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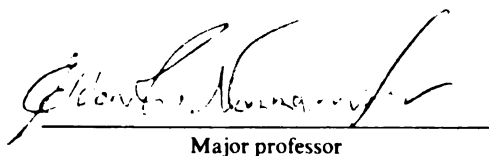
The Development of a College Choice
Set and Choice Decision Applied to an
Independent College of Business

presented by

Barbara A. Mieras

has been accepted towards fulfillment
of the requirements for

Ph.D. degree in Educational Administration


Major professor

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THE DEVELOPMENT OF A COLLEGE CHOICE SET
AND CHOICE DECISION APPLIED TO AN INDEPENDENT
COLLEGE OF BUSINESS

By
Barbara A. Mieras

A DISSERTATION

Submitted to
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ABSTRACT

THE DEVELOPMENT OF A COLLEGE CHOICE SET AND CHOICE DECISION APPLIED TO AN INDEPENDENT COLLEGE OF BUSINESS

By

Barbara A. Mieras

The research involved surveying 260 Davenport College traditional-age freshmen students to measure the influential ratings of 13 marketing/admissions activities, seven categories of people, and when college choice sets and college decisions were made. Four research questions were developed and answered.

Findings of the study indicated students perceived the marketing/admissions activities of all colleges they considered attending and those of Davenport to be similar. Students rated as most influential the visit to campus and interview with an admissions representative, a high school classroom presentation by an admissions representative, and a personal visit with an admissions representative at the high school. Least influential activities in choice set development were radio messages, newspaper messages, and billboard messages.

Marketing/admissions activities most influential on students' decisions to enroll at Davenport instead of another institution were handwritten notes from an admissions representative, receiving a scholarship, and follow-up letters from staff. Least influential were phone contacts from Davenport alumni and current students.

Barbara A. Mieras

Students rated the admissions representative and parents as the people most influential when considering all possible colleges to attend and in making choice decisions to enroll at one institution instead of another. Students rated parents slightly more influential than the admissions representative when making a choice decision.

A majority of the respondents indicated Davenport was first considered a possible college to attend during the first or second semester of the 12th grade. Students indicated decisions were made to enroll at Davenport instead of another institution during the 12th grade.

Recommendations included conducting research on a regular basis to determine where, when, and why students choose a college. Institutions interested in increasing or maintaining enrollments can focus resources on the marketing/admissions activities and people students identified as most influential.

To Davenport College.

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CHAPTER I

INTRODUCTION

During the last decade, projections of a declining traditional-age college applicant pool spurred administrators to seek new ways to attract an increasing share of the available applicant pool to maintain and/or increase enrollments. The interest in maintaining or increasing enrollments brought the topic of student college choice to the forefront. The growing competition for a declining pool of traditional-aged applicants ushered in an era of market-oriented research focusing on the student college choice process as a means of developing more effective marketing and recruitment strategies (Hossler, 1985).

Researchers developed models of college choice and attempted to evaluate the effectiveness of recruitment strategies aimed at influencing choice. The majority of models portray the college choice process as a three-stage or three-phase process. Hossler (1985) developed a three-stage choice model which is a synthesis of several models of student college choice suggested by authors such as D. Chapman (1981) and Litten (1982). The model reflects the interactive and developmental nature of the choice process.

The first phase of Hossler's (1985) model is the predisposition stage. Certain background characteristics are correlated with college attendance. These characteristics are cumulative, exerting

their influence over time. One of the most important background characteristics is that of socio-economic status according to Bishop (1977), Kohn, Manski, Miller (1976), Mundel (1976), Peters (1977), and Trent (1970). According to the literature, colleges and universities have little or no impact during the predisposition stage.

Students predisposed to attending college move on to the second search stage. The search stage involves gathering information about educational options. During the search stage, students formulate a "choice set" (Hossler, 1985). The choice set is the group of institutions to which the student will apply or consider attending. During the search stage, potential matriculants seek out information about colleges and universities to form the choice set. The choice set may range from one institution to several.

During the search stage, many students needlessly limit the number and types of institutions in their choice set. Students typically lack accurate information about the true or net cost of attendance (Hossler, 1985). As a result, some institutions are excluded from a choice set on the basis of list price rather than net price (The College Board, 1976). List price is defined as tuition costs published in the college catalogue. Net price is defined as published tuition, less financial aid. Many potential educational options are eliminated. Thus, an institution which best fits a student's needs may not be considered an option and included in the student's choice set. The literature indicates colleges and universities can achieve the greatest influence on the college choice process during the search stage.

The third stage is choice. During the choice stage, institutions identified as options in the choice set are evaluated and narrowed to a specific institution the applicant will enter. Interaction increases between the applicant and colleges identified as options in the choice set. College communication strategies and net price become more important. Jackson (1978) and Manski and Wise (1983) state price influences the choice decision.

Authors such as Jackson (1978), McRee and Cockriel (1986), and Welki and Navratil (1987) state receiving any financial aid increases the likelihood the student will attend. Freeman (1984) analyzed the effect of "no-need" scholarships on college choice among a sample at midwestern colleges. Freeman's results indicate the "courtship" procedure utilized in awarding the scholarships may actually be more important than the dollar amount of awards. Murphy (1981) states the perception of academic quality is more important to students than the actual cost of attendance. Kealy and Rockel (1987) state a student's choice of a college is based on the relative cost and quality of the institutions in his or her choice set.

The student college choice process is complex. The process can be viewed as a funnel in which students begin by considering a variety of post-high school options. For students predisposed to college, the options are reduced to form a choice set of institutions. A choice decision is made to attend a specific institution from among the colleges/universities in the student's choice set.

As competition among institutions has intensified, administrators have recognized that marketing research can be used to attract and maintain adequate student populations. Market research studies have contributed to identifying factors significant in students' decisions to attend particular institutions.

Statement of the Problem

The problem to be investigated in the study was to identify marketing/admissions activities and people students rate as influential in the college choice process, and determine when choice sets and decisions are made so that institutions' efforts and resources can be targeted accordingly.

The decline in the number of traditional-age college and university prospective students through 1994 has been well documented (Hossler, 1986). The number of high school graduates is not expected to begin rising until 1995. In Michigan, projections indicate the number of high school graduates will decline an estimated 12 percent between 1986-1992 (Kent County Intermediate School District Fourth Friday Report, 1988). To maintain and/or increase enrollments, colleges and universities must identify marketing/admissions activities and persons students indicate were influential in the college choice process and adjust strategies accordingly.

Student college choice is a complex process. The literature indicates a general consensus among authors that the process consists of three stages which can be viewed as a funneling process in which high school students consider a wide variety of post-high school options during a predisposition stage. In the predisposition

stage, available post-high school options become more specific until a college choice set is formed during the second search stage. During the third stage, the funnel continues to narrow to the point at which a student makes a choice decision to attend an institution from among the colleges and universities in the choice set.

Purpose of the Study

The purpose of the study was to examine the search and choice stages of the college choice process to determine marketing/admissions activities and people traditional-age freshmen identified as having influenced college choice set formation, college choice decision, and when choice sets and decisions were made.

The first objective of the study was to identify marketing/admissions activities students indicate were influential in developing college choice sets and institutions included in the choice set. The second objective was to identify Davenport College marketing/admissions activities influential in including the college in choice sets. A third objective of the study was to identify marketing/admissions activities influential in students choosing Davenport as the institution of matriculation. The fourth objective was to determine at what point in the students' high school years the college choice set was formed. The fifth objective was to determine at what point in the high school years students made a choice decision to enroll at Davenport instead of another institution in the choice set. A sixth objective was to identify people students indicated were influential when developing college choice sets and making choice decisions.

First-time freshmen who were 1988 high school graduates were chosen for the study because traditional-age students represent Davenport's largest incoming group of students accepted for Fall enrollment. There were 434 Fall 1988 freshmen who were 1988 high school graduates. Studying first-time, traditional-age students' perceptions of influential marketing/admissions activities and people related to the college choice process can provide data and insight to more effectively recruit from a declining pool of traditional applicants.

Davenport College is an independent, non-profit college of business, established in Grand Rapids in 1866. The Davenport College System is comprised of ten collegiate locations. The main campus of the college is located in Grand Rapids. The Fall 1988 enrollment in Grand Rapids was 3,220 students. Branch campuses are located in Lansing and Kalamazoo. The college also owns and operates three career centers in Grand Rapids, South Bend and Merrillville, Indiana, the Detroit College of Business with campuses in Dearborn, Flint, and Madison Heights, and the Patricia Stevens Career College in Milwaukee, Wisconsin. The Davenport/Detroit System is the largest independent college in Michigan, with a Fall 1988 enrollment of over 11,000 students.

Davenport College in Grand Rapids draws approximately 60% of its students from Kent and Ottawa counties in Michigan. The remaining 40% of students come primarily from western Michigan (a small number from Michigan's upper peninsula). Because Davenport Grand Rapids draws approximately 60% of its freshmen each year from the Kent/Ottawa county area, the major competitors for students are

located within the greater Grand Rapids area. The college's primary competitive environment includes up to ten colleges according to the ACT Class Profile Report of Enrolled 1988-89 Freshmen. The ten colleges are all located in the southwest Michigan market area.

Kotler and Fox (1985) state an institution should look at its position in relationship to its relevant competitors, not every college. The data from the ACT report (1989) indicates Davenport's major competitors among its current students are Grand Rapids Junior College and Grand Valley State University in the greater Grand Rapids area. Entering student surveys administered yearly by Davenport College to incoming freshmen, and the ACT Class Profile Service Report (1989) data indicate scores were sent most frequently to Grand Rapids Junior College, Grand Valley State University, Ferris State University, and Muskegon Business College in addition to Davenport College.

Conducting market research of an institution's current students can provide opportunities for developing and adapting marketing/admissions activities to more effectively influence the process of college choice, particularly at the search and choice stages. Small, independent colleges, such as Davenport, must conduct research on the college choice process and then plan, develop, and implement strategies based on research findings to maintain the institution's market position.

Research Questions

The following research questions were developed for the purpose of identifying marketing/admissions activities and persons students

indicated were influential in the college choice process, when the choice sets were formed, and when decisions were made:

1. What marketing/admissions activities do Davenport freshmen identify as influential in developing a choice set of college and universities?
2. What marketing/admissions activities do Davenport freshmen identify as influential in making a college choice decision?
3. What persons were influential in the students' development of a college choice set and college choice decision?
4. At what point in the students' high school years was the college choice set formed and when was the college choice decision made?

Methodology of the Study

A descriptive study was the research method dictated by the nature of the problem of marketing/admissions activities and people freshmen identify as influential in the development of college choice sets, making choice decisions, and determining when choice sets and decisions were made. The population was defined as first-time, traditional-age freshmen at Davenport College in Grand Rapids, Michigan. Davenport College has an open admissions policy. In the Fall of 1988, there were 434 first-time, traditional-age freshmen students enrolled at Davenport College in Grand Rapids. A survey was the instrument selected as the most appropriate to measure marketing/admissions activities and people influential in choice set development and choice decisions, and when choice sets and decisions were made. A copy of the instrument is included in Appendix A.

The survey instrument is based on marketing/admissions activities and people other researchers identified as having influenced the college choice process. The measuring instrument appears consistent with survey composition used by other researchers in the field.

The procedure to carry out the research began with the preparation of the survey form. A cover letter to accompany the survey was prepared and addressed to first-time, traditional-age freshmen students. The cover letter explained the purpose and value of the study and why the student was included in the survey. The cover letter indicated responses would be confidential. Surveys were asked to be returned within ten days. A copy of the cover letter and survey are included in Appendix A.

Stamped, self-addressed return envelopes were enclosed with cover letters and surveys. After 10 days, students were mailed a postcard reminder. Following this, nonrespondents were sent another cover letter, survey, and self-addressed stamped return envelope. The goal of the study was a 70% return. The study was conducted during May and June, 1989.

Analysis of Data

Presentation of data. The data from the returned surveys is presented in tables to examine frequency distributions using means, percentages, and rank orderings.

Statistical procedures. The descriptive survey study indicated the statistical procedures used to analyze the data from the surveys were the mean to indicate central tendency, the Pearson product moment coefficient of correlation, and Spearman rho rank

order correlation coefficient. Analyzing the data using the statistical procedures, identified marketing/admissions activities and people influential when students were considering colleges to attend, making choice decisions, and determining when in the high school years choice sets were formed and choice decisions made. The descriptive method was used to gather data on the current status of the problem and could lead to additional research on choice set development and choice decisions of first-time, traditional-age freshmen. Twelve questions were utilized in the survey.

Practical Value of the Research

The value of the research to the college being studied included the potential to make competitive gains in enrollment within the greater Grand Rapids market area. As an independent, non-profit institution which receives no funding from state or federal tax dollars, any reduction in enrollment is of serious consequence. As an independent, non-profit college of business, Davenport fills a niche in the greater Grand Rapids higher education community by providing a small campus environment with small classes, personal attention, and a focus on practical business education. Davenport appeals to students who may be unsure of whether to pursue a two-year or four-year degree. Davenport College of Business has an open admissions policy and offers education for careers in business at both the associate and baccalaureate levels.

The Fall 1988 enrollment at the main campus in Grand Rapids was 3,220 students. High school graduate projections between the years of 1986-1992 (The College Entrance Examination Board, 1988) indicates high school graduates will decrease by approximately 12%

in Michigan, thus decreasing the prospective applicant pool. In the greater Grand Rapids area, projections for high school graduates for the next few years are not as dire. Population is growing in Kent and Ottawa counties at twice the rate of the state of Michigan. Fourth Friday headcount data collected by Kent Intermediate School District (1988) for the classes of 1989, 1990, and 1991 indicates a stable number of high school graduates in the Grand Rapids area. Yet, while the number of high school graduates is projected to be fairly stable in the Grand Rapids market area over the next three years, competing institutions have increased efforts to attract larger shares of the potential applicant pool. The high school graduate outlook for other Davenport campus locations is not stable, but rather declining. An enrollment loss for an independent non-profit college, which is primarily tuition driven, would result in a reduction of faculty, staff, program offerings, and lowering of academic quality, due to insufficient revenue sources.

Few colleges are conducting formal or informal research on the college choice process. Results of the research can provide insight for increasing inclusion of a college in prospective students' college choice sets, and increasing choice decisions of a college as the institution of matriculation. Results can be used to focus on the most influential marketing/admissions activities and people in the choice process. The instrument and research method can be used at other campus locations to assist in targeting efforts and resources to achieve greater influence on inclusion in the college choice set and influencing the college choice decision.

Definition of Terms

Choice decision. A prospective student's decision to matriculate at a college or university included in the student's choice set of institutional options.

Choice set. A group of institutions of higher education a prospective student has identified as being possible post-secondary options.

College choice model. A model used to describe the college choice process. The models are typically described as three-stage models: predisposition stage, search stage, and choice stage.

Educational environment. The system within which institutions of higher education provide their services to students.

Educational market place. Colleges in Michigan that offer two-year or four-year degrees in business.

First-time freshmen. Students who are typically 18 or 19 years old and enter college directly from high school.

Influential. Someone or something that can affect or alter the actions of others.

Institutional position. The position of a college among its relevant competitors as perceived by a specific public.

Market. A group of people who have an actual or potential interest in a product or service and the ability to pay for it (Kotler and Fox, 1985).

Marketing. The process by which organizations undertake activities to facilitate the identification, development, and exchange of products and services to satisfy customers. It involves

major emphasis on the development of product, price, place, and promotion strategies.

Marketing/admissions strategies. Activities used to influence inclusion of an institution into a college choice set and to influence a college choice decision.

Position. Describes how a group perceives a college in relation to competing colleges.

Primary competitive market. The geographic market from which the majority of an institution's prospects and students are drawn.

Target market. A group of customers with similar characteristics or needs.

Delimitations and Limitations of the Study

Several delimitations and limitations were established in this study of influential marketing/admissions activities in the development of college choice sets and the college decisions. The target population was first-time, traditional-age freshmen. This market segment is extremely important when forecasting future enrollment expectations for institutions. Other segments such as upper classmen, transfer students, and students who applied but did not matriculate could be subjects of future research. Although traditional-aged applicants entering directly from high school comprise the largest market segment of incoming freshmen, it is a more homogeneous segment than all new students entering Fall 1988, which would include transfer students from other institutions, adult students, and re-entering students.

Results of the study reflect only the perceptions of Davenport College, Grand Rapids, freshmen students who entered Fall 1988. Results of the study may have been different had all freshmen students been surveyed rather than just first-time, traditional-age freshmen students entering directly from high school. Another limitation is the length of time between when the freshmen entered the institution in Fall 1988 until the time of the survey in May and June, 1989.

Summary

The process of college choice, in particular the process of the development of a college choice set and choice decision during the search and choice stages is important to college and university administrators charged with maintaining or increasing enrollments. The problem of a declining traditional-age applicant pool and the associated problems are particularly important for independent institutions which rely on tuition revenues to maintain enrollment and thus, institutional vitality. Chapter II contains a review of the literature on marketing, retention and student development, enrollment management, college choice, and college choice models. Related studies are discussed.

