INFORMATION TO USERS

This was produced from a copy of a document sent to us for microfilming. While the most advanced technological means to photograph and reproduce this document have been used, the quality is heavily dependent upon the quality of the material submitted.

The following explanation of techniques is provided to help you understand markings or notations which may appear on this reproduction.

1. The sign or "target" for pages apparently lacking from the document photographed is "Missing Page(s)". If it was possible to obtain the missing page(s) or section, they are spliced into the film along with adjacent pages. This may have necessitated cutting through an image and duplicating adjacent pages to assure you of complete continuity.

2. When an image on the film is obliterated with a round black mark it is an indication that the film inspector noticed either blurred copy because of movement during exposure, or duplicate copy. Unless we meant to delete copyrighted materials that should not have been filmed, you will find a good image of the page in the adjacent frame.

3. When a map, drawing or chart, etc., is part of the material being photographed the photographer has followed a definite method in "sectioning" the material. It is customary to begin filming at the upper left hand corner of a large sheet and to continue from left to right in equal sections with small overlaps. If necessary, sectioning is continued again–beginning below the first row and continuing on until complete.

4. For any illustrations that cannot be reproduced satisfactorily by xerography, photographic prints can be purchased at additional cost and tipped into your xerographic copy. Requests can be made to our Dissertations Customer Services Department.

5. Some pages in any document may have indistinct print. In all cases we have filmed the best available copy.

University Microfilms International

300 N. ZEEB ROAD, ANN ARBOR, MI 48106
18 BEDFORD ROW, LONDON WC1R 4EJ, ENGLAND

A STUDY TO IDENTIFY THE VARIABLES WHICH INFLUENCE THE INSTITUTIONALIZATION OF INCENTIVE-FUNDED INNOVATIVE PROJECTS IN VOCATIONAL EDUCATION RELATED AREAS IN MICHIGAN

by

Linda Sue Peters

A DISSERTATION

Submitted to
Michigan State University
in partial fulfillment of the requirements
for the degree of

DOCTOR OF PHILOSOPHY

College of Education

1979

ABSTRACT

A STUDY TO IDENTIFY THE VARIABLES WHICH INFLUENCE THE INSTITUTIONALIZATION OF INCENTIVE-FUNDED INNOVATIVE PROJECTS IN VOCATIONAL EDUCATION RELATED AREAS IN MICHIGAN

by

Linda Sue Peters

Statement of the Problem

The problem in this study was to determine the variables which influence the institutionalization of incentive-funded innovations in vocational education.

The following research questions were set forth:

1. What factors encourage incentive-funded innovative projects to become institutionalized into regular school operations?

2. What factors discourage the institutionalization of innovatives so that institutionalization does not occur?

Purposes of the Study

The first purpose of this study was to provide information to individuals from local school districts who are considering initiating incentive-funded projects. The study identified major variables which influence institutionalization. Such information can be used by school administrators and project planners as a guide so that institutionalization will most likely occur, if that is the desired end.

A second purpose was to provide scholars and students of planned change with useful information on which to base future research. This research provided information about institutionalization in vocational education that was not formerly available.

The third purpose of this study was to direct incentive grant awarders to the key variables influencing institutionalization. Knowledge of these variables enables project developers to structure the grant awarding process and accompanying guidelines so that institutionalization, when desired, will most likely occur.

The fourth purpose was to provide teacher educators with information that will be useful in broadening the scope of programs to prepare school personnel. By identifying variables influencing institutionalization, teacher educators can help school personnel to be knowledgeable about initiating and implementing incentive-funded innovative projects.

Methods Used

The population for this study was individuals associated with fifteen incentive-funded innovative projects in vocational education related areas in Michigan. Sites were selected from projects recommended by Michigan Department of Education staff members and based upon specific criteria.

Six individuals from each project were randomly selected to receive the "Institutionalization Questionnaire". Part I of the questionnaire was concerned with the extent to which variables had occurred within each project and whether or not institutionalization was facilitated or hindered by the presence or absence of each variable. Part II collected demographic information.

Data were analyzed using a combination of possible responses for each variable. A single-valued measure was developed which showed both the extent and direction of any one variable's effect on institutionalization. Data were also presented in the aggregate.

Summary of Findings

Based on the response of 64 educators (71.1 percent response), 35 variables were found to exert major influence in facilitating institutionalization. Examples of such variables are:

1. Availability of assistance to project participants.
2. Understanding concerning individual roles in an innovative project.
3. Provision of inservice training.
4. Interaction among project participants at all levels.
5. Adeptness in process skills on the part of a project director.

Conclusions

Each of the major variables plays an important role in the facilitation of change and the institutionalization of innovative projects. These major variables may be loosely grouped into these divisions: staff development activities, affective orientations, communications aspects, administrative characteristics, student impact, project-related components, planning and logistical considerations, and scope of involvement.

It is important to recognize that each variable may affect and be affected by every other variable. Variation in terms of degree and quality of each variable may, in fact cause, variation in terms of institutionalization. However, this study clearly identifies factors that have a strongly positive effect on the institutionalization of incentive-funded innovative projects in vocational education related areas.

This work is affectionately dedicated to

Cathryn and Till

and to my parents

Lois and Jim Burch

ACKNOWLEDGMENTS

The researcher extends her sincere appreciation to all individuals who helped make this study possible.

To Dr. Lawrence Borosage, sincere appreciation is expressed for his help and encouragement as a guidance committee chairman. Gratitude is extended for his continuous support and advice.

To Dr. Bill Rader, a special thanks is extended for serving as dissertation director and for always being available when needed. His advice and constructive ideas are sincerely appreciated.

To Dr. Casmer Heilman, Dr. James Engelkes, and Dr. Rader, who served as members of the guidance committee, gratitude and appreciation is also expressed.

To the many educators in Michigan who responded so well to the questionnaire, appreciation is expressed for their sincere professionalism. Their interest and willingness to assist made this study possible.

To my family, appreciation is expressed for their constant support, encouragement, understanding and patience.

TABLE OF CONTENTS

LIST OF TABLES

Chapter 1

THE PROBLEM

Introduction

Federal aid for vocational education in public education was introduced with the passage of the Smith-Hughes Vocational Education Act in 1917. The act was a means to stimulate the development of vocational education programs as states were not assuming responsibility for them; yet vocational education was recognized to be a necessary part of public education. This federal funding was an innovation in itself. The intent of Smith-Hughes was to stimulate states and local communities to support vocational education. The legislation required that federal funds be matched with an equal amount of state or local money.[1]

Within the last two decades, the concept of incentive funding has been extended to most areas of public education. With the National Defense Education Act of 1958, the federal government increased its encouragement of innovative efforts in the public schools. This initiative continued with the Elementary and Secondary Education Act of 1965. Similar encouragement of innovations in vocational education resulted from the Vocational Education Act (VEA) of 1963 and the subsequent implementation of the VEA Amendments of 1968. (As used here, innovation means "an idea [or] practice ... perceived to be new by the relevant unit of adoption.")[2] Portions of both the VEA of 1963 and

---

[1] ROBERTS, Roy W. Vocational and Practical Arts Education, Harper and Row, New York, 1971, pp. 12-20 and 108-111.

[2] HELMER, O. The Use of the Delphi Technique in Problems of Educational Innovations, p. 95. Rand Corp., Santa Monica, CA, 1966. No. P-3499.

its amendments were designed to aid in the development of new programs and encourage research and experimentation. Again, local matching funds were required for most components of the legislation.[3] Such involvement of the federal government in education has provided money to state departments of education, and increased their involvement in the stimulation of innovation at the local level.

Consequently, state departments of education, reacting to the federal impetus, provide temporary funds to local educational agencies for the initiation and development of educational innovations. These funds are for the development of new educational services and programs and are not intended to support and maintain existing programs, projects, or practices. Nor are such incentive funds intended to support and maintain the innovation for more than a temporary period. Such incentive funding has occurred in most areas of the educational system. It is expected that the innovation will become institutionalized or continued as part of the educational agency's regular operations when the incentive funding ceases.

In reality, the effectiveness of the incentive grant technique is uncertain. Gaps may occur between the expectations of the funding agent and the reality of the local educational agency's operations. Institutionalization of innovations may not occur with the frequency anticipated by the funding agent.[4] As it is used in this study, institutionalization means the integration of an incentive-funded innovative program into regular school operations. While incentive funding stimulates local

---

[3]ROBERTS, op. cit., pp. 114-120.

[4]BERMAN, Paul, and McLAUGHLIN, Aubrey Wallin. Federal Programs, Supporting Educational Change, Vol. VIII (May 1978), p. vi.

agencies to undertake innovative projects, such funding does not insure long term continuation. Project-end evaluation may be positive with respect to achievement of goals and objectives; yet durability and institutionalization of the innovation is not insured or may not be considered or desired by the local educational agency. The return on the incentive funding investment to state and federal departments of education has been "....the adoption of many innovations, the successful implementation of few, and the long-run continuation of still fewer...."[5] There is a need to evaluate the incentive grant approach and to determine ways and means to maximize its effectiveness so that its intent might be better realized.

Statement of the Problem

The problem in this study was to determine the variables which influence the institutionalization of incentive-funded innovations in vocational education.

The following research questions were set forth:

1. What factors encourage incentive-funded innovative projects to become institutionalized into regular school operations?
2. What factors discourage the institutionalization of innovations so that institutionalization does not occur?

Need for the Study

Educational policies and programs, at all levels, are under close scrutiny by legislatures and the general public. Money available for

---

[5]BERMAN, loc. cit.

education is limited and stringent planning and accountability measures are being required of local educational agencies. The funds which are available for education must, therefore, be used effectively and efficiently. Generally, projects which are institutionalized after the funding ends represent an effective use of federal and state dollars. However, this desirable end does not often occur.

Often, benefits may accrue from participating in an incentive-funded project, even though institutionalization does not occur. Both individuals and educational agencies may profit from participation in an innovative effort. However such benefits, while important, are not the area of concentration of this study.

All too often, when external funding ends, projects are either dropped and forgotten, or else they may be institutionalized in a haphazard and piecemeal fashion. In order to bring order and reason to this situation, and to suggest some bases on which to make predictions about the likelihood of project institutionalization, it is necessary to identify those factors (also called variables) that facilitate and those that hinder institutionalization. The identification of these factors is precisely the object of the present research.

Purpose of the Study

The first purpose of this study is to provide institutionalization related information to individuals from local school districts who are considering initiating incentive-funded projects. Such information can be used by school administrators and planners as a guide to

assist them to insure that institutionalization will most likely occur within their district.

A second purpose of this study is to provide scholars and students of planned change with useful information on which to base future research.

A third purpose of this study is to provide information to incentive grant awarders concerning the key variables influencing institutionalization. Knowledge of these variables may enable project developers to structure the grant awarding process and accompanying guidelines so that institutionalization, when desired, is most likely to occur.

A fourth purpose of this study is to provide information to teacher educators which may aid them in their preparation of school personnel.

Basic Assumptions for the Study

The following assumptions were made for this study:

1. That administrators and implementors of incentive-funded projects related to areas of vocational education were sufficiently well-informed concerning project activities so as to enable them to rate the extent of variable presence or absence and the corresponding facilitation or hinderance of institutionalization.

2. That, in addition to administrators and facilitators of each incentive-funded, innovative project, there are a group of individuals, called "significant others," who, while not involved operationally, are aware of, and may influence the outcome of, the project. It is assumed, also, that such persons possess sufficient knowledge to rank the variables which influence the institutionalization of the incentive-funded project.

3. That a questionnaire was appropriate to isolate the key variables which influence the institutionalization of innovations in vocational education.

Delimitations of the Problem

The following were delimitations of this study:

1. This study involved only public secondary institutions.

2. This study was concerned only with innovations related to areas of vocational education which were Michigan Department of Education generated through the use of a "request for proposals" process.

3. The study involved only those projects which received federal monies channeled through the Michigan Department of Education.

4. The study was concerned only with those projects for which there had been an expectation that institutionalization would occur after funding ceased.

5. The study involved only those projects for which incentive funding had occurred no more than five years before the time this research was started (1977); project duration was from two to three years; funding termination occurred at least one year before this research was approved (1978).

Definition of Terms

Adoption - A decision to continue full use of an innovation.[6]

Adoption Process - The mental and physical processes through which an individual(s) passes from first hearing about an innovation to final adoption.[7]

Change - Alteration in the goals, structure or process of a system.[8]

---

[6]ROGERS, Everett M. Diffusion of Innovations, p. 17. The Free Press, MacMillan Company, New York, 1962.

[7]Ibid.

[8]MILES, Matthew B. (ed.). Innovations in Education, p. 13. Teachers College Press, Columbia University, New York, 1964.

ESEA - Elementary and Secondary Education Act, 1965.

Implementation - The translation of project plans into practice.[9]

Incentive Funding - The provision of temporary funds to educational agencies for the initiation and development of educational innovations.

Integration - The process which occurs when an innovative project loses its special status and becomes part of the routinized behavior of the district.[10]

Initiation - The conception and introduction of new practices.[11]

Innovation - An idea [or] practice ... perceived to be new by the relevant unit of adoption.[12]

Institutionalization - Integration of an incentive-funded innovative program into regular school operations.

ISD - Intermediate School District.

Local Education Agencies (LEA) - Public education agencies such as secondary schools, community colleges, intermediate school districts.

Local School District (LSD) - Public school districts including grades K-12.

MDE - Michigan Department of Education.

Organizational Change - Any planned or unplanned alteration of the status quo which affects the structure, technology, and human resources of the total organization.[13]

RFP - Request for proposal.

---

[9]ZALTZMAN, Gerald (ed.). Processes and Phenomena of Social Change, p. vii. John Wiley and Sons, New York, 1973.

[10]Ibid.

[11]HELMER, O., op. cit., p. 258.

[12]Ibid, p. 95.

[13]LIPPITT, Gordon L. Visualizing Change, p. 37. N.T.L. - Learning Resources Corporation, Fairfax, Virginia, 1973.

Secondary - (For the purpose of this study) a term referring to grades 9-12.

Strategy - A means (usually involving a sequence of specified activities) for causing an advocated innovation to become successfully installed in an on-going educational system.[14]

Variable - Factor(s) influencing the institutionalization of innovations.

VEA - Vocational Education Amendments, 1968.

Vocational Education - Organized educational programs which are directly related to the preparation of individuals for paid or unpaid employment, or for additional preparation for a career requiring other than a baccalaureate or advanced degree.[15]

VTES - Vocational-Technical Education Service, a unit within the Michigan Department of Education.

Summary

This chapter has provided an overview of the intent of this study; that is, the identification of variables which influence the institutionalization of innovations in vocational education. Chapter 2 will report on selected studies which have bearing upon this study. Chapter 3 will describe the research design used, and Chapter 4 will present the findings of this study. The final chapter will summarize the study, draw conclusions and present recommendations for further research in the area of institutionalization of innovations.

---

[14]MILES, Matthew B. (ed.), op. cit., p. 19.

[15]The Annual and Long Range State Plan for Vocational Education, 1977-78. Michigan Department of Education, Third Working Draft.

Chapter 2

REVIEW OF THE LITERATURE

Interest in the broad area of change has been great in recent years. An extensive list of references can be found which in one way or another relate to the various aspects of change. Therefore, the purpose of this chapter was to synthesize selected areas in the literature considered to have the most bearing upon this study. The following areas were identified: (1) social and educational change; (2) institutionalization of educational change; and (3) governmental attempts to encourage innovation. Research findings in these areas provided the basis for this study.

SOCIAL AND EDUCATIONAL CHANGE

Social and educational change research has concentrated upon how to achieve change. Less emphasis has been placed upon insuring continuance of the innovation or institutionalization. The literature abounds with studies concerning programs and technologies of planned change and conceptual tools for the change agent; yet there is less information concerning long range effects and continuation. Concentration is often upon an individual's change process rather than upon the influence of an organizational setting.

Lewin[16] stated that to understand change, the researcher must take into account both the person(s) involved and the environment in

---

[16]LEWIN, Kurt. Principles of Topological Psychology, p. 12. McGraw-Hill Book Company, New York, 1936.

which change is desired. Change occurs as a result of the interaction between the individual and his environment with the organizational setting exerting considerable influence upon the individual's acceptance or rejection of change. An understanding of people's motivation and the complexities of their environment is necessary.

The intrapersonal aspects of change must be emphasized, but there is also a need to consider external influences. Because most individuals operate within an organizational setting, change in an individual's behavior and attitudes toward innovation is influenced greatly by that setting. Individuals within an organization also influence the organization's reaction to change. According to Mann,[17]

> Different contents, different methods, different settings, different training units and different change agents contain different motivational impacts for change.

Stages of organizational change as described by Hage and Aiken[18] may be labeled as evaluation, initiation, implementation, and routinization. "The fourth stage, routinization, is a period in which the organization attempts to stabilize the effects of a new program."[19] This stage is the same as institutionalization as used in this study.

---

[17]MANN, Floyd C. "Studying and Creating Change: A Means to Understanding Social Organization," pp. 146-147, in: Research in Industrial Human Relations, Industrial Relations Research Association, Publication 17, 1957.

