

1997

A Descriptive Study of the Trends and Issues in Vocational and Technical Education in the Virginia Community College System

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**A Descriptive Study of the Trends and Issues
in Vocational and Technical Education
in the Virginia Community College System**

**A Research Paper
Presented to the Graduate Faculty of
the Department of Occupational and Technical Studies
at Old Dominion University**

**In Partial Fulfillment
of the Requirements for the
Master of Science in Education Degree**

**By
Angelia M. Comstock
December 1997**

APPROVAL PAGE

This research paper was prepared by Angelia M. Comstock under the direction of Dr. John Turner in OTED 636, Problems in Education. It was submitted to the Graduate Program Director as partial fulfillment of the requirements for the Degree of Master of Science in Education.

APPROVAL BY:

John E. Turner

29 April 1998

Dr. John Turner
Advisor

Date

ACKNOWLEDGMENTS

The author would like to thank the teletechnet site coordinators in the Virginia Community College System for their cooperation in supplying current contact information for the research study. The author would also like to thank the Virginia Community College System office in Richmond, Virginia, for supplying information about the names and locations of the individuals who were contacted to complete this study.

Special thanks is extended to the division chairs, deans, and other Virginia Community College personnel that were contacted to complete the surveys for this research project. Each individual that was contacted was very cooperative and helpful.

The author would also like to express her gratitude to Mr. Tom Wunderlich for allowing her to be flexible with her work schedule while completing this research project.

Finally, the author would like thank Dr. John Turner for his patience, guidance and assistance in the completion of this research project. Without his constant support, this study could not have been completed.

Angelia M. Comstock

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CHAPTER I

INTRODUCTION

The Southern Association of Colleges and Schools (SACS) is in the process of raising the standards required of faculty members at the community college level. Old Dominion University in Norfolk, Virginia, has an Occupational and Technical Studies Department that grants degrees at the bachelor's and master's level. These degrees offer a number of interest areas currently, however, the department is considering the addition of an emphasis at the master's level in community college instruction. This new emphasis would help Virginia's community college faculty upgrade to the SACS standards.

An existing course that would be a part of the new master's degree emphasis is Trends and Issues in Technical Education. This class has not been taught specifically for the community college instructors/faculty before. It has been taught for the secondary vocational and technical education teacher population, but many of the issues and trends that effect the two different populations may vary.

STATEMENT OF THE PROBLEM

The purpose of this study was to determine the current issues and trends in vocational and technical education in Virginia's community colleges.

RESEARCH GOALS

With the purpose of determining the current issues and trends in vocational and technical education at Virginia's community colleges, this study was developed with three research questions (goals) in mind. They were:

- 1) To research the historical foundations of curriculum offerings in Virginia's community colleges.
- 2) To research national issues and trends affecting vocational and technical education in community colleges.
- 3) To compare the issues and trends in Virginia's community colleges as perceived by division chairs and selected deans with national issues and trends as identified from a review of the literature.

BACKGROUND AND SIGNIFICANCE

Since 1976, the faculty of the Occupational and Technical Studies Department at Old Dominion University has taught a graduate class titled Trends and Issues in Vocational and Technical Education. The last time that the class was taught was during the 1994-1995 academic year. The participants in the class were composed of students

primarily interested in vocational and technical education at the secondary level. A revised version of this class is scheduled to be offered as part of a proposed emphasis for community college vocational and technical education instructors/faculty. The course curriculum, however, needed to be updated and adjusted to address current issues and trends for this target population. (Community college vocational and technical instructors/faculty.)

A primary reason for offering the new emphasis is that the Southern Association of Colleges and Schools is currently raising the requirements for faculty accreditation at the community college level. As published in the criteria for accreditation, faculty teaching in the areas of humanities/fine arts, social/behavioral sciences, and natural sciences/mathematics for a community college granting associate degrees "must have completed at least 18 graduate semester hours in the teaching discipline and hold at least a master's degree." (Criteria for Accreditation, 1996, p. 44) The requirement is also the same for occupational/technical faculty. This new requirement necessitates appropriate educational courses/degrees for community college faculty at the master's level.

Another reason supporting the need for an emphasis at the master's level for community college instruction can be seen by analyzing the forecast of jobs that require an associate degree. The Occupational Outlook Handbook (U.S. Department of Labor, 1996-97, p. 5) reports that the

percentage of growth for employment at the associate degree level will increase by twenty-five percent from 1994 until 2005. The Handbook also reports that the occupations requiring an associate degree that will have the largest numerical increase in employment during this time period are registered nurses, paralegals, radiological technologists and technicians, dental hygienists, and medical records technicians. (U.S. Department of Labor, 1996-97, p. 7)

These courses/programs require teaching faculty with a high degree of technical skill/competence as well as considerable expertise in teaching diverse student populations expected to enroll in these programs.

