District Administrators Meeting
44. Minutes: Section 107 Meeting.

D. Miscellaneous

45. Map of VTAE Districts and Full-Time Campuses
46. VTAE Personnel Directory 1978/1979
47. 1975 Wisconsin Agency Organization Chart
48. VTAE Agency Organization Chart
49. Report on NASDVE Conference on Issues and Implications for State Planning

"Local" Documents

50. Area VTAE District One Plan/Application 1980

APPENDIX B

SAMPLE OF DOCUMENTS
SECURED FROM A LOCAL SCHOOL

1. Community College -- Management Information System
2. Community College -- Graduate Follow-Up
3. Vocational Education Instructional Program Review
Occupational Proficiency Programs
4. Comprehensive Education Plan 1979-1980
5. County School Board Meeting -- October 18, 1977 -- Minutes
6. Coordinating Council: Minutes; Needs Assessment/
Recommendations
7. Career Education Center: Information Brochure
8. High School Class Schedule
9. Local Education Agency Application for Federal Funds
10. Handbook of Procedures for Implementing a Sex Equity
Workshop
11. Schools - newspaper
12. A Computer-Based Career Guidance and Counselor
Administrative Support System: (Brochure)
13. Master Plan of Instruction for Nursery Operations 1979-1980
14. Five-Year Comprehensive Vocational Education Plan 1980-1982
15. An Overview of Public Education (Brochure)
16. Public Schools Plan for Placement Services and Follow-Up
Studies
17. Follow-Up Survey of Former Students
18. Occupational Proficiency Programs: Final Class Report
1979-1980
19. Community Instructional Services Survey

20. Memorandum from State Department to Community College Presidents and District School Superintendents (regarding the availability of funds to support the development of regional council vocational education plans)
21. Folder of information regarding education linkage developments
22. Program Planning for Vocational Education
23. Requirements for Entry into Auto Mechanics, Auto Body and Gasoline Mechanics Course
24. Public Schools Assessment Report
25. Room Inventory Form
26. Master Plan - CETA
27. Employment Survey Forms
28. Student Survey Forms
29. Chamber of Commerce Membership Directory
30. Resource and Curriculum Guide
31. Newsletter
32. Needs Assessment & Recommendations Vocational Education Planning
33. 1979-1980 Report of the Superintendent of Schools
34. Placement & Follow-Up Report 1977-1978

APPENDIX C

**SAMPLE RECORDING FORMS
FOR SUMMARIZING FIELD SITE
EVIDENCE OF PLANNING ACTIVITIES**

Data for Planning
(Program Expansion, Deletion, etc.)

State:

Institution:

Interviewee:

Planning Activity	Types of Data	Sources	Evidence	Problems	Comments/Needs Expressed
Add Program Delete Program Expand Program Modify Program Significantly Describe:	Employment Describe:	Own Surveys Employment Service SDVE Regional/Local Planning Group Other Not Determined Describe:	Local App. Other Doc. Cross Confirm Other Not Deter. Describe:	Not Current Not Accurate Not Usable in Present Form Other Not Determined Describe:	
	Demographic/ Economic Describe:	SDVE Other State Agencies Local Government Agencies Other Not Determined Describe:	Local App. Other Doc. Cross Confirm Other Not Deter. Describe:	Not Current Not Accurate Not Usable in Present Form Other Not Determined Describe:	
Educational Describe:		Local Districts Enrollments Costs Placements Student Interest SCVE Other Not Determined Describe:	Local App. Other Doc. Cross Confirm Other Not Deter. Describe:	Not Current Not Accurate Not Usable in Present Form Other Not Determined Describe:	

Coordination

State:

Institution:

Interviewee:

	Purpose of Relationship	Outcomes of Relationship	Problems Cited/Observed	Facilitators C
Voc. Ed. With:	Long Range/Institutional Planning	Voc. Ed. Institution Utilized	Turf Protection/Competitive	
SDVE:	Annual Program Planning	Data or Counsel From Other	for Resources	
Other Voc.	Coordinating Service to	Institution in Long Range/	Personality Conflict	
Institutions	Particular Target	Institutional Planning (or	Organizational Policy/	
Employment	Groups	Vice Versa)	Procedure	
Service	Sharing Useful Infor-	Voc. Ed. Institution Utilized	Legislation	
CETA	mation/Giving Counsel	Data/Counsel From the	Lack of Awareness	
CBO	Compliance with Legis-	Institutions in Annual	Other	
Rehabilitation	lative Mandates	Program Planning Decisions		
Economic	Obtaining Political	(or Vice Versa)		
Development	Support			
Advisory	Increasing Mutual	Voc. Ed. Institution obtained		
Council	Awareness of Institu-	Data From other Institution	Describe:	
Employer	tional Activities/	for Inclusion in Reports		
Community	Capabilities	Required by Federal/State		
Other	Other	Government (or Vice Versa)		
	Describe:			
		Voc. Ed. Institution Shared		
		Facilities, Equipment or		
		Personnel with Other		
		Institution (or Vice Versa)		
		Voc. Ed. Institution Operated		
		Special Programs under		
		Contract to other		
		Institutions (or Vice		
		Versa)		
		Relationship Minimal		
		Other		
		Not Determined		
		Describe:		
			No Evidence	