[18]HAGE, Jerald, and AIKEN, Michael. Social Change in Complex Organizations, pp. 93-104. Random House, New York, 1970.

[19]Ibid, p. 93.

According to the authors, the routinization stage is in particular need of further study and assessment. Unfortunately this stage has received too little attention in various studies of organizations.[20] Because almost no studies have emphasized this stage, "it is difficult to specify reasons that some (new) programs are retained and others are allowed to die."[21]

Many existing ideas about social change may not fit the response of the educational system to the process of change and innovation. They may be appropriate for business, agriculture, and medicine where research and development processes deal with product oriented activities; whereas in education the focus is upon the human element.

According to Carlson[22] most research on innovation is concentrated upon individual, independent practitioners which is less appropriate for educational institutions. Because educational innovations move through complex organizations, many variables interact to determine their fate. Carlson notes that there has been "a lack of concern with organizational theory even though users of educational innovations are either part of complex organizations or are complex organizations."[23]

---

[20] Ibid, pp. 93-104.

[21] Ibid, p. 104.

[22] Research Implications for Education Diffusion, pp. 1-28. Major Papers Presented at the National Conference on Diffusion of Educational Ideas, East Lansing, Michigan, 1968.

[23] Ibid, p. 26.

Carlson's point is reinforced by Rogers and Jain[24] who state that past researchers have focused upon the individual as a unit of analysis. Emphasis has been upon intrapersonal variables. Social structural and organizational variables have been excluded. In education the individual works in an organizational setting; therefore the organization's environmental influences upon innovation and the individuals involved must be considered.

Lin[25] stated that there is a need to bring research attention upon the process surrounding the implementation of innovations. Emphasis must be placed upon the assessment of the effects of innovation upon the educational system as well as the determination of the degree of success of an innovation. An assessment of an educational system's internal conditions plus an analysis of influencing external factors and pressures must occur.[26]

According to Culver and Hoban,[27] much of the current literature emphasizes generalized concepts about change, including descriptions of strategies used to implement change. Emphasis is upon what the change process should look like and how change should occur. Descriptions

---

[24]Ibid, pp. 65-101.

[25]Ibid, pp. 103-109.

[26]BENTZEN Mary M. (ed.). Changing Schools: The Magic Feather Principle, p. 186. McGraw-Hill Book Company, New York, 1974.

[27]CULVER, Carmen J., and HOBAN, Gary J. (eds.). The Power to Change: Issues for the Innovative Educator. McGraw-Hill Book Company, New York, 1973.

of change within the educational setting often fail to consider the realities of change which influence the outcome of innovation. Gaps often occur between what literature says about the change process and reality itself.

In the mid-sixties the dominant approach of change literature in education concerned the features and content of change processes necessary for the management of educational innovation. At that time, Miles[28] emphasized the need to know why innovation spreads at different rates, what causes resistance to change, and why strategies of change succeed or fail.

Bushnell and Rappaport[29] concur with cited researchers that traditional change strategies concentrate primarily upon the individual as the locus of power and ignore the significance of the receiving institution. They point out that change strategies must deal with institutional barriers as well as with the defenses and barriers set forth by the individual. As others have noted, Bushnell and Rappaport stated that organizations shape and mold the behavior of individuals as much as or more than those persons in the organization shape and mold the organization. These authors propose that a systems approach to the study of change be considered. Such an approach would allow for the examination of variables, e.g., organizational norms, traditional role

---

[28]MILES, Matthew B., op. cit., pp. 10-26.

[29]BUSHNELL, David S., and RAPPAPORT, Donald (eds.). Planned Change in Education: A Systems Approach. Harcourt, Brace, Jovanovich, Inc., New York, 1971.

functions, inertia, vested interests, etc., within a system which influence the expected results of change.

Before the late sixties the research literature reveals a paucity of knowledge concerning the conditions which influence the implementation of innovation within an organization. Innovations introduced into education often did not yield intended effects, often because of inadequate implementation strategies. Gross and others state that it is important to examine and understand the circumstances influencing implementation so that intended effects result.[30]

More recently, research seems to reinforce the idea that the state of an organization influences the probable success of the change effort. Studies of educational change and innovation have begun to examine and isolate variables which inhibit or facilitate the implementation of planned change, thus leading to or detracting from institutionalization.

Donald L. Michael,[31] in the article "Inhibitors and Facilitators to the Acceptance of Educational Innovations," identifies factors which may inhibit, transform, or diminish intended effects of educational innovation. Inhibiting factors may be categorized as:

1. ideological, i.e., a lack of commitment to the development and use of educational goals and objectives;

---

[30] GROSS, Neal; GIACQUINTA, Joseph B.; and BERNSTEIN, Marilyn. Implementing Organizational Innovations: A Sociological Analysis of Planned Educational Change. Basic Books, Inc., New York, 1971.

[31] HIRSCH, Werner Z., and Colleagues. Inventing Education for the Future, pp. 268-279. Chandler Publishing Company, San Francisco, California, 1967.

2. interpersonal, i.e., the attitudes prevailing and degree of understanding of all parties involved in the implementation of the innovation;

3. institutional, i.e., the procedures, rules, and regulations which define activities within an institution and between the institution and its clientele; and

4. political, i.e., political vested interests which determine resource allocation and influence circumstances affecting change.

Michael also identifies specific factors which may be used deliberately to facilitate innovation. Such facilitators are:

1. social trauma or disaster, e.g., integration, women's movement, environmental and energy issues;

2. federal government intervention, e.g., legislation, policies, funding; and

3. the intervention of the interfaces, i.e., bridges between the internal environment (the school, teachers, students, etc.) and the external environment (P.T.A., mass media, school boards).

Gross, Giacquinta, and Bernstein[32] postulated in 1971 that if the initiation phase of an innovation is well handled, or its problems are adequately dealt with by school administrators, that the implementation of the innovation will readily occur. Barriers which administrators must confront include:

1. lack of clarity regarding the nature of the innovation;

2. lack of skills and knowledge or capability to implement the innovation;

---

[32]GROSS, et al, op. cit.

3. no availability of the necessary materials and equipment for implementation;

4. basic incompatability of the organizational arrangements or structure with the innovation itself; and

5. lack of willingness to expend the time, money, and effort needed for implementation (although the innovation is initially accepted).

Different patterns of obstacles may surface in efforts to implement different kinds of innovations. Therefore, the unique qualities of each innovation must be considered when implementation and institutionalization are attempted. The function of the school administrator must be the provision of support and commitment to the innovation and to those attempting implementation.

INSTITUTIONALIZATION OF EDUCATIONAL CHANGE

In spite of large outlays of money, time, and effort to promote innovation in the public schools, relatively few innovations have survived and become institutionalized within the school setting. Most innovations are implemented poorly and continuance is often minimal, at best, according to several studies (Huse, 1975; Cogan, 1976; and Rand, 1974-76).

Research emphasizing the strategies and processes surrounding all aspects of change in the educational setting has increased. In the early and mid-seventies educational research, particularly in the area of innovation institutionalization, has accelerated.

In the early seventies Rogers and Shoemaker[33] identified attributes of successful innovative programs. Relative advantage, compatibility, simplicity of use, trialability, observability, low costs, acceptable time considerations, reasonable space requirements and size, and acceptable support services are attributes commonly found in successful innovative projects. Of these attributes Dunn and Bowers[34] state that the most critical factors in innovative vocational education programs are probably costs, reasonable space and size requirements, and compatibility. In their opinion, simplicity of use and trialability are probably the least critical.

Howes[35] in research conducted in 1974 and 1976 identified predictor variables which are critical to the implementation of innovations and which can lead to successful institutionalization. Such variables involve the change itself, the change process, change roles and the formal organizational structure. In later research, Howes[36] attempted to develop a model for predicting outcomes of change efforts across

---

[33]ROGERS, E.L., and SHOEMAKER, Floyd F. Communication of Innovations. 2nd ed., Free Press, New York, 1971.

[34]DUNN, James A., and BOWERS, John E. Vocational Education Curriculum Specialist Project, American Institute for Research, Palo Alto, California, 1976. Module II.

[35]HOWES, Nancy J. "Factors Related to the Institutionalization of Changes in Divergent Organizations." Paper presented at the Annual Meeting of the Northeastern Research Association, Ellenville, New York, October, 1976.

[36]HOWES, Nancy J. "A Contingency Model for Predicting Institutionalization of Innovations Across Divergent Organizations." Paper presented at AERA Annual Meeting, New York, New York, April, 1977.

divergent organizations, elementary schools, institutions of higher education, and correctional facilities, which was based upon the predictor variables. As a result, three sets of implications were derived from the research findings. The first, implications for institutionalization of change, pertains directly to the subject of this research.

Howes states that to insure the greatest degree of successful institutionalization, managers of change should organize their activities around (1) the preparation of the organization to accept the proposed change and (2) assistance to the organization for the implementation of the change.[37] Both types of activities should be well thought-out and planned before their occurrence. Preparation of the organization includes introduction of the change so that it is easily understood; identification of required support services and resources; description of the requirements of individual participants and necessary role changes; descriptions of roles and expectations for all involved; and development of the acceptance and support of appropriate administrators. Organizational assistance during implementation includes such things as the availability of needed support services and resources; development of communication channels which can be freely used; provision of feedback; and relaxation of normal rules and procedures, if appropriate. Howes also notes that the individual(s) in the change agent role should maintain frequent and individual contact with the

---

[37]Ibid, p. 8.

users of the innovation. Individual users must feel involved in the innovative project to make a change effort.

Aspects important to the transferal of successful educational programs and their subsequent institutionalization have been identified by the National Diffusion Network (NDN)[38] in a collection of case studies describing the experiences of NDN field sites. The case studies illustrate clearly that successful educational change depends upon people; yet also note that there are five significant aspects to consider when attempting to transfer successful educational programs. These are:

1. Awareness[39]

   It is important to learn about and understand the innovation before attempting to initiate it.

2. Matchmaking or exploring the fit[40]

   Successful adoption of an innovation depends upon the school district's recognizing and defining a need. When the adopting unit invests time and effort assessing the innovation and itself, success is more likely.

3. Joint decision making or making the commitment[41]

   Individuals involved in managing and implementing an innovation must be involved in decision making concerning the innovation if commitment from all levels is to occur. In

---

[38] Transferring Success. National Diffusion Network, Far West Laboratory for Educational Research and Development, San Francisco, March, 1976.

[39] Ibid, p. 3.

[40] Ibid, p. 27.

addition to those immediately involved with the innovation, support and involvement from the larger community is important for commitment to continue and to maintain the innovative effort.

4. Training or preparing for use of the innovation[42]

   Organized training and implementation assistance must occur for the innovation to be successful. An understanding of the philosophy and processes which underlie the innovation must evolve to be able to implement it successfully. Training in project management as well as in project content increases the change of successful implementation.

5. Institutionalization or stabilizing the innovation[43]

   NDN field site experiences showed that adoption and institutionalization cannot be bought. Money from outside sources can be used to encourage and stimulate innovation but commitment to the innovation is necessary from the onset of the effort so that the end of the external funding does not mean the end of the program or project.

National Diffusion Network experiences reinforce Howe's conclusion that adequate planning and preparation for change, and assistance during change are extremely important factors in developing institutionalized innovations within the public schools.

As a result of a study about elementary school team teaching, Packard and Jovick[44] identified measures of predictability for success up to the conclusion of the implementation stage. Predictors proposed

---

[42]Ibid, p. 79.

[43]Ibid, p. 99.

[44]PACKARD, John S., and JOVICK, Thomas. "Predicting Success in Innovation," MITT Project, University of Oregon, Eugene, Oregon, March, 1978.

were the degree of teacher sense of mastery over the innovation, the degree of teacher satisfaction with the decision process about installing the innovation, the level of participation by teachers in the decision-making process, and the judicious use of consultants for advisement rather than direction. It was found also that the faculties of the schools having the most successful innovative projects in team teaching were predisposed to collaborative behavior. Such things as school size and the autonomy of individual schools from central office control seemed to have little long term effect on the success of the innovation. However, it was stressed by the researchers that prediction using these measures was possible only through the implementation stage.

According to Dunn and Bowers,[45] there are six considerations which help insure that an innovative program in vocational education will be maintained and institutionalized. These follow.

1. Continual reward should be given to the user.
2. Time should be provided so that the innovation can be practiced until it becomes a routine procedure.
3. The innovation should be structurally integrated into the system.
4. The innovation should be evaluated continually to assure its appropriateness.
5. The innovation should have a maintenance system to ensure that all components are in order.

---

[45]DUNN, James A., and BOWERS, John E., op. cit., p. 73.

6. There should be a continuing adaptation capability so that changes in the user system are reflected in the innovation.

Considerations discussed by Dunn and Bowers were derived from Havelock's[46] research conducted to assist external change agents in achieving the stabilization of an innovation. When careful attention is given to these considerations, school district personnel are better able to internalize the philosophy, processes and products of the innovation. Such internalization is important if institutionalization is to occur.

Gaddis[47] recently conducted a study to determine the organizational and personal variables which prevented selected elementary schools from institutionalizing Individually Guided Education (IGE). Schools under study had discontinued IGE after functioning as IGE schools for three or more years. Teachers surveyed cited lack of teacher commitment as the most significant cause of discontinuation of the effort. Building principals, on the other hand, stated that interpersonal conflict among teachers was the most significant factor. District office personnel perceived that the absence of continuing staff development was a significant cause of discontinuation. All groups surveyed stated that withdrawal of local district financial support was a major cause for the termination of IGE in their schools. Other

---

[46]HAVELOCK, Ronald G. A Guide to Innovation in Education, Institute for Social Research, The University of Michigan, Ann Arbor, Michigan, 1979, pp. 149-153.

[47]GADDIS, Marilyn Tyler. "Organizational and Personal Constraints on the Successful Institutionalization of Individually Guided Education," Technical Report No. 447, University of Wisconsin, Madison, Wisconsin, January, 1978.

factors which contributed to the demise of IGE were the lack of training for new staff members, and changes in administration, particularly in building principals, during project implementation.

As a result of her research, Gaddis concluded that weakness in, or complete absence of certain variables often led to the termination of IGE.

Districts which had discontinued IGE after three years were weak or lacking in one or more of these variables:

1. long-range financial commitment from the board of education;
2. publically stated commitment to the project by the board of education;
3. support and commitment for the project by district office personnel and building principals;
4. continuity of leadership;
5. well-planned, comprehensive and continuous staff development activities; and
6. open communication channels among teachers and between teachers and administrators.

Gaddis' research corroborates the findings of other cited research that commitment and support of all types and at all levels are vital to the institutionalization of innovations.

GOVERNMENTAL ATTEMPTS TO ENCOURAGE INNOVATION

The scope of federal activity in education has expanded over the past two decades. Through a variety of legislation, the federal monetary commitment to education has increased. Involvement of state departments

of education in the stimulation of innovation has also grown as federal efforts have increased. Both levels use the incentive grant approach as a means to encourage innovation at the local school district level.

Little has been done to determine the actual effects of the incentive grant approach. Evaluation objectives are usually a part of the grant; however, these objectives usually evaluate the goal attainment of the project during its funding period and do not address the issue of "what happens when the money ends." In the past, there have been few follow-up evaluations.

According to Kirst[48] little information exists on the continuation of innovation projects or on the lasting impact of federal change-causing efforts. Furthermore, when data have been collected, their interpretation has been so broad that it has been rendered nearly meaningless. Kirst speculates that, at the local level, federal monies have little influence on achieving long-lasting change. Innovative programs are hindered by their temporary, uncertain nature. The "soft money" status of incentive-funded projects may lead to a "this too shall pass" attitude on the part of local personnel. Incentive-funded innovative projects may have little residual impact as the money can be withdrawn at any time, and therefore, the project may be isolated from the mainstream of district activities.

It is Kirst's premise that federal money which filters through state departments of education to local school districts is not meeting the expectations with which it is granted. Institutionalization does not

---

[48]KIRST, Michael W. "The Growth and Limits of Federal Influence in Education," Occasional Paper 72-9, September, 1972, School of Education, Stanford University.

occur to the extent anticipated in the funding approach. He states that the impressive potential of the incentive grant approach is not achieved because of:

1. rapidly shifting priorities of the United States Office of Education;
2. fluctuating national commitment to educational change;
3. multiplicity of objectives that leads to a lack of primary goals;
4. inadequate planning and lead time for the submission of proposals;
5. inadequate preparation of the LEA; and
6. organizational rigidity of those LEA's that are not predisposed to change.

Thus, the failure to achieve lasting change is attributed both to the granting agency's mode of operation and to the local school district's response.*

A significant study of the federal incentive grant approach to the stimulation of educational innovation has been recently conducted by Rand Corporation for the United States Office of Education. The two-phase study addressed "federally funded programs designed to introduce and spread innovative practices in public schools."[49] Phase I reviewed change research and"... studied local innovations during their last or next to last year of funding by federal change agent programs and the research focused on the initiation and implementation of these local

---

*Further substantiation of the above conclusions occurred during a telephone conversation with Michael Kirst on February 6, 1978.