In 1994 the total enrollment for the Virginia Community College system, which consists of twenty-three colleges, was 129,510 students. (Virginia Statistical Abstract, 1996-97, p. 177) Currently, many of these students are being taught by instructors with formal educational preparation at the bachelor's degree level. Because many community college students transfer to four-year institutions, SACS wants to raise the educational preparation requirement for community college faculty. Institutions, such as Old Dominion University, that grant master's degrees will need to implement and/or modify programs to meet the needs of this community college instructor population.

The class, Trends and Issues in Vocational and Technical Education, is a part of the new masters level emphasis under consideration by Old Dominion University for

community college instructors. A research base was needed in order to present current information in this class about the issues and trends that effect community college vocational and technical instructors/faculty.

LIMITATIONS

This study was completed with the following limitations:

- 1) The population of this study was limited to vocational and technical education division chairs and selected deans in Virginia's twenty-three community colleges.
- 2) The data collected was limited to the perception of key instructional staff and leaders regarding issues and trends in vocational and technical education in Virginia's community colleges.

ASSUMPTIONS

The results of this study were based on the following assumptions:

- 1) The Virginia community college division chairs and deans surveyed would willingly give their opinions of issues and trends related to vocational and technical education at the community college level.
- 2) The division chairs and deans understood the purpose of the vocational and technical education curriculum or programs and the issues and trends that

are currently impacting these programs at the community college level.

PROCEDURES

In order to conduct this study, the researcher needed to identify the community college vocational and technical education division chairs and deans in Virginia. Following the identification of the division chairs and deans, a survey was developed. The researcher then conducted telephone interviews with each of the division chairs and deans selected to complete the interview. A list of the current issues and trends that currently impact vocational and technical education at the community college level, as reported by the division chairs and deans, was developed. These issues and trends can now be incorporated into the course to be offered in the proposed program by Old Dominion University for vocational and technical educators at the community college level.

DEFINITION OF TERMS

The following terms were used in this study which may have special meanings. To ensure the appropriate understanding of these terms as used in this research paper, the following definitions are provided:

- 1) Community College - "a two-year post secondary institution of higher education that is publicly

supported and usually serves a particular community or region." (Dejnozka and Kapel, 1991, p. 122)

2) Deans - This is a part of the population that will be surveyed for this study. They include one dean from a college randomly selected from each geographic region. The regions were chosen by the researcher and are designated in the attached Virginia State map.

(Appendix B)

3) Division Chairs - This is the population that will be surveyed for this study. They include one division chair from each of the twenty-three community colleges in the state of Virginia. Division chairs in Virginia's community colleges are responsible for supervision of curriculum, content, and instructional quality within their program areas.

4) Issue - "something proceeding from a specified source; a point or matter of discussion, debate, or dispute." (The American Heritage Dictionary, 1982, p. 680)

5) OTS - Occupational and Technical Studies Department at Old Dominion University.

6) SACS (Southern Association of Colleges and Schools) - the organization that determines the requirements for accreditation of faculty members of community colleges.

7) Technical Education - "those educational and training programs that prepare individuals for jobs

and occupations requiring technical skills." (Dejnozka and Kapel, 1991, p. 569)

8) Teletechnet Site Coordinators - Those individuals who coordinate the televised broadcast of Old Dominion University classes to the community college for which they are the coordinator.

9) Trend - "a direction of movement; a general inclination or tendency." (The American Heritage Dictionary, 1982, p. 1291)

10) Trends and Issues in Vocational and Technical Education (OTED 760) - a three credit hour, lecture format class taught by faculty in the Occupational and Technical Studies department of Old Dominion University in Norfolk, Virginia. The class focuses on trends in philosophy, curriculum, and teaching procedures in vocational and technical education. The class also provides opportunities for analysis of research findings and current issues related to vocational and technical education. (Old Dominion University Catalogue, 1995-1996, p. 218)

11) Vocational or Technical Education - a part of the secondary school and community college curriculum designed to prepare the student for employment in at least one occupation. (Dejnozka and Kapel, 1991, p. 599)

SUMMARY AND OVERVIEW

As a result of increased standards of accreditation for community college technical instructors/faculty as decreed by the Southern Association of Colleges and Schools, a need exists for programs at the master's level to meet the educational preparation needs of these community college instructors. The department of Occupational and Technical Studies at Old Dominion University is proposing a master's level emphasis within the existing Occupational and Technical Studies program as a means for community college instructors and faculty to accomplish this requirement. As part of that emphasis, courses such as Trends and Issues in Vocational and Technical Education needed to be updated to contain information relevant, specifically to the community college population.