The methodology of the study is explained in Chapter III. The findings of the study are summarized and presented in Chapter IV. Final conclusions of the study regarding perceptions of first-time freshmen related to influential marketing/admissions activities and people, the development of college choice sets, and making choice decisions are presented in Chapter V.

CHAPTER II

LITERATURE REVIEW

Marketing in Higher Education

During the last ten years, projections by a number of authors that the pool of traditional-aged high school applicants was expected to decline, spurred administrators to examine ways to attract and/or maintain a share of the available applicant pool. Numerous authors have agreed that marketing techniques and research can be of benefit to institutions of higher education (Hossler, 1984; Kemerer, Baldrige, and Green, 1982; Kotler and Fox, 1985; Lay and Endo, 1987; Litten, 1986; Muston, 1985; Voorhees, 1987). Dire predictions of a significant decrease in traditional-aged applicants was the catalyst for the adoption of marketing in higher education.

According to Hossler (1984), colleges and universities with less visibility and less student drawing power became more concerned about future enrollment. Hossler also states the rising costs of higher education due to inflation in the 1970's, aggravated worries that students would not be able to afford college. In addition, by the 1980's reduced federal subsidies in financial aid fueled concerns that fewer students would be able to attend institutions of higher education. These concerns caused higher education to develop an interest and take action to implement

marketing techniques and strategies during the 1970's and early 1980's.

Litten (1986) states marketing thinking became an established vehicle for addressing higher education problems and opportunities by the early 1980's. Litten indicates the implementation of marketing resulted from a quest by academic administrators for tools to 1) enhance academic administration, and 2) energetic efforts by marketers to promote their craft in new areas outside the business field such as education. Hundreds of documents on marketing in higher education published during the last three years indicate the widespread adoption of marketing in higher education. According to Litten, marketers pointed out to academic administrators that it was not a question of whether to engage in marketing, but how to do it effectively.

Marketers emphasized the fundamental fact that people expect to get something, some benefit, from patronizing or affiliating with an institution. The benefits an institution offers are central in determining whether the institution's services are desired and by whom. In business, marketers use a mnemonic device, the four P's, to summarize the marketing concept:

1. Product (the benefit it offers and the means for achieving)
2. Price (the cost to people to get the benefit)
3. Promotion (how people are informed of the product and its price, and how costly it is to get)
4. Place (where to get it and how easy)

Positioning to achieve a desirable place in a market by management of the four P's is a central aspect of marketing.

Hossler (1984, 1986), Kotler and Fox (1985), Lay and Endo (1987), and Litten (1986) state that underlying all market theory is market research. It is essential to an understanding of what people want, how they pursue their objectives, and how desires are or might be filled. Litten (1986) says it is this emphasis on market research that was most directly beneficial in transferring marketing thinking to higher education. Today marketers have rediscovered the essential distinction between goods and services. A sub-specialty has developed within the marketing profession that focuses on marketing services, such as higher education services.

The four properties of services marketing are appropriate to higher education. The four I's of services marketing are:

1. Intangibility (difficult to see or measure)
2. Involvement (the customer must get involved to get the benefit)
3. Inseparability (produced and consumed at the same time)
4. Inconsistency (quality control is a major problem)

In addition, higher education has these high risk purchase traits:

5. Purchased infrequently (a majority purchase only once--bachelors degree)
6. It is of high personal importance
7. Long-term consequences (impacts future earnings and career development)
8. Quality is difficult to judge (no consensus on what constitutes quality)

Litten (1986) states the implications of services marketing to prospective students is that people must "shop" carefully, assess

his or her fit with the institution, and compare relative costs and benefits.

Lay and Endo (1987) state that over the last ten years there has been probably no more emotionally charged subject than applying the concepts and methods of marketing and market research to higher education. The authors state that marketing and market research are here to stay, and a major problem is keeping up with the latest labels and developments. Litten (1986) concurs that market research is well established and will continue to move forward. Litten recommends closer ties to the secular world of marketing, aggressively seeking out what business is doing and adapting those strategies and techniques to higher education's needs and goals.

Bers (1987) concurs with Litten that higher education must adopt business techniques such as using qualitative methods to gain insight into student perceptions and behaviors. One method receiving considerable attention is focus group interviews, such as the method developed by Bers.

Voorhees (1987) concurs with other authors that higher education should adopt business marketing research and methods. Voorhees states it is ironic that at a time when many institutions struggle to remain viable in the face of decreasing dollars, most actions relating to institutional programs have been directed toward formal reviews leading to closure of some programs. Thus, much energy has been spent on saving and evaluating old programs and little on new or replacement programs. What is needed, according to Voorhees, is the careful assessment of market opportunities to strengthen institutional market positions.

Voorhees (1987) like Kotler and Fox (1985) suggests using a program market opportunity matrix to place present and future programs along two dimensions: markets, and programs and then analyze the matrix for opportunities. Voorhees states the bulk of program development in higher education during the last ten years has been in programs that prepare students for vocations and careers. Thus, the most frequently used techniques focused on employers and employer needs. Voorhees cautions that this can lead an institution astray. The author suggests instead that institutions survey current students for insights into market potential.

According to Noble (1986), despite the proliferation of literature on marketing in higher education, and support of the use of marketing by such groups as the College Board, the Johnson Foundation, and the National Association of College Admissions Officers, marketing does not appear to be well understood or widely implemented and is often misused by many higher education administrators. According to Noble, surveys indicate college and university administrators see marketing as selling and promotion. Noble says, "The number of higher education institutions which have implemented comprehensive marketing programs is small indeed (1986, p. 319)."

Noble (1986) conducted a study to investigate progress in the professional marketing of institutions of higher education. A questionnaire was developed, pretested, and mailed to a stratified random sample of colleges and universities. The percentage of public versus private, and small versus large sample respondents

closely paralleled actual college and university populations. The questionnaire had an 86 percent response rate. Noble stated the simplest and surest method of measuring the degree of an institution of higher education's commitment to a comprehensive marketing program was to determine if there was a high level administrator with the responsibility and authority to implement a marketing program.

Results of the study indicated 16.3 percent of the schools had a marketing administrator. Noble (1986) concluded from the data that only a very small number of college and universities have professionally managed marketing programs. Noble states, "The progress that has been made since these surveys were completed, from the perspective of a professional marketer is extremely disappointing (1986, p. 325)."

Brooker (1985) concurs with Noble (1986) that despite the efforts of many scholars and consultants who call for the development of formal marketing programs in higher education (e.g. Knight and Johnson, 1981; and Kotler, 1981, 1985) marketing does not appear to be widely implemented. Brooker concurs with Noble that college and university administrators have too often identified marketing as merely selling and promotion. Brooker and Noble (1985) state a solution to this problem is the appointment of a marketing officer who is responsible for working closely with upper-level administration. According to the authors, this has proved to be a difficult process for many institutions because of the complexity of the marketing mix, the perceived inappropriateness of a traditional marketing officer, the number of diverse groups that have input into

the components of the mix, the uniqueness of higher education, and the difficulty in identifying consumers of higher education.

Brooker and Noble (1985) suggest a number of alternatives which colleges and universities might use to gradually implement formal marketing programs. One alternative suggested was to have a marketing officer at a less visible staff level. A second alternative was to hire marketing consultants. Third, a college or university could conduct marketing workshops to introduce administrators, faculty, and staff to marketing concepts. The authors state:

The task of implementing formal marketing programs at institutions of higher education is formidable but not impossible. Those institutions which commit themselves to the management of their exchange processes are far more likely to survive and prosper than those who lightly let exchange processes take their own course. (1985, p. 199)

Major writers in the area of higher education and marketing concur regarding the need for marketing in higher education (e.g. Noble, 1986; Brooker and Noble, 1985; Knight and Johnson, 1981; Kotler, 1982; and Kotler and Fox, 1985). The literature indicates that as the recognition of the need for marketing in higher education became established, concern for student enrollments continued to increase and institutional leaders began to examine the larger enrollment management process.

Enrollment Management

During the early 1980's, the recognition of the need for marketing in higher education led to the study of managing enrollments throughout the process from initial attraction through graduation (Hossler, 1984). Hossler (1984), and Kemerer, Baldrige,

and Green (1982), among others formalized the concept of enrollment management to describe this emerging focus. Enrollment management not only encompasses the marketing of the institution but integrates all activities and people on the campus into a holistic approach to enrollment. According to Hossler, enrollment management involving the entire campus is much in keeping with perspectives of other major writers in related areas (Astin, 1977; Brown and DeCoster, 1982; Cosgrove, 1986; and Noel and Levitz, 1986). Hossler indicates institutions need to implement and maintain a holistic approach to enrollment and student growth and development. Hossler defines enrollment management as:

. . . process or activity that influences the size, shape, and characteristic of a student body by directing institutional efforts in marketing, recruitment, and admissions, as well as pricing and financial aid. In addition, the process exerts a significant influence on academics and career advising, the institutional research agenda, orientation, retention studies, and student services. (1984, p. 6)

Hossler (1984) states enrollment management is a process that integrates eight areas: Student marketing and recruitment, pricing and financial aid, academic and career advising, academic assistance programs, institutional research, orientation, retention programs, and student services.

According to Hossler (1984), enrollment managers must be able to influence all eight in order to affect the size, shape, and characteristics of the student body. Hossler indicates institutions need to design an enrollment plan as follows:

1. Plan for demand based on past enrollment trends, the economy, demographic trends, labor market information, and direction of public policy.

2. Influence college choice by analyzing factors that affect choice, and identify and assess the competition.
3. Pricing: Find the right niche by determining how financial aid packages affect student choice and how packages compare to the competition.
4. Recruit graduates by assessing the campus' unique environment to identify which students best fit with the institution.
5. Implement an attrition alert system by identifying potential dropouts and market programs to reach those students.
6. Research: conduct formal and informal research on a regular basis.
7. Evaluate the institution's people, programs, and environment on a regular basis.

Hossler identifies research and evaluation as the two most crucial activities in order to assess data necessary to make informed decisions regarding marketing, financial aid awards, and retention efforts.

Hossler (1984, 1986) supports Astin (1977), Brown and DeCoster (1982), Cosgrove (1986), and Noel, Levitz, and Saluri (1987) by stating that institutions can help shape collegiate enrollments by attracting students with the characteristics and qualities needed to thrive at the institution of their choice. Muston (1984) presented evidence in a study of midwestern state universities that enrollment management systems can work using ACT data. Hossler (1986) cites several successful programs of enrollment management that have been implemented at DePauw University, University of Wisconsin at

Oshkosh, DePaul University, and Johnson County Community College. Hossler says these successful programs were possible because each had an "idea champion" similar to champions discussed by Peters and Waterman (1982) that push ideas into becoming realities.

Hossler (1986) states, thus far, the steep projected declines in enrollment in higher education have not materialized. Hossler says a number of demographic and public policy shifts are converging, however, that may change the situation. Demographic shifts, such as an increasing minority population as well as public policy trends at the state and federal level, are affecting financial aid, high school graduation standards, and college entrance requirements. Hossler indicates the impact of these initiatives on student enrollments is both positive and negative. Hossler says these trends have caused colleges and universities to continue to search for new ways to attract prospective students and retain those who do enroll. Hossler states that enrollment management is not simply a new term for marketing and recruitment. It is a holistic, integrated approach to influencing college enrollments from the initial stages of marketing and recruitment through graduation.

Retention and Student Development

Authors, such as Astin (1985), Lenning, Beal, and Sauer (1980), Noel, Levitz, and Saluri (1987), and Pascarella (1982) concur with Hossler (1984, 1986) that it is not enough for institutions to focus only on the marketing of their institutions to maintain enrollments and institutional vitality. Equal attention must be placed on retaining students through graduation. According to Noel, Levitz, and Saluri (1987), over time it is the qualities of the institution

itself that attract and retain students. The authors state that effective attraction and retention of students has little to do with instituting gimmicky programs, lowering standards, or manipulating students into applying or staying. According to the authors, it has everything to do with providing experiences that engage students' minds and energies. The authors believe institutions need to market their institutions honestly and effectively.

Noel, Levitz, and Saluri (1987) support Astin's theory of involvement. According to Astin (1975, 1977), the key to student persistence is to increase student involvement with the institution. In Astin's book, Achieving Educational Excellence (1985), the author states the key to being an excellent institution, and for students to achieve educational excellence, is student involvement. According to Astin (1985), the effectiveness of any educational policy or practice is directly related to the capacity of that policy or practice to increase student involvement.

A major writer in the area of retention, Noel (1978), states retention begins with the admissions process. Students need to make a good college choice to insure a good "fit" between what the campus offers and what the student needs or expects. Astin (1975), Cope and Hannah (1975), and Tinto (1975) concur on the importance of students making a good college choice to increase retention and graduation rates.

According to Noel, Levitz, and Saluri (1987), retention is a practitioner's art. The authors indicate the literature over the past several years has been too much and too theoretical. The authors in their book, Increasing Student Retention (1987),

conducted a nationwide study and found the best retaining colleges have created tight webs of academic and student support services that assist students in successfully accomplishing objectives. The tight webs of academic and student support services have created an atmosphere of involvement for students which appears to support Astin's theory of involvement. According to the authors, institutions should adopt a commitment to individualized instruction which makes learning active through internships, in-class presentations, debates, and simulations.

Concurring with the importance of involvement are Beal and Noel (1980) who cite the necessity of increasing faculty involvement to improve retention. Beal and Noel report from a nationwide survey that the number one retention, factor considered most important by all types of institutions, was a caring attitude by faculty and staff. In addition, the authors state their study indicated that contact outside the classroom is important. Beal and Noel state that on most campuses, faculty involvement is the key to improving retention and thus overall enrollment.

According to Noel, Levitz, and Saluri (1987), successful retention programs are those at institutions with very low attrition rates or those showing a 10 percent or greater improvement over a three-year period. Three characteristics of successful programs identified by the authors are:

1. The retention program is comprehensive and campus-wide.

Notre Dame and Harvard are cited as examples of institutions with significant involvement between faculty and students that emphasize front-loading in the freshman year through

intensive orientations, intrusive advising, and involvement with faculty and staff.

2. An academic advising program. The authors identify Duke University as an institution which has developed and implemented an advising center using a centralized intrusive approach with aggressive follow up. Western New Mexico State University also has established an intrusive advising program which requires students to meet with advisers at regularly scheduled times.
3. A mobilized campus-wide effort. Boston University is cited as having established a network of campus committees, and Eastern Michigan University has established a matrix accountability model to draw in all segments of the campus community.

Noel, Levitz, and Saluri (1987) state that woven through the three features of successful retention programs is much involvement, in class and outside of class, with faculty and staff. Retention begins with the admissions and marketing process and is facilitated by involvement. Students need to make a college choice decision that insures a good fit between what the campus offers and what the student needs or expects.

College Choice

In the preceding pages of the review of the literature, several aspects related to the topic of college choice were discussed. The acceptance by higher education of the need for using marketing strategies in higher education, although implementation of formalized programs appears to be relatively small, has been well

documented. The acceptance of marketing in higher education, due to a concern with maintaining and/or increasing enrollment in institutions in higher education, gave rise to the development of the concept of enrollment management. Authors such as Hossler (1984, 1986) developed the concept of enrollment management to focus attention on the whole enrollment process, beginning with the marketing of the institution through attracting and retaining students to graduation.

Interest in higher education marketing and enrollment management again brought the issue of student retention into focus. Authors such as Astin (1985), Pascarella (1982), and Noel, Levitz, and Saluri (1987) cited the need for institutions to focus as much attention on retaining students as in marketing the institution and attracting students. Retention authors cite the importance of involvement in both retaining students to graduation and in promoting academic excellence for students and institutions. Retention authors also cite the importance of students making a sound college choice decision. Major writers in the area of retention such as Noel (1978) indicate students need to make a good college choice to insure a good fit between what the campus offers and what the student needs or expects. From the preceding discussion of marketing, enrollment management, and retention, the review of literature will now shift to major issues pertaining to access and choice in higher education.

The terms access and choice reflect the educational goals and ideals of the American people (Ellickson, White, and Richard, 1982). The authors define access as the opportunity to enroll in

some type of post-secondary education. The authors define choice as the opportunity for a person to choose among institutions that are appropriate to the person's needs, capabilities, and motivation. According to the authors, higher education in America is being seriously affected by demographics and economic conditions.

According to Ellickson, White and Richard (1982), America's commitment to providing equal educational opportunity is threatened because of rising tuition costs, federal and state financial aid policies, and general economic conditions. The authors state there are barriers to access and choice and that these barriers have a significant impact on the college choice process. The authors state there are five barriers to access and college choice for students: attitudinal, geographic, social, academic aptitude, and financial barriers.