[49]BERMAN, Paul, and McLAUGHLIN, Milbrey Wallin. Federal Programs Supporting Educational Change, Vol. I: A Model of Educational Change, p. iii. Rand Corporation, Santa Monica, California, September, 1974.

projects."[50] "Phase II of the study ... examined what happened to innovative projects after the end of the federal funding period...."[51]

During Phase I of the Rand Study, researchers concluded that

> ... impact-oriented studies of innovative projects have not produced generalizable findings because they fail to deal with the interaction of the project with its institutional setting; and ... implementation problems dominate the outcomes of change processes in the educational system.[52]

Much of the literature reviewed by Berman and McLaughlin concentrated upon the degree to which projects met their stated goals. Very few studies were concerned with the interaction of the projects with their respective institutions.

Rand found two major analytical approaches being used in change-oriented research: First, an approach emphasizing adoption, and second, an approach emphasizing implementation.

Planning, adoption, and dissemination comprise the former perspective. The issues of implementation, institutionalization or institutional adaptation are neglected, and the method of change in an educational setting is not explained.

The more recently studied implementation perspective, on the other hand, defines the probability of successful innovation in terms of its strategies and inhibiting and facilitating variables. Models of

---

[50] BERMAN, Paul, and McLAUGHLIN, Milbrey Wallin. Federal Programs Supporting Educational Change, Vol. VII: Factors Affecting Implementation and Continuation, p. v. Rand Corporation, Santa, Monica, California, April, 1977.

[51] Ibid, p. vi.

[52] Ibid, pp. v-vi.

organizational behavior now become the basis for examining the reality of educational innovation. Reports having an implementation perspective concluded that

> ... the most difficult and complex part of the problem of innovation has to do not with preadoptive behavior but with postadoptive behavior, ... with the process of implementation.[53]

On this basis, the initiation of innovation is not the issue; but rather the difficulties and obstacles encountered during and following implementation become significant.

Differences between the adoption and implementation viewpoints are due largely to respective research traditions. The adoption perspective is based in medicine, agriculture, and rural sociology. Its central concern is the identification of rates of adoption of innovations. The assumption is made that innovations are relatively stable and have a product orientation. With such an orientation, goals and procedures are specific; the relationship between procedure and outcome is clear; certainty of outcome is generally present; passive user involvement is most common; and single individual adopters are characteristic.

In contrast, the implementation perspective has a base in educational research and views innovation as an evolutionary process involving the human element. In the latter case, the following attributes are pertinent: procedures may be incomplete and outcomes may be uncertain; the relationship between innovative procedures and institutional goals often is unclear; active user involvement is required; and institutional adopters are involved.

---

[53]BERMAN and McLAUGHLIN, op. cit., p. 8.

Because of the often variable and unstable nature of educational innovations, it appears that evaluation of innovations apart from the institutional setting may not be possible. Since the innovation may adjust to the institutional setting or the institutional setting may have to adapt to the innovation, it is difficult to compare similar innovations across dissimilar settings. Researchers having an adoption orientation may not consider this variability.

Researchers in the first phase of the Rand Study found that the institutionalization stage requires the most serious commitment. The process of integrating innovative projects into prevalent district policies and procedures is very complex.

Phase II of the Rand Study addresses these complexities. It describes the more far-reaching effects of federal policies aimed at stimulating local educational reform through the provision of incentive funds. The Rand researchers split institutionalization into two components: (1) individual (teacher) institutionalization called assimilation, and (2) system (district) institutionalization called incorporation. Each component can occur without the other but for complete institutionalization to take place, both must happen.

Classroom level findings of the Rand Study indicate that assimilation was dependent upon the effectiveness of project implementation and the degree of teacher change ascribable to the project. It was found that change at the classroom level depended less on project content than how the project was carried out. Also, classroom change depended more upon what the district did with the federal dollars than upon the amount of the grant.

Projects which required significant change by teachers were more likely to result in actual change, perhaps because teachers tended to take such projects more seriously. Teacher participation in project decisions increased the success of implementation activities and enhanced the chances for project continuation. Implementation strategies, such as the provision of related staff training and staff support activities affected the assimilation of the project at the classroom level. Leadership was found to be important for continuation, especially early and lasting support by the principal. It was found that a sense of efficacy on the part of the individual teacher led to increased chances of assimilation. Length of teacher experience, on the other hand, negatively influenced project continuation. Researchers found that the more experienced teachers were less likely to change because of the project; therefore, assimilation was less likely to result.[54]

At the district level, the Rand Study found four factors which affected the school district's continuation decision.[55] These were:

1. cost
2. organizational-political considerations
3. importance of the educational need served
4. perceived project success.

Continuation of an incentive-funding project depended less upon perceived success than upon the other factors. Projects which were most

---

[54]Ibid, pp. 70-149.

[55]Ibid, p. 153.

likely to continue were those in which continuation was intended from the outset. The district's initial attitude toward a specially funded project sets the stage for continuation. If continuation is planned from the beginning, the factors cited above can be manipulated to insure continuation.[56]

Difficulties encountered in sustaining and institutionalizing innovations fall into three major categories: financial, personnel, and political.[57]

The most frequently mentioned district problem in sustaining special projects was the financial one. Often the district has insufficient resources to carry on a project at the desired level of operation. Unanticipated, hidden operating costs and/or failure initially to designate money for necessary support services may be at the root of this problem. Some districts had trouble sustaining special projects because they continued to be viewed as special projects, even after the federal funds ended. This perpetuation of special status made the projects vulnerable to termination and reallocation of money which might have been available for continuation. It was found that financial difficulties encountered by local districts often could have been precluded by appropriate budgetary allocations that could have been planned for and predicted.

Personnel difficulties encountered in sustaining the incentive projects varied considerably, but as with financial difficulties, were "more or less predictable."[58] Project continuation was affected by

---

[56]Ibid, pp. 153-155.

[57]Ibid, pp. 166-172.

[58]Ibid, p. 170.

staff turnover which diluted project enthusiasm and expertise. In some projects, staff resistance proved to be a problem, particularly when efforts were made to include new teachers. An absence of leadership and support from the district's central office and/or a lack of the principal's support were cited as personnel difficulties making incorporation difficult. Also, continuation was difficult if a project director left at the end of the funded project and was not replaced, since his/her departure created a "vacuum of technical expertise, bureaucratic know-how and concern for the project."[59]

With few exceptions, political difficulties influencing project institutionalization had to do with school board or community acceptance of the project. Lack of acceptance often resulted from lack of knowledge and understanding of the project, at least in part caused by low project visibility and ineffective public relations.

The Rand Study found that in many of the projects studied there was generally a failure to plan adequately for project institutionalization. Those districts who saw the federal funds as "seed money" managed funds and other resources accordingly. Usually their projects became a part of the district's regular operations after funding ended. A far more common occurrence was an unwillingness on the part of administrators to take responsibility for the fate of the projects they initiated. A prevalent attitude found was the feeling that the ultimate responsibility for the innovative project does not lie with the local district. Rather,

---

[59]Ibid, p. 171.

if the federal government wants innovative projects institutionalized, administrators often feel the government should provide follow-up funding for project maintenance.[60]

Superintendents of school districts which institutionalized incentive-funded projects presented suggestions to increase the likelihood of project continuance.[61] They stated that institutionalization is not an issue to be considered when the last check arrives but must be planned and begun at the same time as the project proposal is developed. It must be assumed that institutionalization is an integral part of an incentive-funded project. Active measures must be taken from the outset to insure that institutionalization will occur.

Integrated efforts must be made to incorporate the innovative project in all key school district operations: the educational program, the budget process, personnel procedures, and staff support activities. Furthermore, superintendents maintained that successes achieved during the grant period must be highly visible so that necessary project support and commitment can be obtained after funding ends. Training of district personnel also is an important consideration. All district personnel should be trained to handle what needs to be done to continue the project after funding ends. Training should be provided to both administrators and faculty. It should occur in the regular work schedule of the school system.

---

[60] Ibid, pp. 172-178.

[61] Ibid.

Throughout the Rand Study, researchers found that full institutionalization occurred rarely in spite of the expectations of the federal government.[62] Researchers concurred with "... the growing belief that policymakers have overestimated the influence of federal incentives on local practices. ... federal expectations need to be adjusted to the reality of limited federal influence."[63]

Summary

Taken as a whole, the literature indicates that facilitating change in an educational institution is a highly complex task. It is an undertaking which requires careful consideration not only of the individuals involved in the process and the innovation in question, but also of the organizational setting itself. Researchers agree that the state of the organization greatly influences the probable success of innovative efforts.

Integrating innovative projects into regular school operations is difficult. Institutionalization requires substantial individual and institutional commitment. Researchers agree that institutionalization of innovation in the school setting is in need of further study. They concur that there is a need to identify and examine variables which facilitate and inhibit institutionalization.

The use of incentive grants to encourage innovation makes an already complex task even more complicated. Realities of the school

---

[62] Ibid, p. 193.

[63] BERMAN, Paul, and McLAUGHLIN, Milbrey Wallin. Federal Programs Supporting Educational Change, Vol. VIII: Implementing and Sustaining Innovations, p. 35, Rand Corporation, Santa, Monica, CA, May, 1978.

setting and expectations of the funding agency must match if lasting change is to occur. It is important to identify and understand variables which influence institutionalization if the incentive grant approach is to achieve its potential. Researchers in the area of educational change have begun to do just that.

The following conclusions can be drawn from the cited research findings.

Institutionalization must be intended from the outset of an innovative project for it most likely to occur. Planning for all aspects of change and appropriate resource allocation are necessary to achieve institutionalization. Joint decision-making involving several levels of school personnel should occur with the initiation of an incentive grant and continue beyond its termination. Commitment and support of school administrators, particularly the building principals, are important variables influencing institutionalization. Implementation strategies, especially staff development activities, influence project continuation after the funding period.

Therefore, one concludes that the factors affecting institutionalization and the total process of change are many and varied. For incentive grants effectively to bring about educational change, these variables must be identified, refined and considered.

Chapter 3

RESEARCH PROCEDURES

This chapter presents the research design of this study. The following elements are discussed: the population, the site and respondent selection, the survey instrument, the pilot study, the survey procedure, and the analysis of the results.

Population

The population for this study consisted of individuals associated with 21 incentive-funded innovative projects related to vocational education in Michigan. Sites were selected on the basis of the following criteria:

1. The innovation was MDE generated through a "request for proposals" process.
2. Only public secondary educational institutions were chosen.
3. Federal monies for incentive funding, channeled through MDE, were used.
4. It was implied that institutionalization would occur after the incentive funding stopped.
5. The incentive funding began no more than five years before the time this research was started (1977); project duration was from two to three years; funding termination occurred at least one year before this research was approved (1978).

Site and Respondent Selection

Suggestions were sought from selected MDE staff members as to projects which would meet the selection criteria. These staff members

were from the Personnel Development and Career Development units within VTES and the Research, Evaluation and Assessment Service. Individuals from these units administer, monitor or evaluate incentive-funded projects. A list of possible sites resulted. MDE staff members reviewed the list to determine if the selection criteria had been met. The list of twenty-one eligible projects contained in Appendix A resulted from this process.

VTES staff recommended a contact person at each site to whom the researcher sent letters that briefly explained the research project to solicit names and addresses of individuals who had been involved in the identified incentive-funded project (see Appendix B). Individuals in three categories were sought:

1. project administration, e.g., project director or coordinator, vocational director, member of an administrative or coordinating committee.

2. project implementation, e.g., classroom teachers, placement personnel, co-op coordinators, counselors.

3. significant others, e.g., superintendent, assistant superintendent, directors of various service areas, building principals. (Persons having a knowledge of the project but not having an active involvement with project administration or implementation.)

Copies of the letter and the participant form are provided in Appendix B.

Twenty-one letters, accompanied by one form per category for listing possible survey participants, were sent to the contact persons. Nineteen responses (90%) were received, after which a thank-you letter was sent, which is included in Appendix B. However, one response was received too late to be included in the survey; thus only eighteen projects were included.

Two individuals per category per project were randomly selected to receive the survey instrument.

Instrumentation

A questionnaire was used to collect the data for this study. A review of the literature provided the basis for selecting the variables included in the questionnaire. After reviewing the literature, a list of potential variables affecting institutionalization was compiled. Consolidation and reduction eliminated overlap and duplication. The reduced list of variables was sent to a panel of experts who had experience in administering and/or implementing incentive-funded innovative projects to critique and further reduce the list of variables. The panel included representatives from the Michigan Department of Education, the Michigan Advisory Council for Vocational Education, a university, a community college, an intermediate school district, and a local school district. In addition to reducing the list of variables, panelists also made suggestions which resulted in greater clarity of items. Variables were written in question form. Questions were reviewed for bias by panelists and research consultants. Questions were rewritten to minimize the degree of bias inherent in each.

The order of the questionnaire items was randomized using a table of random numbers with the exception of items 92-95. These items required a different response format as they were quantitative in nature and could not be used with a Likert scale. A copy of the "Institutionalization Questionnaire" is in Appendix C.

Intent of the Questionnaire

The intent was included on each questionnaire as follows:

> When a school district implements an externally funded innovative project, the district must decide what to do when the external funding ceases. The project may be dropped or it may continue as part of regular district operations. In the latter case, we say that the project has been "institutionalized." There may be certain variables which indicate that a project will continue and become institutionalized within the district. The identification of such variables is the intent of this questionnaire.

Part I of the Questionnaire

Part I of the questionnaire gathered information pertaining to the institutionalization of innovations: specifically to what extent institutionalization variables occurred in the innovative project and whether or not the presence or absence of each variable facilitated or hindered the institutionalization of the project.

The directions and scale used for Part I of the questionnaire, items 1-91, were as follows:

> Please read the questions below, keep in mind that each question is prefaced with "TO WHAT EXTENT."
>
> FIRST: circle the number on the rating scale (1-5) at the immediate right of each question to indicate to what extent this occurred in your project.
>
> SECOND: circle the number on the rating scale (1-3) at the far right of each question to indicate whether institutionalization was facilitated or hindered by the presence or absence of each item.

The scale to the immediate right of each question was prefaced with "To What Extent" and included:

1. Not at All
2. Very Little
3. No Opinion
4. Somewhat
5. A Great Deal

The scale to the far right of each question was in response to "Did this facilitate or hinder institutionalizing your project?" and included:

1. Facilitate
2. Hinder
3. Not Applicable

The directions and scale for items 92-95 were as follows:

> Please read the questions below.
>
> FIRST: circle either 1 or 2, at the immediate right of the question to indicate a "yes" or "no" response.
>
> SECOND: circle the number on the scale (1-3) at the far right of each question to indicate whether institutionalization was facilitated or hindered by the situation reflected in your response.

The scale to the immediate right of each question was:

1. Yes
2. No

The scale to the far right of each question was identical to that used for items 1-91.

Part II of the Questionnaire

Part II of the questionnaire was designed to collect data pertaining to the respondent himself/herself.

Pilot Study

A pilot study was conducted in order to determine the suitability of the questionnaire. Individuals were surveyed in each category from three of the previously identified incentive-funded projects. Sites were selected for the pilot study on a random basis. Returned questionnaires were completely filled out and respondents did not question the wording or length. Questionnaires showed consistent responses among categories of respondents for each of the three projects. Based on a 72 percent response (13 out of 18), the questionnaire was considered appropriate for this study. Pilot study responses were not included in the tabulation of final survey results.

Survey Procedure

A questionnaire, a cover letter, and a return envelope were mailed to each of the ninety previously selected respondents (two individuals in each of the categories in each of fifteen projects). To help ensure a high response rate a reminder card was sent to each individual who had not responded by three days before the deadline date stated in the cover letter. Sixty-four usable responses were returned (71.1%).

Copies of the cover letter and the reminder card, also are provided in Appendix C. Letters to each project's participants varied somewhat according to the name of the project and the role played by the respondent.

Analysis of Data

The data received from the respondents were transferred to data cards produced for use at the computer facilities at Michigan State University.

Statistical Package for the Social Sciences (SPSS) was used to analyze the data. The specific subprogram used was FREQUENCIES which provided descriptive information.

The mode as the measure of central tendency, frequency and percentages were used to describe the data received. The mode was chosen based upon the recommendation of a university research consultant, as an appropriate means to describe majority response to each variable.

Summary

The population for this study consisted of individuals associated with incentive-funded innovative projects related to vocational education in Michigan. Based upon developed criteria, site selection was made from projects recommended by MDE staff members. Eighteen projects were selected for the study. Two individuals from each of three categories were randomly selected to receive an "Institutionalization Questionnaire." This questionnaire was developed based upon a review of related literature and reactions from a panel of experts. The questionnaire was divided into two sections: Part I dealt with institutionalization variables and Part II was designed to collect demographic information about the respondents.

Before sending out the questionnaire to obtain data for analysis, a pilot study was conducted to determine questionnaire appropriateness. A 72 percent response resulted from the pilot study. Questionnaires then were sent to randomly selected individuals from fifteen projects. Sixty-four usable responses were received (71.1%). Data received was analyzed using the SPSS subprogram FREQUENCIES.