Research data was needed to determine the current issues and trends in vocational and technical education programs in Virginia's community colleges that directly or indirectly affect vocational and technical education instructors. Division chairs and selected deans of Virginia's twenty-three community colleges were asked to provide the researcher with their opinions on the issues and trends that impact community college vocational and technical instructors/faculty. A list of current issues and trends was developed from data provided by the interviewees.

The information in this study was divided into five chapters. Chapter I contains an introduction to the study.

Chapter II contains a review of the literature. In Chapter III, the methods and procedures are described. Chapter IV reports the findings, and the conclusions and recommendations of the study are located in Chapter V.

CHAPTER II

REVIEW OF THE LITERATURE

This chapter will discuss published information related to two aspects of community colleges. First, a review of literature was undertaken to determine the historical foundations of the Virginia Community College System as it related to curriculum offerings. Second, literature was reviewed on both a state and national level to identify documented issues and trends related to vocational and technical education in community colleges. The review of the literature for this research study included the following: The Historical Foundations of Curriculum Offerings in Virginia's Community Colleges and Issues and Trends Affecting Vocational and Technical Education in Community Colleges.

THE HISTORICAL FOUNDATIONS OF CURRICULUM OFFERINGS IN VIRGINIA'S COMMUNITY COLLEGES

As noted by Vaughan, "as the 1960s approached, various economic, social, and political forces not only failed to advocate higher education for the masses, but actually worked against providing greater access to the state's institutions of higher education" (Vaughan, 1987, p. 9). However, in 1959, a study was conducted to determine the

need for comprehensive two-year colleges in Virginia. This study, by Montorana, recommended that two-year colleges include programs with the same type of classes taken in the first two years of the four-year universities, as well as programs similar to other junior colleges. The study also suggested that the two-year colleges offer occupational programs that would prepare students for employment, adult education programs, and community service programs (Vaughan, 1987, p. 12).

In 1966, the Virginia General Assembly passed legislation that helped to create the state's Community College System. With the passing of the legislation in 1966, Virginia made a big step toward the democratization of higher education (Vaughan, 1987, p. 34). Virginia's community colleges were established to improve the educational offerings of the state and for the purpose of giving the citizens "equal access" to higher education. Until the community college system was established in Virginia, higher education was considered a luxury. The community college system allowed more students to pursue higher education. Due to the fact that tuition was kept low and community colleges were established in areas where students could live at home and attend school, more students were able to gain access to higher education (Vaughan, 1987, p. 2).

The mission of the Virginia Community College System as recorded by the State Board on March 20, 1986, is as follows:

The Virginia Community College System functions within the educational community to assure that all individuals in the diverse regions in the Commonwealth of Virginia are given a continuing opportunity for the development and extension of their skills and knowledge through quality programs and services that are financially and geographically accessible.

The Virginia Community College System, through comprehensive community colleges, provides leadership in determining and addressing both the needs of individuals and the economic needs of the colleges' service areas.

Occupational-technical education, transfer education, developmental studies, continuing education, and community services are the primary avenues through which the mission is fulfilled. To assure that all students have the opportunity for success, each college shall provide a comprehensive program of student development services (Vaughan, 1987, p. 72).

The Virginia Community College System currently consists of twenty-three colleges spread across the state. The enrollment for the 1995-1996 academic year was 207,198 students (*Virginia Community Colleges Offer More Opportunities*, 1996, p. S-2).

ISSUES AND TRENDS AFFECTING VOCATIONAL AND TECHNICAL EDUCATION IN COMMUNITY COLLEGES

There are a number of issues facing community colleges that relate to vocational and technical education programs. Diversification of student population is an issue that faces many educational institutions today, including the community

college. "Women now account for more than 50% of the students enrolled in the nation's community colleges. Minorities ... constitute about 25% of the community colleges' student population" (Boone, 1997, p. 9).

Nationally, one of the reasons that community colleges were established was to provide for the community that it served.

The community college, perhaps more than any other community-based organization or agency, has both the potential and the obligation to serve as a leader and catalyst in motivating and empowering the people and their leaders to work collectively to identify, study, and analyze issues affecting their well-being and quality of life and to mount programs leading to resolution of these issues (Boone, 1997, p.6).

This mission has not changed, and the involvement of the community college in the community will continue to be a point of development for community colleges. Continued and possibly increased collaboration with business and industry is also a trend that may need to be further developed in the future of the community college system. The only way to stay on the cutting edge is to include business and industry in the development of that curriculum (Boone, 1997, p. 10).

