To the Graduate Council:

I am submitting herewith a dissertation written by Betsy Crockarell Heineman, entitled "An Analysis of High School Principals' Attitudes Toward and Knowledge of Vocational Education in the State of Tennessee." I recommend that it be accepted in partial fulfillment of the requirements for the degree of Doctor of Education, with a major in Vocational-Technical Education.

George W. Wiegers, Major Professor

We have read this dissertation
and recommend its acceptance:

Accepted for the Council:

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AN ANALYSIS OF HIGH SCHOOL PRINCIPALS' ATTITUDES TOWARD AND KNOWLEDGE OF VOCATIONAL EDUCATION IN THE STATE OF TENNESSEE

A Dissertation

Presented for the

Doctor of Education

Degree

The University of Tennessee

Betsy Crockarell Heineman

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ABSTRACT

Purpose of the Study

The purpose of the study was to identify Tennessee secondary school principals' attitudes toward and knowledge of vocational education and to determine whether or not a relationship existed between the principals' attitudes, and knowledge, and certain demographic data.

Procedure

A Personal Data Form and two questionnaires entitled, "Attitude Toward Vocational Education," and "A Purview of Vocational-Technical Education," were mailed to 150 high school principals in the State of Tennessee. The principals were selected by a stratified proportional random sampling technique. Completed, usable materials were returned by 66 per cent of the principals.

Nineteen hypotheses were formulated for the study. The data were subjected to a Pearson Product-Moment Correlation, Point-Biserial r Correlation, and analyses of variances at the .05 level of significance.

Conclusions

The conclusions of the study are as follows:

1. The findings provided evidence to support the conclusion that a correlation does not exist between principals' attitudes toward vocational education and their knowledge of vocational education.

2. The findings of the study provided evidence to support the conclusion that summer noneducational work experience had a significant, positive effect on principals' attitudes toward vocational education.
3. It was concluded that the number of vocational programs in schools had a significant, positive effect on principals' attitudes toward vocational education.
4. Evidence was provided by the findings to conclude that the teaching majors of principals had a significant, positive effect on the principals' knowledge of vocational education.

Recommendations

1. Other variables should be correlated with principals' attitudes toward vocational education to determine degree of relationships.
2. Principals should have had occupational experience in addition to school related work.
3. Common and unique vocational programs should be offered in comprehensive and separate vocational centers for high school students.
4. Principals should be required to complete at least one vocational education course designed to meet their needs.

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CHAPTER I

INTRODUCTION

The intrinsic value of vocational education lies in its relationship to the social and economic development of the nation. It has often been said that the greatness of this nation is not in its tremendous wealth but its ability to utilize wisely its human resources. Vocational education is a social process concerned primarily with people and their part in doing the work that society needs done. It is concerned with preparing people for work and with improving the work potential of the labor force. For people, this means economic independence, self-realization, and dignity.

In 1961 and 1962, pressure of a technological revolution led President Kennedy to appoint a Panel of Consultants on Vocational Education to study the design of vocational education. The Panel's report was used by the Congress in the formulation of the Vocational Education Act of 1963. A significant growth in enrollment in vocational education followed the 1963 Act.[1]

A provision of the 1963 Act made it mandatory that an Advisory Council be appointed to review the vocational education program after five years, and accordingly the Advisory Council on Vocational Education was appointed by President Johnson in late November, 1966. The

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[1]American Vocational Association, Vocational Education and Man-Power Training Report of a National Legislative Seminar, September 7-9, 1969 (Washington: American Vocational Association, 1969), p. 4.

Council's report was used by Congress in formulating the Vocational Education Amendments of 1968 which became law on October 16, 1968. The new law authorized a vast expansion in vocational education, was designed for maximum flexibility, and was dedicated to providing vocational education to all youth and adults of the nation.[2]

During this same period of time, recognized leaders in education were concerned with curricula in the secondary schools. Conant directed attention to the importance of the comprehensive high school. He referred to comprehensiveness as insuring the availability of the same range of knowledge to all pupils through different activities and in different classes, where teaching procedures are matched to learning style. All pupils could move at their own pace and in their own way to the same destination, to new levels of education, and to the world of work. Conant advocated that there were no separate goals in comprehensive education, but alternate means of reaching the same options. He stated:

> To my mind, it is desirable for as many boys and girls in high school as possible to have an ultimate vocational goal. It may well be that many of them will change their minds before the high school course is over or in later years. But, if a student thinks that what he or she is studying in school is likely to have significance in later life, the study in question takes on a new importance. There is less tendency for such committed students to waste their time or have a negative attitude toward their schoolwork.[3]

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[2]Rupert N. Evans and Others, Education for Employment: The Background and Potential of the 1968 Vocational Education Amendments (Ann Arbor, Michigan: The University of Michigan Institute of Labor and Industrial Relations, 1969), p. 10.

[3]James B. Conant, The American High School Today (New York: McGraw-Hill Book Company, Inc., 1959), p. 127.

Little[4] implied that vocational education is not a separate discipline within education, but is a basic objective of all education. It is all of those aspects of educational experience which help a person to discover his talents, to relate them to the world of work, to choose an occupation, and to refine his talents and use them successfully in employment. There is no longer room for any dichotomy between intellectual competence and manipulative skills and, therefore, between academic and vocational education.

The high school principal has a major function in seeing that the curriculum of the school provides opportunities for learning experiences for all students no matter what their elected goals may be. It is important that the principal's attitude is supportive of all education without snobbishly dichotomizing the curriculum of academic and vocational education. He must be able to see the value of vocational education in the future of our societal problems and the economic growth of our nation. This support will only come when he thoroughly understands the goals of all education and particularly the principles and the importance of vocational education.

Aristotle commented that some perplexing problems arose out of prevailing education in his day and acknowledged that it was not at all clear whether the pupil should practice pursuits that were practically useful or morally edifying:

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[4]J. Kenneth Little, "Intimations of the Future: A Summary," Vocational Education: Today and Tomorrow (Madison, Wisconsin: The University of Wisconsin, 1971), pp. 349-350.

> The existing practice is perplexing; no one knows on what principle we should proceed--should the useful in life, or should virtue, or should the higher knowledge, be the aim of our training; all three opinions have been entertained.[5]

The question is still unresolved today, especially the matter of special directions, purposes, and goals of vocational education in the high school.

I. The Problem

Statement of the Problem

The problem is the reoccurrence of a continuing belief among vocational teachers that public secondary school principals are not supportive of vocational education programs and, consequently, do not make favorable decisions concerning vocational education programs in the schools.

Purpose of the Study

The purpose of the study was to identify Tennessee secondary school principals' attitudes toward and knowledge of vocational education and to determine whether or not a relationship exists between the principals' attitudes, and knowledge, and certain demographic data. Specific questions to be answered included the following:

1. Is there a relationship between a principal's attitude toward vocational ecucation and his knowledge of vocational education?

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[5]Benjamin Jowett, Aristotle's Politics (New York: The Modern Random House, Inc., 1943), p. 321.

2. Is the amount of noneducational work experience a significant factor in the principal's attitude toward vocational education?
3. Are the principal's marital status, age, sex, certification status, and other personal variables factors in the principal's attitude toward vocational education?

II. Basic Assumptions

Basic assumptions under which the researcher worked are as follows:

1. There was a general lack of support for vocational education among high school principals.
2. Principals were key people in respect to curriculum development in a school.

III. Scope and Limitations

Specifically, the study was limited to the following:

1. The study was limited to responses from 150 randomly selected Tennessee high school principals.
2. The high schools included grades seven through twelve.
3. The study was limited to the attitudes measured by the Attitude Toward Vocational Education Scale.
4. The study was limited to knowledge of vocational education as measured by the Purview of Vocational and Technical Education.

IV. Definition of Terms

This study included, by necessity, certain terms peculiar to the subject under consideration. For purposes of this study, the terms were identified as follows:

Academic disciplines. Areas of subject matter pertaining to the liberal arts.

Adult education. Organized activities with an educational objective carried on by out-of-school persons on either a part-time or full-time basis.

Attitude. "Inferred states of the organism that are presumably acquired in much the same manner that other such internal learned activity is acquired. They are predispositions to respond, but are distinguished from other such states of readiness in that they predispose toward an evaluative response."[6]

Comprehensive high school. A high school that includes both general education courses and specialized fields of study in its program and thus offers academic and vocational subjects.

Disadvantaged youth. The student who cannot fit into a general pattern of studies because of cultural, social, educational, or other deficiencies not of his own choosing.

Drop-outs. Students who leave high school prior to graduation.

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[6]Charles E. Osgood and Others, The Measurement of Meaning (Urbana, Illinois: University of Illinois Press, 1967), p. 189.

High school. The school division, also referred to as secondary school, following the elementary school--comprising for the purpose of this study grades seven through twelve.

On-the-job training. An apprenticeship type of training performed under the supervision of a skilled employee of an industry or business.

Technical education. Referring to a high degree of competence or specialized training. A phase of vocational education having to do with programs of a more technical nature.

Vocational education. Public school instruction that develops the basic skill, judgment, and job entry-level knowledge sufficient to prepare youth for employment in agriculture, business, distribution, homemaking, trade, industry, and other occupational areas.[7]

School principal. The administrator of the secondary school.

Nonsupport. A lack of advocating, approving, and/or maintaining with money or subsistence.

V. Importance of the Study

Such a study was worthy of consideration to determine to what extent such a problem did exist and what caused this attitude to exist. Once this was established, the findings, implications, and recommendations from this study may be used to neutralize or modify negative attitudes.

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[7] R. C. Wenrich and R. J. Crowley, Vocational Education as Perceived by Different Segments of the Population (Ann Arbor: University of Michigan, 1964), p. 7.

Legislation both at the federal and state levels has brought special emphasis to vocational education. The recently approved Comprehensive Vocational Education Act in Tennessee is an example of this emphasis.

The social and economic future of this country depends on the education of our youth and particularly the principles of vocational education as related to the world of work; therefore, a curriculum in the high school must encompass both academic and vocational education as integrated particles rather than as separate entities. Vocational education most assuredly is beneficial to a critical population of the disadvantaged and the poor; and career education is important for all students at all academic, social, and economic levels.

The high school principal must believe in the relevance of vocational education and must support the program in his school in order for the school to fulfill the needs of all students and society. Conant believed the comprehensive high school should include at least five vocational programs. The inclusion of such programs is not sufficient without the total support of the principal.

The solution of this problem fills a research gap in that very few studies have been done concerning administrative attitudes relating to vocational education. The research should reveal what the high school administrator in the State of Tennessee believes about vocational education. After analyzing the results, one could plan a program of action to aid in changing or neutralizing the attitudes of the principals portraying negative attitudes.

VI. Nature and Sources of Data

The data needed for this study were scores from the "Attitude Toward Vocational Education"[8] (ATVE) questionnaire, scores from the "Purview of Vocational-Technical Education"[9] (PVTE) questionnaire, and demographic data collected by the Personal Data Form.

Data were collected and processed on 150 randomly selected high school principals in the State of Tennessee. Principals were selected because they were involved in matters pertaining to the curriculum of the school and have a direct influence on what is included in the curriculum.

VII. Hypotheses

The following hypotheses, stated in the null form, were tested for significance at the .05 level:

1. No correlation exists between the attitudes of high school principals toward vocational education and their knowledge of vocational education.

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[8]John P. Engler, Attitude toward vocational education. Research proposal, HRD 411-65. The development of material for the orientation of high school administrators to vocational education needs and programs. Department of Educational Administration, University of Nebraska, 1966.

[9]Francis E. Colgan, A purview of vocational and technical education. Research proposal, HRD 411-65. The development of material for the orientation of school administrators to vocational education needs and programs. Department of Educational Administration, University of Nebraska, 1966.

2. No significant difference exists between the attitudes toward vocational education of full-time principals and of part-time principals.
3. No significant difference exists between the attitudes toward vocational education of principals and the classification of their fathers' occupations.
4. No significant difference exists in the attitudes toward vocational education among principals in various age groups.
5. No significant difference exists in the attitudes toward vocational education among principals with different teaching majors.
6. No significant difference exists in the attitudes toward vocational education among principals who are married, single, separated, divorced, or widowed.
7. No significant difference exists in the attitudes toward vocational education among principals who have participated in vocational education programs and principals that have not participated in vocational education programs.
8. No significant difference exists between the principals' attitudes toward vocational education and the amount of their noneducational work experience.
9. No significant difference exists between principals' attitudes toward vocational education and the number of vocational programs in the schools.
10. No significant difference exists between the attitudes toward vocational education of principals and the size of community

they resided in for the longest period of time before attending college.