A study by Alexander, Eckland, and Thomas (1979) analyzed the effects of social class, family background, race, sex, and academic credentials on student access to higher education. The authors found that academic credentials and social class are major determinants of college access for all students. On the average, white and higher social status students receive higher standardized test scores than black or lower economic status students. When scholastic aptitudes and family origin are controlled, blacks and women experience little disadvantage in terms of the likelihood of attending college. The authors indicate that low socio-economic status students tend to be more disadvantaged and have less access and choice than either blacks or women. As a whole, class rank, high school curriculum, and scholastic aptitudes tend to be more

important to access and choice than the combined effects of race, sex, and social class. The authors conclude by stating they believe student motivations and aspirations are more important in college access and choice than parental income.

In a study by Jackson (1978), the author discusses a general model of student choice and discusses the power of student financial aid to influence students' attendance decisions. Jackson states that attending a better school, having a more prosperous family, or being more academically able all increase the likelihood a student will attend college. Jackson also indicates colleges offering financial aid are more likely to attract students than other equivalent expensive colleges. Jackson also notes that few students apply to both two and four-year colleges, or to colleges with very different tuitions. The effect of financial aid on college choice, according to Jackson, is greatest for North Central residents and smallest for Southerners. Jackson also found that low socio-economic status students respond more strongly to the effect of financial aid, and respond much more favorably to aid offers than other students. Jackson concludes that the award of financial aid is more important than the actual amount of aid. The author found that an applicant offered aid at the college of his or her choice was 8.5 percentage points more likely to attend college than other similar applicants to similar colleges who were not offered aid.

Rosenfeld (1980) conducted a study to examine the post-secondary education decision-making process with emphasis on the effect of student and family characteristics and attitudes. The author states cost does appear to be more important for low income than high

income students. However, the author found cost was not usually one of the main factors taken into account in determining choice decisions. The study indicated financial aid was only occasionally important to some students.

Hearn (1980) states that despite massive increases in student aid, quantitative evidence has not revealed any substantially increased participation (access) by students from low income families. The conclusion that student aid has been ineffective in increasing low income student participation in higher education is supported by Hook (1982). Hook states that increased federal spending for student aid has done little to improve disadvantaged youths' access to higher education and argues that only minor enrollment pattern changes have occurred and that these could not be readily attributable to aid increases.

Hearn (1980) comments that differences in higher education attendance rates among socio-economic levels are due primarily to motivation and attitudinal differences rather than differences in parental ability to pay. Jackson (1978) and Thomas, Alexander, and Eckland (1979) also concur. Hearn (1980) states that financial aid is only one of many factors involved in enrollment decisions and that there is little aid policy itself that can influence enrollment.

Hearn (1980) in assessing the future of higher education in light of financial aid policies, tuition costs, and enrollment patterns, found only earlier notification of students about the various financial aid programs and the prospects for receiving such aid, appeared to hold promise for significant enrollment increases

for higher education. According to Hearn, this is based upon evidence suggesting that important, basic decisions concerning educational aspirations are, for the most part, made earlier in the high school years. Hook (1982) says the expansion of student aid programs during the 1970's simply made it easier for parents and students to meet college costs without increasing low income student enrollments.

Hyde (1978) in a study of the effect of tuition and financial aid on access and choice in post-secondary education presented four general findings:

1. A large proportion of surveyed aid recipients stated they would not attend without aid.
2. Grants were more effective than loans or work-study programs in increasing enrollments.
3. Lowering tuition was not an efficient mechanism for achieving access and choice. Instead, tuition subsidies and student aid to low and middle income students were a more efficient use of financial resources.
4. The awarding of aid was more important than the amount of aid.

Magarrel (1982) states that tuitions have increased and federal aids to students have decreased, resulting in private higher education institutions reporting a major loss of lower income students. McPherson (1978) states that while there is a negative relationship between price and access, tuition is only one of the determining factors. McPherson states that tuition is generally overridden by motivational and other personal characteristics and

family background factors. The author states, however, that a universal finding among similar studies, indicates a \$100 decrease in tuition (occurring in all colleges simultaneously), would lead to about a one percentage point increase in the overall enrollment rate in post-secondary education.

McPherson (1978) says that for every ten students who are induced to enroll in the public sector by the tuition differences between the two sectors, between four to seven of them would otherwise have attended a private institution. The tendency to substitute public for private enrollment with the widening of the tuition gap is stronger among low income students. The author indicates that while high income students are less price sensitive than low income students in deciding whether to attend college, they do remain somewhat sensitive to price in deciding where to go to college. McPherson concludes by saying cutting tuition in half, for example, would only raise overall enrollment by 15 percent. The author indicates, therefore, that attaining high enrollments by keeping tuition rates low across the board is a very expensive way to achieve access goals. McPherson says a less expensive way to maintain high college enrollments or increase enrollments is to target low tuition (or student aid) to those groups that are most sensitive to price in their enrollment decisions; namely, low income students. This finding implies that subsidies should be targeted at low income students and suggests that keeping tuition low at public institutions is hard to defend on access grounds.

Clark and Fenske (1981) also discuss that while financial aid is a critical factor in the public versus private enrollment balance,

financial inducements make a difference for only a small number of students. According to Alexander, Eckland, and Thomas (1979), a student's ability to pay in large part determines their access to higher education. Rosenfeld (1980) reports on a 1979 study which found that 85 percent of the parents expected to support their children's education. Ninety-seven percent of the high socio-economic parents responded this way and 73 percent of the low socio-economic parents responded this way. However, even though a large proportion responded positively, less than one-half of the parents had made financial plans for this expense (exception was the second highest socio-economic level).

Federal government policies of reducing grants and increasing students' reliance on loans may necessitate a greater contribution on the part of the family according to Alexander, Eckland, and Thomas (1979). The authors indicate access may be increasingly determined by a family's ability to pay.

Ellickson, White, and Richard (1982) also identify various factors that affect students' decisions regarding whether or not to attend post-secondary education, which institutions to apply to, and which institutions to attend. The authors concur there are five factors identified by authors such as Alexander, Eckland, and Thomas (1979), Jackson (1978), and Rosenfeld (1980). Attitudinal, educational, social, geographical, and financial factors effect college access and choice decisions.

According to the authors, a student's predisposition towards college, his/her motivation, and level of educational expectations and aspirations influences decisions. Students favorably disposed

to college, select colleges they are likely to attend. Rosenfeld (1980) states that 14 percent of the variance in applications to colleges and 31 percent of the variance in college attendance can be explained by aspirations and expectations.

Alexander, Eckland, and Thomas (1979); Jackson (1978); Munday (1976); and Rosenfeld (1980) discussed the educational variable. The authors concur it is generally agreed that academic ability does have a large influence on whether and where a student pursues post-secondary education. Academic ability, according to Rosenfeld (1980), definitely restricts many students' choice of institutions. Students with high educational development backgrounds tend to apply and enroll at institutions where they perceive other students as being similar in academic ability. In addition, they are more likely to attend high-cost colleges. Jackson (1978) concurs and states that these students, especially, intend to enroll at prestigious, academically rigorous, and expensive colleges. The authors conclude that academic ability does have a great impact on students' educational plans and activities. Factors, such as high college entrance test scores, good high school records, a college preparatory high school program, good high school academic ratings, and good study habits, increase the likelihood of students pursuing post-secondary education.

A third factor affecting access and choice is the social factor. Ellickson, White, and Richard (1982) state the social factors consist of race, sex, religious affiliation, friends' expectations, aspirations, and family background variables, such as parental occupation, education, expectations, and encouragement.

Suter and Johnson (1971) indicate black high school graduates were about as likely to enroll at an institution of higher learning as whites. The authors state racial differences in enrollment patterns in higher education may be due to socio-economic status. Ellickson, White, and Richard (1982) state the effects of social class on higher education attendance and success are greater than sex and/or racial differences. Rosenfeld (1980) reported that students whose father had not completed college were two and a half times more likely to attend college than those whose fathers had not completed high school. Ellickson, White, and Richard reported the nature of family influences tends to become complex and that four types of family influences may affect students' post-secondary educational decisions: genetic, general cultural values and role modeling, direct encouragement, and financial assistance.

Geographic nearness or proximity is a fourth factor that affects access and choice. Rosenfeld (1980) points out that proximity can affect access and choice in at least two ways; knowledge and cost. The author indicates students may be more familiar with schools in their surrounding area and, therefore, these schools would be more "available" to them. Cost refers to the usually higher cost of a distant college or university's tuition, perhaps because of out-of-state tuition expenses or because of higher commuting costs.

Ellickson, White, and Richard (1982) indicated caution should be used when making interpretations concerning the correlation between college attendance and geographical proximity. While the general conclusion has been that proximity is not a particularly important factor when all else is taken into account, there are important

exceptions. The authors state that when all other relevant factors are controlled for, distance from home is probably still strongly related to college choice.

A fifth factor affecting access and choice is financial. Family income, financial aid, and the cost of the institution are specific variables included in the financial factor. In terms of family income, Rosenfeld (1980) states the general conclusion is that the direct effects of the financial factor on various stages in educational decision making are small. Jackson (1978) also found cost not to be a significant factor affecting access, and concluded that cost by itself had no consistent effect on whether students attend college once the decision of how expensive a college to which they may apply has been made, and that if cost has any significant effect, it facilitates where to apply, rather than where to attend. Munday (1976) reported findings consistent with Jackson. In particular, little relationship was found between choice, college cost, and family income for either financial aid applicants or non-applicants.

Welki and Navratil (1987) conducted a study to examine how perceived differences and characteristics between potential matriculants' top choices affect the probability of matriculation. Respondents included matriculants and non-matriculants. The questionnaire was sent to all applicants who were accepted for admission to John Carol University for Fall 1984-85 and asked respondents to compare John Carol University with the most relevant alternative college on 27 attributes, including cost and financial aid. Results revealed significant differences between the

perceptions of matriculants to John Carol University and those who chose to go elsewhere.

Analysis of the data indicated parental preference, cost and financial aid opportunities, campus location, student-faculty ratio, and academic programs were among the most important influences. Tuition during the year had risen by 12 percent, yet applicants' perception of costs did not change, suggesting that an increase in financial aid through scholarships during the same time period may have offset higher tuition costs.

McRee and Cockriel (1986) discussed the award of no-need or merit scholarships and the effect on college choice. The authors indicated no-need scholarships are increasingly being used to attract students, provide additional aid, and to recruit students who are academically and/or athletically talented. McRee and Cockriel state that while no-need scholarships appeared not to be a key factor in the decision to matriculate at a particular institution, their availability may become important in the ability of students to successfully complete college. The authors state that no-need scholarships appeared to enhance the academic reputation of institutions, thereby helping improve their academic reputation so that a no-need award did become a factor in initial and final school selection decisions by students and their parents.

The Carnegie Foundation for the Advancement of Teaching (1986) conducted a nation-wide survey in 1985 of 1,000 high school seniors and their parents in order to learn more about the process of college choice. The Carnegie Foundation found college attendance had become one of the principal strategies used by American families

to sustain or improve the social and economic position of their children and to enhance the quality of their childrens' lives. The Foundation's survey suggests that parental desire for children to attend college is strong, despite the high price tag. Eighty percent of those polled in the survey wanted their children to attend college the next year. Eighty-two percent of the college-bound seniors surveyed reported their parents influenced their decision to attend post-secondary education.

The Carnegie Foundation (1986) asked parents which characteristics they looked for in assessing colleges. Parents valued institutions with good academic reputations. The Carnegie Foundation survey concluded, however, that what contributes to a college's academic reputation remains an elusive question. Parents and students in the survey were almost equally divided on the effect of class size. They were also not particularly convinced that a better education could be obtained from colleges enrolling students from many states or foreign countries; nor were students and parents particularly supportive of institutions offering new and unusual programs. Both students and parents did agree in survey findings that gaining a well-rounded education and learning more about things that interest a student were important reasons for going to college.

According to the results of the survey, whatever college a student selects, he or she seldom makes the decision alone. The college choice involves dialogue between young people, their parents, counselors, teachers, friends, and college admissions representatives. The data from the survey indicates that in the

college choice process, parents' voices are most influential in the decision to go to college in the first place, and again in the final decision about which college to attend. The Carnegie Foundation (1986) survey found the individuals offering the most influence in selecting a college, as reported by high school seniors in 1985, were parents at 51 percent, friends at 23 percent, counselors at 16 percent, and teachers at 10 percent.

Sanders (1986) reported Washington State University's Admissions Office conducted a research study during the spring of 1984. The study was done within the state of Washington's twelfth grade marketplace through a mail survey. Three groups were surveyed: students, parents, and counselors. Eight hundred Washington high school seniors were randomly selected from the Admissions Office's prospective student file. The profile of students selected approximated the composition of the university's three previous freshman classes relative to gender, ethnic group, county of residence within the state, and proposed major. Each student had a self-reported grade point average of at least 2.50, and 100 additional students with the same criteria mix were selected to have their parents included in the research. One counselor from each of Washington's then 342 high schools was also included in the sample. The following response rates were achieved: students 73 percent, parents 66 percent, counselors 89 percent, overall 72 percent.

Sanders (1986) indicated two major conclusions were drawn from the survey's data. First, a high correlation existed between students' and parents' perceptions that the college experience was essentially a four-year value-added experience in preparation for

employment after graduation. The data indicated a significant variance between high school counselors' opinions as to why students select colleges as compared to the opinions of students and parents. Results from the survey indicated that students and parents ranked employment opportunities after graduation as the top choice factor. In contrast, counselors ranking of factors important in college choice were number one, cost of attendance (parents ranked cost of attendance three of eight factors); students ranked cost of attendance five of eight factors; counselors ranked employment opportunities after graduation seven of eight factors. Sanders concluded counselors in Washington State were in need of information related to the factors students and parents consider most significant in college and university choice decisions.

Litten, Sullivan, and Brodigan (1983) and MacDermott, Conn, and Owen (1987) state the development of students' preferences for college access and choice closely parallel those of their parents. Manski and Wise (1983) in College Choice in America state the likelihood a student will apply to a four-year college or university increases proportionately with the quality of his/her high school rank, and SAT scores. Also, parents' education level, and to a lesser extent parents income level, affects the development of students' preferences. Students whose parents are highly educated are much more likely to apply to college than those whose parents are less well educated. The authors also found that parental education level also proved to be important in determining preferences for particular institutions.

MacDermott, Conn, and Owen (1987) indicate information focusing on the area of parental influence and college choice is somewhat limited. The authors conducted a study to identify the similarities and differences in characteristics of first and second generation college attenders and their parents as they approach the college selection process. The study was conducted at the University of Akron in Ohio, which has an enrollment of approximately 26,000 students. Two written questionnaires were developed, one for students and one for parents. Both groups were asked the same questions in order to compare responses. In April 1985, 1,500 individual questionnaires were sent to parents and students who were seniors during the 1984-85 academic year. The response rate for the survey was 35.4 percent. Results of the study indicated that when selecting a college, parents who did not attend college were more concerned about cost, academic reputation, and personal attention than were their sons or daughters. On the other hand, students were more concerned about the availability of social activities than their parents. Strong athletic programs were more important to students than their parents.

The authors concluded that two-year schools, which were not the common choice of second generation attenders, may find it increasingly difficult to recruit traditional-aged students. Two-year institutions may find greater potential within the adult non-traditional population. According to MacDermott, Conn, and Owen (1987), area receptions and on-campus evening and weekend programs may be more favorable choice strategies for first generation families and certainly would not be viewed negatively by second

generation families. The authors cite a point of interest in the study is that data seems to indicate parents allow a freer range of choice as the college selection process advances. Parents appeared to act primarily as a veto, permitting the student to make a college choice, which may not be their own first choice but is acceptable nonetheless.

A study by Buford (1987) also examined the role of parents in the college selection process. Buford's study examined the parent's role in the college selection process at a small, private, liberal arts college. Data was gathered from parents of freshman about the information they needed to make informed decisions about which school their child would attend. The questionnaire was mailed to a stratified, random sample of parents of 300 new freshman during the fall of 1986 with a response rate of 58 percent. Results of the study included the following:

1. Almost all parents were involved to some degree in the college selection process.
2. The majority of parents were involved in every aspect of the college decision process.
3. The parents "ideal" was a school with an enrollment of 3,999, within 100-200 miles of their home, and costing between \$5,000 and \$9,999.
4. Financial aid was not a deciding factor for the majority of parents.

Stewart, Johnson, and Eberly (1987) conducted a study to determine the primary influences including the high school counselor upon college choice. The authors found the reputation of the

institution and/or the particular academic program of interest to the student to be the primary influence upon the student's college choice decision. Other influences identified were the social climate and people including parents, counselors, teachers, and friends. The study was conducted during the summer of 1985. The sample consisted of 3,708 freshman who responded. The response rate was 55 percent of the freshman class.

Results of the Stewart, Johnson and Eberly (1987) study indicated students used several resources to explore college choices. For both males and females, the authors found the most often identified resources were college students, friends, and high school counselors. Nearly 70 percent of the students surveyed said they used these people as resources. The counselor was identified as a resource more often than parents or high school teachers. Mass media provided information to less than 20 percent of the respondents. Data also indicated greater use of counselors by students with lower ACT scores and less by students with high scores. Seventy-six percent of the students with ACT scores between 0-15 used a high school counselor for college information, compared with 68 percent of students with scores between 26 and 36. High ACT scoring students were slightly more likely to use college publications than those with low test scores. The study indicated that of the nine leading information sources used by students (college students, friends, high school counselor, college publications, family, alumni, high school teacher, newspaper, and television), information gained from college students, friends, and the high school counselor were the three most frequently reported by

all sub-groups studied (females and males, blacks and whites, and students in each of four ACT score categories).