The increased involvement of business and industry with community colleges may also play a strategic role in their financial support. Community colleges will need to ...

become more aggressive in seeking and obtaining external funds from the private sector to provide scholarships and fellowships for those students who lack the funds to finance their education and to provide the additional financial resources needed to

enrich existing curricula and to initiate new programs (Boone, 1997, p. 11).

However, a greater dependence by community colleges on business and industry financial support may necessitate a corresponding increase in collaboration on curriculum issues.

As noted in Chapter one, the Occupational Outlook Handbook states that the number of jobs requiring an associate degree will increase by twenty-five percent from 1994 until 2005. As more jobs become available which require an education above the secondary level, the need for access to higher education has increased. President Clinton has even mentioned the possibility of providing for a minimum of fourteen years of education. This would include financial support for every student to attend community college and would contribute significantly to the further "democratization of higher education."

One of the biggest issues addressed in the literature dealt with the proportion of academic versus vocational and technical curriculum offerings. The demand for different types of programs within the community college system changes with time. For example, there have been demands for a parallel program that allows the student to transfer to a four-year university, and there have been demands for curriculum that focuses on vocational and technical education programs (Miller, 1984, p. 278). There are also demands for non-degree adult and continuing education

programs. Part of these demands also include remedial education (Griffith and Connor, 1994, p. 19). All of these curriculum offerings have endured at various levels from the establishment of the Virginia Community College System.

A concern is that community college students often take courses that are general in nature and not specific to their occupational goals. Vocational and technical curriculum is still seen as hierachial. It is above the remedial level, but not quite as rigorous as an academic program designed to allow the student to transfer to a four-year university. Vocational or technical education is still portrayed as a less prestigious educational path than going to school to become a doctor or a lawyer (Griffith and Connor, 1994, p. 82).

Accountability is an issue that every college and university must address. There is a need for colleges to show what kind of results are achieved by their programs in order to continue their very existence. Tax payers are always interested in how their money is being utilized. Therefore, community colleges will need to continue to show how the tax dollars are "used to produce substantive results that will enrich and improve their quality of life" (Boone, 1997, p. 12).

This part of the review has focused on issues in the literature that have an influence on vocational and technical education in community colleges. The study was conducted to verify these issues and to determine any other

issues that effect vocational and technical education in community colleges in Virginia.

SUMMARY

Chapter II dealt with the review of the two primary aspects of community colleges. First, the review considered the foundation of curriculum offerings in Virginia's Community College System. It was determined that the following categories of curriculum/programs were to be offered:

- the equivalent of the first two years of a four year baccalaureate degree
- vocational and technical programs in preparation for employment
- continuing and adult education programs
- remedial course work

There was no evidence that any specific proportion of these curriculum offerings be established, rather, that each of the four should be included.

Second, the review considered issues and trends, both nationally and statewide, which may have an affect on vocational and technical education programs. Findings included the following issues and trends:

Issues

- Changes in student population
- Business and industry involvement in the development of vocational and technical programs
- Funding

- Accessibility to higher education
- Focus on academic versus vocational/technical programs by administration
- The perception of vocational/technical programs being less academically challenging
- Accountability

Trends

- Increased diversity of student population, i.e. women and minorities
- Community Colleges continued mission to serve their community's educational needs
- Continued involvement with business and industry for curriculum development and increased need for involvement for financial support
- Stronger need for access to vocational/technical education programs due to job market demands
- Varied levels of focus on and attention to vocational/technical programs
- Continued perception that vocational/technical education programs are less challenging than academic programs
- Continued need to show direct results of vocational/technical education programs in order to justify community involvement and financial support

Additional reference to the findings are noted in Chapter IV. In the following chapter the methods and procedures of the research will be discussed, and the findings will be presented.

CHAPTER III

METHODS AND PROCEDURES

The population for this study is explained in this chapter. In addition, instrument/questionnaire design, development of individual questions, data collection, tabulation, and analysis are explained in this chapter. Each of these aspects are explained in sequence below.

POPULATION

The population selected for inclusion in this study consisted of one division chair, with responsibility for vocational and technical programs, from each of the twenty-three Virginia community colleges. Some of the community colleges had more than one division chair with responsibilities for vocational and technical programs. In those instances, at least one of these individuals were included in the population for this study. Selection of the division chair to be included from those colleges having more than one division chair responsible for vocational and technical programs was done by selecting the division chair with the widest scope of vocational and technical programs.