11. No significant difference exists between the knowledge of vocational education of full-time principals and of part-time principals.
12. No significant difference exists between the knowledge of vocational education of principals and the classification of their fathers' occupation.
13. No significant difference exists in the knowledge of vocational education among principals in various age groups.
14. No significant difference exists in the knowledge of vocational education among principals with different teaching majors.
15. No significant difference exists in the knowledge of vocational education among principals who are married, single, separated, divorced, or widowed.
16. No significant difference exists in the knowledge of vocational education between principals who have participated in vocational education programs and principals who have not participated in vocational education programs.
17. No significant difference exists between principals' knowledge of vocational education and the amount of their noneducational work experience.
18. No significant difference exists between principals' knowledge of vocational education and the number of vocational programs in schools.

19. No significant difference exists between principals' knowledge of vocational education and size of community they resided in for the longest period of time before attending college.

VIII. Organization of the Study

Chapter I has presented an introduction to the study, the problem, purpose of the study, basic assumptions, scope and limitations of the problem, definitions of terms, importance of the study, nature and sources of data, and hypotheses to be tested.

Chapter II presents a review of related literature.

Chapter III describes the methods and procedures used in the study.

Chapter IV presents the findings of the study and an analysis of the data.

Chapter V presents a summary of the study, conclusions, and recommendations.

CHAPTER II

REVIEW OF RELATED LITERATURE

A review of the literature is divided into three sections. Section I presents a theory of attitudes. Section II reviews studies and articles relating to attitudes toward vocational education. Section III presents administrative characteristics which have been found to influence attitudes toward vocational education.

I. Theory of Attitudes

Attitudes represent the residue of an individual's past experiences. Allport[10] defined an attitude as:

> A mental and neural state of readiness, organized through experience, exerting a directive or dynamic influence upon the individual's response to all objects and situations with which it is related.

Henderson stated, "Attitudes are learned mainly from other people who have high or low prestige for us. Once attitudes have been learned, they are reinforced by a variety of motives.[11]

Many psychologists generally conceive attitudes as an acquired mental and emotional readiness to respond which exerts a directive

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[10]G. W. Allport, "Attitudes in the History of Social Psychology," Attitudes, ed. Marie Jahoda (Baltimore: Penguin Books, Inc., 1968), p. 20.

[11]George Henderson, Programs to Alter Negative Attitudes Toward Integration: An Exploratory Study and Review of Literature (Washington: American Federation of Teachers, 1970), p. 4.

influence on a person's perceptions and actions. It is believed that one forms attitudes within a consistent framework.

> The theories and empirical work dealing with consistencies are mainly concerned with intra-individual phenomena, be it with relationships between one attitude and another, between attitudes and values, or information, or perception, or behavior, or the like. One exception is Newcomb's concept of "strain toward symmetry." Here the concern is primarily with the interplay of forces among individuals which results in uniformities of consistencies among them. There is no question that the concept of consistency, and especially the theory of cognitive dissonance, account for many varied attitudinal phenomena.[12]

There is a close affiliation between attitudes and opinions. The study of attitudes would not be complete without elaborating on the relationship between attitudes and opinions.

> The popular meaning attached to opinion may take any one of three meanings. First, it may refer to the individual's tentative set itself. Second, it may refer to a point of view or set in the abstract; that is a possibility to which a person may or may not subscribe. Third, it may have a "collective" meaning. This is to say that the term "public opinion" means an attitudinal consensus at a given time which, it is supposed, may shift at a later time.[13]

An opinion is tentative in that the subject reserves the right to reverse his view. Opinions actually shape attitudes and are referred to as verbal expressions of attitudes. Opinions are much easier to change than attitudes.

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[12]Robert B. Zajonc, "Balance, Congruity, and Dissonance," Attitudes, ed. Marie Jahoda (Baltimore: Penguin Books, Inc., 1958), pp. 273-274.

[13]J. B. Cooper and J. L. McGaugh, "Attitudes and Related Concepts," Attitudes, ed. Marie Jahoda (Baltimore: Penguin Books, Inc., 1968), p. 29.

The attitude unit is a primary building block which can be distinguished between conscious and unconscious attitudes, between mental and motor attitudes, between individual and group attitudes. Attitudes may be influenced by opinion leaders. This has been a research topic in the area of mass media.

> Research indicates pretty clearly that if those who are exposed to media messages which alter their attitudes do not find support for these new attitudes in their interpersonal contacts or among their reference groups (the groups to which all of us look for cues as to how to behave or for support in our attitudes), they will quickly discount the messages. In other words, mass media messages seldom, if ever, are a sufficient cause of attitude change.[14]

In regard to attitude change, Sherif maintains that in its simplest form, " . . . the problem of attitude change is the problem of the degree of discrepancy between one's own position and the position advocated in a message, and the felt necessity of coping with that discrepancy."[15] Recent research and theorizing conclude that attitudes can be changed when a message which relates to the individual's needs and wants is presented in such a way and at such a time that it is reinforced by related events. Attitudes can also be changed when the change is "guaranteed" social support and where channels of action or obstacles to action are pointed out.[16]

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[14]V. J. Wiman, "Educational Media," Theory Into Practice, XL (1970), 42.

[15]Carolyn W. Sherif and Muzager Sherif, Attitude, Ego-Involvement, and Change (New York: John Wiley and Sons, Inc., 1967), pp. 107-108.

[16]Fred P. Black, Attitude Changes of Vocational Educators After Attending a Three-Week Workshop in Vocational-Technical Education Research (Cheyenne, Wyoming: Wyoming Research Coordinating Unit in Vocational-Technical Education, 1969), p. 2.

Henderson, when commenting on administrative attitudes toward integration concluded:

> When an administrator believes that the maintenance of discipline is his chief function, he is likely to behave in a manner that will foster negative staff attitudes toward the students, parents, and school-community.[17]

In these instances the administrator gives support to the myth that school integration cannot work. On the other hand, when he views his job as being primarily to serve as the community's educational leader and he seeks to bridge the culture gap between students, parents, and school personnel, the administrator is likely to foster a school climate that is conducive to integration.

It is true that in each administrator resides a unique person who brings to his encounter with associates and students a psychological make-up different from all others in the past and never to be duplicated in the future. It is equally true, however, that individual diversity is limited by the social context in which it exists. The individual administrator is a member of a particular class, a particular race, a particular age group, a particular geographical community which shape and delimit his perspective. The attitudes of school personnel are influenced by community forces. One can appraise community structures as a step in changing attitudes of administrators.[18] Thus, attitudes are the creatures of many forces--personal, professional, organizational, and

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[17]Henderson, loc. cit.

[18]Kenneth Clark and Others, School Integration, Proceedings of a Symposium on School Integration (East Lansing: Michigan State University, Bureau of Educational Research, 1964), p. 58.

situational--which form the context within which school personnel develop and carry on their specialized tasks. Only if the social, interpersonal, and structural elements in the perspectives of school functionaries are carefully explored can one assay attitudes realistically, or take steps to change them.

It is easier to detect negative attitudes than to change them. Katz[19] outlined three techniques for changing attitudes: Offer new information, threat of punishment, and promise of reward. None of these techniques work well in modifying ego-defensive attitudes. When based on defense of ego, additional techniques are required; i.e., removal of the threat, catharsis or opportunity for ventilation of feelings, and acquisition of understanding by the individual regarding the reasons for his attitudes.

Cartwright[20] stressed the importance of group influence and pressure in changing attitudes. In any practical attempt to change attitudes, group influence is of primary importance. The group serves two basic purposes in relation to attitude change: It can be a medium of change and it can be a target of change. Furthermore, the greater the sense of belonging an individual has, the greater will be the influence of the group on him, and the greater the prestige he has in the group, the greater will be the influence he can exert on others. Far too often, administrators with positive attitudes toward integration

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[19]Daniel Katz, "The Functional Approach to the Study of Attitudes," Public Opinion Quarterly, XXIV (1960), 165-204.

[20]Dorwin Cartwright, "Achieving Change in People: Some Applications of Group Dynamics Theory," Human Relations, IV (1951), 381-392.

are coerced into either concealing their attitudes or changing them. New teachers in particular learn to reflect sanctioned attitudes, even to the detriment of the students. Even though an administrator may have a positive attitude toward vocational education, he may have learned to reflect sanctioned attitudes of the group of teachers or community citizens. These attitudes, sometimes strongly influenced by community structures and opinion leaders, may represent the residue of a principal's past experiences.

Since attitudes are formed through direct experiences, Cronbach[21] suggested that teacher-education institutions could help build favorable attitudes toward something if the prospective teachers could have a direct experience with the object. Most academic teacher-preparation programs are void of information or philosophy of vocational education.[22]

II. Attitudes Toward Vocational Education

Vocational education has an "image problem." Venn[23] stated, "Vocational education is being seen as second-class education and while it is perceived in this negative light, it is in reality successful and useful." Educators who reach this conclusion believe that if observers

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[21]Lee J. Cronbach, Educational Psychology (New York: Harcourt, Brace, and Company, Inc., 1954), p. 423.

[22]James A. Rhodes, Vocational Education and Guidance (Columbus: Charles E. Merrill Publishing Company, 1970), p. 48.

[23]Grant Venn, Man, Education and Work (Washington, D. C.: American Council on Education, 1964), p. 34.

were more fully informed about vocational education its "image" would be more positive and there would be no problem.

The National Advisory Council on Vocational Education, in its annual reports, has stressed the importance of vocational education in helping to remedy the failure of our schools to educate all high school students to the level necessary for employability. The committee has stressed that the prevailing attitude--that vocational education is designed for somebody else's children--must change. This attitude has pervaded the thinking of some school districts which continue to emphasize the college preparatory program to the detriment of 60 per cent of the graduates who will enter the labor market after graduation from high school.[24]

Criticism of the American education system appears to be growing. Coleman,[25] Barlow,[26] and Rhodes[27] voiced similar beliefs about the secondary status assigned to vocational programs. They indicated that the national climate is such that a change in the attitudes toward vocational education is inevitable. Barlow commented on the

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[24]Edward M. French and Lloyd D. Brooks, Vocational Education in Tennessee Secondary Programs (Knoxville: Tennessee Research Coordinat-Unit, Information Series 22), p. 2.

[25]James S. Coleman, The Adolescent Society (Glencoe, Illinois: Free Press, 1961), p. 215.

[26]Melvin L. Barlow, "A Platform for Vocational Education in the Future," Vocational Education, National Society for the Study of Education, ed. Melvin L. Barlow (Chicago: University of Chicago Press, 1965), p. 290.

[27]Rhodes, loc. cit.

changing scene in education and industry:[28]

> It used to be possible to enroll the school failure--the one weeded out of the preferred pathway--in the vocational program on the pretext that if he couldn't work with his mind then obviously he could work with his hands. This was sugar coated by talking about students with many intelligences--mechanical, clerical, social, abstract, and others--but we didn't really carry the rationale into practice. Then technology played a dirty trick. . . . In order to succeed in an occupation, the worker had to be able to work with his mind and his hands.

The principal is ultimately responsible for the success of the program of his school. Supervision of the instructional program is of primary importance to any principal. Brickell[29] found the school administrator as one of the dominant forces in educational change. Furthermore, a study completed in Indiana revealed that " . . . eighty per cent of the Indiana school administrators viewed themselves as key persons in the development of local vocational education programs."[30]

A determination of the relative importance that principals place upon vocational education in contrast to other educational innovations toward which resources might be directed, would provide a point of departure in planning the implementation of such programs. Bentley and Woerdehoff stated:[31]

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[28]Barlow, loc. cit.

[29]Henry M. Brickell, Organizing New York State for Educational Change (Albany: New York State Department of Education, 1961), pp. 54-55.

[30]Ralph R. Bentley and Frank J. Woerdehoff, "The Viewpoints of Indiana School Administrators Regarding Vocational Education" (Lafayette, Indiana: The Division of Education, Purdue University, June, 1958), p. 8.

[31]Ibid.

> In terms of probable inference, the school administrators are in a favorable position to exert influence on the curriculum design of the secondary school. Consequently, it is reasonable to assume that their viewpoints regarding vocational education contribute much to the degree of acceptance or rejection of this phase of secondary education and the way the program is carried out.

Ericksen described the administrator's influence by stating, "The attitude of a high school principal is basically responsible for the effectiveness or ineffectiveness of the high school program."[32] In light of reported studies, it would appear that guidance counselors' attitudes toward a particular program according to Insko,[33] would be influenced by the principal's expressed attitude toward the program, or the conclusions of the school administration would tend to be accepted by the counselor either through the counselor's desire to be right or through their desire to gain social acceptance.