Stewart, Johnson, and Eberly (1987) indicated the information source most frequently used by black males and females were high school counselors. The authors of the study concluded there were implications for school counselors. First, counselors should be aware of the relatively brief time in the life of students from their first exploration of colleges to the final choice of institution. Most of the choice activity is confined to parts of the junior and senior years of high school. Second, counselors are likely to be a more important information source for black and low SAT score students as opposed to white and high SAT score students.

Chapman, O'Brien, and DeMasi (1987) state the high school counselor is important as one of the earliest possible influencers of college choice. The authors concur with Stewart, Johnson, and Eberly (1987) about the importance of a high school counselor in the case of students with low income and/or low SAT scores. The authors also state related research (Hossler, 1985; Litten, 1982) indicates students from low income families, black students, and students who have parents with less education are more likely to rely on the high school counselor for advice. The authors also indicate, however, the effectiveness of the school counselor in the college advising or information role has been questioned. There appears to be some evidence that school counselors are not always able to provide current or accurate information on colleges and minority and low income students may receive less of the counselor's time and attention than other students (Tillery, 1973).

Chapman, O'Brien, and DeMasi (1987) also cite evidence that minority students tend to make their college decisions later than their non-minority classmates. Consequently, the timing of college information may not be appropriate, and the need to have considerable individualized financial aid advising, may cause time constraints on high school counselors. The authors' study investigated the amount of college advising students from low income backgrounds received from their high school counselors, the students' perceptions of the counselors' effectiveness in the college advising process, and the usefulness of the information received. The study was conducted in December 1985. One thousand students who had been first-time applicants to the New York State Tuition Assistance program during 1984 were contacted by mail and asked to complete the student survey on high school guidance counseling. The study was done with a random sample selected from all 18-22 year old first-time aid applicants. Usable responses were received from 428 students (43% response rate).

Results of the Chapman, O'Brien, and DeMasi (1987) study indicated on the average, high school students received three to five contacts from a high school counselor during their last two years of high school. Twenty percent of the students reported they never discussed college plans with their high school counselor. In addition, 28 percent reported they had never discussed financial aid with their counselor. Another 50 percent sought assistance regarding financial aid no more than twice during their junior and senior years of high school. The authors of the study found this result surprising since everyone in the sample group applied for

admission to a post-secondary institution and all members of the sample were applicants to a financial aid program targeted at low income students.

The results of the study indicated the student/counselor contact that did occur most often was initiated by the counselor. Only 25 percent of the students reported initiating a contact with the high school counselor. Results of the study also indicated that students judged the information they received from high school counselors to be among the least useful of sources. Teachers, parents, and college admissions officers were all seen as providing more useful information than the high school counselor. Results indicated students did not perceive counselors as effective in providing college or financial aid information. These findings did not differ dramatically by race or family income, but minority students reported less counselor contact for financial advising, while lower income students were less positive about the financial advising they received. Chapman, O'Brien, and DeMasi (1987) state a key finding from the study was that the high school counselor does not play a major role in assisting students in college selection. The authors conclude that high school counselors may over estimate their effectiveness in college advising.

The student college choice process is complex. Researchers have cited multiple factors that influence the process. A number of researchers have developed models of college choice. A majority of the models portray the college choice process as a three stage or three phase process. Interwoven or underlying the stages of a college choice model are social, financial, geographical, academic

aptitude, and parental background variables. These background variables appear to impact the college choice process at each of the three stages.

College Choice Models

Several models of college choice have been developed (D. Chapman, 1981; Hossler, 1984, 1985, 1986; Litten, 1982). The authors concur the process is developmental with three phases. Researchers have identified that during the first phase, colleges have little impact on prospective students. Hossler (1985) characterizes the first phase as developmental, in which the students decide whether or not to pursue post-secondary education. A review of the literature cited earlier indicates a number of factors are important at this stage, including socio-economic status, parental educational background, family income, and academic aptitude. Hossler (1985) developed a model of college choice which is a synthesis of models developed by others, such as Chapman (1981) and Litten (1982). In the developmental phase, students who have background characteristics conducive to pursuing post-secondary education begin to gather information about educational options beyond high school. Students who enter the first or predisposition phase proceed to the second or search phase (Chapman, 1981).

According to Hossler (1985), during the second or search phase, colleges and universities can have the greatest impact on influencing a student's perception of an institution's quality and inclusion in the choice set. Chapman (1981) describes the search phase as one involving learning about and identifying appropriate college attributes to consider. According to Chapman and Hossler,

during the search phase students formulate a college choice set. During the search phase, several sources provide information on colleges and universities: parents, high school counselors, peers, etc. During the search phase, students examine information from a variety of sources to determine their "fit" with a particular college or university. The institutions that are assembled into a college choice set are determined by background characteristics of the student, geographical location of the institution, financial aid or scholarship availability, and educational program offerings.

Earlier in the review of the literature, researchers such as Litten, Sullivan, and Brodigan (1983), MacDermott, Conn, and Owen (1987), and Manski and Wise (1983) cited the importance of parental background and influence on college choice. In general, parents appear to be very influential throughout the college choice process; high school counselors, friends, and college admissions representatives less so. Financial variables appear not to be a major factor in the selection of an institution to form a choice set (Fenske and Clark, 1981; McPherson, 1978; and Rosenfeld, 1980).

Other authors such as McRee and Cockriel (1986) and Welki and Navratil (1987) found that financial aid in the form of a scholarship did help to build an institution's reputation or image as a quality institution. The authors state reputation and perceived academic quality are important factors to both students and parents in the selection of a college and university to be included in choice sets. In addition, several authors such as Chapman (1981) found that the types of institutions available for the student to consider and the communication strategies utilized by

these institutions influenced the development of choice sets. The size, price, academic programs, distance, and campus environment of the institutions in a student's choice set ultimately affect the choice decision, according to Chapman (1981).

Hossler (1985) states the third phase is choice. Hossler says a decision is made of which college to attend from among the institutions in the college choice set. According to the author, during the third phase, as in phases one and two, student background characteristics and variables such as geographical considerations, influence the actual choice decision. The choice set is the group of institutions students will actually apply to. During the choice phase, the student makes a decision as to which institution from among those in the choice set the student will actually enter. Hossler suggests that colleges and universities have little impact on the ultimate choice decision during this final third stage. Following is an elaboration of the literature on the three phases of the college choice model.

Predisposition Phase

Many studies of the college choice process (D. Chapman, 1981; Litten, 1982; Litten, Sullivan, and Brodigan, 1983; Manski and Wise, 1982; and Tierney, 1980) examined how student background characteristics interact with student expectations of whether to attend college or not, and which college to attend.

Hossler and Gallagher (1987) state the predisposition phase has received the least attention. The authors indicate, however, that certain background characteristics do appear to be positively correlated with college attendance and are cumulative in their

effects upon student college choice. The authors concur with other major writers in the field that the important background characteristics are socio-economic status, academic ability, parental attitude and encouragement, and peers planning to attend college. Hossler and Gallagher cite related studies by Hearn (1984) and Willingham (1970) that indicated student involvement in high school leadership positions, artistic and athletic accomplishment, participating in student government, drama, and journalism clubs, are related to choosing to attend college. Astin (1985) concurs that involvement in high school has an effect on students being predisposed to attend college.

Willingham (1970) and Bowman and Tinto (1972) also concluded that proximity to a college campus affects the predisposition to attend an institution of higher education. The authors found students who live close to a campus are more likely to enroll in an institution of higher education, although not necessarily the institution they live the nearest. The authors found that along with proximity, high school students living in urban and suburban areas were more likely to attend college than students from rural areas.

The background characteristics appear to be cumulative, exerting their influence over a period of time. A background characteristic identified as important was socio-economic status (Bishop, 1977; Manski and Wise, 1983; Peters, 1977; Trent, 1970). Peters (1977) found that high socio-economic status students are four times more likely to attend college than low socio-economic status students. Writers describing the predisposition phase concur that as

socio-economic status rises so does the likelihood of going to college.

A second background characteristic is the predisposition phase which impacts students going to college is parental influence. Buford (1981) reported a direct relationship between the amount of parental encouragement for attending college and actual college attendance. In addition, the author found that as parental encouragement rises, the likelihood increases of attending a four-year college opposed to a two-year college.

Litten, Sullivan, and Brodigan's (1983) study also noted the importance of parents in the college choice process. Murphy (1981), in studying the college choice process, concurs with other writers in the field. In a study, the author found that approximately 50 percent of both parents and students indicated that parents first initiated the idea of going to college.

A third background characteristic authors identified as important to the college choice process, along with socio-economic status and parental influence, is the academic ability and educational experiences of the student. Kohn, Manski, and Mundel (1972), Manski and Wise (1983), Peters (1977), and Trent (1970) concur that as student academic ability rises, so, too, does the likelihood of attending college. Alexander (1979), Harnqvist (1977), and Kolstad (1981) state the quality of a student's educational experience affects the college choice process, although not to the extent of parental influence, academic ability, and socio-economic status. The authors also found that students

attending high schools considered to be of a higher quality level, were more likely to attend college.

Researchers studying the predisposition phase have attempted to determine when students decide whether or not to consider attending college. Data from a study conducted by Murphy (1981) indicated that 70 percent of a sample group of high school students first considered going to college when they were attending grade school. Parents included in the same study, however, differed. Most of the parents estimated their children first considered going to college as a freshman or sophomore in high school.

Another study related to the predisposition phase was conducted by Ash (1987). The purpose of the Ash study was to identify influential factors in the decision-making process of first-time college students who matriculated at a large, Southeastern university and to analyze the relationships between college choice factors and selected biographic and demographic characteristics. The questionnaire focused on personal, family, and college choice influence items. The subjects were 263 students accepted for Fall 1986 who participated in a new student orientation program at Georgia State University. Analysis of data included factor analysis and analysis of variance. In the questionnaire, students were asked to rank 12 college choice influence items affecting their decision to attend Georgia State University in the order of importance. The findings of the study indicated the influences of college choice items and college choice factors vary according to selected biographic and demographic characteristics of the sample.

Flag (1985) concurs with other writers that parents are influential or a key variable in the predisposition phase. Flag conducted a study to identify the influences on black men to attend historically black or white institutions in middle Tennessee. Results of the study suggested black mothers were most significant in influencing their sons to go to college. Although nearly half of the participants' mothers and fathers had graduated from college, the percentage of fathers who attended but did not graduate doubled that of mothers. Contrary to other research findings, black fathers were considered second most influential in the participant's decision to go to college.

Flag (1985) states that black parents are the key influential factor, rather than other individuals and/or recruitment strategies in motivating sons to go to college. The author concludes from the study that educational background and social class interfaces with the college choice process for a preponderance of the men in the study. Findings from the Flag study indicate that although cost, size, location, and atmosphere of the college or university are important in its inclusion in the choice set and/or as the institution of choice, the basis for motivation to attend college in the predisposition phase stems from the home, regardless of the parents' educational background.

Stahler (1986) conducted a study of college applicants at different levels in the admissions process. The study was conducted at Ottberbein College, a small, moderately selective, private liberal arts college. Research questions of the study were:

1. Are there differences between inquiring non-applicants, non-matriculants, and matriculants according to geographic, academic, or socio-economic variables?
2. Do prospective students who inquire but not apply differ according to geographic, academic, or socio-economic variables?
3. Do prospective students who choose not to matriculate differ according to geographic, academic, or socio-economic variables?
4. Do prospective students who matriculate differ according to geographic, academic, or socio-economic variables?

Surveys were distributed to students in the 1984-85 admitted file for the college. Conclusions of the Stahler study support previous findings of Zemsky and Oedel (1983) regarding the college choice process. Results indicated that geographic, academic, and socio-economic variables were of great importance to prospective students in determining college choice. Differences between non-matriculants and matriculants were primarily related to academic and socio-economic variables, whereas inquiring non-applicants differed according to the geographic variables from non-matriculants and matriculants.

Hossler (1985) states that it appears likely a combination of student background characteristics makes it more likely for certain students to enter the predisposition phase. Hossler says the predisposition phase can begin as early as the freshman year in high school, and in the majority of cases, by the senior year when students predisposed to college enter the second or search phase.

Search Phase

Hossler (1985) states students predisposed to attending college enter the second or search phase. Hossler discusses two groups of students entering the search phase. The first group is described as the "whiches." The "whiches" are students definitely planning to enter a college or university but are deciding which institution to attend. The second group is referred to as "whethers," who are deciding whether to attend college or to decide on a non-educational option. Hossler states it is during the search phase that the interactive nature of the college choice process begins, as potential matriculants seek more information about colleges and universities.

Hossler and Gallagher (1987) concur that potential college matriculants begin to seek information about colleges and universities to develop college choice sets. D. Chapman (1981) describes the search phase as one in which students are searching for institutions at the same time institutions are searching for students.

D. Chapman (1981) suggests that college communication strategies such as campus visits and written information have the most significant impact on determining an institution's inclusion in the student's choice set of colleges and universities. Hossler (1985) indicates it is in the search phase that students develop a college choice set. Litten, Sullivan, and Brodigan (1983), Tierney (1980), and Zemsky and Oedel (1983) concur there appears to be some logic in the way students develop a college choice set. However, the authors state it has not been determined what the actual process is for

developing the choice set. Litten, Sullivan, and Brodigan (1983) report that high ability students tend to conduct a more sophisticated process of developing a college choice set than low ability students. Zemsky and Oedel (1983) concur that as SAT scores and income level of students fall, they narrow the geographical range and the quality of institutions to consider. Litten (1982) in a study of the search phase found that black students, students from low incomes families, or students of parents with little education, typically conduct searches which take longer and are less efficient. Litten also found these students to be more likely to rely on high school counselors for advice.

During the second or search phase when students are gathering information about colleges and developing a college choice set, Hossler (1985) indicates students typically lack accurate information about the cost of attendance at colleges they are considering. As a result, students exclude some institutions from the choice set on the basis of list price. Packer (1980) also found students who might be eligible for financial aid did not apply because they did not believe they would be eligible. Hossler (1985) indicates a pervasive problem during the second or search phase is that many students needlessly limit the number and types of institutions in the choice set.

Hossler (1985) states the college choice set may range from one institution to several. According to Hossler, the lack of a comprehensive data base on student applications makes it difficult to study the college choice set patterns of students. Hossler states that although it appears conclusive that the number of

students submitting multiple applications indicates an increase in applying to several institutions, the extent of the increase is unknown.

In a study related to the search phase of the college choice process, Niemi (1986) conducted a study during March 1985 of 140 randomly-selected seniors in four northeastern Minnesota high schools. The high school students were surveyed to determine which of 29 potential factors persuaded them to attend local community colleges after high school. Niemi found the following variables, in descending order, to be statistically significant: educational goal, general knowledge about community colleges, possession of community college catalogs, knowledge of community college drop-outs, parental interests, expectation of financial assistance from the college, the student's drive for independence, proximity to the community college, and recruiting efforts by community college personnel.

Variables found not to be significant in the Niemi (1986) study were high school experiences, perception of the quality of community college education, perception of non-academic features at community colleges, form of the questionnaire used, perception of the quality of community college education, perception of community college atmosphere, position on social issues, gender, devotion to demographic principles, outlook on life, fixity of post-high school plans, reaction to the survey, knowledge of courses offered by community colleges, news media as sources of information about community colleges, perception of community college prestige, community college alumni in the immediate family, number of colleges

applied to, number of visits to the community college campuses, recommendations of high school personnel, peer influences, and socio-economic status.

The search phase has been identified by researchers, such as Hossler (1985) and others, as the stage in which institutions of higher education can have the most impact. Grozs (1987) conducted a study to investigate the relative influence of the attributes of North Dakota State University-Bottineau on student decisions to make a choice decision to attend the institution. The study also measured the effectiveness of various methods used to provide information to students about the university. The population of the Grozs study was the 1986 freshman class. A questionnaire was administered to the freshman class in either a classroom setting or in a mailed request and mailed response procedure.

Results of the investigation indicated that programs of study or majors offered at the university strongly influenced college choice decisions for both males and females. Conversely, housing and athletic programs appeared to have little influence on the college choice decision. Results of the study also indicated printed sources of information designed to have a persuasive effect on individual prospective students were more influential recruitment tools than were printed sources aimed at groups of prospective students at large. Faculty members also appeared to have a high, persuasive effect on student choice decisions. The recruitment techniques of direct mail and campus tours were also effective in attracting students to the university campus. The study found some differences between male and female students. The college catalog,

high school counselor, and scholarship offers appear to have a greater persuasive effect on female than on male students. Male students appear to be more effectively influenced by their parents than female students.