Planning for Special Needs

State:

Institution:

Interviewee:

Purpose	Evidence of Planning	Outcomes	Constraints	Comments/Notes
Planning for Ex Equity	Meetings Local Application Other Documents Other	Special Programs Enrollment Changes Policy/Procedures Changes Attitudinal Changes Other	Lack of Local Funds Lack of State Funds Community Values Lack of Student Interest School Personnel Attitudes Other	
	Not Determined	Did Not Determine	Did Not Determine	
Planning for Disadvantaged and Handicapped	Meetings Local Application Other Documents Other	Special Programs Enrollment Changes Policy/Procedure Changes Attitudinal Changes Other	Lack of Local Funds Lack of State Funds Community Value Lack of Student Interest School Personnel Attitudes Other	
	Not Determined	Did Not Determine	Did Not Determine	

Evaluation for Planning

State:

Institution:

Interviewee:

Source	Evidence of Evaluation Utilizations	Problems in Evaluation	Notes/Comments
<u>External</u> SDVE Initiated Assessments, Reports IACVE or Craft Committee Other Did Not Determine,	Procedures/Practices Document Evidence on Local Application Documentation that Evaluation Affected Recycling Decisions Other Evidence	Appears to have little or no use locally Other	
<u>Internal</u> Student Follow-up Employer Follow-up Staff Assessments of Program Relevance, Quality Other Did Not Determine	Did Not Determine Describe Evaluation Utilization		

BIBLIOGRAPHY

The Advisory Council for Technical Vocational Education in Texas. A report of the Governor's Conference on Technical Vocational Education. Austin, TX: 1977.

Atteberry, J.W. A Model for Planning Vocational Education Via Mathematical Modeling. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1978.

Atteberry, J.W.; Miller, R.; and Pershing, A. Improving Vocational Education Planning: More Myth Than Reality? Columbia, MO: University of Missouri, 1977.

Bentley, W.H. Administering the Successful Vocational Education Program. West Nyack, NY: Parker Publishing Company, Inc., 1979.

Branch, M.C. Planning: Aspects and Applications. NY: John Wiley & Sons, Inc., 1966.

Bregman, R. A Model for Planning Vocational Education at the Local Level. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1979.

Budke, W.E. Vocational Education Administration, Management, and Policy. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1978.

Colorado State Board for Community Colleges and Occupational Education. Comprehensive Program Review Plan. Denver, CO: State Board for Community Colleges and Occupational Education, 1975.

Colorado State Board for Community Colleges and Occupational Education. Standard Procedures for Program Planning, Supervision, and Evaluation. Denver, CO: State Board for Community Colleges and Occupational Education, 1978 (Draft).

Copa, G.H.; and Geigle, K. National Conference for State Vocational Education Planning Staffs: Final Report. Minneapolis, MN: University of Minnesota, 1976

Copa, G.H.; Geigle, K.; and Imade, V.O. Factors, Priorities, and Information Needs in Planning Vocational Education: Views of Selected Educational Planners in Minnesota. Minneapolis, MN: University of Minnesota Department of Vocational and Technical Education, 1976.

The Eckman Center. Five-Step Workplan for Vocational Education Planning with Full Accountability. Woodland Hills, CA: The Eckman Center, April, 1973.

The Eckman Center. The ICIS Workplan for Vocational Education. Canoga Park, CA: The Eckman Center, 1975.

Grasso, John T. Impact Evaluation in Vocational Education: The State of the Art. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1979.

Holcomb, R.E.; Morris, W.; and Callahan, J. California Guidelines for Establishing, Modifying and Terminating Occupational Programs Handbook. Sacramento, CA: California State Department of Education, 1977.

Holcomb, R.E.; Morris, W.; and Callahan, J. California Guidelines for Modifying and Terminating Occupational Programs Evaluation Handbook. Sacramento, CA: California State Department of Education, 1978.

Hopkins, C.O. Data Sources for Vocational Education Evaluation. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1979.

Jackson, J.R. Vocational Education-The Texas Study. Austin, TX: Texas Vocational-Technical Association, 1979.

Kansas State Department of Education. Kansas Vocational Education Annual Plan for Fiscal Year 1980 and Accountability Report for Fiscal Year 1978. Topeka, KS: Kansas State Department of Education, 1979. (Draft).

Kansas State Department of Education. One and Five-Year State Plan for Fiscal Year 1978-1982 Vocational Education. Topeka, KS: Kansas State Board of Education, 1977.

Koble, D.E.; and Gilmore, D.C. A Master Plan for Selected Areas of Vocational Education Programs in the State of Rhode Island. Columbus, OH: The Center for Vocational and Technical Education, The Ohio State University, 1974.

Koble, D.E. Jr.; and Long, A. Improving State-Level Vocational Planning and Evaluation. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1978.