Kaufman's[34] role study of secondary schools in preparing youth for employment included 25 schools visited by an evaluation team which made observations, conducted interviews, and administered questionnaires to teachers and administrators, union officials, and vocational education graduates. Findings from this study revealed that academic teachers from comprehensive high schools were less favorable toward vocational

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[32]K. Ericksen, "The Principal and the Counselor in a Changing World," Bulletin of the National Association of Secondary School Principals, XLVI (1962), 190.

[33]Chester A. Insko, Theories of Attitudinal Change (New York: Appleton-Century-Crofts, 1967), p. 14.

[34]Jacob J. Kaufman et al., "The Role of Secondary Schools in the Preparation of Youth for Employment" (University Park, Pennsylvania: The Pennsylvania State University, 1967), p. 72.

education than were vocational teachers. The academically oriented teachers rejected any suggestions to expand vocational education and believed more basic education was necessary. They also expressed the belief that vocational students had inferior ability. The follow-up interviews indicated that vocational graduates performed just as well in their jobs, and, in fact, considered themselves better prepared for their work. Still vocational education is considered by many as in some way "inferior" and the term "dumping ground" is often applied to it.

Conroy[35] investigated attitudes of several junior high school faculties toward vocational education and tested alternatives to improve those attitudes. Analysis of the scales used to measure attitudes of junior high school staff members revealed that, although the overall attitude toward vocational education was favorable, staff members tended to have reservations about vocational education as a suitable program for scholastically able students. Apparently, junior high school staff members believed that bright students were above the skills and abilities required by the occupations it teaches. This attitude appears to prevail despite the complex technological programs recently added to many vocational curriculums, the elaborate equipment supporting those programs, and the competence of the instructor. It might be concluded that junior high school staff members differentiate between technicians and theorists and perceive vocational education as a suitable experience

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[35]William G. Conroy, "An Investigation of Alternatives to Improve Attitudes of Junior High School Staff Members Toward Vocational Education in High Schools" (Woburn, Massachusetts: Massachusetts Research Coordinating Unit, 1969), p. 64.

for tradesmen and technicians, but not for students with the ability to become theorists. The study found that vocational educators tend to view the attitudes of junior high school staff members as significantly less favorable toward vocational education than they in fact are. This was true of all vocational educators in the experimental school, both before and after a workshop experience. Vocational educators involved in the workshops tended to develop a more favorable perception of junior high school staff attitudes than vocational educators who did not participate. This finding suggested that vocational educators believe their professional peers have little regard for the value or importance of their work. Perhaps an inferiority complex has been fostered as a result of real or imagined rejection by academicians during their formal education and later reinforced by the reward system for degree-holders within the educational community.

Sybouts and Krepel[36] surveyed a group of school superintendents and principals in an attempt to determine their attitudes toward vocational education and their attitudes toward several vocational and academic concepts. Superintendents of larger school systems had a more positive attitude toward vocational education than the superintendents of smaller school systems. Superintendents, as a group, had a significantly more positive attitude toward vocational education than the group of principals used in this study. This suggests that the individuals most able to implement new occupational educational programs, the

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[36]Ward Sybouts and Wayne Krepel, "The Development of Materials for the Orientation of School Administrators to Vocational Education Needs and Programs" (Lincoln: University of Nebraska, 1970), p. 109.

principals, appeared to have the most negative attitudes toward these programs. The research concluded:

> . . . that a need exists for increased emphasis in the area of vocational and technical education. Since a lack of of qualified school administrators is a hinderance to a change in vocational and technical education, a need exists for programs to train and develop the leadership necessary for the expansion and improvement of vocational and technical education.

Superintendents and principals were found to be less favorable toward vocational education than academic education. These are the individuals most able to implement new programs and give new direction to the guidance personnel.

Miller's study[37] indicated that teachers were strongly opposed to the viewpoint that college calibre students should be guided away from vocational subjects. The teachers had an average score of 4.3 out of a possible 5.0. The principals were seen with an average score of 3.4 which was .9 of a point below the teachers. Over half of the principals were seen as undecided or in agreement that college calibre students should be guided away from vocational subjects. Major findings of this study revealed that: (1) teachers were more favorable to vocational education than were principals, and (2) generally, principals were favorable toward vocational education.

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[37]Texton R. Miller, "Teacher Perception of Principals' Views on Vocational Education" (Raleigh: North Carolina State University Research Series in Occupational Education, 1966), p. 12.

Spengler[38] conducted a study of the attitudes of school board members toward vocational education. This study concluded that the board members had a positive attitude toward vocational education. It also concluded that board members' attitudes in the urban districts were more positive than the attitudes of board members in the suburban and rural districts.

In a vocational education perception study by Wenrich and Crowley,[39] the general favorability of parents toward education includes the vocational program. Parents wanted to see a good program for youth who could benefit from such a program. The college-preparatory programs concerned them a bit more; however, employers wanted to see basic subjects such as science and math stressed while school administrators wanted not only to expand the vocational program, but also to upgrade it. Teachers while favorable in general were not satisfied with the scholastic records of students in vocational programs. Although there were no strong conclusions made, the study did show some interesting relationships between attitudes held about vocational education and attitudes held about college-preparatory education. One observation was that all groups believed that vocational education programs were as important as college-preparatory programs; however, all groups believed vocational education programs were not as respectable as college-preparatory programs.

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[38]James Spengler, The Attitudes of School Board Members Toward Occupational Education (New York: The State Department of Education, 1970), p. 97.

[39]Wenrich, loc. cit.

In a series of case studies reported by Keathley,[40] it was found that one weakness would have to be eliminated before real progress could be made in unifying the general and vocational education aims. That weakness was found in the training programs of the teachers colleges. In light of the many bad situations existing between the personnel of the two fields of education, it seemed that it would be well if the teacher training institutions in the State of Tennessee would include at least a three quarter hour course in their curriculum, which would be designed to acquaint all prospective teachers with those facts, ideas, concepts, and ideals about vocational education which are so surprising to new teachers and which, when misunderstood, can lead to undesirable relationships. The old theory of mental discipline is still strongly entrenched in the thinking of many of those who are about to begin teaching within the public schools.

The feeling that general education is for the purpose of developing culture, preparing for college, and preparing for the enjoyment of leisure, as contrasted to the one that vocational education is preparation for work, and reserved for the "lower" classes, is largely traditional. The public associates "culture" with general education, and "work" with vocational education.

In 1958, Purdue University conducted a study on the viewpoints of Indiana school administrators regarding vocational education. Principal

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[40]Snyder Belt Keathley, "A Study of Relationships Between Vocational and General Education Programs and Personnel" (Knoxville: The University of Tennessee, 1951), pp. 206-208; 228-229.

investigators were Bentley and Woerdehoff.[41] Major attention, in this study was focused upon those principles, policies, and practices in vocational education which were most acceptable and least acceptable to school administrators, and furnished a basis for re-examining vocational education in the secondary schools in Indiana. In general, findings in this study indicated that Indiana school administrators believed that vocational education was an important part of secondary education in that state. In addition, high school principals from smaller schools believed that most students were interested in vocational education and that such courses should be a part of the education for all pupils. One of the most interesting findings of this study related to the perception of administrators as to their importance in the development of local programs of vocational education. This was indicated by the fact that 80 per cent of the respondents to the questionnaire viewed themselves as key persons in local program development. Such a finding lends support to the theory proposed by this writer regarding the importance of assessing local administrators' feelings in the further development of vocational education in Tennessee.

III. Characteristics Influencing Attitudes

The educational administrator is the one who must bear much of the burden as the change agent, adapter, innovator, and catalyst. School administrators are in a favorable position to exert influence on the curricular design of the secondary school. Consequently, it is

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[41] Bentley, loc. cit.

reasonable to assume that their viewpoints regarding vocational education contribute much toward the degree of acceptance or rejection of this phase of secondary education and the way the program is carried out.

The following characteristics are believed to influence administrators' attitudes toward vocational education:

1. Knowledge of vocational education
2. Full-time or part-time administrative position
3. Father's occupation
4. Age
5. Teaching major
6. Marital status
7. Participation in vocational programs
8. Noneducational work experience.

To move vocational education from a "status quo" position to one of rightful partnership with other areas of the curriculum requires an attitudinal change on the part of the principal. This change may be initiated by external forces such as the school board or citizens groups, or it may come from within as a simple questioning of what can be done to improve all areas of instruction and course offerings.

Dodson[42] suggested that perhaps the initial change in attitude with regard to the administrator's consideration of vocational education was the personal improvement of his general knowledge and understanding

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[42]Edwin S. Dodson, Vocational Education and the Comprehensive High School: A Challenge to Administrators (Reno: The Nevada Research Coordinating Unit, 1968), p. 11.

of vocational education. Barlow[43] stated, "It becomes mandatory that the high school principal realign his system of values and carry the entire (not just vocational) faculty with him in this direction, a process that is not easily done, as institutional behavior tends to be extremely rigid." Once a determined effort is made by the principal to move in this direction, he can greatly influence all of the teachers in the recognition of their responsibility to students who are not college bound.

The knowledge which the educational administrator possesses determines to a large extent the direction which educational opportunities will take within his school. Miller's[44] study concerned itself with what teachers of agriculture perceived to be the viewpoints of their principals toward vocational education, and was based upon a premise; namely, that the effectiveness with which an administrator directs a vocational education program is dependent upon his knowledge, understanding, and appreciation for such a program.

Black[45] reported that educators throughout the State of Wyoming had shown little or no responsibility toward the actual improvement of old or the development of new programs, techniques, or procedures in vocational education. This lack of sincere participation in research

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[43]Melvin L. Barlow, "Curriculum Development and the Improvement of Instruction," The Bulletin of the National Association of Secondary School Principals, XLIX (May, 1965), 125, 129.

[44]Miller, loc. cit.

[45]Black, op. cit., p. 1.

and development programs in Wyoming toward the improvement of the state's vocational education goals stemmed from the fact that educators, counselors, administrators, and others lacked knowledge about procedure, funding, and research design and methods to actively pursue the opportunities available.

Keathley[46] found in his case studies that principals' negative attitudes toward vocational education stemmed from the fact that they did not understand what a vocational program was and used the program to get rid of all their problem children. Students were "sentenced" from academic education classes to vocational education classes.

The role of vocational education like the image of vocational education reported in Wenrich and Crowley's study,[47] is perceived according to the experience of the individual making the judgment. School administrators having had experience with vocational education programs tended to hold a more favorable viewpoint than those not having had such experience.

LaBorde[48] found there was difference in the attitudes toward vocational education of guidance counselors who had participated in vocational education and counselors who had not participated in vocational education programs. The counselors who had participated in

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[46]Keathley, op. cit., p. 193.

[47]Wenrich, loc. cit.

[48]Gerald K. LaBorde, "A Study of the Relationship Between Attitudes Toward Vocational Education and Knowledge of Vocational Education of Tennessee Guidance Personnel" (Knoxville, The University of Tennessee, 1973), p. 64.

vocational education programs had a better attitude toward vocational education.

McNeil[49] found the lack of status of vocational education may be based on the fact that the teacher population as well as school administrators have been drawn from a group which may have had very little first-hand experience with occupations related to vocational education. Many school principals have not worked at a job not related to education.

Kaufman's role study[50] of secondary schools in preparing youth for employment revealed that academic teachers from comprehensive high schools were less favorable toward vocational education than were vocational teachers. The academically oriented teachers rejected any suggestions to expand vocational education and believed more basic education was necessary.

Parks[51] revealed that the area of public school certification had a marked effect upon attitudes toward vocational education. Respondents who were certified to teach in vocational education programs had the most favorable attitudes toward vocational education while those certified in mathematics were least favorable. This study used such factors as age, years of experience in administering a vocational

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[49]Jackson Malcom McNeil, "A Study of Vocational Education as Perceived by Principals in Thirty-Two High Schools" (Auburn, Alabama: Auburn University, 1968), p. 37.

[50]Kaufman, loc. cit.

[51]Darrell Lee Parks, "Attitudes and Principles Regarding Vocational Education in Ohio" (Columbus: The Ohio State University, 1968), pp. 94-95.

education program, credit hours completed beyond the baccalaureate degree, being enrolled as a vocational education student in high school, non-educational occupational experience, and parents' occupational status as factors to compare with attitudes.

LaBorde[52] found the full-time counselor had a more positive attitude toward vocational education than the part-time counselor. Therefore, it is assumed that the part-time principal would appear to be less favorable toward vocational education than the full-time principal. This study also found a significant difference existed between the knowledge of vocational education of counselors and their fathers' occupations.

IV. Summary

Attitudes represent the residue of a principal's past experiences and are often strongly influenced by community structures and power leaders. Katz suggested three techniques that could be used to change attitudes: offer new information, threat of punishment, and promise of reward. Other techniques must be used when the objective is to modify ego-defensive attitudes. Group influence is also important in changing attitudes as administrators may learn to reflect sanctioned attitudes of teachers and other community citizens.