Chapter 4

FINDINGS

This chapter presents the analysis of the responses from the educators who participated in the study. The analysis is divided into two parts.

The first section describes the respondents backgrounds and includes a subsection which describes those respondents' submitting non-usable replies. The second section contains data concerning the variables which facilitate and hinder the institutionalization of incentive-funded innovations in vocational education. This section concerns directly the research questions posed in Chapter 1.

BACKGROUND OF RESPONDENTS

The data summarized in this study were compiled from the responses of 64 administrators, implementors, and "significant others" (71.1 percent response) who returned the questionnaire. The largest rate of return was from administrators and the smallest was from the "significant other" category. Table 1 summarizes the response rate of the three categories.

Responses which were not included in the data analysis were received from eleven individuals. Two questionnaires were received too late to be included and nine individuals returned blank questionnaires with accompanying letters. Virtually all of these letters expressed an interest in the research project, but claimed an inability to complete the questionnaire. There were three non-usable responses each from administrators

and implementors, and five from significant others. Table 2 summarizes the reasons for lack of questionnaire completion.

Table 1

RESPONDENTS BY CATEGORY

Category	Responses	Percent Return	No Responses	Percent	Total Sample
Administrator	24	80.0	6	20.0	30
Implementor	22	73.3	8	26.7	30
Significant Other	18	60.0	12	40.0	30
Total	64		26		90
Percent	71.1		28.9		100.0

Table 2

NON-USABLE RESPONSES BY REASON

Reason	Responses	Category	
Late Returns	2	Administrator Implementor	(1) (1)
Lack of sufficient information regarding project to be able to respond	6	Significant Other Administrator	(5) (1)
Multi-project involvement and unable to synthesize information	2	Implementor	(2)

Table 2 (Continued)

Reason	Responses	Category
Length and number of choices in questionnaire	1	Administrator (1)
Total	11	

Table 3 and 4 show the frequency and percentage of response for the data collected in Part II of the questionnaire. The typical respondent is male, 41 to 49 years old, holds a master's degree, has over 14 years' experience in education, has served his educational agency for 10 to 14 years, and has 4 to 6 years in his present position.

Table 3

PROFILE OF INSTITUTIONALIZATION QUESTIONNAIRE RESPONDENTS: AGE, SEX, LEVEL OF EDUCATION

(n = 64)

Item	Frequency	Percent
Age (years)		
25 or older		
26-30	2	3.1
31-35	13	20.3
36-40	16	25.0
41-49	19	29.7
50 or older	14	21.9
TOTAL	64	100.0
Sex		
Female	10	15.6
Male	54	84.4
TOTAL	64	100.0

Table 3 (Continued)

Item	Frequency	Percent
Level of Education		
No Response	1	1.6
Baccalaureate	6	9.4
Masters	44	68.8
Specialist	8	12.5
Doctorate	5	7.8
TOTAL	64	100.0

Table 4

PROFILE OF INSTITUTIONALIZATION QUESTIONNAIRE
RESPONDENTS: EXPERIENCE
(n = 64)

Item	Frequency	Percent
Time in Present Position		
No Response	1	1.6
1 year or less	5	7.8
1-3 years	9	14.1
4-6 years	17	26.6
7-9 years	13	20.3
10-14 years	14	21.9
over 14 years	5	7.8
TOTAL	64	100.0
Time in Present Educational Agency		
No Response	1	1.6
1 year or less	1	1.6
1-3 years	5	7.8
4-6 years	14	21.9
7-9 years	13	20.3
10-14 years	16	25.0
over 14 years	14	21.9
TOTAL	64	100.0

Table 4 (Continued)

Item	Frequency	Percent
Total Time in Education Profession		
No Response	2	3.1
1 year or less	0	0
1-3 years	0	0
4-6 years	1	1.6
7-9 years	6	9.4
10-14 years	23	35.9
over 14 years	32	50.0
TOTAL	64	100.0

The job titles of respondents are reported on Table 5. Several respondents indicated that their present job title is not the one they held while their project was receiving incentive funds.

Table 5

RESPONDENTS BY JOB TITLE
(n = 64)

Job Title	Frequency	Percent
Board of Education Member	1	1.6
Superintendent	6	9.4
Assistant Superintendent	5	7.8
Vocational Director	7	10.9
Other Service Area Director	15	23.4
High School Principal	13	20.3

Table 5 (Continued)

Job Title	Frequency	Percent
Teacher	7	10.9
Counselor	5	7.8
Other	5	7.8
TOTAL	64	100.0

VARIABLE IDENTIFICATION

Part I of the questionnaire listed the 95 selected institutionalization variables in question form. (For example, "To what extend did the vocational director support the project?")

Respondents were asked to reply in two ways: first, to indicate to what extent each variable had occurred (extent); and second, to indicate whether the presence or absence of each variable had facilitated or hindered project institutionalization (influence). The following rating scale was provided for the first part of the response (extent):

1. Not at All
2. Very Little
3. No Opinion
4. Somewhat
5. A Great Deal

This rating scale applied to the second response (influence):

1. Facilitate
2. Hinder
3. Not Applicable

Thus, each variable can be analyzed using a combination of the two responses.

Response Analysis

Questionnaire responses were analyzed in two ways.

First, data were analyzed in the aggregate. Absolute frequency and relative frequency (percent) for each scale response for each variable were tabulated. Table 1 in Appendix D presents this aggregated information. Modes are indicated by variable for both extent and influence.

Second, data were analyzed using a combination of possible responses for each variable. Table 6 provides an explanation of response combinations. Since each variable, 1 through 91, demanded two responses - extent and influence - the data were examined by pairing the extent and influence responses for each variable. By considering the extent responses, "not at all" (1) and "very little" (2) as roughly equivalent, and "somewhat" (4) and "a great deal" (5) as also equivalent, the coding by pairs displayed in Table 6 was constructed. Extent responses were paired with "facilitate" or "hinder" or "not applicable" which resulted in the codes shown in Table 6.

Thus, the response code (a+, a-, b+ ... etc.) is a single-valued measure showing both the extent and direction of any one variable's effect on institutionalization.

After codes were assigned for every response for each variable, the code appearance frequency was listed for each variable (1 through 91). Table 7 reports the appearance frequencies of the response codes for

each variable. (Variables 92 through 95 are not included in this table since the response format differed as explained in Chapter 3, page 39.) A triple asterisk in Table 7 indicates those appearance frequencies above 50 percent (i.e., above 32 responses). The 50 percent cut-off level was chosen based upon the recommendation of a university research consultant who deemed it appropriate for exploratory research of this nature. Variables which reflect these majority opinions follow Table 7.

Table 6

RESPONSE COMBINATIONS - 1 THROUGH 91

Response Code	(0) No Response	(1) Not at All	(2) Very Little	(3) No Opinion	(4) Somewhat	(5) A Great Deal	(0) No Response	(1) Facilitate	(2) Hinder	(3) Not Applicable
a+					4 and 5 paired with			1		
a-					4 and 5 paired with				2	
b+		1 and 2				paired with			2	
b-		1 and 2				paired with		1		
c+					4 and 5 paired with					3
c-		1 and 2				paired with				3
0				3 paired with total of	0 and	1 and	2 and	3		
	0			paired with total of	0 and	1 and	2 and	3		

Table 7

APPEARANCE FREQUENCY OF EACH RESPONSE CODE FOR EACH VARIABLE
1 THROUGH 91

Variable		Response Code a+	a-	b+	b-	c+	c-	0
1. Did project participants, at all levels, interact with one another?	F*	54***	3	3	1	1	0	2
	P	84.3	4.7	4.7	1.6	1.6	0	3.1
2. Were tangible incentives (e.g., released time, pay) used to motivate project staff?	F	31	2	10	3	4	10	4
	P	48.4	3.1	15.6	4.7	6.3	15.6	6.3
3. Did the initiators of the project make known the potential long-term effects?	F	52***	1	4	0	7	0	0
	P	81.2	1.6	6.3	0	10.9	0	0
4. Has the project been continued as initially implemented?	F	29	2	7	2	12	6	6
	P	45.3	3.1	10.9	3.1	18.8	9.4	9.4
5. Did people outside of the district direct the project?	F	11	7	1	17	3	19	6
	P	17.2	10.9	1.6	26.6	4.7	29.7	9.4
6. Did your school district have a history of adopting vocational education related innovations?	F	35***	0	3	0	5	11	10
	P	54.7	0	4.7	0	7.8	17.2	15.6
7. Did the vocational director support the project?	F	50***	1	5	0	0	0	8
	P	78.1	1.6	7.8	0	0	0	12.5

*F = frequency; P = percentage (n = 64); ***= responses above 50%

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
8. Was the final project evaluation positive?	F	48***	1	1	0	7	0	7
	P	75.0	1.6	1.6	0	10.9	0	10.9
9. Were regular project meetings held?	F	46***	4	5	0	1	4	4
	P	71.9	6.3	7.8	0	1.6	6.3	6.3
10. Was there a pilot test for modification of the project before large scale implementation?	F	35***	0	4	1	1	13	10
	P	54.7	0	6.3	1.6	1.6	20.3	15.6
11. Did the project increase staff workloads?	F	11	24	2	6	10	6	5
	P	17.2	37.5	3.1	9.4	15.6	9.4	7.8
12. Did final evaluation occur?	F	36***	1	1	2	8	1	15
	P	56.3	1.6	1.6	3.1	12.5	1.6	23.4
13. Does the school district have an open organizational climate?	F	39***	4	7	1	5	0	8
	P	60.9	6.3	10.9	1.6	7.8	0	12.5
14. Did the instructional and support staff feel positively about their professional competence?	F	45***	8	3	1	2	0	5
	P	70.3	12.5	4.7	1.6	3.1	0	7.8
15. Was there increased student learning as a result of the project?	F	53***	0	0	1	5	0	5
	P	82.8	0	0	1.6	7.8	0	7.8
16. Did monitoring of the project by the Michigan Department of Education occur?	F	23	3	1	4	10	8	15
	P	35.9	4.7	1.6	6.3	15.6	12.5	23.4

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
17. Did the Michigan Department of Education participate actively in the project?	F	19	2	3	7	3	11	19
	P	29.7	3.1	4.7	10.9	4.7	17.2	29.7
18. Was the innovative project mandated externally?	F	9	2	4	13	3	17	16
	P	14.1	3.1	6.3	20.3	4.7	26.6	25.0
19. Did outside people train project participants?	F	34***	2	1	6	2	10	9
	P	53.1	3.1	1.6	9.4	3.1	15.6	14.1
20. Was the project director adept in process skills?	F	54***	1	2	0	1	1	5
	P	84.3	1.6	3.1	0	1.6	1.6	7.8
21. Were intangible professional and psychological incentives (e.g., encouragement, recognition) used to motivate project staff?	F	46***	2	5	0	0	4	7
	P	71.9	3.1	7.8	0	0	6.3	10.9
22. Did the project reflect the superintendent's priorities?	F	37***	3	7	0	1	8	8
	P	57.8	4.7	10.9	0	1.6	12.5	12.5
23. Was assistance available to project participants?	F	56***	3	3	0	0	1	1
	P	87.5	4.7	4.7	0	0	1.6	1.6
24. Was there two-way oral communication between the project directors and project implementors?	F	53***	3	1	0	2	0	5
	P	82.8	4.7	1.6	0	3.1	0	7.8
25. Did the building principal participate in the training?	F	29	1	17	1	1	8	7
	P	45.3	1.6	26.6	1.6	1.6	12.5	10.9

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
26. Was there space to continue the project after the external funding ended?	F	45***	2	4	0	5	1	7
	P	70.3	3.1	6.3	0	7.8	1.6	10.9
27. Did administrators perceive the project to be successful?	F	41***	1	10	0	5	0	7
	P	64.1	1.6	15.6	0	7.8	0	10.9
28. Did both administrative and instructional levels support the initiation of the project?	F	46***	2	9	0	1	1	5
	P	71.9	3.1	14.1	0	1.6	1.6	7.8
29. Was the project easy to manage?	F	41***	2	5	0	5	0	11
	P	64.1	3.1	7.8	0	7.8	0	17.2
30. Were the merits of the project described before it was started?	F	49***	1	4	0	5	2	3
	P	76.6	1.6	6.3	0	7.8	3.1	4.7
31. Were materials available to implement the project?	F	48***	2	7	0	2	3	2
	P	75.0	3.1	10.9	0	3.1	4.7	3.1
32. Were new behaviors required by the project explained to you?	F	39***	4	4	1	3	4	9
	P	6.09	6.3	6.3	1.6	4.7	6.3	14.1
33. Were materials available to continue the project after the external funding ended?	F	41***	3	12	0	4	0	4
	P	64.1	4.7	18.8	0	6.3	0	6.3
34. Did key personnel participate in project decision making?	F	49***	4	4	0	1	0	6
	P	76.6	6.3	6.3	0	1.6	0	9.4
35. Did the vocational director participate in project training?	F	34***	0	4	0	3	10	13
	P	53.1	0	6.3	0	4.7	15.6	20.3

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
36. Was there equipment to continue the project after the external funding ceased?	F	39***	2	8	1	1	1	12
	P	60.9	3.1	12.5	1.6	1.6	1.6	18.8
37. Did the instructional and support staff have a positive attitude toward change?	F	42***	4	9	0	4	0	5
	P	65.6	6.3	14.1	0	6.3	0	7.8
38. Did the district allocate money to support the project before external funding ended?	F	29	0	20	0	0	1	14
	P	45.3	0	31.3	0	0	1.6	21.9
39. Were the demands of the project described before it was started?	F	42***	5	4	0	6	0	7
	P	65.6	7.8	6.3	0	9.4	0	10.9
40. Did the instructional and support staff perceive the project to be successful?	F	47***	3	4	0	3	1	6
	P	73.4	4.7	6.3	0	4.7	1.6	9.4
41. Were people available to implement the project?	F	48***	3	3	0	4	0	6
	P	75.0	4.7	4.7	0	6.3	0	9.4
42. Were several schools involved in the project?	F	51***	4	0	2	3	2	2
	P	79.7	6.3	0	3.1	4.7	3.1	3.1
43. Were project objectives followed as stated?	F	52***	5	1	1	3	0	2
	P	81.2	7.8	1.6	1.6	4.7	0	3.1
44. Were project participants able to satisfy their concerns and goals by their participation?	F	51***	3	3	0	1	0	6
	P	79.7	4.7	4.7	0	1.6	0	9.4
45. Did the school district adapt to project demands?	F	41***	6	3	2	4	0	8
	P	64.1	9.4	4.7	3.1	6.3	0	12.5

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
46. Do parents in the district support innovation?	F	40***	3	2	0	3	0	16
	P	62.5	4.7	3.1	0	3.1	0	
47. Did the instructional and support staff cooperate with each other in implementing the project?	F	53***	1	4	0	1	0	5
	P	82.8	1.6	6.3	0	1.6	0	7.8
48. Is management centralized within the district?	F	38***	5	1	2	7	0	11
	P	59.4	7.8	1.6	3.1	10.9	0	17.2
49. Did local people train project participants?	F	33***	4	4	2	3	9	9
	P	51.6	6.3	6.3	3.1	4.7	14.1	14.1
50. Did the projects replace previous practices, curricula or programs?	F	11	6	4	16	1	17	9
	P	17.2	9.4	6.3	25.0	1.6	26.6	14.1
51. Were involved teachers familiar with project materials, methods and/or techniques?	F	42***	1	9	4	4	0	4
	P	65.6	1.6	14.1	6.3	6.3	0	6.3
52. Did the building principal support the project?	F	46***	5	6	0	1	0	6
	P	71.9	7.8	9.4	0	1.6	0	9.4
53. Did the project supplement existing practices, curricula or programs?	F	45***	2	2	5	1	4	5
	P	70.3	3.1	3.1	7.8	1.6	6.3	7.8
54. Was reliable information about the project available to project participants?	F	54***	4	3	0	0	0	3
	P	84.3	6.3	4.7	0	0	0	4.7
55. Did administrators deal with unanticipated project-related events flexibly?	F	47***	4	2	0	3	0	8
	P	73.4	6.3	3.1	0	4.7	0	12.5

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
56. Did the project require complex integration of its activities into school programs?	F	21	11	2	18	1	4	7
	P	32.8	17.2	3.1	28.1	1.6	6.3	10.9
57. Was it perceived that the instructional and support staff maintained a sense of personal involvement in the success of the project?	F	42***	3	10	0	2	0	7
	P	65.6	4.7	15.6	0	3.1	0	10.9
58. Was the project easy to implement?	F	35***	4	11	1	3	2	8
	P	54.7	6.3	17.2	1.6	4.7	3.1	12.5
59. Is decision making centralized within the district?	F	36***	8	2	1	4	2	11
	P	56.3	12.5	3.1	1.6	6.3	3.1	17.2
60. Was the project developed by people outside of the district?	F	16	11	4	11	6	8	8
	P	25.0	17.2	6.3	17.2	9.4	12.5	12.5
61. Was the project developed by local district people?	F	33***	0	12	3	2	6	8
	P	51.6	0	18.8	4.7	3.1	9.4	12.5
62. Was there increased student motivation as a result of the project?	F	54***	0	4	0	1	1	4
	P	84.3	0	6.3	0	1.6	1.6	6.3
63. Did the instructional and support staff participate in evaluating the project	F	38***	3	7	0	4	3	9
	P	59.4	4.7	10.9	0	6.3	4.7	14.1
64. Did on-going evaluation occur?	F	44***	2	4	1	1	1	11
	P	68.8	3.1	6.3	1.6	1.6	1.6	17.2