- Law, G.F. Impact of Vocational Education and Manpower Training on the Labor Market. Flagstaff, AZ: Northern Arizona University, 1974.
- Lawrence, J.E.S.: and Whitney, C.S. Labor Market Information and Vocational Planning. Raleigh, NC: North Carolina State University School of Education, 1977.
- Lee, A.M. Use of Evaluative Data by Vocational Educators. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1979.
- Maryland State Department of Education. Maryland State Plan for the Administration of the Vocational Technical Education Programs under the Vocational Education Amendments of 1976. Baltimore, MD: Maryland State Department of Education, 1977.
- Meckley, R.F. Planning Facilities for Occupational Education Programs. Columbus, OH: Charles E. Merrill Publishing Company, 1972.
- Merz, H., Starr, H., Cohen, S., Jahnke, J., Maurice, C., Zahniser, G., and Bowers, E. Improving the Technology of Local Level Vocational Education Planning. (Columbus, Ohio: The National Center for Research in Vocational Education, The Ohio State University, 1981.
- Oklahoma State Department of Vocational and Technical Education. The Oklahoma Five-Year State Plan '78-'82 for the Administration of Vocational Education. Oklahoma City, OK: Oklahoma State Board of Vocational Education, 1977.
- O'Reilly, P.A. The State Planning Process in Vocational Education. Flagstaff, AZ: Northern Arizona University, 1975.
- Pennsylvania Department of Education. Planning Vocational Education Programs in Pennsylvania: Guidelines for the Use of Labor Market Information. Harrisburg, PA: Bureau of Educational Research, Pennsylvania Department of Education, 1970.
- Policy Statements for Vocational Education in Wisconsin. Madison, WI: Wisconsin Board of Vocational, Technical, and Adult Education, 1977.
- Pucel, D.J. Longitudinal Methods as Tools for Evaluating Vocational Education. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1979.

- Russell, E. Literature Related to Guidelines and Models for State-Level Planning and Evaluation in Vocational Education. Paper read at conference on "Improving State Level Vocational Planning and Evaluation," February 5-8, Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1978.
- Schroeder, W.E. Technical and Vocational Education Planning: An International Annotated Bibliography of ERIC Documents. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1976.
- Smith, H.; Hudson-Wilson, S.; Pannell, P.; and Olszewski, D. Methods for Local Labor Market Planning. Boston, MA: University Regional Institute on Employment Policy, 1977 (Draft).
- Starr, H., Merz, H., and Zahniser, G. Coordination in Vocational Education Planning: Barriers and Facilitators. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1980.
- Starr, H., Merz, H., Thrane, L., Jahnke, J., Cohen, S., Maurice, C., and Bowers, E. Conditions Affecting Vocational Education Planning--Implications for Administration and Research. Columbus, OH: The National Center for Research in Vocational Education, The Ohio State University, 1981.
- Stevens, D.W., ed. Occupational Employment Projections for Program Planning Purposes: Issues and Examples. Columbia, MO: University of Missouri-Columbia, College of Arts and Sciences, 1976.
- Texas Education Agency. Texas Annual Program Plan for Vocational Education, Fiscal Year 1979. Austin, TX: Texas Education Agency, 1979.
- A Unified Approach to Occupational Education: Report of the Commission on Vocational Education. Sacramento, CA: California State Department of Education, 1979.
- U.S. Department of Health, Education, and Welfare, Office of Education, Bureau of Occupational and Adult Education. The Development and Implementation of a Management and Information System for Long-Range Planning of Vocational Education Programs at the Local Level. Washington: U.S. Government Printing Office, 1977.
- U.S. Department of Labor, Manpower Administration. Program Assessment Guide for Prime Sponsors Under the Comprehensive Employment and Training Act of 1973. Washington, DC: U.S. Government Printing Office, 1975.

VanZant, John. L. Occupational Information for Educational Planning. Ventura, CA: California Occupational Information System, 1978.

The Vocational Education Policy Research Project. Manpower and Vocational Education Planning Processes: Four Regional Case Studies. Austin, TX: Lyndon B. Johnson School of Public Affairs, 1975.

The Vocational Education Policy Research Project. Resources for Local Manpower and Vocational Education Planners. Austin, TX: Lyndon B. Johnson School of Public Affairs, 1975.

Westat, Inc. National Study of Vocational Education Systems and Facilities, Volume II: State Vocational Education System Descriptions. Rockville, MD: Westat, Inc., 1978.

Wisconsin Board of Vocational, Technical and Adult Education. Wisconsin Cost Allocation System. Madison, WI: Wisconsin Board of Vocational, Technical, and Adult Education, 1977.

Wisconsin Board of Vocational, Technical, and Adult Education. Wisconsin Five-Year State Plan for Vocational, Technical, and Adult Education, 1978-82. Madison, WI: Wisconsin Board of Vocational, Technical, and Adult Education, 1977.

Young, R.C. Manpower Demand: Information Guidelines for Educational, Vocational Education, and Manpower Planning. Columbus, OH: The Center for Vocational and Technical Education, The Ohio State University, 1973.

Young, R.C.; Clive, W.V.; and Miles, B.E. Vocational Education Planning: Manpower, Priorities, and Dollars. Columbus, OH: The Center for Vocational and Technical Education, The Ohio State University, 1972.