Vocational programs have been assigned a secondary status. The National Advisory Council on Vocational Education reported the prevailing attitude toward vocational education is that such

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[52]LaBorde, op. cit., p. 76.

programs are designed for somebody else's children.

Brickell found the principal to be one of the dominant forces in educational change. School administrators viewed themselves as key persons in the development of local vocational programs, as Bentley and Woerdehoff discovered in their study. Ericksen's study revealed that the attitude of a high school principal was basically responsible for the effectiveness or ineffectiveness of the high school program.

In his study, Kaufman concluded that academic teachers from comprehensive high schools were less favorable toward vocational education than were vocational teachers. Conroy discovered that teachers have reservations about vocational education as a suitable program for scholastically able students. Miller's study showed exactly the opposite conclusion. He found that teachers were strongly opposed to the viewpoint that college calibre students should be guided away from vocational subjects.

Spengler concluded that school board members had a positive attitude toward vocational education. School board members in urban districts revealed more positive attitudes than those in suburban or rural districts.

Wenrich and Crowley found that parents generally favored vocational education but were a bit more concerned with college preparatory programs.

Superintendents, as a group, had a significantly more positive attitude toward vocational education than principals, according to Sybouts and Krepel. Superintendents of larger school systems had a

more positive attitude toward vocational education than the superintendents of smaller school systems.

Keathley discovered a weakness in the training programs of teachers colleges. He suggested that the colleges include at least a three quarter hour course to acquaint all prospective teachers with vocational education.

Bentley and Woerdehoff concluded that school administrators believed that vocational education was an important part of secondary education. The administrators believed that such courses should be a part of education for all pupils.

Dodson, Miller, and Keathley found that principals' negative attitudes toward vocational education stemmed from the fact that they did not have knowledge or understanding of vocational programs. Teachers and principals have had little first-hand experience with occupations related to vocational education, according to McNeil.

The area of certification has an effect upon attitudes toward vocational education. Parks found that respondents who were certified to teach in vocational education programs had more favorable attitudes toward vocational education than those certified in math.

CHAPTER III

METHODOLOGY

The purpose of this study was to identify Tennessee secondary school principals' attitudes toward and knowledge of vocational education and to determine whether or not a relationship existed between principals' attitudes, knowledge, and certain demographic data. This chapter presents the procedures used, including the selection of subjects, instruments for the collection of data, and treatment of the data used in this study.

I. Selection of Subjects

A list of names and addresses of all public school secondary principals in the State of Tennessee was obtained from the Tennessee State Department of Education.[53] Principals serving Tennessee high schools, grades seven through twelve, were randomly selected by utilizing the stratified proportional sampling technique. A total of 150 names were drawn.

Information acquired from the State Department of Education listed a total of 313 public secondary schools in Tennessee with vocational programs.[54] There were 122 schools in East Tennessee with

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[53]Benjamin E. Carmichael (ed.), Tennessee Directory of Public Schools (Nashville: State Department of Education, 1973-74).

[54]Ibid.

vocational programs, 99 schools in Middle Tennessee, and 92 schools in West Tennessee. The total number of schools (313) was divided into the number of schools in each of the grand divisions of Tennessee to get a percentage in each division. The percentage of each division was multiplied by 150 to ascertain the number to be drawn from East, Middle, and West Tennessee. Fifty-nine names were drawn to represent East Tennessee, 47 names were drawn to represent Middle Tennessee, and 44 names were drawn to represent West Tennessee.

II. Instruments for the Collection of Data

The data used for this study were scores from the "Attitude Toward Vocational Education" (ATVE), scores from the "Purview of Vocational-Technical Education" (PVTE), and demographic data collected by the Personal Data Form.

Engler's[55] ATVE scale was the attitudinal instrument used in this study. Engler used a panel of experts from the field of test construction and vocational education to assist him in the construction of the scale. His original scale was reviewed by the panel to clear the statements of ambiguity, double meaning, and correctness of information. The corrected scale was administered to a pilot group of graduate students in the field of school administration at The University of Nebraska. An item analysis was conducted to determine the ability of each item to discriminate. This instrument originally contained 67 items. For the purpose of the study, the number of items

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[55]Engler, loc. cit.

in the scale was reduced to 45. Scores above 100 on the ATVE scale indicate a positive attitude toward vocational education.

The PVTE instrument was developed by Colgan[56] to sample an individual's knowledge of vocational education. Colgan formed an advisory group consisting of experts from the fields of educational administration, sociology, vocational education, and members of the Nebraska State Department of Education. This advisory group assisted Colgan in the selection of general areas for sampling as well as assisting in the construction of test items. Questions related to vocational and technical education were included from the areas of literature, legislation, administration, guidance, population, labor, curriculum and finance. The advisory group retained 115 items from the original pool of 200 test items. The 115 item instrument was administered to a pilot group of 99 students at The University of Nebraska. An item analysis was conducted on the results of the Pilot administration. From this analysis, 50 items were selected for the final instrument. Of these 50 items an odd-even analysis yielded a corrected reliability of .79. For the purpose of the study, several items on the instrument have been updated and the number of items on the instrument has been reduced to 36. A total test score of the correct number of responses was used.

Background demographic data were collected through a questionnaire specifically developed for this study. The Personal Data Form asked for general information, parental information, training, and work experience.

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[56]Colgan, loc. cit.

The instruments used in this study appear in Appendix A, Appendix B, and Appendix C.

III. Data Collection

A simulated data base and analysis was performed before the actual data were collected. The trial run was analyzed in order to perfect the instruments before submitting them to the sample population.

On October 21, 1974, questionnaires were mailed to all participants. A cover letter describing the study and requesting the principals' cooperation was included (Appendix D). The principals were instructed to return the questionnaires in an enclosed, addressed, stamped envelope.

After a three-week interval which netted a 58.6 per cent return, a follow-up mailing was made to the nonrespondents. This mailing consisted of a letter expressing the urgency for the return of the completed material (Appendix E). From the original mailing to 150 selected principals and with the second mailing, a total of 99, 66 per cent usable returns were received.

IV. Treatment of the Data

The ATVE and the PVTE instruments were hand scored as they were received. The scores on the two instruments were recorded on sheets, key punched into IBM cards, and verified.

The resources of The University of Tennessee Computing Center were employed to complete the necessary statistical computation. A Pearson Product-Moment correlation was used to determine the

relationship between principals' attitudes toward vocational education and their knowledge of vocational education. A Point-Biserial r was used to determine the relationship between ATVE scores, PVTE scores, and principals' participation in high school vocational programs.

The variables of age, father's occupation, noneducational work experience, full-time position as principal, teaching major, involvement in vocational education, and marital status were subjected to an analysis of variance to determine any significant difference in attitude toward vocational education and knowledge of vocational education in the various categories.

V. Summary

A Personal Data Form, and an ATVE and PVTE instrument were mailed to 150 principals throughout the State of Tennessee. After a second mailing, the returned data were statistically treated utilizing a Pearson Product-Moment correlation, analyses of variance, and a Point-Biserial r.

The findings of the study are presented in Chapter IV.

CHAPTER IV

FINDINGS AND ANALYSIS OF DATA

Data presented in this chapter were obtained from high school principals throughout the State of Tennessee. Data were hand scored for each of the 99 responding principals, recorded on computer sheets, and key punched into IBM cards for statistical treatment. A Pearson Product-Moment Correlation, analyses of variances, and a Point-Biserial r were used to test the 19 hypotheses. Demographic data were collected from each respondent and were used in the statistical treatments.

I. Demographic Findings

Principals participating in the study completed the Personal Data Form which requested general information, family background, educational background, characteristics of selected schools, non-educational work experience, and other demographic data.

General Information

Each principal provided certain biographic information. The general information is presented in Table 1. The majority of the respondents in the study (97 per cent) held a full-time position as principal. The majority of the respondents were male (97 per cent), 41 years of age or older (65.6 per cent), and married (94.9 per cent).

Respondents were asked to list the number of years they had been in a principalship position. A majority (97.7 per cent) had 10 years

Table 1

Biographic Information About Respondents in Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Position:		
Full-time principal	96	97
Part-time principal	3	3
Total	99	100
Number Years Principal:		
1-5 years	37	37.4
6-10 years	30	30.3
11-20 years	23	23.2
21-30 years	8	8.1
More than 30 years	1	1.0
Total	99	100.0
Sex:		
Male	96	97
Female	3	3
Total	99	100
Age:		
26-30	6	6.1
31-35	11	11.1
36-40	17	17.2
41-45	23	23.2
46-50	24	24.2
51-over	18	18.2
Total	99	100.0
Marital Status:		
Single	3	3.0
Married	94	95.0
Widowed	1	1.0
Divorced	1	1.0
Total	99	100.0

or less experience as principal. Only 8.1 per cent had experience as a principal for 21 to 30 years.

Family Background of Principals

Information was requested from the participating principals about their parents' education, parents' occupation, and the size of the community in which they had lived for the longest period of time before attending college.

The respondents indicated that their father had less education than their mother. Only 32.4 per cent had graduated from high school while 40.5 per cent of the principals' mothers had completed high school. The level of parents' education is presented in Table 2.

A majority (71.7 per cent) of the principals' mothers were listed as having no occupation other than housekeeping, but 9.1 per cent worked in professional occupations. Unskilled or semi-skilled occupations accounted for the highest percentage (41.4 per cent) of the fathers' occupations. The next highest occupational category for the fathers was skilled occupations with 27.3 per cent in this area. There were more fathers in professional occupations (11.1 per cent) than there were mothers in professional occupations (9.1 per cent). Occupational information of principals' mothers and fathers, organized by category, number of respondents, and percentage of respondents, is presented in Table 3.

Data were requested from principals concerning the size of the community where they had lived for the longest period of time before attending college. Many of the principals lived for the longest period

Table 2

Principals' Mothers' and Fathers' Level of Formal Education by Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Father's Education Level:		
Less than eighth grade	32	32.3
Graduated eighth grade but not high school	35	35.4
Graduated high school no college work	16	16.2
Attended college but not a graduate	7	7.1
College graduate	3	3.0
Advanced work above baccalaureate degree	6	6.1
Total	99	100.0
Mother's Educational Level:		
Less than eighth grade	24	24.2
Graduated eighth grade but not high school	35	35.4
Graduated high school no college work	27	27.3
Attended college but not a graduate	7	7.1
College graduate	5	5.1
Advanced work above baccalaureate degree	1	1.0
Total	99	100.0

Table 3

Principals' Mothers' and Fathers' Occupations by Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Father's Occupations:		
None or no information	5	5.1
Unskilled or semi-skilled	41	41.4
Skilled	27	27.3
Sales	6	6.1
Public service	9	9.1
Professional	11	11.1
Total	99	100.0
Mother's Occupation:		
None or housekeeping	71	71.7
Factory	8	8.1
Sales	6	6.1
Secretarial	5	5.1
Professional	9	9.1
Total	99	100.0

of time in a rural-farm setting (44.4 per cent). A large majority of the principals (84.8 per cent) lived in towns, villages, or on the farm with populations under 9,999. Information regarding the respondents' size of community in which they lived for the longest period of time before attending college is presented in Table 4.

Educational Background

Most principals (97 per cent) had attended public schools. Most of the principals (70.7 per cent) reported their graduating high school class to be less than 100 students. A majority of the respondents (51.5 per cent) indicated they had taken vocational courses in high school. Most of the respondents (89.9 per cent) had not taught any vocational education courses. The data relating to principals' involvement in vocational education are presented in Table 5.

A large number (77.8 per cent) of the principals' teaching preparation and certification was in secondary education. Twenty-two per cent of the principals had teaching experience in the areas of physical education or coaching. Teaching experience in the area of social studies included 19 per cent of the principals. Eighteen per cent of the principals had teaching experience in science, and 17 per cent in math. Table 6 presents data on teaching certification and teaching experience of the respondents.

Characteristics of Selected Schools

Information on the number and kinds of vocational programs in each school was collected from each of the participants. The 99

Table 4

Respondents Size of Community Where Lived for Longest Period of Time Before Attending College by Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Rural - farm	44	44.4
Village (under 2,500)	16	16.2
Town (2,500 - 9,999)	24	24.2
Small City (10,000 - 99,999)	6	6.1
Large City (100,000 and over)	9	9.1
Total	99	100.0

Table 5

Respondents Involvement in Vocational Education by Number and Percentage in Each Classification (N = 99)

Classification	N	Per Cent
Took Vocational Courses		
Yes	51	51.5
No	48	48.5
Total	99	100.0
Taught Vocational Courses		
Yes	10	10.1
No	89	89.9
Total	99	100.0

Table 6

Respondents Teaching Certification and Teaching Experience by Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Teaching Certification		
K-12	9	8.1
Elementary and Secondary	13	13.1
Secondary	77	77.8
Total	99	100.0
Teaching Experience		
English	9	9.1
Math	17	17.2
Social Studies	19	19.2
Science	18	18.2
Art	1	1.0
P.E. or Coaching	22	22.2
Elementary Education	1	1.0
Driver Training	1	1.0
Didn't teach before became principal	1	1.0
Vocational Education	10	10.1
Total	99	100.0

responding principals listed a composite total of 333 vocational programs in their schools. There were 92 programs in Home Economics in the 99 schools. Other programs largely represented were Vocational Agriculture (62), Business (60), Trades and Industry (51), and Distributive Education (14).