The initial list of division chairs was identified by using the most current Virginia Community College Directory (1996 - 1997). An e-mail query was then sent to the Old

Dominion University Teletechnet site coordinators for each of the twenty-three community colleges to verify that the individual selected was the appropriate person and that they were still in that position. A few changes were made based on feedback from the Teletechnet site coordinators. A final list of twenty-three division chairs was then completed and composed the primary population for the study.

In order to attain a higher level administrative perspective regarding issues and trends related to vocational and technical education within Virginia's community colleges, a sample population was also identified from the total population of Virginia community college deans. To accomplish this, the researcher arbitrarily divided the State of Virginia into six geographical regions (Appendix B). These regions were identified as West, South Central, North Central, South East, North East, and North. Each region contained no less than three and no more than four community colleges. One community college dean was then randomly selected from among the deans within that geographical region. These six deans constituted the second response group and represented the population of Virginia community college administrators.

INSTRUMENT DESIGN AND DATA COLLECTION

An interview guide was designed to be used during telephone interviews with each of the twenty-three division chairs and six deans. The interview guide was designed to

obtain information from the twenty-three Virginia community college vocational and technical division chairs and the six deans regarding their perceptions of issues and trends.

The interview guide consisted of a total of eight questions [issues and trends]. Each question was constructed to solicit perceptions about the various issues and trends identified in the review of literature pertaining to vocational and technical education in community colleges. Additional questions were added based on casual conversations with persons employed in Virginia's Community College System. These questions are A, C, and D which relate to funding, technology, and the average age of students. A copy of the interview guide is provided in Appendix A.

Telephone interviews were successfully completed with twenty-two of the twenty-three Virginia community college division chairs. Repeated attempts to establish an acceptable time to conduct the interview with one division chair were not successful. Telephone interviews with each of the six community college deans were completed successfully.

DATA TABULATION AND ANALYSIS

During each interview, participant responses were recorded on the interview guide. Immediately following each interview, the researcher reviewed the recorded responses, making complete sentences where brief notes regarding

contextual responses had been recorded during the interview. After all interviews were completed, individual responses were grouped with like responses and tabulated for overall percentage responses of like nature. These grouped and tabulated responses were then compared to the issues and trends found in the literature regarding vocational and technical education within the community college systems.

SUMMARY

This chapter described the population of the study, instrument/questionnaire design, and development of individual interview questions. In addition, data collection, tabulation, and analysis were explained. Chapter IV will report the findings of the study.

CHAPTER IV

FINDINGS

In this chapter the results found by conducting a review of the literature and a survey of a sample of the division chairs and selected deans from each of the community colleges in Virginia will be reported. The interview guide (Appendix A) was designed to address the perception of key instructional staff and leaders regarding selected issues and trends in vocational and technical education in Virginia's community colleges.

Research question one was to determine through the review of literature the historical foundations of curriculum offerings in Virginia's community colleges. Through this review, it was determined that the following categories of curriculum/programs were to be offered:

- the equivalent of the first two years of a four year baccalaureate degree
- vocational and technical programs in preparation for employment
- continuing and adult education programs
- remedial course work

There was no evidence that any specific proportion of these curriculum offerings be established, rather, that each of the four should be included.

Research question two was to determine through the review of literature national issues and trends affecting vocational and technical education in community colleges. The results are as follows:

Issues

- Changes in student population
- Business and industry involvement in the development of vocational and technical programs
- Funding
- Accessibility to higher education
- Focus on academic versus vocational/technical programs by administration
- The perception of vocational/technical programs being less academically challenging
- Accountability

Trends

- Increased diversity of student population, i.e. women and minorities
- Community Colleges continued mission to serve their community's educational needs
- Continued involvement with business and industry for curriculum development and increased need for involvement for financial support
- Stronger need for access to vocational/technical education programs due to job market demands
- Varied levels of focus on and attention to vocational/technical programs
- Continued perception that vocational/technical education programs are less challenging than academic programs
- Continued need to show direct results of vocational/technical education programs in order to justify community involvement and financial support

Research question three was to compare the issues and trends in Virginia's community colleges as perceived by division chairs and selected deans with national issues and trends as identified from a review of the literature.

Research Question Three

As noted in Chapter III, a survey questionnaire to be used with telephone interviews was developed to determine answers for research question three. A copy of the questionnaire is located in Appendix A. [Note: the percentage responses for a given question may total more than 100% due to respondents providing multiple answers.]