Kress (1987) conducted a study to determine salient factors influencing college selection among 11th and 12th grade high school students. Kress conducted the study to determine:

1. Which persons were most influential in the college search and choice process?
2. Which environmental factors (campus location, size, and distance from home) were most important in the college search and choice process?
3. Which sources of information provided by the college to the prospective student were most important in the college search and choice process?
4. Which image factors projected by the college were most influential in the search and choice stages?

The population for the study consisted of 119 students. The questionnaire was administered in May and June, 1987. Results of the study indicated:

1. Parents of 11th and 12th grade high school students, especially mothers, were the most influential people in the college choice process.
2. Students indicated a preference for attending a campus in a suburban setting, less than 100 miles from home, with an enrollment of more than 1,000 students.

3. Most influential or important college-generated sources of information were first, the college visit, and second, the college admissions counselors.
4. Career opportunities after graduation from college proved to be the most valuable image projected by the college in the phases of search and choice.

Authors such as D. Chapman (1981), Hossler (1985), and Manski and Wise (1983) have identified that most students predisposed to attending college begin the search phase somewhere between elementary school and their junior and senior year. Stewart reported the results of a study of 3,708 college freshman. Results of the study reveal that most respondents began college planning before their senior year in high school and had made their final choice decision during their senior year. Data from the study indicated respondents identified the most important factors for an institution being included in the choice set were the academic reputation of the college, the quality of available programs, costs, faculty reputation, and friendliness of the school. Some differences between males and females were found. Males and females differed on 10 of 15 factors. Blacks and whites differed on 4 of 15 factors. The most frequently cited influential information sources by males, females, blacks, and whites were college students, friends, and high school counselors. The study confirms a study by Chapman, O'Brien, and DeMasi (1987) that the information source most frequently used by blacks during the search phase were high school counselors.

In another study related to the search phase, Sevier (1986) conducted an investigation to examine the factors that influenced college choice with specific emphasis on how information about colleges was gathered and ordered by students and parents during the search phase of the choice process. Key findings of the study included:

1. The institution's image and reputation is an influence factor.
2. Parents and friends play an important role in the search and college choice process.
3. The influence of the Student Search Service is pervasive.
4. The effects of recruitment strategies and activities, particularly those involving print mediums, are cumulative.
5. College costs and financial aid are confusing and do impact the choice process.
6. The influence of the high school guidance counselor declined and the home emerged as the locus for the college choice decision.

Greer (1987) conducted a study to explore the factors that determine college choice among freshman who had made a choice decision to attend a small college. The researcher distributed a student questionnaire and a parent questionnaire. The sample for the survey consisted of 530 student respondents and the parents of the same 530 student respondents. Students were surveyed during an actual visit to the campus. The 530 parents were surveyed by telephone. Results of the study suggested that parents had little

influence on students' college choice decisions; however, results indicated that:

1. The student market for small colleges is close to home.
2. A small college is usually not a first choice.
3. The reputation of the college is important, but other factors are also important.

Greer concluded that small "invisible" colleges were extremely vulnerable to enrollment shifts. The results of the Greer study would appear to contradict studies conducted by other researchers, such as Murphy (1981), and Litten, Sullivan, and Brodigan (1983), which indicated parents were very influential in the college choice process.

Smith (1988) conducted a study related to the search phase of the college decision process. The study was conducted to investigate the college decisions of older and younger two-year and four-year students in order to determine: 1) whether different types of students make different choices; 2) how college choices are best predicted; and 3) how cognitive heuristics availability and representativeness help explain college choice. One hundred twenty-five students participated in the study, including 85 two-year college students and 40 four-year college students. All four-year students were traditional aged (18-24 years old) and of the two-year students, 40 were traditional college age and 45 were non-traditional (25 years old or older).

Results of the study indicated two-year and four-year students make significantly different types of college choices. The college choices of younger two-year and four-year students could be

distinguished more effectively by a set of choice factors constructed from college attributes students rated important rather than on the basis of students' high school GPA or socio-economic status. The author reported results of the study indicated students knew little about the colleges/universities they had made a choice decision to attend. When making decisions, data indicated students identified as important, factors about which they did not have information and did not include factors about which they did have information. Smith (1988) stated the results of the experiment strongly supports the notion that students use heuristics availability and representativeness when making decisions about colleges. Students' judgments about colleges appear to be influenced by their perceived similarity to students in the college description and by the vividness of those descriptions. Smith concluded that representativeness, in particular, had a highly significant effect on students likelihood of inquiry, application, and attendance.

The review of the literature indicated students who were predisposed towards attending college move on to the search phase. During the search phase, students develop a choice set of institutions to consider. Hossler (1985) states the search phase is the point at which institutions can exert the most influence. Following the second or search phase, students move to the third phase of the college choice process.

Choice Phase

Hossler (1985) states that at the beginning of the choice phase, the choice set developed during phase two is evaluated. During the

choice phase, according to Hossler, students narrow their choice to a specific institution to enter. According to Hossler and Gallagher (1987), during the third choice phase, the institutions in the student's choice set are evaluated, enabling a student to narrow the choice set to a specific institution to enter. The authors state that as the student makes a decision of which institution to attend, the student's preferences, characteristics of the college or university, and the recruitment activities appear to determine the outcome. The authors describe merit awards and college communication strategies as being part of the college courtship procedures.

Freeman (1984) found that non-aid based activities, such as letters from the president, on-campus banquets, and special certificates, did appear to influence the choice phase. Freeman concluded that non-aid based courtship procedures may be as important as the actual financial aid award. Geller (1982) concurred and reported that students have a clear preference for personalized, written material and want to hear in a personalized way from faculty teaching in the student's area of academic interest. Hossler and Gallagher (1987) discuss implications from studying the college choice process:

At the institutional level, admissions, marketing, and financial aid decision-makers should carefully analyze their recruitment activities. Professionals in these areas have developed an intuitive sense of what works best for them, however, many times admissions and marketing personnel view all of their recruitment activities as influencing the selection of one institution over another. This means that they are directing their efforts at the choice phase, when in fact, the most critical phase is the search phase. The best way for institutions to expand their applicant pool is to reach students at the search phase. (p. 218)

The authors suggest institutions study their practice of early recruitment of sophomores and juniors in high school. Hossler and Gallagher (1987) state recruiting at the sophomore and junior level may be effective only for selective institutions because high-ability students tend to enter the search phase earlier than students of average ability. The authors suggest that for institutions typically attracting students of average ability, early recruitment may not be an effective strategy. The authors suggest efforts be targeted at making high school students aware of the institution so the institution may be considered as an option for inclusion in the college choice set developed during the search phase.

During the third or choice phase, Hossler and Gallagher (1987) state the interactive nature of the process becomes more evident. Manski and Wise (1983) and Jackson (1978) report that net price as opposed to list price does influence the choice decision. Jackson also reported receiving any financial aid increased the likelihood a student would attend a particular institution. However, interpreting the importance of financial aid in the enrollment decision has been difficult. Murphy (1981) found that academic quality to be more important in a college choice decision than the actual cost of attendance. These findings suggest the interactive relationship between choice, quality, and price is sensitive to a number of variables, yet the type and amount of scholarship aid may have an impact on student matriculation (Hossler, 1985).

Freeman (1984) conducted a study on the effectiveness of "no-need" scholarships on college choice decisions among a sample of mid-west college students:

The results show that the "courtship" procedures utilized in making these awards may have actually been more important than the amount of the awards. Geller (1982) also examined the effectiveness of various types of marketing literature. His study reveals that students have a clear preference for some forms of material over others. A 1984 College Board report notes that 36 percent of all students participating in the Board's students search program applied to one to three of the colleges they learned of from this service. Communication strategies can influence a choice process. (Hossler, 1985, p. 9)

Litten, Sullivan, and Brodigan (1983) reported students generally chose their first choice institution. Astin (1985) states the typical choice set for over half of students taking the American Freshman Survey was one to two institutions, indicating many potential college options had already been eliminated. Hossler (1985) states an important point to remember about the third phase is that colleges and universities have limited impact on the college choice decision.

Authors studying the college choice process describe the process as complex. During the predisposition phase, authors generally concur there is little direct interaction between students and institutions of higher education, thus the influence or impact an institution can have on predisposing students to higher education is limited. During the second or search phase, however, interaction between students and institutions increases as students develop a college choice set. Authors, such as Hossler (1985), have identified that institutions can have the greatest impact on inclusion of an institution into the college choice set during the

second search phase. As students gather information about the institutions in choice sets, they move to the third phase of actual choice. During the choice phase, a number of variables determine which institution becomes the college or university of choice. Hossler (1985, p. 9) states "Understanding student college choice has obvious utility for marketing efforts intended to influence student choice."

The third phase in the college choice process has been identified as a stage in which institutions of higher education have limited impact. Keihn (1986) conducted a study to investigate the influence of predictive information on the college choice process. Keihn asked the following questions in the study:

1. Is predictive success related to the change from a student's first choice college to a different institution at the time of actual enrollment?
2. What additional factors are associated with changing from a first-choice institution to a different institution at the time of actual enrollment?

Subjects of the study were 1980-81 participants in the Minnesota Post-High School Planning Program. Results of the study indicated 72 percent of the students changed their college choice decision from their first choice institutions to different institutions at the actual time of enrollment. Among all students that changed college choice, more changed to less selective institutions rather than changed to more selective institutions.

In a related study, Streveler (1986) conducted an investigation to determine the extent to which South Dakota high school students persisted in their first choice of a post-secondary institutions or career choice between the end of the junior year and the end of their senior year. The study also surveyed reasons given by students for making an institution choice selection change. The population of the study was 5,272 students. Analysis of the data indicated that 66 percent of the population studied changed their selection of a first-choice institution. Data indicated student interest in out-of-state institutions was relatively persistent, especially towards Minnesota institutions. Data indicated students were more likely to change their selection to an institution of the same type than they were to that of a different type. Data also indicated that persistence in institutional selection was almost a linear function of a student's academic ability. Students were more likely to change their selection of an institution than their selection of a career. These students also made selection changes, primarily because of reasons related to institutional or program preferences.

Schafer (1986) investigated how different types and amounts of financial aid awards influenced enrollment at a public university of both majority and minority students determined to have financial need. The study used an experimental design. There were 265 subjects selected from the experimentally accessible population for use in the control and experimental groups. Groups were formed based on ethnicity and need level. The experimental group was awarded a larger amount of gift aid, and in some cases a larger

total amount of aid in the financial aid package, to see if there was any difference in who enrolled on the Bolder campus for the fall of 1985. Results of the study indicated that differential financial aid packages do appear to influence enrollment for majority students but not under-represented minority students. Schafer states that implications of the study include:

1. Institutions of higher education can increase their enrollments of majority students by awarding better financial aid packages (appears to be true for both high and low-need students).
2. Institutions should be cautious about awarding large amounts of institutional money as a recruiting tool for under-represented minorities.

Results of the study concur with other studies cited such as Niemi (1986), Welki and Navratil (1987), and McRee and Cockriel (1986).

In a study by Lindberg (1987) conducted at Southern Illinois University in Carbondale, questionnaires were mailed to a sample group of parents of 8,810 first-time admitted Illinois resident freshman students aged 17-22. Major findings of the survey indicated almost 96 percent of students whose parents ranked Southern Illinois University at Carbondale as their first choice institution subsequently actually enrolled, with mothers playing a large role in the decision-making process. The percentage of students enrolled elsewhere increased as the choice of Southern Illinois University at Carbondale decreased. Lindberg stated the campus visit by the student had played an important role in the search and choice phases. The author states family, high school

counselors, friends, current students, and alumni appear to be the most important people in the choice process. Important factors related to choice decisions in this study were curriculum offerings, the campus visit, and the location and distance from home. The findings support other research findings cited previously.

Summary

The college choice process is complex, yet researchers have developed models that assist in identifying which students are predisposed to higher education, how a choice set of colleges/universities is developed, and how choice decisions are made. Hossler's (1984, 1985, 1987) model of college choice provides a framework for examining the process. Major authors in the field concur that institutions can have the greatest influence during the search phase, rather than the predisposition or choice phases.

CHAPTER III

METHOD

The purpose of this study was to examine the search and choice stages of the college choice process to determine marketing/admissions activities and people, first-time, traditional-age freshmen identify as having influenced college choice set formation, college choice decisions, and determine when choice sets and decisions were made. Data related to these questions will enable an institution to focus energies and resources on the most influential marketing/admissions activities, people, and time periods. The focus of the study was Davenport College, Grand Rapids. Topics discussed in the method section include design of the study, population, instrument administration, measurement and variables, and analysis.

Design of the Study

The study was designed to examine students' influential ratings of marketing/admissions activities and people in the college choice process, and when decisions were made. The design of the study was descriptive. A survey was conducted during May and June, 1989, of Fall 1988 freshmen at Davenport College, Grand Rapids. The survey was mailed to 434 first-time, traditional-age freshmen students. Thirteen marketing/admissions activities identified in higher education literature were analyzed. Respondents were asked 12

questions to determine when decisions were made and to rate the influential levels of marketing/admissions activities and people in the college choice process. Profile data of the respondents was also requested to identify current term of attendance, sex, county of residence, other colleges considered, and if Davenport was the first choice institution. The method used was consistent with various marketing research studies discussed in Chapter II (Greer, 1987; Kress, 1987; Sevier, 1986).

Population and Sample

Population

The population was defined as first-time freshmen enrolled at Davenport College, Grand Rapids. The population chosen for the study was consistent with other related college choice studies in higher education.

Sample Size and Collection

The entire population of 434 Fall 1988 first-time, traditional-age freshmen at Davenport College, Grand Rapids, was surveyed.

Sample response. The total number of surveys returned was 262. However, two surveys were unusable due to incohesive responses. Items were marked down a single column on each of the six pages. The actual total number of usable surveys was 260. The response rate was 60%.

Instrument administration. The survey was mailed to first-time, traditional-age freshmen students during May and June, 1989. The survey was first mailed to students on May 1, 1989. A

cover letter accompanied the survey indicating the survey was to be returned within ten days. A reminder card was mailed to students on May 14, 1989. The letter and survey were mailed a second time on June 2, 1989. A copy of the cover letter and the survey are presented in Appendix A.

Geographic representation. Data related to student geographic representation is presented in Table 3.1. Representation by geographic region of the respondents was consistent with actual student population percentages. The Kent County student population percentage was 39%; the survey respondents, 37%. The Ottawa County student population percentage was 23%; the survey respondents, 20%. The Allegan County student population percentage was 5%; the survey respondents, 7%. The Montcalm County student population percentage was 5%; the survey respondents, 5%. The balance of the student population (28%) was from other counties within and outside of Michigan. Thirty-one percent of the survey respondents were from other counties within and outside of Michigan.

Table 3.1.--Geographic response rates of survey respondents.

County	Student Population Percent	Survey Respondents Percent
Kent	39%	37%
Ottawa	23%	20%
Allegan	5%	7%
Montcalm	5%	5%
All Others	28%	31%
Total	100%	100%

Source: Fall enrollment 1988, Registrar's Office, Davenport College, Grand Rapids.

Male/female representation. The actual female representation in the student population was 69% for Fall 1988. The female representation of the respondents was 199 (80%). The actual male representation in the student population was 31% for Fall 1988-89. Male representation of the respondents was 51 or 20%. Ten people did not identify their sex on the survey. The male/female representation of the respondents is somewhat different than that of the actual student population during Fall 1988. Several reasons may exist for the higher female representation of the respondents. The male/female representation of the actual total student population includes approximately 50% of the student body that attends evenings and/or off campus, who as a group tend to have a higher percentage of females. Secondly, more females may have chosen to complete the survey than males.

Measurement and Variables

Instrument development

Rating scale and response options. Survey respondents were asked to rate 13 marketing/admissions activities and seven categories of people on a scale of 1-5, with 1 indicating not influential and 5 indicating very influential. In addition, students were asked to identify which of six other colleges they considered attending. Two other questions asked students to select from nine high school time periods when they first considered Davenport as a possible college to attend and when the choice decision to enroll was made.

Item source. The list of 13 marketing/admissions activities and seven groups of people were selected through an analysis of

previous related research on admissions and marketing in higher education (Freeman, 1984; Geller, 1982; Greer, 1987; Hossler, 1984, 1985, 1986; Kress, 1987; Schafer, 1986). The selected marketing/admissions activities and groups of people were:

Marketing/admissions activities

People

college brochures	parents
college catalogues	high school counselor
student quotes about their college experience	friend
radio messages	current Davenport student
TV messages	Davenport alumni
billboard messages	Davenport admissions reps.
newspaper messages	high school teachers
high school classroom presentation by college admissions rep.	
personal college visit with college admissions rep. at high school	
visit to college campus/interview with an admissions rep.	
attending a college open house	
attending a financial aid workshop on college campus	
attending a college day/night fair	

Survey layout

The first three questions of the survey were designed to collect student classification data. Questions asked were term enrolled, male or female, and county of home town residence. A fourth question was designed to identify when the institution was first considered as a possible college to attend. A fifth question was designed to identify other colleges and universities students considered attending. The sixth question was designed to identify the students' first choice institution to attend. A seventh question was developed for students to rate the influential levels of marketing/admissions activities when considering all possible colleges or universities to attend. The eighth question was

developed for students to rate the influential level of Davenport marketing/admissions activities. The ninth question was designed to rate the influential levels of people when students considered an institution as a possible college to attend. The tenth question was developed to identify when students made a choice decision to enroll at one institution instead of another. The eleventh question was designed to determine marketing/admissions activities influential on students' choice decisions to enroll at one institution instead of another college or university. The twelfth question was developed to determine the influential level of people when students made decisions to enroll at an institution. A copy of the survey is included in Appendix A.