A majority (67.7 per cent) of the schools had a student population of 800 or less; 18.2 per cent had an enrollment over 1000 students. Information pertaining to vocational programs in the schools and size of school population is presented in Table 7.

Noneducational Work Experience

Participants were asked to list how many summer vacations since their graduation from college were they employed in noneducational work experience. In responding, 26.3 per cent of the principals indicated they had completed no noneducational work experience during the summers. A total of 27.3 per cent of the principals had one to three summers of noneducational work experience. Principals were also asked to indicate how many years they had been employed in an occupation unrelated to any educational program or institution. Results indicated that 46.5 per cent had never been employed for a full year in a noneducational related occupation. A total of 23.2 per cent had completed one to three years of employment in a noneducational setting. Principals' noneducational work experience data are presented in Table 8.

Table 7

Vocational Programs by Service Area and Size of School by Number and Percentage in Each Classification (N = 99 Respondents from 99 Schools)

Classification	N	Per Cent
Vocational Programs in Schools		
Home Economics	92	92
Vocational Agriculture	62	62
Business	60	60
Trades and Industry	51	51
Distributive	46	46
Health Occupations	14	14
Other	8	8
Total in 99 schools	333	
Size of School		
0-500 students	32	32.3
501-800 students	35	35.4
801-1000 students	14	14.1
1001-1300 students	10	10.1
1301-1900 students	7	7.1
2001 or more students	1	1.0
Total	99	100.0

Table 8

Respondents Noneducational Work Experience by Number and Percentage for Each Classification (N = 99)

Classification	N	Per Cent
Summer Employment (Noneducational)		
None	26	26.3
1-3 Summers	27	27.3
4-5 Summers	13	13.1
6-8 Summers	11	11.1
9 or more	22	22.2
Total	99	100.0
Full Years Employment (Noneducational)		
None	46	46.5
1-3	23	23.2
4-5	8	8.1
6-8	8	8.1
9 or more	14	14.1
	99	100.0

Other Demographic Findings

The information regarding school location of participating principals is presented in Table 9. As discussed in Chapter III, a stratified proportional random sampling technique was used which allowed 59 to be selected from East Tennessee, 47 from Middle Tennessee, and 44 from West Tennessee. The percentage of the number selected responding was based on the number responding as compared to the number selected for East, Middle, and West Tennessee, respectively.

Principals were asked if they believed that schools offering vocational programs should provide placement services to all drop-outs and graduates. A majority (62.6 per cent) of the principals favored such services. A large majority (80.8 per cent) of the respondents believed that teachers in vocational programs need training in the professional aspects of vocational education such as vocational guidance, vocational philosophy, vocational curriculum development, and vocational evaluation. Principals also believed in large number (83.8 per cent) that teachers in vocational programs need graduate training outside vocational education in general professional education such as educational philosophy, educational curriculum development, educational philosophy, and educational evaluation. Data regarding placement and graduate training in vocational and general education are presented in Table 10.

II. Hypotheses Testing

Nineteen hypotheses were formulated for the study. The scores of the "Attitude Toward Vocational Education" (ATVE), and the

Table 9

Participating Principals' School Location in the State of Tennessee by Number Selected, Percentage of Number Selected Responding, and Number Responding (150 Total Selected; 99 Responding)

Classification	Number Selected	Percentage of Number Selected Responding	Number Responding
Division of State			
East Tennessee	59	65.9	40
Middle Tennessee	47	63.8	30
West Tennessee	44	67.8	29
Totals	150		99

Table 10

Respondents' Decisions on Need for Placement Services and Graduate Training in Professional Aspects of Vocational and General Education in Classification by Number, ATVE Mean Scores, and PVTE Mean Scores

Classification	Number	ATVE Mean Scores	PVTE Mean Scores
Placement Services			
Yes	62	94.08	18.47
No	37	92.92	19.65
Total	99		
Graduate Training in Vocational Education			
Yes	80	93.20	18.79
No	19	95.53	19.42
Total	99		
Graduate Training in General Education			
Yes	83	93.02	18.67
No	16	96.88	20.13
Total	99		

"Purview of Vocational-Technical Education" (PVTE), were subjected to statistical treatments.

As previously stated, the .05 level of significance was selected for the study. When statistical treatment confirmed that differences did not exist at the .05 level of significance, the null hypothesis was accepted. The findings concerning each statement are presented in a table with an accompanying analysis.

Hypothesis 1

No correlation exists between the attitudes of high school principals toward vocational education and their knowledge of vocational education.

Most of the principals in this study had their teacher preparation and experience in an academic area.

To test the null hypothesis, the scores of the ATVE and Purview of Vocational-Technical Education were processed using a Pearson Product-Moment correlation. The data and results are presented in Table 11.

The resulting coefficient of 0.0788 was not significant at the .05 level of significance. Hypothesis 1 was accepted.

Hypothesis 2

No significant difference exists between the attitudes toward vocational education of full-time principals and of part-time principals.

To test this hypothesis the ATVE scores of full-time principals and part-time principals were subjected to an analysis of variance. The results are presented in Table 12.

Table 11

Pearson Product-Moment Correlation: ATVE Scores with PVTE Scores (N = 99)

	Mean	S.D.	r	Level of Significance
ATVE Scores	93.6465	13.1658	0.0788*	0.438
Purview Scores	19.7273	7.8569		

*Not Significant.

Table 12

Analysis of Variance of ATVE Scores of Full-Time Principals and Part-Time Principals (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	1	1.4596	1.459596	0.00834*	3.96
Within Groups	97	16985.1667	175.104811		
Total	98	16986.6263	173.332921		

*Not Significant.

The F ratio was not significant at the .05 level; therefore, Hypothesis 2 was accepted. There is not a significant difference in the attitudes toward vocational education between full-time principals and part-time principals.

Hypothesis 3

No significant difference exists between the attitudes toward vocational education of principals and the classification of their fathers' occupations.

To test Hypothesis 3 an analysis of variance was computed on the ATVE scores of the principals and the various categories of the principals' fathers' occupations. Table 13 presents the results of the analysis of variance.

The F ratio was not significant at the .05 level; therefore, Hypothesis 3 was accepted. The occupation of the father did not appear to influence the principals' attitudes toward vocational education.

Hypothesis 4

No significant difference exists in the attitudes toward vocational education among principals in various age groups.

To test Hypothesis 4 an analysis of variance was computed using the ATVE scores of the principals and the age categories obtained from the Personal Data Form. The results of the analysis of variance are presented in Table 14.

The F ratio was not significant at the .05 level; therefore, Hypothesis 4 was accepted. Age did not influence principals' attitudes toward vocational education.

Table 13

Analysis of Variance of ATVE Scores and Principals' Fathers' Occupations (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	5	296.9859	59.39173	0.33098*	2.33
Within Groups	93	16689.6404	179.458499		
Total	98	16986.6263	173.332921		

*Not Significant.

Table 14

Analysis of Variance of ATVE Scores and Principals' Age (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	5	1079.2407	215.848136	1.26192*	2.33
Within Groups	93	15907.3856	171.047157		
Total	98	16986.6263			

*Not Significant.

Hypothesis 5

No significant difference exists in the attitudes toward vocational education among principals with different teaching majors.

The responses of the principals were categorized as English, Mathematics, Social Studies, Science, Art, Foreign Language, Physical Education or Coaching, Vocational Education, and others. Other areas included one response in elementary education and one in driver training.

To test Hypothesis 5 an analysis of variance was computed using the ATVE scores of the principals and their teaching majors. The results are presented in Table 15.

The F ratio was not significant at the .05 level; therefore, Hypothesis 5 was accepted. The teaching majors of the principals did not influence their attitudes toward vocational education.

Hypothesis 6

No significant difference exists in the attitudes toward vocational education among principals that are married, single, separated, divorced, or widowed.

The majority of the principals (96) in the study were male. An analysis of variance was computed using the ATVE scores and the marital status of the principals. The results are presented in Table 16.

The F ratio was not significant at the .05 level; therefore, Hypothesis 6 was accepted. The marital status of the principals did not appear to influence their attitudes toward vocational education.

Table 15

Analysis of Variance of ATVE Scores and the Teaching Majors of Principals (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	7	2256.2787	322.325524	1.99124*	2.12
Within Groups	91	14730.3476	161.871952		
Total	98	16986.6263	173.332921		

*Not Significant.

Table 16

Analysis of Variance of ATVE Scores and the Marital Status of Principals (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	3	329.2256	109.741851	0.62588*	2.72
Within Groups	95	16657.4007	175.341060		
Total	98	16986.6263	173.332921		

*Not Significant.

Hypothesis 7

No significant difference exists in the attitudes toward vocational education among principals that have participated in vocational education programs and principals that have not participated in vocational education programs.

Because one of the two variables in this correlation problem was a genuine dichotomy, a point-biserial r coefficient was used to test the hypothesis. The correlation between yes and no answers and the ATVE scores for 99 high school principals is presented in Table 17.

Neither of the point-biserial r's were significant at the .05 level; therefore, Hypothesis 7 was accepted. There is no significant difference in the attitudes of principals that have participated in vocational education programs and those that have not participated.

Hypothesis 8

No significant difference exists between the principals' attitudes toward vocational education and the amount of their non-educational work experience.

Principals were requested to list the number of summers of noneducational work experience and to list the number of full years of noneducational work experience. Each set of intervals of noneducational work experience were used with the ATVE scores to compute an analysis of variance to test Hypothesis 8.

The results of the analysis of variance for the amount of summer noneducational work experience is presented in Table 18. The results of the analysis of variance for the amount of full years of noneducational work experience are presented in Table 19.

Table 17

Point-Biserial Correlation of ATVE Scores and Principals' Participation in High School Vocational Programs (N = 99)

Classification	r	t	Table r
Enrolled in Vocational Course	0.0906*	0.1737*	.205
Taught Vocational Course	0.1134*	0.4916*	.205

*Not Significant.

Table 18

Analysis of Variance of ATVE Scores and the Number of Summers of Noneducational Work Experience (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	4	47.2521	11.813034	.06555*	2.48
Within Groups	94	16939.3741	180.206108		
Total	98	16986.6263	173.332921		

*Significant at .05 level.

Table 19

Analysis of Variance of ATVE Scores and Number of Full Years of Noneducational Work Experience (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	4	528.1270	132.031760	0.75408*	2.48
Within Groups	94	16458.4992	175.090417		
Total	98	16986.6263	173.332921		

*Not Significant.

The analysis of variance of ATVE scores and the number of summers of noneducational work experience produced an F ratio that was less than 1.0. When the statistical technique to reverse the degrees of freedom and take a reciprocal of Table F was applied, it was found that F was significant at the .05 level.

The analysis of variance of ATVE scores and number of full years of noneducational work experience produced an F ratio that was not significant at the .05 level.

Since one F ratio was significant at the .05 level, Hypothesis 8 was rejected in part. It would appear there is a relationship between summers of noneducational work experience and principals' ATVE scores.

Hypothesis 9

No significant difference exists between the principals' attitudes toward vocational education and the number of vocational programs in the schools.

Of the 99 principals reporting, there was a total of 333 vocational programs in the schools. Programs in Home Economics, Agriculture, Business, and Trades and Industry were more prevalent.

To test Hypothesis 9 an analysis of variance and a t-test were computed. Results are presented in Table 20.

The F ratio was significant at both the .05 and .01 levels. The t was significant at the .05 level; therefore, Hypothesis 9 was rejected. There is a significant difference in the attitudes toward vocational education and the number of vocational programs in the schools.

Table 20

Analysis of Variance of Principals' ATVE Scores and Number of Vocational Programs in Schools (N = 99)

Source	df	SS	MS	F	t	Table F
Between Groups	3	2256.3253	752.108432	4.85057**		2.72
Within Groups	95	14730.3010	155.055800		2.2024009*	
Total	98	16986.6263				

**Significant at .05 and .01 levels.

*Significant at .05 level.

Hypothesis 10

No significant difference exists between the attitudes toward vocational education of principals and the size of community they resided in for the longest period of time before attending college.