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
65. Did the project reflect the board of education's priorities?	F	30	0	7	0	7	2	18
	P	46.9	0	10.9	0	10.9	3.1	28.1
66. Were project objectives stated?	F	54***	0	1	1	2	0	6
	P	84.3	0	1.6	1.6	3.1	0	9.4
67. Are you presently applying basic project ideas and methods in your classroom or work situation?	F	41***	2	1	0	4	4	12
	P	64.1	3.1	1.6	0	6.3	6.3	18.8
68. Was space available to implement the project?	F	50***	1	5	0	3	0	5
	P	78.1	1.6	7.8	0	4.7	0	7.8
69. Was there continuity of project management?	F	51***	4	3	0	0	0	6
	P	79.7	6.3	4.7	0	0	0	9.4
70. Did project meetings address practical concerns?	F	49***	4	0	0	3	1	7
	P	76.6	6.3	0	0	4.7	1.6	10.9
71. Does the general community support innovation in the schools?	F	48***	2	3	1	2	1	7
	P	75.0	3.1	4.7	1.6	3.1	1.6	10.0
72. Did key personnel participate in project design?	F	46***	2	4	2	0	1	9
	P	71.9	3.1	6.3	3.1	0	1.6	14.1
73. Did the district begin the project with the intent that it would continue when external funding ceased?	F	36***	4	8	0	3	0	13
	P	56.3	6.3	12.5	0	4.7	0	20.3

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
74. Did you understand your role in the project?	F	55***	2	1	0	1	0	5
	P	85.9	3.1	1.6	0	1.6	0	7.8
75. Did planning occur before the project was started?	F	54***	1	2	0	1	0	6
	P	84.3	1.6	3.1	0	1.6	0	9.4
76. Was in-service training provided to project participants?	F	55***	0	4	1	0	0	4
	P	85.9	0	6.3	1.6	0	0	6.3
77. Were project materials developed by project staff?	F	49***	1	3	2	2	4	3
	P	76.6	1.6	4.7	3.1	3.1	6.3	4.7
78. Did the project require change in staff behavior?	F	26	15	3	4	1	6	9
	P	40.6	23.4	4.7	6.3	1.6	9.4	14.1
79. Was the project compatible with existing activities of the system?	F	46***	3	3	0	4	0	8
	P	71.9	4.7	4.7	0	6.3	0	12.5
80. Were several instructional and support staff involved in the project?	F	50***	0	2	1	3	1	7
	P	78.1	0	3.1	.6	4.7	1.6	10.9
81. Was time available for implementation?	F	49***	1	7	0	0	0	7
	P	76.6	1.6	10.9	0	0	0	10.9
82. Did key personnel participate in project training?	F	52***	1	2	0	0	0	9
	P	81.2	1.6	3.1	0	0	0	14.1
83. Was the innovative project mandated internally?	F	22	6	6	6	1	9	14
	P	34.4	9.4	9.4	9.4	1.6	14.1	21.9

Table 7 (Continued)

Variable		Response Code a+	a-	b+	b-	c+	c-	0
84. Did the project adapt to school district needs?	F	53***	0	2	0	1	0	8
	P	82.8	0	3.1	0	1.6	0	12.5
85. Was equipment available to implement the project?	F	49***	2	3	0	1	2	7
	P	76.6	3.1	4.7	0	1.6	3.1	10.9
86. Are the objectives of the project still in effect within your school district?	F	50***	1	1	0	4	3	5
	P	78.1	1.6	1.6	0	6.3	4.7	7.8
87. Was the district participating in other innovative projects?	F	33***	7	2	5	3	5	9
	P	51.6	10.9	3.1	7.8	4.7	7.8	14.1
88. Are there strong collective bargaining units within the district?	F	17	12	0	1	20	5	9
	P	26.6	18.8	0	1.6	31.3	7.8	14.1
89. Was there perceived risks and uncertainty connected with the project?	F	8	20	2	11	4	7	12
	P	12.5	31.3	3.1	17.2	6.3	10.9	18.8
90. Has your district continued local funding of the project?	F	34***	1	13	0	3	6	7
	P	53.1	1.6	20.3	0	4.7	9.4	10.9
91. Is the current attitude in the school district toward the project positive?	F	43***	1	4	0	4	4	8
	P	67.2	1.6	6.3	0	6.3	6.3	12.5

Variables that Facilitate Institutionalization

Of the 64 respondents, 32 or more indicated that the following variables facilitate institutionalization. This information was extracted from Table 7 by determining those variables for which the response code appearance frequency was greater than 50 percent in the column headed a+. It is also noteworthy that no response code appearance frequency greater than 50 percent appeared in any column other than the a+ column. One should keep in mind that the a+ code represents that combination of responses comprised of "somewhat" and "a great deal" with "facilitates." Variables are arranged with percentages in descending order.

Institutionalization is facilitated by:

A great amount of assistance available to project participants (Variable 23, a+ = 87.5%).

A high level of understanding concerning individual roles in an innovative project (Variable 74, a+ = 85.9%).

Provision of a great deal of inservice training (Variable 76, a+ = 85.9%).

A great amount of interaction among project participants at all levels (Variable 1, a+ = 84.3%).

A high degree of adeptness in process skills on the part of a project director (Variable 20, a+ = 84.3%).

The availability of reliable information about the project which is accessible by project participants (Variable 54, a+ = 84.3%).

Increased student motivation as a result of the project (Variable 62, a+ = 84.3%).

Planning before project start-up (Variable 75, a+ = 84.3%).

Stating project objectives (Variable 66, a+ = 84.3%).

Two-way oral communication between project directors and project staff (Variable 24, a+ = 82.8%).

Project adaptation to school district needs (Variable 84, a+ = 82.8%).

Staff cooperation during project implementation (Variable 47, a+ = 82.8%).

Increased student learning as the result of an innovative project (Variable 15, a+ = 82.8%).

The participation of key personnel in project training (Variable 82, a+ = 81.2%).

Following project objectives as stated (Variable 43, a+ = 81.2%).

The project initiators making known the potential long-term effects of the project (Variable 3, a+ = 81.2%).

Involving several schools in the innovative project (Variable 42, a+ = 79.7%).

Satisfying project participants' concerns and goals by project participation (Variable 44, a+ = 79.7%).

Continuity of project management (Variable 69, a+ = 79.7%).

Strong vocational director support of the project (Variable 7, a+ = 78.1%).

Having adequate space available for project implementation (Variable 68, a+ = 78.1%).

Involvement of several staff members in the innovative project (Variable 80, a+ = 78.1%).

Strong continuation of project objectives (Variable 86, a+ = 78.1%).

Describing project merits before project start-up (Variable 30, a+ = 76.6%).

The participation of key personnel in project decision making (Variable 34, a+ = 76.6%).

Addressing practical concerns at project meetings (Variable 70, a+ = 76.6%).

The development of project materials by project staff (Variable 77, a+ = 76.6%).

Having ample time for project implementation (Variable 81, a+ = 76.6%).

Having sufficient equipment available for project implementation (Variable 85, a+ = 76.6%).

Having positive final project evaluation (Variable 8, a+ = 75.0%).

Having materials available to implement the innovative project (Variable 31, a+ = 75.0%).

A high level of community support of school innovation (Variable 71, a+ = 75.0%).

Having sufficient people available to implement an innovative project (Variable 41, a+ = 75.0%).

Perceptions of project success on the part of instructional and support staff (Variable 40, a+ = 73.4%).

Administrative flexibility in dealing with unanticipated project-related events (Variable 55, a+ = 73.4%).

Holding regular project meetings (Variable 9, a+ = 71.9%).

Using tangible incentives to motivate project staff (Variable 21, a+ = 71.9%).

Support of project initiation from both administration and instructional levels (Variable 28, a+ = 71.9%).

Building principal support of the project (Variable 52, a+ = 71.9%).

Participation of key personnel in project design (Variable 72, a+ = 71.9%).

Project compatibility with existing activities of the school district (Variable 79, a+ = 71.9%).

Possession of positive feelings about their professional competence on the part of the instructional and support staff (Variable 14, a+ = 70.3%).

Having adequate space to continue the project after funding termination (Variable 26, a+ = 70.3%).

Supplementing existing practices, curricula or programs with the innovative project (Variable 53, a+ = 70.3%).

The occurrence of formative evaluation (Variable 64, a+ = 68.8%).

Positive current attitudes in the school district toward the project (Variable 91, a+ = 67.2%).

Positive attitudes toward change on the part of instructional and support staff (Variable 37, a+ = 65.6%).

Describing project demands before starting the project (Variable 39, a+ = 65.6%).

Familiarity on the part of teachers, with project materials, methods and/or techniques (Variable 51, a+ = 65.6%).

Staff maintenance of a high sense of personal involvement in project success (Variable 57, a+ = 65.6%).

Having an easy to manage project (Variable 29, a+ = 64.1%)

Having available sufficient materials to continue the project after funding termination (Variable 33, a+ = 64.1%).

Adaptation of the school district to project demands (Variable 45, a+ = 64.1%).

Present application of basic project concepts (Variable 67, a+ = 64.1%).

Administrative perception of project success (Variable 27, a+ = 64.1%).

Parent support of innovation (Variable 46, a+ = 62.5%).

Having an open organizational climate (Variable 13, a+ = 60.95).

Explaining new behaviors required by the project (Variable 32, a+ = 60.9%).

Having equipment available for project continuation (Variable 36, a+ = 60.9%).

Having centralized district management (Variable 48, a+ = 59.4%).

Instructional and staff participation in project evaluation (Variable 63, a+ = 59.4%).

The project's reflection of the superintendent's priorities (Variable 22, a+ = 57.8%).

The occurrence of final project evaluation (Variable 12, a+ = 56.3%).

Having centralized district decision making (Variable 59, a+ = 56.3%).

The intention, at project start-up, to continue the innovative project after the incentive funding ends (Variable 73, a+ = 56.3%).

Having a history of adopting vocational education related innovatives (Variable 6, a+ = 54.7%).

Having a pilot test for project modification (Variable 10, a+ = 54.7%).

Having a project which is easy to implement (Variable 58, a+ = 54.7%).

Using outside people to train project participants (Variable 19, a+ = 53.1%).

The participation of the vocational director in project training (Variable 35, a+ = 53.1%).

Having a continuation of local funding for the incentive project (Variable 70, a+ = 53.1%).

Having project training conducted by local people (Variable 49, a+ = 51.6%).

District participation in other innovative projects (Variable 87, a+ = 51.6%).

Having the project developed by local district people (Variable 61, a+ = 51.6%).

Seventeen variables showed no distinct trends in either the analysis presented in Table 7 or in the aggregate information presented in Table I, Appendix D. No inferences can be drawn concerning these seventeen variables: numbers 2, 4, 5, 11, 16, 17, 18, 25, 38, 50, 56, 60, 65, 78, 83, 88, and 89, since no response code appearance frequency for any were greater than 50 percent. A wide variety of code responses occurred for each of these variables; therefore, judgment concerning their influence upon institutionalization is not possible.

None of the variables in the study can be considered as hindering institutionalization since no response code appearance frequency in the a- and b+ columns of Table 7 was greater than 50 percent.

Variables 92 through 95 were analyzed, Table 8, using a procedure similar to that followed for variables 1 through 91. Table 8 displays the response combinations for variables 92 through 95.

Table 8

RESPONSE COMBINATIONS 92 THROUGH 95

Response Code	(0) No Response	(1) Yes	(2) No	(0) No Response	(1) Facilitate	(2) Hinder	(3) Not Applicable
1		1 paired with			1		
2		1 paired with				2	
3		1 paired with					3
4			2 paired with		1		

Table 8 (Continued)

Response Code	(0) No Response	(1) Yes	(2) No	(0) No Response	(1) Facilitate	(2) Hinder	(3) Not Applicable
5			2	paired with		2	
6			2	paired with			3
NR	0	paired with		0 and	1 and	2 and	3
		1 and 2 paired with		0			

The frequency of responses for each possible combination was determined for each variable for every respondent. Table 9 reports the results; again code response appearance frequencies above 50 percent are noted with a triple asterisk.

Based upon results displayed in Table 9, one may conclude that only Variables 94 and 95 influence institutionalization. In both cases the response code of 1 is above 50 percent and indicates that positive response to the variable question facilitates institutionalization. Thus, this inference is appropriate: a low turnover rate among both administrative and instructional and support staff facilitates institutionalization.

In the case of Variable 92 and 93 responses are widely distributed with no response code appearance frequency above 50 percent. Therefore, no valid judgment can be made concerning these variables.

Table 9

APPEARANCE FREQUENCIES OF EACH RESPONSE CODE FOR EACH VARIABLE 92 THROUGH 95

Variable		Response Code 1	2	3	4	5	6	NR
92. Has the superintendent been in the school district three years or less?	F*	12	2	9	16	5	16	4
	P	18.6	3.1	14.1	25.0	7.8	25.0	6.3
93. Has the superintendent been in the school district seven years or more?	F	23	3	10	3	3	14	8
	P	35.9	4.7	15.6	4.7	4.7	21.9	12.5
94. Is there a low turnover rate among instructional and support staff?	F	42***	4	9	1	2	2	4
	P	65.6	6.3	14.1	1.6	3.1	3.1	6.3
95. Is there a low turnover rate among district administrators?	F	42***	3	8	2	2	2	5
	P	65.6	4.7	12.5	3.1	3.1	3.1	7.8

*F = frequency; P = percent; *** = responses above 50 percent

Chapter 5

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

SUMMARY

The Problem

The first purpose of this study was to provide information to individuals from local school districts who are considering initiating incentive-funded projects. This study identified major variables which influence institutionalization. Such information can be used by school administrators and project planners as a guide so that institutionalization will most likely occur, if that is the desired end.

A second purpose of this study was to provide scholars and students of planned change with useful information on which to base future research. This research provided information about institutionalization in vocational education related areas that was not formerly available.

A third purpose of this study was to direct incentive grant awarders to the key variables influencing institutionalization. Knowledge of these variables enables project developers to structure the grant awarding process and accompanying guidelines so that institutionalization, when desired, will most likely occur. Prerequisites for project proposal submission can be coordinated with variables that facilitate institutionalization.

The fourth purpose of this study was to provide teacher educators with information that will be useful in broadening the scope of programs to prepare school personnel. By identifying variables which influence

institutionalization, teacher educators can help school personnel to be knowledgeable about initiating and implementing incentive-funded innovative projects.

Thus, the problem in this study was to determine the variables which influence the institutionalization of incentive-funded innovations in vocational education related areas.

Research Procedures

The population for this study was individuals associated with fifteen incentive-funded innovative projects related to vocational education in Michigan. Sites were selected from projects recommended by MDE staff members and based upon specific criteria.

A questionnaire was used to collect data. Six individuals from each project were randomly selected to receive an institutionalization questionnaire. Part I of the questionnaire was concerned with the extent to which variables had occurred within each project and whether or not institutionalization was facilitated or hindered by the presence or absence of each variable. Part II of the questionnaire collected demographic information.

Findings

The data presented in this study were compiled from the responses of the 64 individuals (71.1 percent response) who returned the questionnaire.

It was found that in 76 of 95 variables on the questionnaire over half of the respondents indicated that the presence of each variable facilitated institutionalization.

The remaining 19 variables showed inconclusively mixed responses, and thus, no judgment can be made concerning their influence upon institutionalization.

None of the variables emerged from the study as clearly hindering institutionalization.

Findings concerning the influence of variables on the Institutionalization Questionnaire can be categorized as follows:

1. Facilitating variables exerting major influence upon institutionalization: variables above the median (73.4%) of the response code (a+) appearance frequence.

2. Facilitating variables exerting some influence upon institutionalization: variables whose (a+) response code appearance frequency is between 73.4 percent and 50.0 percent.

3. Variables for which no judgment can be made: variables whose response code appearance frequency in any response code is below 50.0 percent.