Question one in the survey addressed the issue of the student populations served by the vocational and technical programs at community colleges in Virginia. Sixty-four percent (64%) of the respondents believed that there are proportionally more returning adults enrolled in the vocational and technical programs. Fourteen percent (14%) of the respondents believed that the populations fluctuate due to the economy and job market in their particular geographical area. Twenty-five percent (25%) of the respondents stated that the national "tech prep" movement would increase the number of traditional high school students enrolling in vocational and technical programs. Additional responses included that the programs could be

advertised more to students and parents in order to help increase the number of high school students enrolling in these programs, and that workforce developments would continue to keep the proportion of returning adults in the programs high.

The second question addressed by the survey concerned the involvement of the community in the development of the vocational and technical programs at the community college. Each college has an advisory committee for each of their vocational/technical programs. The participants were asked if they felt that these committees created a sufficient amount of involvement with the businesses and industries in their area. Seventy-five percent (75%) of the respondents stated that the committees did give a sufficient amount of involvement with businesses and industries in their area. However, forty-three percent (43%) of the respondents stated that there should be more involvement with businesses and industries in their area. Eighteen percent (18%) of the respondents mentioned that they have many other methods, other than the advisory committees, used to involve business and industry in curriculum development and evaluation.

Another question addressed by the survey dealt with instructional technology and its impact on the vocational and technical courses at the community college. Survey participants gave a mixture of answers to this question.

Fourteen percent (14%) of the respondents stated that their classes and professors lacked the equipment needed to use cutting edge technology in their classrooms. Fifty-seven percent (57%) of the participants stated that the instructors used an extensive amount of technology in their course delivery methods. All (100%) of the respondents believe that the impact of technology on their classes will continue to grow tremendously. One of the concerns expressed by fourteen percent (14%) of the respondents is being able to secure the money needed for the technology that will be required to keep up with the progression of new and innovative instructional techniques. Seven percent (7%) of the respondents also expressed a concern for the classes that require heavy equipment instead of computers. Twenty-one percent (21%) of the division chairs and deans see funding being provided for computers, but they see very little funding being provided for other important equipment. In many community colleges, the money used for computers throughout the vocational and technical programs is taken from a budget that is used for all equipment. This means that often a large amount of the money in the budget gets used for computers and there is not enough left to purchase the other needed equipment.

The next question on the survey deals with the issue of funding. It asked the participants if they felt that

sources of their funding have been changing. Specifically, the respondents were asked to explain how their amount of funding or their sources of funding had changed. Forty-six percent (46%) of the participants said that their funding was being reduced, but the majority of the respondents stated that the funding was about the same as it had been over the last few years. Respondents were asked to state other sources that they would consider if their funding amounts were cut considerably. Some of the answers were as follows: fund raising projects, grants, partnerships with business and industry, foundation support, local governments, and endowments.

As noted in Chapter two, the Review of Literature, President William Clinton has made a proposal that every student should be provided with the funds to attend college for a minimum of two years. The participants were asked to describe how this proposal would effect their programs should it become a reality. Eighty-two percent (82%) of the respondents stated that they believed that there would be an increase in the enrollment in their vocational and technical programs. Eighteen percent (18%) of the respondents believed that the implementation of this proposal would not make any changes in their programs. For those participants that stated that their enrollments would increase,

fifty-seven percent (57%) also stated that provisions would need to be made to accommodate this increase.

As noted in the Review of Literature, there are two predominate categories of curriculum for credit used at community colleges, academic and vocational/technical. In the survey, each of the respondents were asked to estimate which curriculum received more attention from the college's administration. Thirty-two percent (32%) of the participants responded that the two curriculums received equal attention. Eighteen percent (18%) of the respondents stated that the vocational/technical curriculum received more attention, and fifty percent (50%) of the respondents stated that the academic curriculum received more attention. Eleven percent (11%) of the participants stated that the college that they represented would focus more attention on the programs that were in demand by their community at the time.

As noted in the Review of Literature, students, parents, and counselors in the secondary school system often perceive vocational and technical programs to be the way for students who do not do as well academically to further their education. When asked if this perception was still prevalent at the community college level, only twenty-nine percent (29%) of the survey participants believed that the tracks were viewed to be of equal academic challenge.

Eighteen percent (18%) of the participants also stated that many of the students who are enrolled in the academic track as well as the vocational/technical track lack the necessary skills needed to be productive in either program.

The last question addressed by the survey concerned program assessment. Participants were asked to describe their assessment methods. Twenty-nine percent (29%) of the respondents use a program review that is conducted on a rotating schedule. Other random responses included were the use of surveys to track employment placement of their graduates, program exit or state exams, standardized tests, student portfolios and projects, on the job assessments (apprenticeships), student evaluations, focus groups, and employer assessments. Forty-three percent (43%) of the respondents stated that the means of assessment used were adequate and they did not foresee any changes in the near future. Twenty-one percent (21%) of the participants stated that they could always do more assessment.