To test Hypothesis 10 an analysis of variance was computed using ATVE scores of principals and the size of community categories obtained from the Personal Data Form. The results of the analysis of variance are presented in Table 21.

Most principals (84.8 per cent) lived for the longest period in communities under 9,999 in population. The F ratio was not significant at the .05 level. Hypothesis 10 was accepted. The size of the community in which principals resided for the longest period of time before entering college did not appear to influence their attitudes toward vocational education.

Hypothesis 11

No significant difference exists between the knowledge of vocational education of full-time principals and of part-time principals.

To test Hypothesis 11, the PVTE scores of full-time principals and part-time principals were subjected to an analysis of variance. The results of the test are presented in Table 22.

The F ratio of 0.95198 was not significant at the .05 level; therefore, Hypothesis 11 was accepted. It appeared there was no difference in knowledge of vocational education between full-time principals and part-time principals.

Table 21

Analysis of Variance of Principals' ATVE Scores and Size of Community Resided in Before Attending College (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	4	119.718	29.9295	0.1667983*	2.48
Within Groups	94	16866.909	179.4352		
Total	98	16986.627			

*Not Significant.

Table 22

Analysis of Variance of PVTE Scores of Full-Time Principals and Part-Time Principals (N = 99)

Source	df	SS	MS	F	Table F
Principal	1	11.27557	11.2755682	0.95198*	3.96
Residual	97	1148.90625	11.8443943		
Corrected Total	98	1160.18182			

*Not Significant.

Hypothesis 12

No significant difference exists between the knowledge of vocational education of principals and the classification of their fathers' occupations.

An analysis of variance was computed using the principals' PVTE scores and the categories of the principals' fathers' occupations. The results are presented in Table 23.

The F ratio of 1.80550 was not significant at the .05 level; therefore, Hypothesis 12 was accepted.

Hypothesis 13

No significant difference exists in the knowledge of vocational education among principals in various age groups.

An analysis of variance was computed using the PVTE scores of principals and the age category of the principal. The results of the analysis are presented in Table 24. The F ratio was not significant at the .05 level; therefore, Hypothesis 13 was accepted.

Hypothesis 14

No significant difference exists in the knowledge of vocational education among principals with different teaching majors.

To test Hypothesis 14, an analysis of variance and a t-test were computed using the PVTE scores of the principals and their teaching majors. The results of the analysis are presented in Table 25. The F ratio was significant at both the .05 and .01 levels. Hypothesis 14 was rejected.

Table 23

Analysis of Variance of PVTE Scores and Principals' Fathers' Occupations (N = 99)

Source	df	SS	MS	F	Table F
Father's Occupation	5	102.65436	20.5308713	1.80550*	2.33
Residual	93	1057.52746	11.3712630		
Corrected Total	8	1160.18182			

*Not Significant.

Table 24

Analysis of Variance of PVTE Scores and Age of Principal (N = 99)

Source	df	SS	MS	F	Table F
Age	5	47.99221	9.5984416	0.80261*	2.33
Residual	93	1112.18961	11.9590281		
Corrected Total	98	1160.18182			

*Not Significant.

Table 25

Analysis of Variance of PVTE Scores and Teaching Majors of Principals (N = 99)

Source	df	SS	MS	F	t	Table F
Teaching Major	7	227.19857	32.4569387	3.16574**		2.12
Residual	91	932.98325	10.2525632		1.7792526*	
Corrected Total	98	1160.18182				

**Significant at .05 and .01 levels.

*Not Significant.

Hypothesis 15

No significant difference exists in the knowledge of vocational education among principals that are married, single, separated, divorced, or widowed.

To test Hypothesis 15, an analysis of variance was computed using the PVTE scores and marital status of the principals. Results are presented in Table 26. The F ratio of 0.59834 was not significant at the .05 level; therefore, Hypothesis 15 was accepted.

Hypothesis 16

No significant difference exists in the knowledge of vocational education between principals who have participated in vocational education programs and principals who have not participated in vocational education programs.

Because one of the two variables in this correlation was a genuine dichotomy, a point-biserial r coefficient was used to test the hypothesis. The correlation between yes and no answers and the PVTE scores for 99 high school principals is presented in Table 27.

Neither of the point-biserial correlation coefficients were significant at the .05 level. Hypothesis 16 was accepted.

There appears to be no significant difference in the knowledge of vocational education between principals that have participated in vocational education programs and principals that have not participated.

Hypothesis 17

No significant difference exists between principals' knowledge of vocational education and the amount of their noneducational work experience.

Table 26

Analysis of Variance of PVTE Scores and the Marital Status of Principals (N = 99)

Source	df	SS	MS	F	Table F
Marital Status	3	21.51515	7.1717172	0.59834*	2.72
Residual	95	1138.66667	11.9859649		
Corrected Total	98	1160.18182			

*Not Significant.

Table 27

Point-Biserial Correlation of PVTE Scores and Principal's Participation in High School Vocational Programs (N = 99)

Classification	r	t	Table r
Enrolled in Vocational Course	0.0877*	0.4471*	.205
Taught Vocational Course	0.0159*	0.1833*	.205

*Not Significant.

Principals were requested to list the number of summers of noneducational work experience and the number of full years of non-educational work experience. An analysis of variance was computed on each of the two sets of data using the PVTE scores.

An analysis of variance was computed using the principals' PTVE scores and the number of summers of noneducational work experience. Results of this analysis are presented in Table 28. The F ratio of 1.27040 was not significant at the .05 level.

An analysis of variance was computed using the PVTE scores and the number of full years of noneducational work experience. The results of the analysis are presented in Table 29.

Neither F ratio was significant at the .05 level. Hypothesis 17 was accepted.

Hypothesis 18

No significant difference exists between the principals' knowledge of vocational education and the number of vocational programs in schools.

To test Hypothesis 18 the PVTE scores of principals and the number of vocational programs in the schools were subjected to an analysis of variance. The results of the test are presented in Table 30.

The F ratio of 1.20924 was not significant at the .05 level; therefore, Hypothesis 18 was accepted. Apparently, there was no difference in the knowledge of vocational education of the principals and the number of programs in the schools. There was a significant

Table 28

Analysis of Variance of PVTE Scores and the Number of Summers of Noneducational Work Experience (N = 99)

Source	df	SS	MS	F	Table F
Summer Employment	4	59.50207	14.8755180	1.27040*	2.48
Residual	94	1100.67975	11.7093590		
Corrected Total	98	1160.18182			

*Not Significant.

Table 29

Analysis of Variance of PVTE Scores and the Number of Full Years of Noneducational Work Experience (N = 99)

Source	df	SS	MS	F	Table F
Years Summer Employment	4	44.13058	11.0326440	0.92923*	2.48
Residual	94	1116.05124	11.8728856		
Corrected Total	98	1160.18182			

*Not Significant.

Table 30

Analysis of Variance of Principals' PVTE Scores and Number of Vocational Programs in Schools (N = 99)

Source	df	SS	MS	F	Table F
Number Vocational Programs	3	42.63979	14.2132631	1.20824*	2.72
Residual	95	1117.54203	11.7636003		
Corrected Total	98	1160.18182	11.8385900		

*Not Significant.

difference between attitudes toward vocational education of principals and the number of vocational programs in the schools.

Hypothesis 19

No significant difference exists between principals' knowledge of vocational education and the size of community they resided in for the longest period of time before attending college.

To test Hypothesis 19, an analysis of variance was computed using the PVTE scores of principals and the size of community categories obtained from the Personal Data Form. The results of the analysis of variance are presented in Table 31.

The F ratio of 0.9562101 was not significant at the .05 level. Hypothesis 19 was accepted.

Other Findings

Principals participating in the study were located in either East, Middle, or West Tennessee. An analysis of variance was computed using ATVE scores of all principals and their location within the State. Results of the analysis of variance are presented in Table 32.

The F ratio of 0.0987082 was not significant at the .05 level. The three divisions of the State had approximately the same mean scores. Principals in East Tennessee showed a slightly higher mean score of 94.35. Principals in Middle Tennessee showed a mean score of 93.33, and principals in West Tennessee had a mean score of 93. The highest possible score that could have been made on the ATVE instrument was 159.

A similar analysis of variance was computed using the PVTE scores and location of principals in the State. The results of the

Table 31

Analysis of Variance of Principals' PVTE Scores and Size of Community Resided in Before Attending College (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	4	41.4835	10.370875	0.9562101*	2.48
Within Groups	94	1019.5064	10.845812		
Total	98	1060.9899			

*Not Significant.

Table 32

Analysis of Variance of Principals' ATVE Scores and School Location Within the State (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	2	34.86	17.43	0.0987082*	3.11
Within Groups	96	16951.767	176.5809		
Total	98	16986.627			

*Not Significant.

analysis of variance are presented in Table 33.

The F ratio was not significant at the .05 level. Again, East Tennessee principals' scores were slightly higher with a mean score of 19.5. Principals in Middle Tennessee had a mean score of 18.5 and principals in West Tennessee showed a mean score of 18.9. The highest possible PVTE score was 36.

III. Summary

For this study 19 hypotheses were tested for statistical significance. This chapter presented the results of the findings. A significant relationship was not found to exist between principals' attitudes toward vocational education and their knowledge of vocational education. Significant differences were found in principals' attitudes toward vocational education and their number of summers of non-educational work experience.

Other significant differences were found in principals' attitudes toward vocational education and the number of vocational programs in schools. There was a significant difference in the Purview of Vocational-Technical Education scores and principals' teaching majors.

The null hypotheses that were accepted included numbers one through seven, ten through twelve, thirteen, and fifteen through nineteen.

Table 33

Analysis of Variance of Principals' PVTE Scores and School Location Within the State (N = 99)

Source	df	SS	MS	F	Table F
Between Groups	2	20.0999	10.04995	0.9268944*	3.11
Within Groups	96	1040.89	10.842604		
Total	98	1060.9899			

*Not Significant.

CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

I. Summary

The purpose of the study was to identify Tennessee secondary school principals' attitudes toward and knowledge of vocational education and to determine whether or not a relationship existed between the principals' attitudes, and knowledge, and certain demographic data. Answers to the following questions were sought:

1. Is there a correlation between a principal's attitude toward vocational education and his knowledge of vocational education?
2. Is noneducational work experience a signficant factor in the principal's attitude toward vocational education?
3. Are the principal's marital status, age, sex, certification status, and other personal variables factors in the principal's attitude toward vocational education?

A group of 150 Tennessee high school principals were mailed a Personal Data Form, an "Attitude Toward Vocational Education" (ATVE) questionnaire, and a "Purview of Vocational-Technical Education" (PVTE) questionnaire. Of the 150 randomly selected principals, there was a 66 per cent return of completed forms.

Data received from the 99 principals were hand scored, listed on computer sheets, and punched into IBM cards for statistical processing.

To accomplish the purpose of the study, 19 hypotheses were tested. A Pearson Product-Moment Correlation was computed to determine the correlation between attitude toward vocational education and knowledge of vocational education. A Point-Biserial r and analyses of variances were computed to test the remaining 18 hypotheses. The University of Tennessee Computing Center was engaged to process the statistical computations.

The summary of the findings drawn from the data analysis and presentation of Chapter IV are presented according to the following outline: (1) demographic data, (2) summary of hypotheses, and (3) other findings.

Demographic Data

Of the principals responding to the study, the typical principal possessed the following characteristics:

1. A majority of the principals (97 per cent) held a full-time position as principal.
2. Most principals were male, married, and 41 years of age or older.
3. A majority (67.7 per cent) had been principal for 10 years or less.
4. Principals' fathers had less education than their mothers.
5. Most principals lived for the longest period of time before entering college, in areas with populations under 9,999. A large percentage (44.4 per cent) lived for the longest period of time in a rural-farm setting.

6. A majority (51.5 per cent) of the principals had taken vocational courses in high school.
7. A large percentage (89.9 per cent) had never taught any vocational courses.
8. Most of the principals' (77.8 per cent) teaching preparation and certification was in secondary education.
9. Many of the principals (22.2 per cent) had teaching experience in the areas of physical education or coaching.
10. Approximately three out of four principals (73.7 per cent) had worked one or more summers in an occupation unrelated to the field of education.
11. Less than half of the principals (46.5 per cent) indicated they had never been employed for a full year in a non-educational related occupation.

A majority (67.7 per cent) of the schools had a student population of 800 or less. Among the 99 schools responding, there was a composite total of 333 vocational programs. Home economics led with a total of 92 programs in the 99 schools. Other programs largely represented were vocational agriculture, business, and trades and industry.

Summary of Hypotheses

Of the 19 null hypotheses tested for the study, three revealed a significant relationship; and therefore, were rejected. Significant differences were found in:

1. Principals' attitudes toward vocational education and their number of summers of noneducational work experience.

2. Principals' attitudes toward vocational education and the number of vocational programs in schools.
3. The "Purview of Vocational-Technical Education" scores and principals' teaching majors.