Instrument Validity

To determine the validity of the instrument, the researcher compared the instrument to marketing/admissions questionnaires used by other researchers (Ash, 1987; Chapman, O'Brien, and DeMasi, 1987; Greer, 1987; Grosz, 1987). The instrument was designed to measure the influential levels of marketing/admissions activities and people in the college choice process and when students made choice decisions.

Analysis

Overview

Data were analyzed through the use of percentages, means, Pearson product moment coefficient of correlation, and the Spearman rho rank order correlation coefficient. Ten tables were developed to analyze the influential ratings of marketing/admissions activities and people in the college choice process and when decisions were made. Two tables were developed to analyze colleges and universities students considered attending and county of residence.

Research Question 1

The first research question was designed to determine students' ratings of the influential level of marketing/admissions activities related to developing a choice set of colleges and universities. Data are presented in tables to analyze means and rankings of the marketing/admissions activities. The Pearson product moment coefficient of correlation and the Spearman rho rank order correlation coefficient were used to test for significant differences.

Research Question 2

The second research question was designed to determine students' ratings of the influential levels of marketing/admissions activities related to making college choice decisions from among the institutions in choice sets. Data are presented in tables to analyze the means and rank order of each activity. The Pearson product moment coefficient of correlation and the Spearman rho rank

order correlation coefficient were used to test for significant differences.

Research Question 3

The third research question was designed to determine students' ratings of the influential levels of people involved in the development of college choice sets and college choice decisions. Students were asked to rate the influential level of seven categories of people. Means and rank orders are presented in two tables to examine two points in the college choice process. One table presents means and rank orders for the time periods students were developing choice sets of institutions. A second table presents means and rank orders of students' ratings of the influential levels of seven categories of people for the time periods when students were making choice decisions of which college or university to enroll at from among the institutions in choice sets.

Research Question 4

The final research question was designed to determine when students form college choice sets during high school and when college choice decisions were made. Percentages were used to determine the frequencies of nine time periods during the high school years.

CHAPTER IV

FINDINGS

The results from surveying 260 first-time freshmen at Davenport College, Grand Rapids, indicated students' influential ratings of marketing/admissions activities and people in the search and choice stages of the college choice process. Results also identified when choice sets were formed, and choice decisions were made. The survey also provided data for a profile of the students: male/female ratio of respondents, county of home town residence, other colleges and universities respondents considered attending, and whether or not Davenport was the first choice institution.

Four research questions were answered. The first question was designed to provide a rating of marketing/admissions activities students found influential when considering all possible colleges and universities to attend, and which were influential in including Davenport College as a possible option.

The second research question was designed to identify marketing/admissions activities freshmen rate as influential when making an actual choice decision of which college or university to attend from among the institutions included in the choice set.

The third research question was designed to identify people influential in the students' development of a college choice set when considering all possible colleges to attend, and people

influential on the student's choice to actually enroll at one institution instead of another.

The fourth research question was designed to identify at what point in the high school years students first considered possible colleges to attend, and when in the high school years students actually chose to enroll at one institution instead of another institution in the choice set.

Other Institutions Students Considered

Students were asked to identify other colleges and universities they considered attending. Eight institutions were identified in varying proportions from the survey responses. Students checked one or more of six colleges or universities on the survey or wrote in a response. Results for each institution appear in Table 4.1. The four institutions students identified most frequently were Grand Valley State University, Grand Rapids Junior College, Muskegon Business College, and Ferris State University with 69, 68, 56, and 51 responses, respectively. Other institutions students identified were Central Michigan University, Western Michigan University, and Michigan State University with responses of 29, 29, and 18, respectively. Additional write-in responses included 45 other colleges and universities within and outside the state of Michigan. A complete list of other write-in colleges and universities is given in Appendix B.

Table 4.1--Other colleges and universities
Davenport College students considered attending.

College	Number
Grand Valley State University	69
Grand Rapids Junior College	68
Muskegon Business College	56
Ferris State University	51
Central Michigan University	29
Western Michigan University	29
Michigan State University	18
All Others	45

Respondents were also asked to identify if Davenport College was their first choice college to attend. One hundred eighty-five students (71%) indicated Davenport College was their first choice. Sixty-seven (26%) indicated Davenport was not their first choice college to attend. Eight (3%) students did not respond to the question. Students who indicated Davenport was not their first choice college to attend, were asked to identify a first choice institution. The two institutions identified most frequently as first choice institutions were Grand Valley State University and Muskegon Business College with 13 and 8 responses, respectively. Other colleges or universities identified as first choice institutions to attend were Michigan State University, Ferris State University, Central Michigan University, and Hope College with 5, 4, 4, and 4 responses, respectively. There were 23 other colleges or universities identified as first choice options with responses of less than four per institution. A complete list of other first choice colleges or universities is presented in Appendix C.

Activities Influential in Choice Set Development

The first research question was designed to provide a rating of 13 marketing/admissions activities students identified as influential when considering all possible colleges and universities to attend, and which were influential in including Davenport as a possible option. Respondents were asked to rate two additional Davenport marketing/admissions activities: Davenport College Career Day and Find Out About Davenport Pizza Party.

Results of the data are presented in Table 4.2. Means and rank orders of the marketing/admissions activities were used to analyze the data. The overall mean of activities for all possible colleges students considered attending was 2.77. The overall mean of Davenport marketing/admissions activities was 2.85. The Pearson product moment coefficient of correlation of the two overall means is $+0.99$. This indicates students rated the marketing/admissions activities of all colleges they considered attending and those of Davenport College as nearly identical in influence. When rank order by means was analyzed using the Spearman rho rank order correlation coefficient, the result was a perfect $+1$ correlation. Students' ratings indicated the marketing/admissions activities at all possible colleges they considered attending and those of Davenport College were extremely similar in terms of being influential or not influential.

The data in Table 4.2 indicates that for the 13 marketing/admissions activities, means for all but two activities were slightly higher for Davenport College than for all possible colleges students considered attending. The personal visit with an

admissions representative at the students' high school by Davenport College had a mean of 3.584 and the activity at other colleges students considered attending had a mean of 3.660.

The second marketing/admissions activity that Davenport College had a slightly lower mean was attending a college open house. The mean for Davenport College was 3.139 and at all possible colleges students considered attending 3.151. The difference in means is relatively insignificant as discussed earlier. A Pearson product moment coefficient of correlation of $+0.99$ and a Spearman rho rank order correlation coefficient of $+1$ indicates students perceived no difference between the marketing/admissions activities of Davenport and the activities of all colleges they considered attending.

The marketing/admissions activities students identified as most influential were the visit to campus and interview with an admissions representative, a high school classroom presentation by a college admissions representative, a personal visit with a college admissions representative at the high school, and attending a college open house, ranked 1, 2, 3, and 4, respectively. Rated least influential when considering whether or not to attend a particular institution were newspaper messages and billboard messages, ranked 12 and 13, respectively. Students were asked to rate two additional marketing/admissions activities used by Davenport College: Davenport College Career Day and Find Out About Davenport Pizza Party. The means for the two activities were 2.76 for Career Day and 2.03 for Find Out About Davenport Pizza Party.

Table 4.2--Influence means and rank orderings of marketing/admissions activities.

Activity	All Colleges		Davenport College		Rank Difference
	Mean	Rank	Mean	Rank	
College brochures	3.105	5	3.129	5	0
College catalogues	3.040	6	3.102	6	0
Student quotes about college experience	2.575	7	2.683	7	0
Radio messages	2.120	11	2.286	11	0
TV messages	2.178	10	2.302	10	0
Billboard messages	1.940	13	2.098	13	0
Newspaper messages	2.021	12	2.212	12	0
High school classroom presentation by admissions representative	3.679	2	3.689	2	0
Personalized visit with admissions at high school	3.660	3	3.584	3	0
Visit campus/interview	3.723	1	3.770	1	0
Attending college open house	3.151	4	3.139	4	0
Attending financial aid workshop	2.382	9	2.430	9	0
Attending college day/night	<u>2.449</u>	8	<u>2.590</u>	8	0
Mean	2.77		2.85		

These two marketing/admissions activities were not included in the rank order comparisons when comparing activity means of all possible colleges students considered attending and Davenport College and are not listed in Tables 4.2-4.8.

Frequency distributions of responses within each influential rating category (1--not influential, 2, 3, 4, 5--very influential) for marketing/admissions activities of all possible colleges students considered attending and those same activities for Davenport College were developed to determine differences. Frequencies were rank ordered within each rating category of 1-5. The Spearman rho rank order correlation coefficient was used to compare students' ratings of marketing/admissions activities of all possible colleges and Davenport College. The results of the statistical analyses follow in Tables 4.3, 4.4, 4.5, 4.6, and 4.7.

Data on the frequency distributions and rank orders of students' ratings of the 13 marketing/admissions activities rated 5 (very influential) for all colleges and Davenport College is presented in Table 4.3. There were no significant differences between the very influential rating (5) of the marketing/admissions activities of all possible colleges to attend compared to Davenport College activities. A Spearman rho rank order correlation coefficient of $+0.94$ indicates no significant difference between students' perceptions of activities conducted by all colleges compared to Davenport College. The marketing/admissions activity most frequently rated as very influential for all colleges students considered attending and Davenport was the visit to campus and

Table 4.3--Influence rating 5: very influential frequency and rank order.

Marketing/Admissions Activity	All Possible Colleges to Attend Rank					Davenport College Rank		
	Frequency	R ¹	Frequency	R ²	Rank Order Difference	D	D ²	
College brochures	23	6	30	6	0	0	0	
College catalogs	26	5	35	5	0	0	0	
Student quotes about college experience	14	8	25	7	1	1	1	
Radio messages	6	10.5	12	10.5	0	0	0	
TV messages	6	10.5	12	10.5	0	0	0	
Billboard messages	0	13	10	12.5	.5	.5	.25	
Newspaper messages	5	12	18	9	3	3	9	
High school classroom presentation by college admiss. rep.	84	2	89	2	0	0	0	
Personal visit with admissions rep. at high school	74	3	78	3	0	0	0	
Visit to campus/ interview	86	1	91	1	0	0	0	
Attending college open house	35	4	49	4	0	0	0	
Attending financial aid workshop	9	9	10	12.5	-3.5	-3.5	12.25	
Attending college day/night	16	7	24	8	-1	-1	1	
					0	0	23.5	

interview, with responses of 86 and 91, respectively. Other activities rated most frequently as very influential (5) were the high school classroom presentation by a college admissions representative, a personal visit with the college representative at the high school, attending a college open house, college catalogs, and college brochures, rank ordered by frequency of response as 2, 3, 4, 5, 6, respectively.

Data on the frequency distributions and rank orders of students' ratings of the activities at influential level 4 for all colleges and Davenport College is presented in Table 4.4. Frequency distributions and rank orders within the influence rating category of 4 indicated there were no significant differences between the activities of all possible colleges to attend and those of Davenport College. College brochures ranked first in frequency of response and college catalogs ranked second within this category. Activities within the rating category of 4 were ranked, and the Spearman rho rank order correlation coefficient was used to analyze the data. The result was a correlation coefficient of $+0.95$. The $+0.95$ correlation coefficient indicates the activities rated at an influential level of 4 was similar for marketing/admissions activities at all colleges students considered attending and those of Davenport.

Table 4.4--Influence rating 4: frequency and rank order.

Marketing/Admissions Activity	Frequency	All Possible Colleges to Attend Rank	Frequency	Davenport College Rank	Rank Order Difference	D ²
College brochures	111	1	101	1	0	0
College catalogs	94	2	86	2	0	0
Student quotes about college experience	62	7	58	7	0	0
Radio messages	28	11	38	9.5	1.5	2.25
TV messages	31	8	36	11	-3	9
Billboard messages	22	12	21	12	0	0
Newspaper messages	21	13	20	13	0	0
High school classroom presentation by college admiss. rep.	89	3	76	4	-1	1
Personal visit with admissions rep. at high school	83	6	75	5	1	1
Visit to campus/ interview	86	4	82	3	1	1
Attending college open house	84	5	70	6	-1	1
Attending financial aid workshop	30	9	38	9.5	- .5	.25
Attending college day/night	29	10	41	8	2	4
					0	19.5

Data on the frequency distributions and rank orders of students' ratings of the activities at influential level 3 for all colleges and Davenport College is presented in Table 4.5. The frequency distributions and rank orders of activities rated at an influence level of 3 was again similar when comparing all possible colleges to attend and Davenport College. A Spearman rho rank order correlation coefficient of $+0.94$ indicates students rated the activities of all possible colleges to attend and Davenport College similar. The marketing/admissions activities most frequently rated at an influence level of 3 were attending a financial aid workshop and attending a college day/night fair, ranked 1 and 2, respectively.

Frequency distributions and rank orders within the influence rating category of two were similar for the marketing/admissions activities of all other possible colleges and Davenport. Data in Table 4.6 indicates within this rating category, the activity with the highest frequency of response was T.V. messages, ranked 1, with 78 responses for all possible colleges students considered attending and 67 responses for Davenport. College brochures, radio messages, and college catalogs were also ranked similarly within this rating category at 2, 3, and 4, respectively. A Spearman rho rank order correlation coefficient of $+0.96$ indicates a very high positive correlation. Students perceived little difference between activities rated at an influence level of 2 for all colleges students considered attending and Davenport.

Table 4.5--Influence rating 3: frequency and rank order.

Marketing/Admissions Activity	Frequency	All Possible Colleges to Attend Rank	Davenport College Rank	Rank Order Difference	D ²
College brochures	20	13	12	1	1
College catalogs	32	11	10	1	1
Student quotes about college experience	51	6.5	8	-1.5	0
Radio messages	51	6.5	6.5	0	0
TV messages	48	8	6.5	1.5	2.25
Billboard messages	56	5	3	2	4
Newspaper messages	60	3	4	-1	1
High school classroom presentation by college admiss. rep.	23	12	11	1	1
Personal visit with admissions rep. at high school	40	9	9	0	0
Visit to campus/ interview	33	10	13	-3	9
Attending college open house	57	4	5	-1	1
Attending financial aid workshop	99	1	1	0	0
Attending college day/night	92	2	2	0	0
				<u>0</u>	<u>20.25</u>

Data on the frequency distributions and rank orders within the rating category of 1 (not influential) are summarized in Table 4.7. The frequency of responses and rank orders are again very similar. Rated most frequently as not influential was billboard messages for all possible colleges students considered attending and Davenport College, with responses of 115 and 110, respectively. Also rated not influential were newspaper messages and radio messages, ranked 2 and 3, respectively. A Spearman rho rank order correlation coefficient of $+0.99$ indicates a near perfect correlation of students' ratings of activities not influential at all colleges they considered attending and those of Davenport.

To summarize, students were asked to rate the influential level of a series of marketing/admissions activities using a 1-5 scale with 1 indicating the activity was not influential and 5 indicating the activity was very influential. The data indicates students found some marketing/admissions activities more influential than others. Mean ratings of the marketing/admissions activities were very similar for all possible colleges students considered attending and for Davenport College. Students rated as most influential the visit to the college campus and interview with an admissions representative. Students rated as least influential billboard messages.

Table 4.6--Influential rating 2: frequency and rank order.

Marketing/Admissions Activity	Frequency	All Possible Colleges to Attend Rank	R ¹	Frequency	R ²	Davenport College Rank	Rank Order Difference	D	D ²
College brochures	74		2	65	2			0	0
College catalogs	60		4	55	4			0	0
Student quotes about college experience	45		6	43	6			0	0
Radio messages	72		3	57	3			0	0
TV messages	78		1	67	1			0	0
Billboard messages	57		5	42	7			-2	4
Newspaper messages	44		7	51	5			2	4
High school classroom presentation by college admiss. rep.	26		8	24	9			-1	1
Personal visit with admissions rep. at high school	16		13	14	13			0	0
Visit to campus/ interview	21		9.5	29	8			1.5	2.25
Attending college open house	21		9.5	20	11			-1.5	2.25
Attending financial aid workshop	20		11.5	18	12			- .5	.25
Attending college day/night	20		11.5	21	10			<u>1.5</u>	<u>2.25</u>
								<u>0</u>	<u>16</u>

Activities Influential in College Choice Decisions

The second research question was designed to determine marketing/admissions activities Davenport freshmen identify as influential in making a college choice decision to attend Davenport instead of another institution. Students were asked to rate a series of nine activities using a 1-5 scale to indicate the influential level of an activity. A rating of 1 indicated the activity was not influential. A rating of 5 indicated the activity was very influential. The activities were conducted to encourage students to enroll at the college instead of another institution. The data in Table 4.8 summarizes the results related to this research question. Follow-up handwritten notes from admissions representatives received the highest influential rating with a mean of 3.056. The second highest rated activity was receiving a scholarship, with a mean score of 3.032.