Based on the categorizations above, the following result is stated:

Variables of major importance (Categoryl, above) which facilitate institutionalization are:

1. A great amount of assistance available to project participants.

2. A high level of understanding concerning individual roles in an innovative project.

3. Provision of a great deal of inservice training.

4. A great amount of interaction among project participants at all levels.

5. A high degree of adeptness in process skills on the part of a project director.

6. The availability of reliable information about the project which is accessible by project participants.

7. Increased student motivation as a result of the project.

8. Planning before project start-up.

9. Stating project objectives.

10. Two-way oral communication between project directors and project staff.

11. Project adaptation to school district needs.

12. Staff cooperation during project implementation.

13. Increased student learning as the result of an innovative project.

14. The participation of key personnel in project training.

15. Following project objectives as stated.

16. The project initiators making known the potential long-term effects of the project.

17. Involvement of several schools in the innovative project.

18. Satisfaction of project participants' concerns and goals by project participation.

19. Continuity of project management.

20. Strong vocational director support of the project.

21. Adequate space available for project implementation.

22. Involvement of several staff members in the innovative project.

23. Strong continuation of project objectives.

24. Description of project merits before project start-up.

25. The participation of key personnel in project decision making.

26. Addressing practical concerns at project meetings.

27. The development of project materials by project staff.

28. Ample time for project implementation.

29. Sufficient equipment available for project implementation.

30. Positive final project evaluation.

31. Materials available to implement the innovative project.

32. A high level of community support of school innovation.

33. Sufficient people available to implement an innovative project.

34. Perceptions of project success on the part of instructional and support staff.

35. Administrative flexibility in dealing with unanticipated project-related events.

It is also of interest that there are 41 variables in Category 2 which exert some influence to facilitate institutionalization and 19 variables in Category 3 for which no judgment can be made concerning their influence upon institutionalization.

CONCLUSIONS

In this study 35 variables have been identified as exerting major influence upon institutionalization. Each plays an important role in the facilitation of change and the institutionalization of innovative projects. These major variables may be loosely grouped into the following divisions: staff development activities, affective orientations, communications aspects, administrative characteristics, student impact, project-related components, planning and logistical considerations, and scope of involvement.

Staff development activities play a major role in the successful institutionalization of incentive-funded innovative projects. Substantial, practical inservice training must be provided to project participants, followed by whatever assistance is necessary to implement the project. It is important that key personnel from all levels participate in staff development activities.

Satisfaction of affective concerns is an important factor in achieving institutionalization. Individual goal achievement as a result of project participation is important. School personnel must clearly understand their roles in the project and any role changes necessitated by project participation. A project which is perceived to be successful and which satisfies individual concerns is more likely to achieve institutionalization than one which does not.

Variables which have a communications orientation are extremely important in facilitating institutionalization. Considerable participant interaction, including two-way oral communication, is vital. Interaction should occur between and among all levels of school personnel and will likely result in increased staff cooperation. Information exchanged must be reliable and easily accessed by all. Project participants also need to have the opportunity to learn about and question project merits and potential long-term project effects.

Administrative characteristics play an important role in achieving an institutionalized project. Project administrators who are adept in process skills and flexible in dealing with project contingencies increase the chances of project continuance. Continuity of these administrators

is important to maintain positive project momentum. Support of, and commitment to the project by the vocational director is critical to the institutionalization of vocational education related projects.

While variables related to student impact are not the most important variables in facilitating institutionalization, they are, nonetheless, important. Increased student motivation and learning as a result of the project are the most important student impact variables.

Allowing adequate planning time before project start-up is an important variable which influences other variables having a logistical orientation. Having enough space, equipment and materials for project implementation is important for project survival, and thus, affects project institutionalization. Ample time must be allotted for project implementation as implementation greatly influences continuation. Involvement of sufficient personnel to adequately implement a project also facilitates institutionalization.

Several variables surfaced as project-related components influencing potential institutionalization. When the innovative project itself can be adapted or modified to meet school district needs, institutionalization potential is enhanced. Clearly stating and following project objectives is important; but here too, modification should occur, if necessary. Materials which are required for project implementation should be developed by project participants. Projects which terminate with a positive final evaluation also are more likely to continue than those which do not.

Projects for which institutionalization is desired should involved a wide variety of personnel in all aspects of project life. The

participation of key personnel from both administrative and instructional levels is particularly important in project decision making. Active community support of the innovation can be included in this scope of involvement category.

In conclusion, it is important to recognize that each variable may affect and be affected by every other variable. Presence of the major facilitating variables alone may not be enough to insure institutionalization. Variation in terms of degree and quality of each variable may, in fact, cause variation in terms of the institutionalization outcome. However this study clearly identifies some factors that have a strongly positive effect on the institutionalization of incentive-funded innovative projects in vocational education related areas.

RECOMMENDATIONS

The following recommendations are made which relate to the purposes of the study:

1. That local school district personnel be aware of and understand the major variables which influence institutionalization before initating incentive-funded projects. Categories of major variables include staff development activities, affective orientation, communications aspect, administrative characteristics, student impact, project-related components, planning and logistical considerations, and scope of involvement.

2. That additional research be conducted concerning the institutionalization of innovations in vocational educated related areas. Research in three areas is recommended:

    a. Case studies involving institutionalized and non-institutionalized incentive-funded

projects should be conducted. Case study methodology can provide in-depth information centering upon the three categories of variables identified in this study.

b. Research should be conducted to further investigate variables found in Category 2 (page 71). While these variables exert some facilitating influence (a+ code), there are other code responses which appear with some strength, although not reaching the 50.0 percent response rate.

c. Study should be made of the Category 3 variables (page 71) which did not achieve a 50.0 percent response level and for which no judgments can be made. Considerable variation occurred within the code responses for these variables; yet, some variables appeared with strength but not to the 50.0 percent response rate.

3. That incentive grant awarding agencies be aware of, understand and use information about the major variables which facilitate institutionalization. However, before such information is used, grant awarders must determine whether or not institutionalization is a desired end. If it is, then this expectation must be communicated explicitly to potential grant recipients. Once the expectation of institutionalization is determined and communicated, then knowledge of facilitating variables should be shared with local district personnel to help insure the desired outcome. Institutionalization requisites can be incorporated into guidelines for incentive project proposal submission. Adequate time for proposal development and project implementation must then be provided so that institutionalization potential is realized. In conjunction with guideline establishment, funding agents should establish checkpoints which help district personnel evaluate progress leading to an institutionalized project. To further local efforts, funding agents should consider requiring third-party evaluation to be an integral component of an incentive-funded innovative project. Third party evaluation should be both concurrent and terminal in nature.

4. That vocational teacher educators include the study of educational change and its' facilitation in present graduate program requirements. In graduate and inservice programs emphasis should be placed upon initiating, implementing, and institutionalizing incentive-funded innovative projects. Grantsmanship oriented programs also should be provided to complement change oriented course offerings.

CAUTIONS TO THE READER

Limitations are inherent in this study which must be taken into consideration by the reader in the event that he/she decides to conduct further research related to the findings of the study. Such limitations are not prohibitive, yet must be noted as cautions of which the reader should be aware.

Due to the highly complex nature of educational change and institutionalization itself, ambiguity is present in the nature of the topic itself. While it is possible to identify major facilitating variables, other less tangible influences may surface unexpectedly during the life of an incentive project which may greatly affect its' institutionalization potential and reality.

It may be difficult to replicate the study, particularly due to the specific nature of the relatively small number of incentive projects chosen for inclusion in the study. In addition to which, the time factor used as a criterion for project selection may hinder location and accessibility of former project participants. Characteristics of the survey instrument itself may affect replicability of the study and serve as a caution to the reader. For example, it is not known how the questionnaire respondents interpreted the term "not applicable" on the rating scale. One respondent may have interpreted the term to mean not important as far as influencing institutionalization; whereas another respondent may have used the term to mean that it was not appropriate, from his/her perspective, to respond to the influence of the variable itself. Other terms used on the rating scale may have been subject to quantitative interpretation variance on the part of questionnaire respondents.

The group of respondents termed "significant others" was assumed to have sufficient knowledge and understanding of the incentive projects under study to be able to complete the questionnaire. In reality this assumption may not have been valid as evidenced by the low return rate in this category and the number of non-usable "significant other" responses.

The method of analysis chosen for this study is not a standardized analytical technique and may itself serve as a caution to the reader. For example, the positive and negative signs of the response codes were chosen on a mathematical basis and may need to be revised for the sake of face value consistency.

While these limitations should serve as cautions to the reader who may conduct related research, they in no way negate the value either of this study or related future research.

GENERAL OBSERVATIONS

This work clearly substantiates the intuitive idea that institutionalization is a complex issue which is not to be taken lightly either by grant awarding agencies or grant recipients.

BIBLIOGRAPHY

BIBLIOGRAPHY

BARNETT, H.G. Innovation: The Basis of Cultural Change. McGraw-Hill Book Company, Inc., New York, 1953.

BELL, Gerald D. (ed.). Organizations and Human Behavior. Prentice-Hall, Inc., Englewood Cliffs, New Jersey, 1967.

BENNIS, Warren G.; BENNE, Kenneth D.; and CHIN, Robert (eds.). The Planning of Change. Holt, Rinehart, and Winston, New York, 1961.

BERMAN, Paul, and McLAUGHLIN, Milbrey Wallin. Federal Programs Supporting Educational Change, Vol. I: A Model of Educational Change. Rand Corporation, Santa Monica, California, September, 1974.

_____. Federal Programs Supporting Educational Change, Vol. IV: The Findings in Review. Rand Corporation, Santa Monica, California, April, 1975.

_____. Federal Programs Supporting Educational Change, Vol. VII: Factors Affecting Implementation and Continuation. Rand Corporation, Santa Monica, California, April, 1977.

_____. Federal Programs Supporting Educational Change, Vol. VIII. Rand Corporation, Santa Monica, California, May, 1978.

BERMAN, Paul, and PAULY, Edward W. Federal Programs Supporting Educational Change, Volume II: Factors Affecting Change Agent Projects. Rand Corporation, Santa Monica, California, April, 1975.

BENTZEN, Mary M. (ed.). Changing Schools: The Magic Feather Principle. McGraw-Hill Book Company, New York, 1974.

BUSHNELL, David S., and RAPPAPORT, Donald (eds.). Planned Change in Education: A Systems Approach. Harcourt, Brace, Jovanovich, Inc., New York, 1971.

COGAN, Morris L. Educational Innovation: Educational Wasteland, Theory Into Practice, June, 1976, 15 (3).

CULVER, Carmen J., and HOBAN Gary J. (eds.). The Power to Change: Issues for the Innovative Educator. McGraw-Hill Book Company, New York, 1973.

DUNN, James A., and BOWERS, John E. Vocational Education Curriculum Specialist Project, American Institute for Research, Palo, Alto, California, 1976. Module II.

GADDIS, Marilyn Tyler. "Organizational and Personal Constraints on the Successful Institutionalization of Individually Guided Education," Technical Report No. 447, University of Wisconsin, Madison, Wisconsin, January, 1978.

GROSS, Neal; GIACQUINTA, Joseph B.; and BERNSTEIN, Marilyn. Implementing Organizational Innovations: A Sociological Analysis of Planned Educational Change. Basic Books, Inc., New York, 1971.

HAGE, Jerald, and AIKEN, Michael. Social Change in Complex Organizations. Random House, New York, 1970.

HAVELOCK, Ronald G. A Guide to Innovation in Education. Institute for Social Research. University of Michigan, Ann Arbor, Michigan, 1970.

_____. Planning for Innovation Through Dissemination and Utilization of Knowledge. Institute for Social Research. University of Michigan, Ann Arbor, Michigan, 1971.

HELMER, O. The Use of the Delphi Technique in Problems of Educational Innovations. Rand Corporation, Santa Monica, California, 1966. No. P-3499.

HIRSCH, Werner Z. and Colleagues. Inventing Education for the Future. Chandler Publishing Company, San Francisco, California, 1967.

HOWES, Nancy J. "Factors Related to the Institutionalization of Changes in Divergent Organizations." Paper presented at the Annual Meeting of the Northeastern Research Association, Ellenville, New York, October, 1976.

_____. "A Contingency Model for Predicting Institutionalization of Innovations Across Divergent Organizations." Paper presented at AERA Meeting, New York, New York, April, 1977.

HULL, William L., and WELLS, Randall L. The Classification and Evaluation of Innovations in Vocational and Technical Education. The Ohio State University, Columbus, Ohio, 1972.

HUSE, E.F. Organization Development and Change. West Publishing Company, New York, 1975.

KIRST, Michael W. "The Growth and Limits of Federal Influence in Education," Occasional Paper 72-9, September, 1972, School of Education, Stanford University.

LEVIN, Kurt. Principles of Topological Psychology. McGraw-Hill Book Company, New York, 1936.

LIPPITT, Gordon L. Visualizing Change. N.T.L. - Learning Resources Corporation, Fairfax, Virginia, 1973.

MANN, Floyd C., and NEFF, Franklin W. Managing Major Change in Organizations. Foundation for Research on Human Behavior. Braun and Brumfield, Inc., Ann Arbor, Michigan, 1961.

MILES, Matthew B. (ed.). Innovations in Education. Teachers College Press, Columbia University, New York, 1964.

New Dimensions for Educating Youth. A Bicentennial Conference Report on America's Secondary Schools, USOE/NASSP, 1976.

PACKARD, John S., and JOVICK, Thomas. "Predicting Success in Innovation." MITT Project, University of Oregon, Eugene, Oregon, March, 1978.

Research Implications for Education Diffusion. Major Papers Presented at the National Conference on Diffusion of Educational Ideas, East Lansing, Michigan, 1968.

Research in Industrial Human Relations. Industrial Relations Research Association, Publication 17, 1957.

ROBERTS, Roy W. Vocational and Practical Arts Education. Harper and Row, New York, 1971.

ROGERS, Everett M. Diffusion of Innovations. The Free Press, MacMillan Company, New York, 1962.

ROGERS, E.L., and SHOEMAKER, Floyd F. Communication of Innovations. 2nd ed., Free Press, New York, 1971.

The Annual and Long Range State Plan for Vocational Education, 1977-78. Michigan Department of Education, Third Working Draft.

Transferring Success. National Diffusion Network, Far West Laboratory for Educational Research and Development, San Francisco, March, 1976.

VENN, Grant. "Seeking an Administrative Commitment to Innovation." Center for Vocational Education, The Ohio State University, Columbus, Ohio, April, 1976.

VON HADEN, Herbert I., and KING, Jean Marie. Innovations in Education. Charles A. Jones Publishing Company, Worthington, Ohio, 1971.

WANGERIN-MEYER, Judith. Diffusion of an American Montessori Education. The University of Chicago, Chicago, Illinois, 1975.

ZALTZMAN, Gerald (ed.). Processes and Phenomena of Social Change. John Wiley and Sons, New York, 1973.

APPENDIX A

INCENTIVE-FUNDED PROJECTS

	Total Population*	Total Sample	Total Respondents
Mobile Career Development Laboratory Project			
Charlevoix-Emmet ISD	36	6	2
Gogebic-Ontonagon ISD	15	6	3
Eastern Upper Peninsula ISD	18	6	4
Career Development Support Services Program			
Kalamazoo Valley ISD	10	6	3
Charlevoix-Emmet ISD	42	6	1
Kent ISD	17	6	6
Macomb ISD	15	6	3
Genesee ISD	**	-	-
Calhoun ISD	**	-	-
Cheboygan-Otsego-Presque Isle ISD	**	-	-
Area Placement Project			
Gratiot-Isabella ISD	23	6	6
Genesee ISD	10	6	3
Gogebic-Ontonagon ISD	15	6	6
Muskegon ISD	16	6	6
Lenawee ISD	15	6	6
UP Placement Project	18	6	6
Career Exploration and Related Training			
Eastern Upper Peninsula ISD	16	6	5
Vocational Education Reading Power Project			
Oakland ISD	9	6	4
Career Development Project			
Coloma School District	14	6	6
Curriculum Development Project			
Capitol Area Career Center	8	6	3
Computer Management System Project			
Capitol Area Career Center	9	6	4
TOTAL	316	108	64

*Names received from contact persons for each project. (These numbers may not represent actual number of project participants; rather names for which addresses were available.)

**No response or received too late for inclusion.

GENERIC PROJECT DESCRIPTIONS

The Mobile Career Development Laboratory Projects focused upon the provision of career information and awareness to high school students. Decision-making for vocational selection was heavily stressed as were self awareness activities. Materials development and collection and inservice training were among the project components. Projects moved from original reliance on mobile units into career information centers within the schools.

The Career Development Support Services Program projects provided inservice and assistance in the development and use of career development oriented materials. A career guidance component was included. Project activities focused upon teachers the first year and upon students the second year.

The Area Placement Projects were intended to develop placement programs at the secondary level. Record keeping procedures, follow-up activities, and the establishment of community contacts were included in these projects. Training of placement personnel in materials use and placement strategies were a part of these projects.

The Career Exploration and Related Training projects developed a two-phase approach to career exploration. Emphasis was placed upon career awareness at the junior high school level and upon career exploration at the high school level. Student and teacher oriented materials were developed covering all areas of life role competencies. Training packages and an implementation process to be used by teachers were also developed.

The Vocational Education Reading Power Project had as its major intent, the closing of the gap between reading difficulty levels of instructional materials and reading problems encountered by secondary students in vocational education. As a result of the project, modified reading materials for students and training packages for teachers were developed. Reading skill improvement was incorporated into vocational instruction.

The Career Development Project at the secondary level had a three-pronged orientation. Emphasis was upon the incorporation of a career planning course into the school curricula. This class included self-awareness and career exploration activities. Emphasis was also upon inservice activities with teachers related to infusing career development into the classroom. And third, as a guidance component, was the development and implementation of a model to help students plan for their career preparation.