A significant relationship was not found to exist between principals' attitudes toward vocational education and their knowledge of vocational education. Sixteen hypotheses were accepted.

Other Findings

An analysis of variance was computed using "Attitude Toward Vocational Education" (ATVE) scores and the location of principals in the State of Tennessee. The results of the analysis of variance were not significant at the .05 level. There was no significant difference in the attitudes toward vocational education of principals and their location in the State of Tennessee. The three regions of the State had approximately the same mean scores. Principals in East Tennessee showed a slightly higher mean score of 94.35 Principals in Middle Tennessee showed a mean score of 93.33, and principals in West Tennessee had a mean score of 93. The highest possible score that could have been made on the ATVE instrument was 159.

A similar analysis of variance was computed using the knowledge scores and location of principals in the State. The results of the analysis of variance were not significant at the .05 level. There was no significant difference in the knowledge of vocational education of principals and their location in the State of Tennessee. East Tennessee principals' scores were slightly higher than the principals' scores in Middle and West Tennessee. The mean score for East Tennessee principals

was 19.5. Principals in Middle Tennessee had a mean score of 18.5, and principals in West Tennessee showed a mean score of 18.9. The highest possible score for the PVTE was 36.

II. Conclusions and Recommendations

The conclusions and recommendations presented in this section were derived from the findings of the study. It is hoped that these conclusions and recommendations will serve to improve the attitudes of school administrators toward and knowledge of vocational education programs throughout the State.

1. Conclusion: The findings provided evidence to support the conclusion that there is no correlation between principals' attitudes toward vocational education and their knowledge of vocational education.

Recommendation: It is recommended that other variables be correlated with principals' attitudes toward vocational education to determine degrees of relationships.

2. Conclusion: The findings of the study provided evidence to support the conclusion that the summer noneducational work experience of principals had a positive effect on their attitudes toward vocational education.

Recommendation: It is recommended that principals should have occupational experience and simulated work experience in areas nonrelated to education.

3. Conclusion: It was concluded that the number of vocational programs in the schools had a significant, positive effect on the

principals' attitudes toward vocational education.

Recommendation: It is recommended that common and unique vocational programs should be included in a comprehensive high school or be offered in separate vocational centers with provisions being made for high school students.

4. Conclusion: Evidence was provided by the findings to conclude that the teaching majors of principals had a significant, positive effect on the principals' knowledge of vocational education.

Recommendation: It is recommended that principals be required to complete at least one vocational education course designed to meet their needs.

Other Recommendations

It is recommended that vocational leaders should work with civic groups, influential citizens, and teachers to keep them aware and knowledgeable of vocational education. Media services should be utilized to acquaint the public with vocational programs. Films and filmstrips pertinent to vocational programs in the schools should be developed to present before civic groups, principals, students, and other citizens, with the speaker being able to produce facts and a strong defense for vocational programs. Knowledgeable personnel from business, industry, and labor should be enlisted for membership on occupational preparation advisory committees.

A follow-up study should be conducted after the Comprehensive Vocational Act in Tennessee has been fully implemented in order to ascertain whether this Act has influenced principals' attitudes toward and knowledge of vocational education in the State of Tennessee.

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APPENDIXES

APPENDIX A

ATVE SCALE

Below are several statements. CROSS OUT the phrase below each statement that best describes what you believe about vocational education. There are no right or wrong answers. We would like your honest opinion on each one of the statements.

SAMPLE: Vocational education is a rapidly growing program in the United States.

Strongly Agree Agree Undecided Disagree Strongly Disagree

1. Vocational training is more than a minor part of the total education program.

Strongly Agree Agree Undecided Disagree Strongly Disagree

2. Teachers in vocational programs have been as well trained as teachers in traditional programs.

Strongly Agree Agree Undecided Disagree Strongly Disagree

3. Even though most people change jobs several times during a lifetime, training students for occupations in school is a good investment.

Strongly Agree Agree Undecided Disagree Strongly Disagree

4. The main reason high school graduates cannot find jobs is because of their lack of initiative in looking for a job.

Strongly Agree Agree Undecided Disagree Strongly Disagree

5. School principals should be concerned with the occupational needs of the community.

Strongly Agree Agree Undecided Disagree Strongly Disagree

6. Students in vocational education programs should take the same courses as those in academic programs.

Strongly Agree Agree Undecided Disagree Strongly Disagree

7. Students should be placed in vocational programs as a result of their past academic performance rather than their own selection.

Strongly Agree Agree Undecided Disagree Strongly Disagree

8. Even though some students do not have the ability, they can still gain something from the traditional academic program of study.

Strongly Agree Agree Undecided Disagree Strongly Disagree

9. Educational programs should be developed for the majority needs.

Strongly Agree Agree Undecided Disagree Strongly Disagree

10. Once a person has been trained in a specific occupation there is no need for further training.

Strongly Agree Agree Undecided Disagree Strongly Disagree

11. Vocational instruction should be available for those who need, want, and can profit from it.

Strongly Agree Agree Undecided Disagree Strongly Disagree

12. Any student who really wants to work can find a job after he graduates.

Strongly Agree Agree Undecided Disagree Strongly Disagree

13. Since automation is changing the world of work so rapidly, it is senseless to train people for occupations.

Strongly Agree Agree Undecided Disagree Strongly Disagree

14. Vocational programs are principally for the slow learner and the student who has not succeeded.

Strongly Agree Agree Undecided Disagree Strongly Disagree

15. Most schools are not doing an adequate job of preparing students for the field of work after school.

Strongly Agree Agree Undecided Disagree Strongly Disagree

16. Since students have a lifetime to become trained for work, they should spend their school time learning academic subjects.

Strongly Agree Agree Undecided Disagree Strongly Disagree

17. Vocational education equips the student with geographic mobility.

Strongly Agree Agree Undecided Disagree Strongly Disagree

18. Only school facilities should be used for vocational training.

Strongly Agree Agree Undecided Disagree Strongly Disagree

19. Traditional methods of instruction, organization, and procedures are very applicable to vocational instruction.

Strongly Agree Agree Undecided Disagree Strongly Disagree

20. Since more and more students are going to college, college preparatory programs should be stressed more heavily in school.

Strongly Agree Agree Undecided Disagree Strongly Disagree

21. Females, as well as males, should be trained in vocational programs.

Strongly Agree Agree Undecided Disagree Strongly Disagree

22. Area vocational-technical schools assume the local school's responsibility of instruction for the student who does not want to pursue a college education.

Strongly Agree Agree Undecided Disagree Strongly Disagree

23. Allowing students to spend time away from school during the day for work experience results in more problems than benefits.

Strongly Agree Agree Undecided Disagree Strongly Disagree

24. More and more technical information is needed to qualify for entry into useful occupations.

Strongly Agree Agree Undecided Disagree Strongly Disagree

25. Schools should be concerned with training the adult as well as those who have not yet entered the work field.

Strongly Agree Agree Undecided Disagree Strongly Disagree

26. Vocational classes are provided primarily for low-achievers and delinquent students.

Strongly Agree Agree Undecided Disagree Strongly Disagree

27. Fewer students would drop out of school if appropriate vocational programs were available.

Strongly Agree Agree Undecided Disagree Strongly Disagree

28. Competition in the labor market puts a greater burden on the school for training.

Strongly Agree Agree Undecided Disagree Strongly Disagree

29. Guidance and counseling is more important for the college-bound student than the student in a vocational training program.

Strongly Agree Agree Undecided Disagree Strongly Disagree

30. Students in vocational programs should have the same basic course requirements as college prep students along with their vocational courses.

Strongly Agree Agree Undecided Disagree Strongly Disagree

31. Since automation is changing the world of work so rapidly, students should be given only a general education.

Strongly Agree Agree Undecided Disagree Strongly Disagree

32. Real jobs provide the best laboratory for vocational education.

Strongly Agree Agree Undecided Disagree Strongly Disagree

33. Most instruction in vocational classes is easily worked with in large groups.

Strongly Agree Agree Undecided Disagree Strongly Disagree

34. The traditional curriculum is still adequate for all students.

Strongly Agree Agree Undecided Disagree Strongly Disagree

35. It is the primary job of the school to educate; the responsibility of industry is to train.

Strongly Agree Agree Undecided Disagree Strongly Disagree

36. The dropout rate when compared with unemployment of the general population implies a need for vocational training in schools.

Strongly Agree Agree Undecided Disagree Strongly Disagree

37. High school students have not seen enough of the world of work to make tentative career choices during their high school years.

Strongly Agree Agree Undecided Disagree Strongly Disagree

38. Information from follow-up studies of all high school graduates may have impact on training of students for the field of work.

Strongly Agree Agree Undecided Disagree Strongly Disagree

39. Choosing appropriate vocational goals is an outgrowth of the vocational program.

Strongly Agree Agree Undecided Disagree Strongly Disagree

40. A work-study program for needy students leads to dissatisfaction of other students.

Strongly Agree Agree Undecided Disagree Strongly Disagree

41. The training of youth for specific occupations is more the responsibility of trade schools than of secondary schools.

Strongly Agree Agree Undecided Disagree Strongly Disagree

42. Because of the expense involved, a comprehensive program which would include a variety of courses for all students is impractical.

Strongly Agree Agree Undecided Disagree Strongly Disagree

43. Adult education programs should be looked upon as part of the responsibility of the local school system.

Strongly Agree Agree Undecided Disagree Strongly Disagree

44. Descriptive occupational brochures in the school are an appropriate tool for use in career choices.

Strongly Agree Agree Undecided Disagree Strongly Disagree

45. The school should require all girls to complete at least one course in home economics.

Strongly Agree Agree Undecided Disagree Strongly Disagree

APPENDIX B

A PURVIEW OF VOCATIONAL AND TECHNICAL EDUCATION

Principals are frequently in contact with facts, organization procedures, personnel choices, program selection, etc., relating to vocational education needs and programs. Each item has a best answer (one that is most accurate). Check the answer you believe is most accurate. You are not expected to know all the information. PLEASE RECORD A RESPONSE FOR EACH ITEM.

1. Occupational preparation of rural youth is of great help because it increases the student's
   _____A. employability locally
   _____B. geographical mobility
   _____C. work competence
   _____D. personal income

2. The Vocational Business and Office Education program is limited to students who
   _____A. plan to go to college
   _____B. need to work
   _____C. plan on full-time employment after graduation
   _____D. want work experience

3. The Vocational Education Amendments of 1968 encouraged the expansion of
   _____A. work study programs
   _____B. the responsibility for training by industry
   _____C. apprenticeship training
   _____D. basic college entrance requirements

4. The educational administrator should seek the active support of the staff, students, parents, and organizations to secure sufficient funds for
   _____A. team teaching
   _____B. vocational education
   _____C. the instructional budget
   _____D. new band uniforms

5. A relative poor use of training funds results from training sessions with fewer than
   _____A. 6 trainees
   _____B. 10 trainees
   _____C. 14 trainees
   _____D. 18 trainees

6. The Vocational Education Amendments of 1968 suggested that home economics education give consideration to some activities
   _____A. for useful employment
   _____B. outside the home
   _____C. involving manipulative skills
   _____D. involving consumer and homemaking problems

7. Vocational education programs should be administered by
   _____A. a national advisory committee
   _____B. a panel of consultants
   _____C. legally constituted public school authorities
   _____D. the state department of education in the respective states

8. According to the Vocational Education Amendments of 1968, work-study students from the age 15 to 20 may now spend a maximum of _____ hours of school time per week in employment where the work is part of the school curriculum.