SUMMARY

This chapter discussed the results of the literature review pertaining to research question one and two and the survey conducted to answer research question three. Chapter five will discuss the summary, conclusions, and recommendations of the research.

CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

The problem of this study was to determine the issues and trends in vocational and technical education in Virginia's community colleges. This was accomplished by telephone interviews with community college division chairs and deans to determine their perceptions of issues and trends in vocational and technical education.

The research goals of this study were to: 1) research the historical foundations of curriculum offerings in Virginia's community colleges (as depicted in the literature), 2) research national issues and trends affecting vocational and technical education in community colleges (as recorded in the literature), and 3) compare the issues and trends in Virginia's community colleges as perceived by division chairs and selected deans with national issues and trends as identified from a review of the literature.

The limiting factors of this study were that: 1) the population was limited to vocational and technical education division chairs and selected deans in Virginia's twenty-three community colleges, and that 2) the data

collected was limited to the perception of these key instructional staff and administrators regarding issues and trends in vocational and technical education in Virginia's community colleges.

Two basic assumptions were made during this research project. The first assumption was that the division chairs and deans surveyed were willing to give their opinions of issues and trends related to vocational and technical education at the community college level. The second assumption was that the division chairs and deans understood the purpose of the vocational and technical education curriculum or programs and the issues and trends that are currently impacting these programs at the community college level.

Data was successfully collected from at least one vocational or technical division chairs from twenty-two of the twenty-three community colleges. Six community college deans were also randomly selected from six geographical regions within the state of Virginia. These deans were interviewed regarding their perceptions of issues and trends related to vocational and technical education in Virginia's community colleges.

As noted on the previous page, there were three research goals in this study. The first goal was to research the historical background of the community colleges

in Virginia in respect to the approach to vocational and technical education. This was done through research into existing literature about the foundation of curriculum offerings in the Virginia Community College System. There were four types of curriculum offerings identified through this review of the literature. They are as follows:

- the equivalent of the first two years of a four year baccalaureate degree
- vocational and technical programs in preparation for employment
- continuing and adult education programs
- remedial course work

The second goal was to research issues and trends affecting vocational and technical education in community colleges nationally. This goal was also accomplished through a review of the literature. The following issues and trends were identified:

Issues

- Changes in student population
- Business and industry involvement in the development of vocational and technical programs
- Funding
- Accessibility to higher education
- Focus on academic versus vocational/technical programs by administration
- The perception of vocational/technical programs being less academically challenging
- Accountability

Trends

- Increased diversity of student population, i.e. women and minorities
- Community Colleges continued mission to serve their community's educational needs
- Continued involvement with business and industry for curriculum development and increased need for involvement for financial support
- Stronger need for access to vocational/technical education programs due to job market demands
- Varied levels of focus on and attention to vocational/technical programs
- Continued perception that vocational/technical education programs are less challenging than academic programs
- Continued need to show direct results of vocational/technical education programs in order to justify community involvement and financial support

The final goal of this study was to compare the issues and trends in Virginia's community colleges as perceived by division chairs and selected deans with national issues and trends as identified from a review of the literature. As noted previously, the national issues and trends related to vocational/technical education programs in community colleges were identified. Additionally, a telephone survey was conducted of vocational/technical department chairs and selected deans from the Virginia Community College System. The results from the survey of Virginia community college personnel were then compared with the national issues and trends identified from the literature.

CONCLUSIONS

The national issues and trends related to vocational/technical education programs in community colleges were general in nature. Issues and trends in Virginia's community colleges, related to vocational/technical education programs, were very specific when compared to those identified from the literature nationally. The issues and trends, which were identified through the survey of Virginia community college division chairs and deans, that are generally supported by those identified in the literature nationally include:

- Fifty percent (50%) of the respondents felt that academic programs receive more attention than vocational/technical programs.
- The perception that vocational/technical programs are less academically challenging continues.
- The focus on vocational/technical education programs versus academic programs fluctuates due to community and job market demands at the time.

Information derived from the survey of Virginia community college respondents did reveal some issues and trends beyond those identified from the review of literature about issues and trends nationally. These included:

- A proportionally larger number of older adults are enrolling in vocational/technical education programs in Virginia's community colleges.
- The majority of the respondents felt that advisory committees provide sufficient interaction between the community college and the community.
- Technology will continue to impact vocational and technical courses at an ever increasing rate.
- The respondents felt that funding appears to be holding constant, however, there is a continued concern that funding for computer technology will be taken from general equipment budgets without additional funding.
- If Congress provides funding for all students with a "B" average to attend college, this would result in a large increase in enrollment for community colleges and vocational and technical programs, and additional provisions will need to be made in order to accommodate this increase.
- Although respondents across the twenty-three Virginia community college campuses indicated that they complete program reviews, there appears to be a lack of consistency between campuses regarding the methods/format used for the reviews.