Least influential activities in encouraging students to enroll at Davenport instead of another institution were phone calls from alumni and current Davenport College students, ranked 8 and 9, respectively, with means of 2.093 and 2.049. The data indicates Davenport College freshmen found written forms of communication and receiving a scholarship more influential on the decision to enroll than either person-to-person contact or phone communications. However, phone contact from an admissions representative was rated as more influential than phone contacts from alumni and Davenport students, and more influential than the local reception for accepted students and parents.

Table 4.7--Influential rating 1: not influential frequency and rank order.

Marketing/Admissions Activity	All Possible Colleges to Attend				Davenport College		
	Frequency	R ¹	Frequency	R ²	Rank Order Difference	D	D ²
College brochures	28	12	32	11	1	1	1
College catalogs	38	10	38	9	1	1	1
Student quotes about college experience	75	7	71	7	0	0	0
Radio messages	95	3	90	3	0	0	0
TV messages	84	6	82	6	0	0	0
Billboard messages	115	1	110	1	0	0	0
Newspaper messages	112	2	99	2	0	0	0
High school classroom presentation by college admiss. rep.	30	11	31	12	-1	1	1
Personal visit with admissions rep. at high school	49	9	37	10	-1	1	1
Visit to campus/ interview	27	13	24	13	0	0	0
Attending college open house	48	8	57	8	0	0	0
Attending financial aid workshop	91	4	89	4	0	0	0
Attending college day/night	88	5	84	5	0	0	0
						<u>0</u>	<u>4</u>

Table 4.8--Activities influential in
choice decisions to enroll at Davenport.

Activity	Mean	Rank
Follow-up letters from Davenport College staff	2.972	3
Follow-up handwritten notes from Admissions representatives	3.056	1
Assistance with completing financial aid forms	2.707	5
Receiving a scholarship	3.032	2
Phone contact from Admissions rep.	2.665	6
Phone contact from alumni	2.093	8
Phone contact from current Davenport College students	2.049	9
Local reception for accepted students and parents	2.448	7
Meeting with Davenport College faculty member	2.807	4

People Influential in Choice Set Development and Decisions

The third research question was designed to determine persons influential in the students' development of a college choice set and college choice decision. Students were asked to use the 1-5 scale to identify which of seven categories of people were very influential (5) through those not influential (1). The summary of data related to this question appears in Tables 4.9 and 4.10. The data in Table 4.9 summarizes student responses of influential ratings of the seven people categories when students were considering possible colleges to attend. Students rated as most influential the Davenport admissions representative and parents, ranked 1 and 2, respectively. The Davenport College admissions representative with a mean of 3.127 was rated most influential, slightly higher than parents at 3.044. Rated least influential of

the people categories were Davenport College alumni and current Davenport College students, ranked 6 and 7, respectively.

Students were also asked to rate the influential level of the seven categories of people on the choice to enroll at Davenport instead of another institution. Table 4.10 summarizes the data related to this question. Rated most influential were parents and the Davenport admissions representative, ranked 1 and 2, respectively. Rated least influential were Davenport College alumni and current Davenport students, ranked 6 and 7, respectively. A reversal in rankings of the Davenport College admissions representative and parents is indicated in Tables 4.9 and 4.10. When considering all possible colleges, students rated parents as second most influential. However, once the college was selected as a possible institution to attend and students made a choice decision, parents were rated as the most influential people in the decision to actually enroll.

Table 4.9--Influential ratings of people
in choice set development.

People	Mean	Rank
Parents	3.044	2
High school counselor	2.685	4
Friend	2.637	5
Current Davenport students	2.296	7
Davenport alumni	2.448	6
Davenport admissions representative	3.172	1
High school teachers	2.796	3

Examining the data in Tables 4.9 and 4.10 reveals another shift in rankings. When considering all possible colleges to attend, students rated the high school counselor as slightly more influential than friends, ranked 4 and 5, respectively. Once a decision to enroll at Davenport had been made, students reversed the rankings for friend and high school counselor at 4 and 5, respectively. However, the difference in means is small. In summary, students identified the Davenport College admissions representative and parents as most influential when considering all possible colleges to attend and when making an actual choice decision to enroll.

Table 4.10--Influential ratings of people
in choice decisions to enroll.

People	Mean	Rank
Parents	3.237	1
High school counselor	2.610	5
Friend	2.629	4
Current Davenport student	2.20	7
Davenport alumni	2.268	6
Davenport admissions representative	2.955	2
High school teachers	2.702	3

When College Choice Sets and Decisions are Made

The fourth research question was designed to determine at what point in students' high school years college choice sets were formed and when college choice decisions were made. To answer the research question, students were asked to identify when Davenport College was first considered as a possible college to attend and when was the

choice decision made to enroll at Davenport instead of another college or university.

Students could select from nine time periods during the high school years: before 9th grade, 9th grade, 10th grade, first semester of the 11th grade, second semester of the 11th grade, summer before 12th grade, first semester of the 12th grade, second semester 12th grade, and the summer after 12th grade.

The data related to when students first considered Davenport a possible college to attend is summarized in Table 4.11. Responses indicate a majority of students considered Davenport as a possible college to attend during the first or second semester of the 12th grade. Fifty-nine students identified Davenport was first considered as a possible college to attend during the first semester, and 59 considered Davenport as a possible college to attend during the second semester of the 12th grade for a total of 118 (47.2%). Examining the data also indicates that 80 (32.1%) had considered Davenport as a possible college to attend during the 11th grade and summer before the 12th grade. One hundred and nine (43.8%) of the respondents indicated Davenport was first considered a possible college to attend prior to their senior year. Twenty-three (9.2%) indicated they had not considered Davenport as a possibility until the summer after the 12th grade.

Table 4.11--When students first considered Davenport as a possible college to attend.

When	Number	Percent
Before 9th grade	3	1.2%
9th grade	3	1.2%
10th grade	23	9.2%
1st semester, 11th grade	17	6.8%
2d semester, 11th grade	33	13.2%
Summer before 12th grade	30	12.0%
1st semester, 12th grade	59	23.6%
2d semester, 12th grade	59	23.6%
Summer after 12th grade	<u>23</u>	<u>9.2%</u>
Total	250	100.0%

The data related to when students decided to enroll at Davenport instead of another institution is summarized in Table 4.12. A majority of students identified they had made the decision to enroll at Davenport during the first or second semester of the 12th grade. Forty-five students identified the first semester of the 12th grade, and 110 identified the second semester of the 12th grade for a total of 155 (62.2%). Fifty (20.1%) decided to enroll at Davenport instead of another institution during the 11th grade or summer before the 12th grade. Fifty-six (22.5%) decided to enroll at Davenport prior to their senior year. Thirty-eight (15.3%) did not decide to enroll at Davenport instead of another institution until the summer after the 12th grade. Examination of the data from Tables 4.11 and 4.12 appears to indicate a brief period of time between when students considered Davenport as a possible college to attend and when the decision was made to enroll at the college instead of another institution.

Table 4.12--When students decided to enroll at
Davenport instead of another institution.

When	Number	Percent
Before 9th grade	0	0 %
9th grade	1	0 %
10th grade	5	2.0%
1st semester, 11th grade	14	5.6%
2d semester, 11th grade	13	5.2%
Summer before 12th grade	23	9.2%
1st semester, 12th grade	45	18.1%
2d semester, 12th grade	110	44.2%
Summer after 12th grade	<u>39</u>	<u>15.3%</u>
Total	249	99.6%

Summary of Research Findings

Davenport College freshmen found certain marketing/admissions activities more influential than others in developing a choice set of colleges and universities to attend. Data from the research study indicated students identified as most influential a visit to the college campus and interview with an admissions representative, a high school classroom presentation by an admissions representative, and a personal visit with an admissions representative at their high school, ranked 1, 2, and 3, respectively. Students rated as least influential radio messages, newspaper messages, and billboard messages, ranked 11, 12, and 13, respectively. Students rated the influential level of marketing/admissions activities of all possible colleges they considered attending and those of Davenport College very similar. The Spearman rho rank order correlation coefficient for the activities at all possible colleges students considered attending

and Davenport College was a perfect +1 correlation. The Pearson product moment coefficient of correlation of the overall means for the influential ratings of activities of all colleges students considered and Davenport was +.99.

The marketing/admissions activities Davenport freshmen identified as most influential in making a college choice decision to enroll at Davenport instead of another institution were follow-up handwritten notes from an admissions representative and receiving a scholarship, ranked 1 and 2, respectively. Data indicated students found phone calls from alumni and current Davenport students (ranked 8 and 9, respectively) least influential on their decision to enroll at Davenport instead of another institution.

Research findings indicated students rated as most influential on the decision to include Davenport as a possible college to attend the Davenport admissions representative and parents, ranked 1 and 2, respectively. Data indicated students rated as least influential of the people categories when considering all possible colleges to attend Davenport alumni and current Davenport students, ranked 6 and 7, respectively. Once the development of a college choice set was complete, students were asked to identify which of the same people were most influential on their decision to enroll at Davenport instead of another institution. Data indicated most influential were parents and the Davenport admissions representative, ranked 1 and 2, respectively. Rated least influential were Davenport College alumni and current Davenport students, ranked 6 and 7, respectively. Findings indicated parents

became more influential on the choice decision once a college had been included in the choice set as a possible college to attend.

The fourth research question was designed to determine at what point in the students' high school years the college choice set was formed and when was the college choice decision made. Findings indicated the majority of Davenport freshmen considered the college as a possible college to attend during the 12th grade. Data also indicated the majority of students decided to enroll at Davenport instead of another institution during the 12th grade. The findings indicated there was a brief time period between the time Davenport was first considered a possible college to attend and when students made the decision to enroll at Davenport instead of another institution.

CHAPTER V

CONCLUSIONS

Introduction

During the 1980's, projections of a declining traditional-aged college applicant pool spurred administrators to seek new ways of maintaining or increasing an institution's share of the available applicant pool. A key administrative goal became maintaining and/or increasing enrollment, thus maintaining market share within the environment. This interest brought the topic of student college choice to the forefront. Growing competition for a declining pool of applicants ushered in an era of increased focus on marketing/admissions activities. Researchers developed models of college choice, and began to evaluate the effectiveness of marketing/admissions strategies aimed at influencing choice. Research studies indicate administrators can influence college choice decisions by emphasizing strategies students find more influential than others, particularly during the search stage of the college choice process. Marketing and admissions research studies have contributed to identifying factors and activities significant in a student's decision to attend a particular college or university.

This research study was designed to determine marketing/admissions activities and people, students at Davenport

College found influential in college choice set development, choice decisions, and when choices were made.

Overview

The research study was designed to answer four research questions: (1) marketing/admissions activities students identify as influential in developing a choice set of colleges and universities; (2) marketing/admissions activities students identify as influential in making a college choice decision; (3) persons influential in the students' development of a college choice set and college choice decision; and (4) when students form college choice sets during high school and make college choice decisions.

A total of 13 marketing/admissions activities were selected for the study to measure activities first-time freshmen identified as influential when considering possible colleges to attend and then later when making choice decisions. Students were also asked to rate seven people categories on how influential the people were in students' development of a choice set of colleges to attend and when choice decisions were made to enroll at a particular institution. To identify when choice sets were developed and decisions were made, students were asked to select from nine time periods in high school when choice sets and decisions were made. Students could select from nine time periods during the 9th grade year through the summer after the 12th grade year.

Background information on students was also collected to provide a profile of the respondents. Students were asked to indicate whether they were male or female, county of home town residence, and other colleges they considered attending.

Students were asked to use an influence rating scale of 1-5 to rate how influential marketing/admissions activities or people were when considering all possible colleges to attend and when making a choice decision to enroll at one institution instead of another. A rating of five indicated the activity or person was very influential. A rating of one indicated the activity or person was not influential. Students could also choose ratings of four, three, or two, indicating more or less influence.

Student Profile

Background data from the student survey indicates that 199 (77%) of the respondents were female and 61 (23%) of the respondents were male. The female/male percentages of the survey respondents does differ somewhat from the overall female/male proportions of the Davenport student population as a whole. During the fall of 1988, the percentages of females/males for the entire student body was 69% females and 31% males. The data to identify the county of home town residence of student respondents indicated 96 (37%) were from Kent County, 53 (20%) were from Ottawa County, 17 (7%) were from Allegan County, 13 (5%) were from Montcalm County, and 81 (31%) were from other counties within or outside of the state of Michigan.

The primary recruiting area for Davenport has traditionally been Kent and Ottawa counties. One hundred forty-nine (57%) of the respondents were from these two counties. The conclusion can be drawn that a majority of students are from the immediate area. However, 111 (43%) of respondents were from counties other than Kent or Ottawa. Other colleges or universities students identified most frequently as possible institutions to attend were Grand Valley

State University, Grand Rapids Junior College, and Muskegon Business College. One hundred eighty-five (71%) students identified Davenport College was their first choice college to attend.

Recommendations Based on Student Profile

Based on the results of student profile data, recommendations are for institutions to continue to expend the major portion of resources and activities targeted to the students the college or university typically attracts. Given a predominantly female student population, an institution should focus the main share of marketing and admissions activities at females. A smaller portion of marketing and admissions activities should be targeted at males. Special targeted marketing/admissions activities should be developed to appeal to men. College majors should be studied to determine female/male ratios to identify which appeal most strongly to females and males. Differentiated strategies and activities related to programs that appeal to females and males should be developed and implemented.

Results of the survey indicated the majority of students come from Kent and Ottawa counties (57%). Data from the registrar's office confirms the county of residence profile of all Davenport students to be 60% from Kent and Ottawa counties. The data indicated, however, that approximately 40-43% of students are coming from counties other than Kent and Ottawa. If an institution such as Davenport, wishes to expand its applicant pool, additional efforts should be implemented to more actively recruit from other counties in the college's territory. Outside admissions representatives should increase contacts with high schools outside of the immediate

counties. Direct mail campaigns should be implemented, targeted to males and females differently, according to current male/female program enrollments by majors. Research should be conducted annually to determine shifts in county of home town residence. Shifts may reflect changes in the effectiveness of the institution's marketing strategy, admissions program, strength of institutional image, the appeal of program offerings, or a change in the appeal of the college's environment.

Conclusions on Influential Marketing/Admissions Activities

Research Question 1 was designed to determine marketing/admissions activities students identify as influential in developing choice sets of colleges and universities. Results of the study indicated the most influential activities were the on-campus visit and interview with an admissions representative, the high school presentation by an admissions representative, a personal visit with an admissions representative at the high school, and attending a college open house.

Data from the study indicates administrators may choose to adjust marketing/admissions activities to increase the number of high school classroom presentations by admissions representatives to generate interest in on-campus visits. Additional on-campus visits and interviews with an admissions representative would generate additional opportunities for an institution to be included in students' choice sets of colleges and universities to attend. The conclusion can also be drawn that institutions encouraging admissions representatives to initiate more personal visits with prospective students at the students' high schools may increase the

possibility of the institution being included in choice sets. Holding more open houses for prospective students and parents, particularly outside the immediate recruiting area, emphasizing personal contact and increasing on-campus experiences appear to offer the most opportunity for institutions to influence the college choice process. The conclusion can also be drawn that personalized contact through the use of direct mail may be an effective method of influencing the choice process. Institutions may choose to implement a direct mail program promoting scholarship opportunities differentiated by sex, program interest, and include handwritten notes.

Another conclusion based on the data is that billboard messages, newspaper messages, and radio messages, as strategies to reach the high school market, may be largely ineffective. However, as part of an overall media mix, these two mediums may be appropriate to reach the adult market. Newspaper advertising may be more effective targeted to adults rather than the high school market and may be more effective located in the section of the newspaper that appeals to the institutions' target population. Radio station arbitrons and listener profiles can be examined to determine listenership and audience appeal. Radio messages can be designed and placed to appeal to specific target populations within the market place.

Conclusions on the Influential Activities Related to College Choice

Research Question 2 was designed to determine marketing/admissions activities students identify as influential in making college choice decisions. Results of the data indicated students identify as most influential follow-up handwritten notes,

receiving a scholarship, follow-up letters from the admissions staff, and meeting faculty. The conclusion can be drawn that if administrators want to influence the college choice decisions, strategies should be implemented to increase handwritten communications to prospective students and applicants. Handwritten thank-you notes for visiting campus, birthday and Christmas cards, and personal notes from faculty to applicants in their majors and follow-up letters may provide the most opportunities to influence students' choice decisions. Increasing and promoting scholarship opportunities for students also provides a means for institutions to influence choice decisions. Conclusions from the data also indicate on-campus activities which actively involve faculty with students, such as campus tours, career days, open houses, and orientations, provide additional opportunities to influence college choice decisions.