The Curriculum Development Project (CDP) centered around the planning, development, and implementation of individualized, self-paced, modularized units of instruction in the vocational classroom. It was essentially a curricular system designed around a career ladder approach to meet the needs of students at all levels of ability and aspiration. The Computer Management System Project complemented the CDP and had as its purpose the development of a computerized system to manage the individualized curriculum approach so that instructors could readily access, modify, and use needed materials and information.

APPENDIX B

Agricultural and Natural Resources Education Institute
410 Agriculture Hall (517) 355-6580
Michigan State University East Lansing, Michigan 48824

November 14, 1978

Dear (Name):

You may remember working with (Name) on the (Name of Project). He suggested that I contact you for a list of people associated with it.

There has been a considerable amount of interest in the institutionalization of externally funded projects in vocational education. I am preparing a study to determine the important variables that affect the success of institutionalization. To collect this information, I have to get in touch with teachers, administrators, and others associated with the project.

Your cooperation in providing me with their names and addresses on the enclosed forms would be greatly appreciated. If you could furnish me with at least five names in each category, I could arrive at a valid sample. Some of the people you might think of may have moved away. Would you please include their names and addresses, if you know them, anyway?

(Name), thank you very much for your help.

Sincerely,

Linda S. McFaul
Articulation Consultant

LSM/caf

Enclosures

PROJECT ADMINISTRATION

Individuals in this category should represent project administration, i.e., project director or coordinator, vocational director, members of an administrative or coordinating committee, etc. These persons should have been involved, if possible, throughout the duration of the project on a regular continuing basis.

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

PROJECT IMPLEMENTATION

Individuals in this category should represent project implementors, i.e., classroom teachers, placement personnel, co-op coordinators, counselors, etc. These persons should have been involved, if possible, throughout the duration of the project on a regular continuing basis.

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

SIGNIFICANT OTHERS

Individuals in this category should be persons having a knowledge of the project, but not having an active involvement with project administration or implementation. Such persons might include: superintendent, assistant superintendent, directors of various service areas, building principals, etc.

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

NAME _____
ADDRESS _____
_____
_____
_____

Agricultural and Natural Resources Education Institute
410 Agriculture Hall (517) 355-6580
Michigan State University East Lansing, Michigan 48824

December 14, 1978

Dear (Name):

Thank you for providing me with the names and addresses of individuals associated with the (Name of Project). Your response will help me carry out the next step of the study dealing with the institutionalization of externally funded projects in vocational education.

(Name), thank you very much for your help.

Sincerely yours,

Linda S. McFaul
Articulation Consultant

LSM/caf

APPENDIX C

Agricultural and Natural Resources Education Institute
410 Agriculture Hall (517) 355-6580
Michigan State University East Lansing, Michigan 48824

January 30, 1979

Dear (Name):

You have been identified by your professional colleagues as an individual who played a key role in the (Name of Project).

There has been a considerable amount of interest in the institutionalization of externally funded projects in vocational education. I am preparing a study to determine the important factors that affect the success of institutionalization.

Will you please help me by responding to the enclosed questionnaire which will identify such factors? Because of your efforts, you are in an excellent position to furnish insight into innovation which can benefit research dealing with change.

Your responses will be held strictly confidential and therefore, your anonymity maintained. Your returning this questionnaire by February 21, 1979 would be appreciated.

Thank you very much for your help.

Sincerely yours,

Linda S. McFaul
Articulation Consultant

LSM/caf

Enclosure

Institutionalization Questionnaire

Michigan State University
East Lansing, Michigan 48824

January 1979

When a school district implements an externally funded innovative project, the district must decide what to do when the external funding ceases. The project may be dropped or it may continue as part of regular district operations. In the latter case, we say that the project has been "institutionalized." There may be certain variables which indicate that a project will continue and become institutionalized within the district. The identification of such variables is the intent of this questionnaire.

DIRECTIONS:

Please read the questions below. Keep in mind that each question is prefaced with "TO WHAT EXTENT."

FIRST: circle the number on the rating scale (1-5) at the immediate right of each question to indicate to what extent this occured in ***your*** project.

SECOND: circle the number on the rating scale (1-3) at the far right of each question to indicate whether institutionalization was facilitated or hindered by the presence or absence of each item.

	TO WHAT EXTENT:					Did this ***facilitate*** or ***hinder*** institutionalizing your project?		
	1	2	3	4	5	1	2	3
TO WHAT EXTENT:	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	Facilitate	Hinder	Not Applicable
1. Did project participants, at ***all*** levels, interact with one another?	1	2	3	4	5	1	2	3
2. Were tangible incentives (e.g., released time, pay) used to motivate project staff?	1	2	3	4	5	1	2	3
3. Did the initiators of the project make known the potential long-term effects?	1	2	3	4	5	1	2	3
4. Has the project been continued as initially implemented?	1	2	3	4	5	1	2	3
5. Did people outside of the district direct the project?	1	2	3	4	5	1	2	3
6. Did your school district have a history of adopting vocational education related innovations?	1	2	3	4	5	1	2	3
7. Did the vocational director support the project?	1	2	3	4	5	1	2	3
8. Was the final project evaluation positive?	1	2	3	4	5	1	2	3
9. Were regular project meetings held?	1	2	3	4	5	1	2	3
10. Was there a pilot test for modification of the project before large scale implementation?	1	2	3	4	5	1	2	3
11. Did the project increase staff workloads?	1	2	3	4	5	1	2	3
12. Did final evaluation occur?	1	2	3	4	5	1	2	3
13. Does the school district have an open organizational climate?	1	2	3	4	5	1	2	3
14. Did the instructional and support staff feel positively about their professional competence?	1	2	3	4	5	1	2	3
15. Was there increased student learning as a result of the project?	1	2	3	4	5	1	2	3
16. Did monitoring of the project by the Michigan Department of Education occur?	1	2	3	4	5	1	2	3
17. Did the Michigan Department of Education participate actively in the project?	1	2	3	4	5	1	2	3
18. Was the innovative project mandated externally?	1	2	3	4	5	1	2	3
19. Did outside people train project participants?	1	2	3	4	5	1	2	3
20. Was the project director adept in process skills?	1	2	3	4	5	1	2	3
21. Were intangible professional and psychological incentives (e.g., encouragement, recognition) used to motivate project staff?	1	2	3	4	5	1	2	3

DIRECTIONS:

Please read the questions below. Keep in mind that each question is prefaced with "TO WHAT EXTENT."

FIRST: circle the number on the rating scale (1-5) at the immediate right of each question to indicate to what extent this occured in ***your*** project.

SECOND: circle the number on the rating scale (1-3) at the far right of each question to indicate whether institutionalization was facilitated or hindered by the presence or absence of each item.

TO WHAT EXTENT:

	TO WHAT EXTENT:					Did this ***facilitate*** or ***hinder*** institutionalizing your project?		
	1 Not at All	2 Very Little	3 No Opinion	4 Somewhat	5 A Great Deal	1 Facilitate	2 Hinder	3 Not Applicable
22. Did the project reflect the superintendent's priorities?	1	2	3	4	5	1	2	3
23. Was assistance available to project participants?	1	2	3	4	5	1	2	3
24. Was there two-way oral communication between the project directors and project implementors?	1	2	3	4	5	1	2	3
25. Did the building principal participate in the training?	1	2	3	4	5	1	2	3
26. Was there space to continue the project after the external funding ended?	1	2	3	4	5	1	2	3
27. Did administrators perceive the project to be successful?	1	2	3	4	5	1	2	3
28. Did ***both*** administrative and instructional levels support the initiation of the project?	1	2	3	4	5	1	2	3
29. Was the project easy to manage?	1	2	3	4	5	1	2	3
30. Were the merits of the project described before it was started?	1	2	3	4	5	1	2	3
31. Were materials available to implement the project?	1	2	3	4	5	1	2	3
32. Were new behaviors required by the project explained to you?	1	2	3	4	5	1	2	3
33. Were materials available to continue the project after the external funding ended?	1	2	3	4	5	1	2	3
34. Did key personnel participate in project decision making?	1	2	3	4	5	1	2	3
35. Did the vocational director participate in project training?	1	2	3	4	5	1	2	3
36. Was there equipment to continue the project after the external funding ceased?	1	2	3	4	5	1	2	3
37. Did the instructional and support staff have a positive attitude toward change?	1	2	3	4	5	1	2	3
38. Did the district allocate money to support the project ***before*** external funding ended?	1	2	3	4	5	1	2	3
39. Were the demands of the project described before it was started?	1	2	3	4	5	1	2	3
40. Did the instructional and support staff perceive the project to be successful?	1	2	3	4	5	1	2	3
41. Were people available to implement the project?	1	2	3	4	5	1	2	3
42. Were several schools involved in the project?	1	2	3	4	5	1	2	3
43. Were project objectives followed as stated?	1	2	3	4	5	1	2	3
44. Were project participants able to satisfy their concerns and goals by their participation?	1	2	3	4	5	1	2	3
45. Did the school district adapt to project demands?	1	2	3	4	5	1	2	3
46. Do parents in the district support innovation?	1	2	3	4	5	1	2	3
47. Did the instructional and support staff cooperate with each other in implementing the project?	1	2	3	4	5	1	2	3
48. Is management centralized within the district?	1	2	3	4	5	1	2	3
49. Did local people train project participants?	1	2	3	4	5	1	2	3
50. Did the projects *replace* previous practices, curricula or programs?	1	2	3	4	5	1	2	3

51. Were involved teachers familiar with project materials, methods and/or techniques?	1	2	3	4	5	1	2	3
52. Did the building principal support the project?	1	2	3	4	5	1	2	3
53. Did the project *supplement* existing practices, curricula or programs?	1	2	3	4	5	1	2	3
54. Was reliable information about the project available to project participants?	1	2	3	4	5	1	2	3
55. Did administrators deal with unanticipated project-related events flexibly?	1	2	3	4	5	1	2	3
56. Did the project require complex integration of its activities into school programs?	1	2	3	4	5	1	2	3
57. Was it perceived that the instructional and support staff maintained a sense of personal involvement in the success of the project?	1	2	3	4	5	1	2	3
58. Was the project easy to implement?	1	2	3	4	5	1	2	3
59. Is decision making centralized within the district?	1	2	3	4	5	1	2	3
60. Was the project developed by people outside of the district?	1	2	3	4	5	1	2	3
61. Was the project developed by local district people?	1	2	3	4	5	1	2	3
62. Was there increased student motivation as a result of the project?	1	2	3	4	5	1	2	3
63. Did the instructional and support staff participate in evaluating the project?	1	2	3	4	5	1	2	3
64. Did on-going evaluation occur?	1	2	3	4	5	1	2	3
65. Did the project reflect the board of education's priorities?	1	2	3	4	5	1	2	3
66. Were project objectives stated?	1	2	3	4	5	1	2	3
67. Are you presently applying basic project ideas and methods in your classroom or work situation?	1	2	3	4	5	1	2	3
68. Was space available to implement the project?	1	2	3	4	5	1	2	3
69. Was there continuity of project management?	1	2	3	4	5	1	2	3
70. Did project meetings address practical concerns?	1	2	3	4	5	1	2	3
71. Does the general community support innovation in the schools?	1	2	3	4	5	1	2	3
72. Did key personnel participate in project design?	1	2	3	4	5	1	2	3
73. Did the district begin the project with the intent that it would continue when external funding ceased?	1	2	3	4	5	1	2	3
74. Did you understand your role in the project?	1	2	3	4	5	1	2	3
75. Did planning occur before the project was started?	1	2	3	4	5	1	2	3
76. Was in-service training provided to project participants?	1	2	3	4	5	1	2	3
77. Were project materials developed by project staff?	1	2	3	4	5	1	2	3
78. Did the project require change in staff behavior?	1	2	3	4	5	1	2	3
79. Was the project compatible with existing activities of the system?	1	2	3	4	5	1	2	3
80. Were several instructional and support staff involved in the project?	1	2	3	4	5	1	2	3
81. Was time available for implementation?	1	2	3	4	5	1	2	3
82. Did key personnel participate in project training?	1	2	3	4	5	1	2	3
83. Was the innovative project mandated internally?	1	2	3	4	5	1	2	3
84. Did the project adapt to school district needs?	1	2	3	4	5	1	2	3
85. Was equipment available to implement the project?	1	2	3	4	5	1	2	3
86. Are the objectives of the project still in effect within your school district?	1	2	3	4	5	1	2	3
87. Was the district participating in other innovative projects?	1	2	3	4	5	1	2	3
88. Are there strong collective bargaining units within the district?	1	2	3	4	5	1	2	3
89. Was there perceived risk and uncertainty connected with the project?	1	2	3	4	5	1	2	3
90. Has your district continued local funding of the project?	1	2	3	4	5	1	2	3
91. Is the current attitude in the school district toward the project positive?	1	2	3	4	5	1	2	3

DIRECTIONS:

Please read the questions below.

FIRST: circle either 1 or 2, at the immediate right of the question to indicate a "yes" or "no" response.

SECOND: circle the number on the scale (1-3) at the far right of each question to indicate whether institutionalization was facilitated or hindered by the situation reflected in your response.

	1 YES	2 NO	Did this ***facilitate*** or ***hinder*** institutionalizing your project? 1 Facilitate	2 Hinder	3 Not Applicable
92. Has the superintendent been in the school district three years or less?	1	2	1	2	3
93. Has the superintendent been in the school district seven years or more?	1	2	1	2	3
94. Is there a low turnover rate among instructional and support staff?	1	2	1	2	3
95. Is there a low turnover rate among district administrators?	1	2	1	2	3

Now that you have completed the Institutionalization Questionnaire, will you please take a few more minutes to complete the following demographic information? Thank you very much for your cooperation.

1. Title: _____

2. Age Range:
   _____ under 25 _____ 31-35 _____ 41-49
   _____ 26-30 _____ 36-40 _____ 50 plus

3. Sex:
   _____ Female _____ Male

4. Highest Degree Earned:
   _____ Bachelor _____ Specialist
   _____ Master _____ Doctorate

5. Time in Present Position:
   _____ less than 1 year _____ 4-6 years _____ 10-14 years
   _____ 1-3 years _____ 7-9 years _____ 15 plus years

6. Total Time in Education Profession:
   _____ less than 1 year _____ 4-6 years _____ 10-14 years
   _____ 1-3 years _____ 7-9 years _____ 15 plus years

7. Time in Present Educational Agency:
   _____ less than 1 year _____ 4-6 years _____ 10-14 years
   _____ 1-3 years _____ 7-9 years _____ 15 plus years

PLEASE RETURN THIS QUESTIONNAIRE TO:

Linda S. McFaul
CBE Articulation Project
100 Wills House
Michigan State University
East Lansing, Michigan 48824

February 17, 1979

Your assistance is badly needed! About 2½ weeks ago you received an "Institutionalization Questionnaire" from me. Your response is needed so the research can be continued. Thank you for your help!