9. The primary responsibility of vocational guidance is to help persons to
   _____A. find a job
   _____B. make tentative choices
   _____C. enter into employment
   _____D. receive payment for training

10. New sources of energy and automation are raising standards of living and the minimum competency necessary for
    _____A. secondary education
    _____B. life adjustment
    _____C. initial employment
    _____D. vocational education

11. The individual without occupational preparation should be aware of the percent of change in the labor force during the 1960's. He would find that between 1960-1970 the demand for professional and technical persons
    _____A. remained stable
    _____B. increased by 20 percent
    _____C. increased by 40 percent
    _____D. increased by 60 percent

12. Of every ten persons who finish elementary school, how many will graduate from college?
    _____A. 2 out of 10
    _____B. 4 out of 10
    _____C. 5 out of 10
    _____D. 6 out of 10

13. Finding out about careers, sorting out career choices, making career decisions depends first and last on the individual's
_____A. opportunities
_____B. initiative
_____D. aptitude
_____D. ability

14. The principal document to guide local boards in providing vocational education is the
_____A. Vocational Education Act of 1963
_____B. Smith-Hughes Act
_____C. NDEA of 1958
_____D. State Rules, Regulations and Minimum Standards for Vocational Education

15. Knowledge of opportunities is of little benefit to the individual if the
_____A. information is not current
_____B. individual is not qualified for the job available
_____C. individual cannot relocate
_____D. tools are too expensive

16. Small high schools sometimes arrange for instructional services on an area basis. These services include
_____A. a special facility rental
_____B. sharing student transportation costs
_____C. sharing vocational guidance and training specialists
_____D. administrative teams

17. The highest rate of unemployment is found among job seekers
_____A. 16-17 years of age
_____B. 25-34 years of age
_____C. 35-44 years of age
_____D. 45 years and older

18. A person's ability to adapt to new work situations is determined largely by
_____A. his education
_____B. the goals of society
_____C. his education and training
_____D. the employment opportunities available

19. Advisory committees for vocational education should function at
_____A. both state and local levels
_____B. state level only
_____C. local level only
_____D. the federal level

20. Distributive Education is the title of a vocational education program for
_____A. small communities
_____B. students with handicaps
_____C. communities having a wide range of employment opportunities
_____D. youth with differing aptitudes and abilities

21. Training programs conducted by industry tend to benefit
_____A. the economy
_____B. the public schools
_____C. those who have jobs
_____D. the manpower outlook

22. For every ten youngsters now in grade school, how many will seek full-time employment immediately after completing high school?
_____A. three
_____B. four
_____C. five
_____D. six

23. The average number of years which women spend in the labor force is
_____A. 10 or less
_____B. 15
_____C. 20
_____D. 25

24. A school district should have enough pupils to support efficiently
_____A. the college-bound student
_____B. the comprehensive high school
_____C. the area vocational school
_____D. a broad vocational program

25. The prime responsibility for the education of Americans rests with the
_____A. national government
_____B. state governments
_____C. state departments of education
_____D. local districts

26. To keep pace with new methods, materials, and opportunities, vocational education facilities will need to be provided for the continual training and retraining of
_____A. 5,000,000 persons
_____B. 13,000,000 persons
_____C. 18,000,000 persons
_____D. 21,000,000 persons

27. What is the responsibility of state boards of vocational education?
_____A. to conduct in-service for vocational teachers
_____B. to employ teachers for local programs
_____C. to decide how funds are to be spent
_____D. to administer the state plan

28. High unemployment in a nation indicates that the economy is not fully utilizing its
_____A. apprenticeship potential
_____B. human resources
_____C. vocational education programs
_____D. job training possibilities

29. The most dramatic growth in the United States labor force is in which age group?
_____A. under 25
_____B. 25-34
_____C. 35-44
_____D. 45 and over

30. During the 1970's it is estimated that women will be entering the labor force at a net increase per year of
_____A. 190,000
_____B. 300,000
_____C. 200,000
_____D. 500,000

31. Sharpening an individual's awareness of the larger tasks of society is the responsibility of
_____A. the community
_____B. industry
_____C. vocational guidance
_____D. vocational education

32. The purpose of the Vocational Education Act of 1963 as cited in section I, was to
_____A. authorize Federal grants to states to assist existing vocational programs
_____B. authorize Federal grants to states to assist the strengthening of vocational agriculture
_____C. assist and encourage the training programs of private industry
_____D. authorize Federal grants to states to assist revisions in vocational education

33. The school facilities should be designed as a
_____A. community education center
_____B. base for team teaching
_____C. model for the education of youth
_____D. laboratory for youth

34. The 1974 Comprehensive Vocational legislation in Tennessee set a goal for what percent of students to be enrolled in occupational programs by fiscal year 1978?
_____A. 24 percent
_____B. 35 percent
_____C. 50 percent
_____D. 60 percent

35. The current number of students in the United States who drop out of high school each year is
_____A. 300,000
_____B. 175,000
_____C. 750,000
_____D. 500,000

36. The 1968 Vocational Education Amendments set aside funding of 15 percent to be used in special programs for
_____A. handicapped individuals
_____B. adults
_____C. disadvantaged individuals
_____D. research

APPENDIX C

PERSONAL DATA FORM

Name _____

Address _____

_____

Position: Principal _____
Principal-teacher _____

Sex: Male _____
Female _____

Marital Status: Single _____
Married _____
Widowed _____
Divorced _____
Separated _____

Age: 22-25 _____
26-30 _____
31-35 _____
36-40 _____
41-45 _____
46-50 _____
51-over _____

1. What was the highest level of formal education of your father?
   _____A. Less than eighth grade
   _____B. Graduated from eighth grade, but not from high school
   _____C. Graduated from high school, but not from college
   _____D. Attended college but did not graduate
   _____E. Graduated from college
   _____F. Advanced work beyond the Baccalaureate degree

2. What was the highest level of formal education of your mother?
   _____A. Less than eighth grade
   _____B. Graduated from eighth grade, but not from high school
   _____C. Graduated from high school, but not from college
   _____D. Attended college but did not graduate
   _____E. Graduated from college
   _____F. Advanced work beyond the Baccalaureate degree

3. What was your father's occupation for the longest period of time before you attended college? (Please write specific occupation in the blank and check the appropriate space) _____
   _____A. None or no information
   _____B. Unskilled or semi-skilled (miner, laborer, factory worker, etc.)

_____C. Skilled (carpenter, machinist, printer, etc.)
_____D. Sales (traveling or nontraveling salesman)
_____E. Public service (policeman, fireman, etc.)
_____F. Professional (doctor, nurse, teacher, lawyer, etc.)

4. What was your mother's occupation for the longest period of time before you attended college? (Please write specific occupation in the blank and check the appropriate space) _____
_____A. None, besides keeping house
_____B. Factory work (assembly work, knitting mill, etc.)
_____C. Sales (clerk in store, etc.)
_____D. Secretarial or clerical
_____E. Professional (lawyer, teacher, tec.)

5. What was the approximate size of the community in which you had lived for the longest period of time before attending college? If suburban, include with the population of the greater metropolitan area population.
_____A. Rural-farm
_____B. Village (under 2,500)
_____C. Town (2,500 - 9,999)
_____D. Small city (10,000 - 99,999)
_____E. Large city (100,000 and over)

6. What type of senior high school did you attend?
_____A. Public
_____B. Private-denominational (Religious, i.e., Baptist, Methodist, etc.)
_____C. Private-nondenominational

7. What was the size of your senior high school graduating class?
_____A. Under 20
_____B. 20-49
_____C. 50-99
_____D. 100-249
_____E. 250-499
_____F. 500 or more

8. Did you take any courses in vocational education in high school?
_____A. Yes
_____B. No
If yes, please list the course(s) _____

9. Have you personally taught a course(s) in vocational education?
_____A. Yes
_____B. No
If yes, please list the course(s) _____

10. How many summer vacations since your graduation from college have you been employed by a business(es) or occupied a paid position(s) NOT connected with any educational program or institution? (Include only summer vacations)
_____A. None
_____B. 1-3 summer vacations
_____C. 4-5 summer vacations

_____D. 6-8 summer vacations
_____E. 9 or more summer vacations

11. How many years have you been employed by a business(es) or occupied a paid position(s) NOT connected with any educational program or institution?
_____A. None
_____B. 1-3 years
_____C. 4-5 years
_____D. 6-8 years
_____E. 9 or more years

12. What was your certified level of teaching?
_____A. Elementary
_____B. Secondary
_____C. K-12
_____D. Other, please specify _____

13. What was your major area of teaching for the longest period of time before you became a principal? (Check only one)
_____A. English
_____B. Mathematics
_____C. Social Studies
_____D. Science (Physical or Biological)
_____E. Art
_____F. Foreign Language
_____G. Physical Education or Coaching
_____H. Vocational Education
_____I. Music
_____J. Other, please specify _____

14. What grades does your school include?
_____A. 7-12
_____B. 8-12
_____C. 9-12
_____D. 10-12
_____E. 11-12
_____F. Other, please specify _____

15. How many different vocational programs are provided in your school?
_____A. None
_____B. 1-5
_____C. 6-10
_____D. 11 or more

16. Check the vocational programs in your school:
_____A. Home Economics
_____B. Vocational Agriculture
_____C. Business
_____D. Trades and Industry
_____E. Distributive Education

_____F. Health Occupations
_____G. Other, please specify _____

17. What is the size of your school?
_____A. 0-500 students
_____B. 501-800 students
_____C. 801-1000 students
_____D. 1001-1300 students
_____E. 1301-1900 students
_____F. 1901-2000 students
____G. 2001 or more students

18. What is the number of teachers in your school?
_____A. 0-10
_____B. 11-20
_____C. 21-30
_____D. 31-40
_____E. 41-60
_____F. 61-80
_____G. 81 or more

19. How long have you been a principal?
_____A. 1-5 years
_____B. 6-10 years
_____C. 11-20 years
_____D. 21-30 years
_____E. More than 30 years

20. Do you believe that schools offering vocational programs should provide placement services to all dropouts and graduates?

_____yes _____no

21. Do you believe that teachers in vocational programs need graduate training in professional aspects of vocational education such as vocational guidance, vocational philosophy, vocational curriculum development, and vocational evaluation, etc.?

_____yes _____no

22. Do you believe that teachers in vocational programs need graduate training outside vocational education in general professional education such as educational psychology, educational curriculum development, educational philosophy, and educational evaluation, etc.?

_____yes _____no

APPENDIX D

THE UNIVERSITY OF TENNESSEE
KNOXVILLE 37916
COLLEGE OF EDUCATION
Department of Vocational-Technical Education

October 21, 1974

Dear Colleague:

With the cooperation of the Department of Vocational-Technical Education in The University of Tennessee College of Education, we are investigating attitudes of high school principals toward vocational education and their knowledge of vocational education. To complete this study, we are in need of your cooperation and your professional commitment to research.

You will find a Personal Data Form, an ATVE, and a Purview of Vocational and Technical Education enclosed in this mailing. Would you take a few minutes of your valuable time to complete the Personal Data Form and the two instruments?

After you have completed the Personal Data Form, the ATVE, and the Purview of Vocational and Technical Education, please return the three in the self-addressed, stamped envelope.

In order to insure successful completion of the objectives of this study, we will need as high percent of return as possible. We realize this is a pressing time for you, but it is imperative that these questionnaires be completed and returned before October 29, 1974. Please be assured we will adhere to strict confidentiality of responses. No identification of individual schools or principals will be made. Upon completion of this study, a summary of the findings will be made available to you if you so desire.

Sincerely,

Betsy Heineman

Enclosures: Personal Data Form
ATVE
Purview of Vocational-Technical Education
Envelope for return mailing

APPENDIX E

THE UNIVERSITY OF TENNESSEE
KNOXVILLE 37916
COLLEGE OF EDUCATION
Department of Vocational-Technical Education

November 16, 1974

Dear Colleague:

On October 24, 1974, I sent you questionnaires for principals and asked if you would aid us in a cooperative research effort by completing the instruments. Thank you for your quick return of the instruments.

This study is proceeding well and progressing toward a successful conclusion. Returns have reflected a genuine interest in the subject and have furnished data which promises to make the study more meaningful.

In order for the study to be complete every item on the questionnaires must be answered. Please check what you believe to be the best answer and return it in the enclosed, stamped envelope as soon as possible. I have checked the unmarked items with red ink for easy finding.

Under no circumstances will individuals, schools, or systems be identified in the results of the study or in any other report.

Sincerely,

(Mrs.) Betsy Heineman

Enclosures: Personal Data Form
ATVE
Purview of Vocational-Technical Education
Envelope for return mailing

VITA

Betsy Crockarell Heineman was born in Clarksville, Tennessee. She received her elementary and secondary education in the Clarksville-Montgomery County, Tennessee School System. She entered Lindenwood College in St. Charles, Missouri, and completed her Bachelor of Science and Master's degrees at Austin Peay State University in Clarksville, Tennessee. Requirements for the Doctor of Education degree were completed at The University of Tennessee in June, 1975.

For ten years she accepted a teaching position in Clarksville, Tennessee. During this time she held evening teaching positions at the Ft. Campbell Army Education Center, Ft. Campbell, Kentucky, and at Trane Manufacturing Plant in Clarksville, Tennessee. She is presently Director of Vocational-Technical Education for the Clarksville-Montgomery County Unified School System in Clarksville, Tennessee.

She is a member of Phi Kappa Phi, Phi Delta Kappa, Kappa Delta Pi, and Delta Kappa Gamma honor societies. She holds membership in the American Vocational Association, Tennessee Vocational Association, Tennessee Education Association, National Education Association, and the National Council of Local Administrators.

She was married in August, 1959, to William J. Heineman and is the mother of two daughters, Elizabeth and Mary Katherine.