RECOMMENDATIONS

This study sought to determine the current issues and trends in vocational and technical education in Virginia's community college system. Based on the findings in this study it is recommended that:

- Instructors of vocational/technical education programs in Virginia's community colleges should continue to seek ways of collaborating closely with business, industry, and the local community at large when making decisions regarding these programs.
- Instructors of vocational/technical education programs in Virginia community colleges should continue to seek new and additional instructional strategies that will assist an increasingly older student population.
- Community colleges should continue to seek additional sources of funding to assist with technical updates to preserve funding for more traditional equipment needs.
- Community colleges should consider adding separate line items to their budget to delineate between "high tech" (computers) and more traditional equipment funds.
- Community colleges should consider utilizing advisory committees and committee members to a greater extent to publicize and market vocational and technical programs.

- State level leadership should consider a standardized program review process to enable better cross campus and state wide comparisons of programs.
- The survey results indicate that vocational/technical programs are viewed as less academically challenging. Consideration should be given to closer collaboration and integration of math, science, and English language skill curriculums with vocational/technical curriculums. This collaboration would enhance the perceived challenge of the vocational/technical programs, and it would reinforce the math, science, and English language skills needed to pursue these programs.

It is also recommended that these research findings be included in graduate classes that include community college instructors as students. Additionally, the results of this study may change in a short period of time, therefore, it would be advisable to update this information with another survey in the next three to five years.

There is a large amount of research pertaining to vocational and technical education at the secondary level. However, less research exists on vocational and technical education at the post secondary level. Therefore, it would also be beneficial to the field to conduct more research in the area of post secondary vocational and technical

education. The national issues and trends found in the literature should also be validated within other states as well. This would give more validation to the accurateness of the issues and trends on a national level.

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Appendices

Appendix A - Sample of the Survey

Appendix B - Research Regions

Appendix A

Sample of the Survey

Issues and trends in Vocational/Technical Education

Name _____ **College:** _____

A. (I)¹ What student populations are enrolled in the technical programs at your campus? Does there tend to be more returning adult students or the traditional high school students enrolled in your vocational/technical programs? Please explain.

A. (T) Do you feel that these populations will or should change? If so, how?

B. (I) Each community college has an advisory committee for each vocational/technical program. Do you feel that this committee creates a sufficient amount of involvement with business and industry in your area? Please explain.

B. (T) Should the amount of involvement be different? If so, how?

C. (I) How do you think instructional technology has impacted the technical courses at your campus? Please explain.

C. (T) Do you see this impact changing? If so, how?

D. (I) Have the sources and amounts of funding for the technical programs at your campus been changing? If so, in what ways have they changed?

D. (T) If there is less funding being provided for your technical programs from state and federal governments, what other sources could be considered?

E. (I) President Clinton has proposed that every student should receive a minimum of two years of college education. If this were to become a reality, would this effect your technical programs? If so, how?

E. (T) What things will have to be done to accommodate this concept (If it does effect your campus)?

F. (I) Which of the following curriculum categories receives the most attention by college administration at your campus?

Academic _____ Vocational/Technical _____
Please Explain.

F. (T) Should this focus or amount of attention change in the future? If so, how?

G. (I) It is often said that students, parents, and counselors have a perception that the vocational/technical classes at the secondary level are for those students who do not do well academically. Do you feel that this perception of vocational/technical programs is the same or different at the community college level? Please explain.

G. (T) Should or will this change in the future? If so, how?

H. (I) What methods or techniques do you use to assess the effectiveness of your technical programs? Please explain.

H. (T) Does this give you adequate feedback about your programs? If not, what other assessments methods could be helpful? Please explain.

Please list any other issues and trends.

Feel free to attach other sheets of paper if you need more room to explain any item.

¹ Note: I = Issue; T = Future Trends

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<input type="checkbox"/> VA Highlands (VHCC)/SW Ctr., Abingdon
<input type="checkbox"/> VA Western (VWCC)
<input type="checkbox"/> Wake Technical, NC (WTC)
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Appendix B

Research Regions

Research Regions

Regions that were adopted for purposes of identifying deans representative of the Virginia Community Colleges

- West (4 community colleges)
- South Central (4 community colleges)
- North Central (4 community colleges)
- South East (4 community colleges)
- North East (4 community colleges)
- North (3 community colleges)