Linda S. McFaul
Articulation Consultant

APPENDIX D

Table I

AGGREGATE: TO WHAT EXTENT AND FACILITATE/HINDER

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
1. Did project participants, at all levels, interact with one another?	F*	1		4	2	31**	26		55**	6	3
	P	1.6		6.3	3.1	48.4	40.6		85.9	9.4	4.7
2. Were tangible incentives (e.g, released time, pay) used to motivate project staff?	F		14	11	3	28**	8	1	34**	12	17
	P		21.9	17.2	4.7	43.8	12.5	1.6	53.1	18.8	26.6
3. Did the initiators of the project make known the potential long-term effects?	F			4		24	36**		52**	5	7
	P			6.3		37.5	56.3		81.3	7.8	10.9
4. Has the project been continued as initially implemented?	F		4	12	1	25**	22	5	31**	9	19
	P		6.3	18.8	1.6	39.1	34.4	7.8	48.4	14.1	29.7
5. Did people outside of the district direct the project?	F		19**	19	5	10	11	2	28**	8	26
	P		29.7	29.7	7.8	15.6	17.2	3.1	43.8	12.5	40.6
6. Did your school district have a history of adopting vocational education related innovations?	F	1	4	11	7	23**	18	4	35**	3	22
	P	1.6	6.3	17.2	10.9	35.9	28.1	6.3	54.7	4.7	34.4

*F = Frequency; P = Percentage; ** = Mode

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
7. Did the vocational director support the project?	F	5		5	3	9	42**	2	50**	6	6
	P	7.8		7.8	4.7	14.1	65.6	3.1	78.1	9.4	9.4
8. Was the final project evaluation positive?	F			1	7	17	39**		47**	2	15
	P			1.6	10.9	26.6	60.9		73.4	3.1	23.4
9. Were regular project meetings held?	F	1	1	8	2	24	28**	2	46**	9	7
	P	1.6	1.6	12.5	3.1	37.5	43.8	3.1	71.9	14.1	10.9
10. Was there a pilot test for modification of the project before large scale implementation?	F	2	13	5	8	19**	17	2	36**	4	22
	P	3.1	20.3	7.8	12.5	29.7	26.6	3.1	56.3	6.3	34.4
11. Did the project increase staff workloads?	F		4	11	2	41**	6	3	16	27**	18
	P		6.3	17.2	3.1	64.1	9.4	4.7	25.0	42.2	28.1
12. Did final evaluation occur?	F	2	2	2	13	12	33**	2	38**	3	21
	P	3.1	3.1	3.1	20.3	18.8	51.6	3.1	59.4	4.7	32.8
13. Does the school district have an open organizational climate?	F	2	2	6	5	30**	19	4	39**	12	9
	P	3.1	3.1	9.4	7.8	46.9	29.7	6.3	60.9	18.8	14.1
14. Does the instructional and support staff feel positively about their professional competence?	F		1	3	4	33**	23	1	46**	11	6
	P		1.6	4.7	6.3	51.6	35.9	1.6	71.9	17.2	9.4
15. Was there increased student learning as a result of the project?	F		1		5	29**	29		53**	1	10
	P		1.6		7.8	45.3	45.3		82.8	1.6	15.6

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
16. Did monitoring of the project by the Michigan Department of Education occur?	F	1	6	7	14	24**	12	3	27**	4	30
	P	1.6	9.4	10.9	21.9	37.5	18.8	4.7	42.2	6.3	46.9
17. Did the Michigan Department of Education participate actively in the project?	F	2	9	12	16**	15	10	5	25	7	27**
	P	3.1	14.1	18.8	25.0	23.4	15.6	7.8	39.1	10.9	42.2
18. Was the innovative project mandated externally?	F		32**	6	12	11	3	6	21	7	30**
	P		50.0	9.4	18.8	17.2	4.7	9.4	32.8	10.9	46.9
19. Did outside people train project participants?	F	1	12	9	4	30**	8	4	40**	3	17
	P	1.6	18.8	14.1	6.3	46.9	12.5	6.3	62.5	4.7	26.6
20. Was the project director adept in process skills?	F			3	5	22	34**	1	56**	3	4
	P			4.7	7.8	34.4	53.1	1.6	87.5	4.7	6.3
21. Were intangible professional and psychological incentives (e.g., encouragment, recognition) used to motivate project staff?	F		3	6	7	34**	14	1	46**	8	9
	P		4.7	9.4	10.9	53.1	21.9	1.6	71.9	12.5	14.1
22. Did the project reflect the superintendent's priorities?	F	1	4	11	7	29**	12	2	37**	11	14
	P	1.6	6.3	17.2	10.9	45.3	18.8	3.1	57.8	17.2	21.9
23. Was assistance available to project participants?	F			4		35**	25	1	57**	5	1
	P			6.3		54.7	39.1	1.6	89.1	7.8	1.6

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
24. Was there two-way oral communication between the project directors and project implementors?	F	1		1	2	22	38**	2	53**	4	5
	P	1.6		1.6	3.1	34.4	59.4	3.1	82.8	6.3	7.8
25. Did the building principal participate in the training?	F		12	15	7	21**	9		30**	19	15
	P		18.8	23.4	10.9	32.8	14.1		46.9	29.7	23.4
26. Was there space to continue the project after the external funding ended?	F	1	2	2	7	30**	22		45**	6	13
	P	1.6	3.1	3.1	10.9	46.9	34.4		70.3	9.4	20.3
27. Did administrators perceive the project to be successful?	F			10	6	17	31**	2	41**	11	10
	P			15.6	9.4	26.6	48.4	3.1	64.1	17.2	15.6
28. Did both administrative and instructional levels support the initiation of the project?	F		1	9	4	31**	19	1	47**	11	5
	P		1.6	14.1	6.3	48.4	29.7	1.6	73.4	17.2	7.8
29. Was the project easy to manage?	F	1	1	4	8	41**	9	3	41**	7	13
	P	1.6	1.6	6.3	12.5	64.1	14.1	4.7	64.1	10.9	20.3
30. Were the merits of the project described before it was started?	F		1	5	2	21	35**	1	49**	5	9
	P		1.6	7.8	3.1	32.8	54.7	1.6	76.6	7.8	14.1
31. Were materials available to implement the project?	F	1	1	9	1	23	29**	1	48**	9	6
	P	1.6	1.6	14.1	1.6	35.9	45.3	1.6	75.0	14.1	9.4

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
32. Were new behaviors required by the project explained to you?	F	1	2	7	6	33**	15	3	41**	8	12
	P	1.6	3.1	10.9	9.4	51.6	23.4	4.7	64.1	12.5	18.8
33. Were materials available to continue the project after the external funding ended?	F		5	7	4	18	30**		42**	15	7
	P		7.8	10.9	6.3	28.1	46.9		65.6	23.4	10.9
34. Did key personnel participate in project decision making?	F		1	3	4	28**	28	2	49**	8	5
	P		1.6	4.7	6.3	43.8	43.8	3.1	76.6	12.5	7.8
35. Did the vocational director participate in project training?	F	4	4	10	9	23**	14	5	34**	5	20
	P	6.3	6.3	15.6	14.1	35.9	21.9	7.8	53.1	7.8	31.3
36. Was there equipment to continue the project after the external funding ceased?	F	4	4	6	8	19	23**	1	40**	10	13
	P	6.3	6.3	9.4	12.5	29.7	35.9	1.6	62.5	15.6	20.3
37. Did the instructional and support staff have a positive attitude toward change?	F	1	1	8	4	32**	18	3	42**	13	6
	P	1.6	1.6	12.5	6.3	50.0	28.1	4.7	65.6	20.3	9.4
38. Did the district allocate money to support the project before external funding ended?	F	2	13	8	12	25**	4	6	29**	20	9
	P	3.1	20.3	12.5	18.8	39.1	6.3	9.4	45.3	31.3	14.1

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
39. Were the demands of the project described before it was started?	F			4	6	31**	23	2	42**	10	10
	P			6.3	9.4	48.4	35.9	3.1	65.6	15.6	15.6
40. Did the instructional and support staff perceive the project to be successful?	F		1	4	5	29**	25	2	48**	7	7
	P		1.6	6.3	7.8	45.3	39.1	3.1	75.0	10.9	10.9
41. Were people available to implement the project?	F	1	1	2	3	28	29**	3	48**	8	5
	P	1.6	1.6	3.1	4.7	43.8	45.3	4.7	75.0	12.5	7.8
42. Were several schools involved in the project?	F		3	1	1	17	42**	3	52**	4	5
	P		4.7	1.6	1.6	26.6	65.6	4.7	81.3	6.3	7.8
43. Were project objectives followed as stated?	F			2	1	25	36**	1	53**	6	4
	P			3.1	1.6	39.1	56.3	1.6	82.8	9.4	6.3
44. Were project participants able to satisfy their concerns and goals by their participation?	F	1		3	4	32**	24	2	53**	6	3
	P	1.6		4.7	6.3	50.0	37.5	3.1	82.8	9.4	4.7
45. Did the school district adapt to project demands?	F			5	6	33**	20	3	43**	9	9
	P			7.8	9.4	51.6	31.3	4.7	67.2	14.1	14.1
46. Do parents in the district support innovation?	F	2		3	12	30**	17	3	41**	5	15
	P	3.1		4.7	18.8	46.9	26.6	4.7	64.1	7.8	23.4

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
47. Did the instructional and support staff cooperate with each other in implementing the project?	F			4	4	28**	28	1	53**	5	5
	P			6.3	6.3	43.8	43.8	1.6	82.8	7.8	7.8
48. Is management centralized within the district?	F	1		3	10	25**	25	3	40**	8	13
	P	1.6		4.7	15.6	39.1	39.1	4.7	62.5	12.5	20.3
49. Did local people train project participants?	F	2	10	5	7	25**	15	3	35**	8	18
	P	3.1	15.6	7.8	10.9	39.1	23.4	4.7	54.7	12.5	28.1
50. Did the projects replace previous practices, curricula, or programs?	F		20**	20	6	16	2	3	28**	10	23
	P		31.3	31.3	9.4	25.0	3.1	4.7	43.8	15.6	35.9
51. Were involved teachers familiar with project materials, methods and/or techniques?	F		2	11	2	29**	20	3	46**	10	5
	P		3.1	17.2	3.1	45.3	31.3	4.7	71.9	15.6	7.8
52. Did the building principal support the project?	F		2	4	6	26**	26		46**	12	6
	P		3.1	6.3	9.4	40.6	40.6		71.9	18.8	9.4
53. Did the project supplement existing practices, curricula, or programs?	F	1	8	3	2	29**	21	3	50**	4	7
	P	1.6	12.5	4.7	3.1	45.3	32.8	4.7	78.1	6.3	10.9
54. Was reliable information about the project available to project participants?	F		1	2	1	29	31**	2	54**	7	1
	P		1.6	3.1	1.6	45.3	48.4	3.1	84.4	10.9	1.6

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
55. Did administrators deal with unanticipated project-related events flexibly?	F			2	7	34**	21	2	47**	7	8
	P			3.1	10.9	53.1	32.8	3.1	73.4	10.9	12.5
56. Did the project require complex integration of its activities into school programs?	F		5	20	5	21**	13	2	41**	13	8
	P		7.8	31.3	7.8	32.8	20.3	3.1	64.1	20.3	12.5
57. Was it perceived that the instructional and support staff maintained a sense of personal involvement in the success of the project?	F		2	8	6	29**	19	2	42**	14	6
	P		3.1	12.5	9.4	45.3	29.7	3.1	65.6	21.9	9.4
58. Was the project easy to implement?	F		8	7	7	31**	11	2	37**	14	11
	P		12.5	10.9	10.9	48.4	17.2	3.1	57.8	21.9	17.2
59. Is decision making centralized within the district?	F	2		6	8	28**	20	3	38**	10	13
	P	3.1		9.4	12.5	43.8	31.3	4.7	59.4	15.6	20.3
60. Was the project developed by people outside of the district?	F		17	8	6	14	19**	4	27**	15	18
	P		26.6	12.5	9.4	21.9	29.7	6.3	42.2	23.4	28.1
61. Was the project developed by local district people?	F		12	9	6	12	25**	3	36**	12	13
	P		18.8	14.1	9.4	18.8	39.1	4.7	56.3	18.8	20.3
62. Was there increased student motivation as a result of the project?	F		1	4	2	32**	25	2	54**	5	3
	P		1.6	6.3	3.1	50.0	39.1	3.1	84.4	7.8	4.7

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
63. Did the instructional and support staff participate in evaluating the project?	F		2	9	7	17	29**	2	39**	10	13
	P		3.1	14.1	10.9	26.6	45.3	3.1	60.9	15.6	20.3
64. Did on-going evaluation occur?	F		3	3	9	19	30**	2	45**	7	10
	P		4.7	4.7	14.1	29.7	46.9	3.1	70.3	10.9	15.6
65. Did the project reflect the board of education's priorities?	F	2	2	7	15	20**	18	5	30**	8	21
	P	3.1	3.1	10.9	23.4	31.3	28.1	7.8	46.9	12.5	32.8
66. Were project objectives stated?	F			2	5	13	44**	1	55**	1	7
	P			3.1	7.8	20.3	68.8	1.6	85.9	1.6	10.9
67. Are you presently applying basic project ideas and methods in your classroom or work situation?	F	5	3	2	6	22	26**	3	41**	3	17
	P	7.8	4.7	3.1	9.4	34.4	40.6	4.7	64.1	4.7	26.6
68. Was space available to implement the project?	F	1	1	4	3	20	35**	2	50**	6	6
	P	1.6	1.6	6.3	4.7	31.3	54.7	3.1	78.1	9.4	9.4
69. Was there continuity of project management?	F		1	2	5	26	30**	1	52**	7	4
	P		1.6	3.1	7.8	40.6	46.9	1.6	81.3	10.9	6.3
70. Did project meetings address practical concerns?	F	1		1	6	31**	25	1	49**	4	10
	P	1.6		1.6	9.4	48.4	39.1	1.6	76.6	6.3	15.6

Table I, Continued

	Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
71.	Does the general community support innovation in the schools?	F	1	1	6	3	40**	13	3	50**	5	6
		P	1.6	1.6	9.4	4.7	62.5	20.3	4.7	78.1	7.8	9.4
72.	Did key personnel participate in project design?	F	2	3	4	5	22	28**	3	49**	6	6
		P	3.1	4.7	6.3	7.8	34.4	43.8	4.7	76.6	9.4	9.4
73.	Did the district begin the project with the intent that it would continue when external funding ceased?	F	1	2	6	12	20	23**	3	37**	13	11
		P	1.6	3.1	9.4	18.8	31.3	35.9	4.7	57.8	20.3	17.2
74.	Did you understand your role in the project?	F			1	2	15	46**	3	55**	4	2
		P			1.6	3.1	23.4	71.9	4.7	85.9	6.3	3.1
75.	Did planning occur before the project was started?	F		1	1	5	19	38**	2	54**	3	5
		P		1.6	1.6	7.8	29.7	59.4	3.1	84.4	4.7	7.8
76.	Was in-service training provided to project participants?	F			5	3	21	35**	1	56**	4	3
		P			7.8	4.7	32.8	54.7	1.6	87.5	6.3	4.7
77.	Were project materials developed by project staff?	F		4	5	2	22	31**	2	51**	4	7
		P		6.3	7.8	3.1	34.4	48.4	3.1	79.7	6.3	10.9
78.	Did the project require change in staff behavior?	F	1	5	9	6	32**	11	4	31**	17	12
		P	1.6	7.8	14.1	9.4	50.0	17.2	6.3	48.4	26.6	18.8

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
79. Was the project compatible with existing activities of the system?	F	1		3	5	34**	21	3	46**	7	8
	P	1.6		4.7	7.8	53.1	32.8	4.7	71.9	10.9	12.5
80. Were several instructional and support staff involved in the project?	F		1	5	3	27	28**	4	51**	2	7
	P		1.6	7.8	4.7	42.2	43.8	6.3	79.7	3.1	10.9
81. Was time available for implementation?	F			7	5	23	29**	3	49**	8	4
	P			10.9	7.8	35.9	45.3	4.7	76.6	12.5	6.3
82. Did key personnel participate in project training?	F	1		3	7	28**	25	3	52**	4	5
	P	1.6		4.7	10.9	43.8	39.1	4.7	81.3	6.3	7.8
83. Was the innovative project mandated internally?	F	1	12	11	12	17**	11	5	27**	13	19
	P	1.6	18.8	17.2	18.8	26.6	17.2	7.8	42.2	20.3	29.7
84. Did the project adapt to school district needs?	F	1		2	6	28**	27	2	54**	2	6
	P	1.6		3.1	9.4	43.8	42.2	3.1	84.4	3.1	9.4
85. Was equipment available to implement the project?	F	1	2	3	4	27**	27	2	49**	5	8
	P	1.6	3.1	4.7	6.3	42.2	42.2	3.1	76.6	7.8	12.5
86. Are the objectives of the project still in effect within your school district?	F	1	1	4	2	27	29**	2	50**	2	10
	P	1.6	1.6	6.3	3.1	42.2	45.3	3.1	78.1	3.1	15.6

Table I, Continued

Variable		No Response	Not at All	Very Little	No Opinion	Somewhat	A Great Deal	No Response	Facilitate	Hinder	Not Applicable
87. Was the district participating in other innovative projects?	F	2	4	10	6	28**	14	4	38**	9	13
	P	3.1	6.3	15.6	9.4	43.8	21.9	6.3	59.4	14.1	20.3
88. Are there strong collective bargaining units within the district?	F	1	2	5	5	24	27**	4	18	12	30**
	P	1.6	3.1	7.8	7.8	37.5	42.2	6.3	28.1	18.8	46.9
89. Was there perceived risk and uncertainty connected with the project?	F		8	13	10	27**	6	3	20	23**	18
	P		12.5	20.3	15.6	42.2	9.4	4.7	31.3	35.9	28.1
90. Has your district continued local funding of the project?	F	4	12	9	2	17	20**	2	34**	14	14
	P	6.3	18.8	14.1	3.1	26.6	31.3	3.1	53.1	21.9	21.9
91. Is the current attitude in the school district toward the project positive?	F	2	2	6	4	24	26**	2	44**	7	11
	P	3.1	3.1	9.4	6.3	37.5	40.6	3.1	68.8	10.9	17.2

Table II

AGGREGATE: TIME/TURNOVER

Variable		No Response	Yes	No	No Response	Facilitate	Hinder	Not Applicable
92. Has the superintendent been in the school district three years or less?	F*	2	24	38**	3	28**	7	26
	P	3.1	37.5	59.4	4.7	43.8	10.9	40.6
93. Has the superintendent been in the school district seven years or more?	F	4	37**	23	7	26**	6	25
	P	6.3	57.8	35.9	10.9	40.6	9.4	39.1
94. Is there a low turnover rate among instructional staff?	F	1	58**	5	3	43**	6	12
	P	1.6	90.6	7.8	4.7	67.2	9.4	18.8
95. Is there a low turnover rate among district administrators?	F	2	56**	6	4	44**	5	11
	P	3.1	87.5	9.4	6.3	68.8	7.8	17.2

*F = Frequency; P = Percentage; ** = Mode