Conclusions on Persons Influential in the College Choice Process

Research Question 3 was designed to identify persons influential in students' development of a college choice set and college choice decision. Results of the survey indicated the admissions representative and parents were most influential. During the development of a college choice set, the admissions representative was rated as most influential, parents second. When the college choice decision was being made, parents were rated most influential, the admissions representative second most influential. Based on the data, the following conclusions can be drawn.

Administrators should hire and train high school admissions representatives carefully. The high school admissions

representative is very influential in determining whether an institution is included in the college choice set and whether the institution is selected as the college of choice. High school admissions representatives should be trained extensively in representing the college, conducting classroom presentations, and relating well to students on a personalized, professional basis.

A second recommendation is to increase the frequency of high school admissions representative contacts at high schools through presentations and counselor visits with small groups of students. Personally visiting with prospective students and applicants at their high schools should be a planned activity. Admissions representatives should be given a list of prospective students and applicants from each high school in their territory. Each prospective student or applicant should be contacted personally at the student's high school.

Institutions interested in influencing students' development of college choice sets and decisions may find it most effective to implement strategies and activities that increase personal contacts with parents. Early in the recruiting process, admissions representatives can initiate contacts with parents of prospective students through letters, handwritten notes, phone calls, and on-campus events. The conclusion can be drawn from the data that a majority of students are developing choice sets of colleges during the 11th and 12th grade. To influence the college choice process, parents can be contacted early in the high school years. However, data indicates the 12th grade may be the most crucial time to maintain contact with parents as students move towards choice

decisions. Parents are an excellent resource to assist students in developing college choice sets and making choice decisions, yet most institutions have not actively targeted parents.

Conclusions on When Choice Sets and Decisions are Made

Research Question 4 was designed to determine at what point in students' high school years college choice sets were formed and when were choice decisions made. Results of the study indicated a majority of students identified the 12th grade as the time when choice sets of possible colleges to attend were formed and choice decisions were made to enroll at one institution. Data indicated, however, that 44% of the students had considered possible colleges to attend prior to their senior year.

Based on results of the study, the conclusion can be made that there is considerable interest in possible colleges to attend during the high school years prior to 12th grade. To influence the college choice process, high school admissions representatives can increase classroom presentations to juniors and sophomores. Since the data indicated little time span between the time the college was considered a possible college to attend during choice set development, to the time when choice decisions were made to enroll at the college instead of another institution, it is important that the college be considered a possibility early in students' high school years.

Summary

Overall, the study disclosed useful findings that would not be readily apparent without the use of a rating scale to identify

marketing/admissions activities and people students found most influential in the college choice process. The data collected from the study can be particularly useful for colleges which rely on effective marketing and admissions strategies to maintain or increase enrollments. The traditional pool of applicants has decreased, and the competition for the available pool has increased. Institutions that want to influence the college choice process will need to develop and implement strategies that maintain or increase the institution's market share, and thus maintain or increase the institution's growth and vitality. Data from the study enabled the researcher to identify marketing/admissions activities and people students indicated were most influential in the college choice process. Data also indicated when students developed college choice sets and when choice decisions were made.

In addition to a declining traditional-age applicant pool, the cost of recruiting students has escalated rapidly. Institutions are under increasing pressure to make informed decisions on effective recruitment strategies and allocation of resources.

The number of colleges that have closed during the past few years has increased. Those that have closed have been primarily small, independent colleges. The outlook for the future has been described as one in which even more small colleges will close their doors due to declining enrollment. Institutions who want to influence the college choice process will need to conduct research on a regular basis, both within and outside the institution, to identify effective marketing/admissions activities, influential people, and when choice sets and choice decisions are being made.

Data from this study should be applicable to other institutions. Small, independent colleges, such as Davenport, serve a particular segment of the market. Efforts to reach the institution's market must be targeted towards marketing/admissions activities, people, and time periods students identify as most influential in the college choice process. Additional research to determine male/female differences in influential ratings of marketing/admissions activities and people could provide data for more effective recruitment strategies. The data from the study also indicates recruitment strategies may more effectively be used earlier in students' high school years. Conducting follow-up research could help pinpoint the time periods more effectively.

Institutions must project images of quality education, stable enrollment or planned growth, and financial stability to maintain student appeal and market share. Declining enrollment can be a symptom of mismanagement or inattention to marketing/admissions activities, people, and time periods students indicate are most influential in the college choice process. To influence the college choice process, institutions must also market the college or university through successful management of the four P's of marketing: product, price, place, and promotion.

Reflections

Few small colleges consistently conduct market research. Whether the research is conducted informally or formally, no longer can colleges avoid taking a business-like approach to determine the profile of students the institution attracts, marketing/admissions activities and people most influential in the college choice

process, and when students make choices and decisions. Research should be conducted on a regular basis to provide data to answer these questions.

In order to effectively market an institution or a product, administrators must make sure the institution has a quality product that fits the institutional mission. Benchmarks need to be established for quality, such as (1) student skills and abilities demonstrated through outcome assessments, (2) successful student graduation/completion rates, (3) high graduate employment rates, and (4) alumni successes in professional and community contributions.

A second imperative for college administrators is to price the "product" appropriately. Revenue sources for public institutions and private institutions are quite dissimilar. Public institutions receive a majority of revenues from federal and state government. At public institutions, tuition does not come close to covering the cost of a student's education. Support from state and federal sources subsidizes the cost of students' education. Independent or private institutions rely on tuition dollars for a majority of revenues and support. Therefore, tuition costs at an independent or private institution are usually considerably higher than tuition rates at public institutions.

In recent years the cost of a college education has skyrocketed, with tuition increases exceeding the rates of inflation. At the same time, the amount of financial aid dollars available to students in the form of grants has declined, and loan volume has increased dramatically. Institutions have an obligation to set tuition at rates which enable them to cover costs and allow for reinvestment by

the institution in human resources, equipment, and facilities. However, institutions need to be mindful of raising tuition rates relative to inflation rates. Colleges and universities are also obligated to insure students receive a quality education for their tuition dollars.

For an independent college, such as Davenport, it is critical that administrators analyze the impact of tuition increases before pricing the "product." The profile of the Davenport study body indicates that in 1989, 69% of the student body received financial aid. Of the 69%, 40% had loans of some type. Changes in eligibility guidelines for determining financial need have greatly affected the amount of educational expenses students have been expected to cover.

During Fall 1989, for the first time, Davenport students receiving a full Pell Grant and full Michigan Tuition Grant had no money left to buy books. To cover costs, students are taking out more loans. The volume of student loans at Davenport has more than doubled during the past year. Administrators need to analyze the financial profile of the study body and the availability of loan dollars to students. No increase in financial aid grants is expected, so the college must anticipate tuition increases for a large portion of its students will be covered by loans.

Each institution has a market niche and appeals to a particular group from which it draws the majority of its students. Tuition levels impact an institution's image and place relative to its competitors. Administrators need to exercise care to price the "product" appropriately, according to the institution's niche and

student profile. Internal research should be conducted regularly to assess the financial profile of the student body to estimate the impact of tuition increases on enrollment.

A third component to monitor is place. The location of a college or university plays an important part in the institution's image, its market niche, and relationship among competing institutions. Colleges and universities, particularly small institutions, need to analyze how students and the community view the institution's location. Enrollment patterns and trends should be studied to identify students' home residence. The location of an institution is particularly critical for attracting the high school market. Location can be either a positive factor or negative factor. The positiveness or negativeness of a location is not static. It changes over time. Facilities and location play an important part in the ability of an institution to attract and maintain its market share. A number of strategies to capitalize on location have been used by institutions. Many institutions, such as Davenport, have used a branching strategy to establish branch campuses and attendance centers in locations with growing populations and needs for higher education. Students should be surveyed annually to determine perceptions of the institution's environment.

The fourth "P" of marketing to manage is promotion. College and university administrators have found it essential to promote the product. Care should be taken to promote the institution and its products honestly and ethically. Marketing and admissions plans and activities that maintain and/or increase market share are critical

for the survival of colleges and universities. As the results from this study indicated, some marketing/admissions activities and people are more influential than others. It is important for institutions to identify the activities and people most influential in the college choice process and target resources and efforts accordingly.

Competition for students and dollars is at an all-time high. Institutions most vulnerable are small colleges with a relatively narrow appeal. Institutions need to conduct on-going research to assess the changing environment. Yet, it is often the small institutions which do the least market research. The 1990's will likely see more small colleges close their doors. Conducting research is essential if small colleges are to continue to provide students the opportunity to make choice decisions to attend their institutions.

In the past, colleges have all too often relied on instincts to guide the selection and implementation of strategies to market the institution and its programs. Within an increasingly competitive marketplace, and the more general use of marketing by institutions of higher education, the competition for students is likely to continue and most probably increase. Research, such as this study, can provide administrators with data to plan, develop, and implement strategies that can assist an institution to grow and prosper in the 1990's.

APPENDICES

APPENDIX A

COVER LETTER AND SURVEY

COVER LETTER

Dear

The purpose of this letter is to ask your help in conducting a study for a Ph.D. dissertation at Michigan State University. Studying how and when students choose a college can help us do a better job in our admissions program.

You can make an important contribution to Davenport's admissions program for future students by completing the enclosed survey.

Please complete the survey today, if at all possible, but no later than May 10. A stamped, self-addressed envelope is enclosed. Your participation is strictly voluntary. You may choose not to complete this questionnaire without penalty. You indicate voluntary agreement to participate by completing and returning this survey.

Students are Davenport's most important customer! Please help us do a better job. Complete and return your survey today! Responses will be confidential.

Sincerely,

Barbara Mieras
Vice President for Enrollment

cak

Enclosures: Survey
Stamped, self-addressed envelope

STUDENT SURVEY

Thank you for participating in this survey. It is important that you complete all parts of the survey. Please respond to one of the choices listed for each item.

1. Freshman 1st term ____ 2nd term ____ 3rd term ____
2. Male ____ Female ____
3. County of Home Town Residence
 Kent ____
 Ottawa ____
 Other _____ (please specify)
4. When did you first consider Davenport College as a possible college to attend?
 Before 9th grade ____ Summer before 12th grade ____
 9th grade ____ 1st semester, 12th grade ____
 10th grade ____ 2nd semester, 12th grade ____
 1st sem., 11th grade ____ Summer after 12th grade ____
 2nd sem., 11th grade ____
5. What other colleges and universities did you consider attending?
 Central Michigan University ____
 Ferris State University ____
 Grand Rapids Junior College ____
 Grand Valley State University ____
 Muskegon Business College ____
 Western Michigan University ____
 Other _____ (please specify)
6. Was Davenport College your first choice college to attend?
 Yes ____ No ____
 If no, which college or university was your first choice?

7. Which marketing/admissions activities listed below were influential when you were considering all possible colleges and/or universities to attend?

	Not Influential				Very Influential
a. College brochures	1	2	3	4	5
b. College catalogues	1	2	3	4	5
c. Student quotes about their college experience	1	2	3	4	5
d. Radio messages	1	2	3	4	5
e. TV messages	1	2	3	4	5
f. Billboard messages	1	2	3	4	5
g. Newspaper messages	1	2	3	4	5
h. High school classroom presentation by college admissions representative	1	2	3	4	5
i. Personal visit with college admissions representative at high school	1	2	3	4	5
j. Visit to college campus/interview with an admissions representative	1	2	3	4	5
k. Attending a college open house	1	2	3	4	5
l. Attending a financial aid workshop on college campus	1	2	3	4	5
m. Attending a college day/night fair	1	2	3	4	5
n. Other (please specify)					
_____	1	2	3	4	5

8. Which Davenport College marketing/admissions activities were influential in including Davenport College as a possible college/university to attend?

	Not Influential				Very Influential
a. Davenport College brochures	1	2	3	4	5
b. Davenport College catalogues	1	2	3	4	5
c. Student quotes about Davenport College experience	1	2	3	4	5
d. Davenport radio messages	1	2	3	4	5
e. Davenport TV messages	1	2	3	4	5
f. Davenport billboard messages	1	2	3	4	5
g. Davenport newspaper messages	1	2	3	4	5
h. High school classroom presentation by Davenport College admissions representative	1	2	3	4	5
i. Personal visit with Davenport College admissions representative at high school	1	2	3	4	5
j. Visit to Davenport College campus	1	2	3	4	5
k. Attending a Davenport College open house	1	2	3	4	5
l. Attending a financial aid workshop at Davenport College	1	2	3	4	5
m. Talking to a Davenport College admissions representative at a college night	1	2	3	4	5
n. Attending a Davenport College Career Day	1	2	3	4	5
o. Attending Find Out About Davenport Pizza Party	1	2	3	4	5
p. Other (please specify)					
	1	2	3	4	5

9. Which people were significant influences in considering Davenport College as a possible college to attend?

	Not Influential				Very Influential
a. Parents	1	2	3	4	5
b. High school counselor	1	2	3	4	5
c. Friend	1	2	3	4	5
d. Current Davenport student	1	2	3	4	5
e. Davenport alumni	1	2	3	4	5
f. Davenport admissions representatives	1	2	3	4	5
g. High school teachers	1	2	3	4	5
h. Others (please specify)					
_____	1	2	3	4	5

10. When did you actually decide to choose to enroll (take classes) at Davenport College over other colleges or universities?

Before 9th grade	_____	Summer before 12th grade	_____
9th grade	_____	1st semester, 12th grade	_____
10th grade	_____	2nd semester, 12th grade	_____
1st sem., 11th grade	_____	Summer after 12th grade	_____
2nd sem., 11th grade	_____		

11. Which Davenport College marketing/admissions activities were influential in your choice to actually enroll (take classes) at Davenport instead of another college or university?

	Not Influential				Very Influential
a. Follow-up letters from Davenport staff	1	2	3	4	5
b. Follow-up handwritten notes from admissions representatives	1	2	3	4	5
c. Assistance with completing financial aid forms	1	2	3	4	5
d. Receiving a scholarship	1	2	3	4	5
e. Phone contact from admissions reps.	1	2	3	4	5
f. Phone contact from Davenport alumni	1	2	3	4	5
g. Phone contact from current Davenport students	1	2	3	4	5
h. Local reception for accepted students and parents	1	2	3	4	5
i. Meeting with Davenport faculty member	1	2	3	4	5
j. Other (please specify)					
_____	1	2	3	4	5

12. Which people were significant influences on your choice to actually enroll (take classes) at Davenport College?

	Not Influential				Very Influential
a. Parents	1	2	3	4	5
b. High school counselor	1	2	3	4	5
c. Friend	1	2	3	4	5
d. Current Davenport student	1	2	3	4	5
e. Davenport alumni	1	2	3	4	5
f. Davenport admissions representatives	1	2	3	4	5
g. High school teachers	1	2	3	4	5
h. Others (please specify)					
_____	1	2	3	4	5

COMMENTS: _____

Thank you for your help. Please return survey in the stamped, self-addressed envelope to:

Barbara Mieras
Vice President for Enrollment
Davenport College
415 East Fulton
Grand Rapids, MI 49503

APPENDIX B

OTHER COLLEGES AND UNIVERSITIES STUDENTS CONSIDERED ATTENDING

Other Colleges and Universities Students Considered Attending

<u>Michigan Community/Junior</u>	<u>Michigan Independent Colleges/Universities</u>	<u>Michigan Public Colleges/Universities</u>	<u>Out of State</u>
Alpena Community College Lake Michigan Community College Kalamazoo Valley Community College Mid-Michigan Community College Montcalm Community College Wayne Community College	Alma College Aquinas College (2) Baker College Calvin College (5) Grace Bible College Grand Rapids Baptist College Hope College (5) Jordan College (2) Kendall School of Design (4) Northwood Institute (3) Patricia Stevens Career College Suomi College (2)	Central Michigan University Lake Superior State College Michigan State University Michigan Technological University (3) Northern Michigan University University of Michigan	Anderson College Ball State University (2) California State (2) Christ for the Nations Institute DePaul University East New Mexico State University Graceland College Indiana Institute of Technology Indiana University Liberty University Memphis State University New Mexico University Northern Illinois University Northwestern University S. E. Academy Taylor University Texas University The Ohio State University University of Nevada, Las Vegas University of Southern California, Los Angeles University of Washington Vincennes University

Note: Multiple responses are indicated in parentheses.

APPENDIX C

OTHER COLLEGES OR UNIVERSITIES IDENTIFIED AS FIRST CHOICE OPTIONS

Other Colleges or Universities Identified as First Choice Options

Aquinas College (2)
Calvin College
California State University (2)
Ferris State College
Grace Bible College
Graceland College
Grand Rapids Baptist College
Grand Rapids Junior College (3)
I.T.T. Technical Institute
Kendall School of Design
Lake Superior State College
Lyola University
Mid-Michigan Community College
Northern Michigan University
Northwestern University
Northwood Institute
Patricia Stevens Career College
S. E. Academy
Texas University
University of Nevada, Las Vegas
Vincennes University
Wayne Community College
Western Michigan University

Note: Multiple responses are indicated in parentheses.

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