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# Community College Student Affairs Administrators' Perceptions Regarding Intercollegiate Athletics

Lucynda Daphne Holland  
*Clemson University*

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COMMUNITY COLLEGE STUDENT AFFAIRS ADMINISTRATORS'  
PERCEPTIONS REGARDING INTERCOLLEGIATE ATHLETICS

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A Dissertation  
Presented to  
the Graduate School of  
Clemson University

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In Partial Fulfillment  
of the Requirements for the Degree  
Doctor of Philosophy  
Educational Leadership

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by  
Daphne Lucynda Holland  
August, 2009

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Accepted by:  
Dr. Frankie Keels Williams, Committee Chair  
Dr. Tony Cawthon  
Dr. Barbara Griffin  
Dr. James Satterfield

## ABSTRACT

The purpose of this study was to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. Participants were student affairs administrators selected from community colleges within the southeastern region of the United States. The researcher sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. In addition, the researcher sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

Using a quantitative cross-sectional survey research design, data regarding community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) were collected from a web-based survey. Results from the descriptive analysis of the first research question showed that the majority of community college student affairs administrators' had positive perceptions of the five variables. Results from correlation analysis of the second research question showed no significant relationship existed between community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five

variables and student enrollment. Results from correlation analysis of the third research question showed a significant relationship existed between community college student affairs administrators' perceptions of intercollegiate athletics in terms of attractiveness of institution and retention rate. No significant relationships existed between the other five variables and retention rate. While the study yielded significant findings in regard to attractiveness of institution and retention rate, more research is needed on community college administrators, faculty, staff, and students regarding intercollegiate athletics' variables of student engagement, attractiveness of institution, institution spirit, support of mission, and financial earnings.

## DEDICATION

This dissertation is dedicated to all the strong women in my life who encouraged and inspired me to relentlessly strive and accomplish goals I never imagined I could.

"If you have knowledge, let others light their candles in it." — Margaret Fuller

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## CHAPTER ONE

### INTRODUCTION

Athletic programs on community college campuses provide opportunities for students to better connect to the institution through various forms of participation, thus prompting an increase in on-campus engagement outside the classroom and connectivity to the institution (Ashburn, 2007; Ethington, 2000; Jenkins, 2006; Perry & Raepple, 1980; Williams, Byrd, & Pennington 2008; Williams & Pennington, 2006). In addition to encouraging student connectedness through student engagement, Jenkins (2006) reported that intercollegiate athletics foster enrollment growth and increase retention rates. Moreover, researchers have shown athletics are integral to community college students' collegiate experiences (Williams, Byrd, & Pennington, 2008).

Intercollegiate athletics are present in almost half of community colleges in the United States (Chen, 2008). These data are supported by community colleges' membership in the National Junior College Athletic Association. Approximately 517 community colleges reported holding memberships within the National Junior College Athletic Association (NJCAA) during the 2008-2009 academic year, and an additional 30 were reported as new members for the upcoming 2009-2010 academic year (National, 2009). The NJCAA is the governing body for intercollegiate athletic programs for two-year colleges. The athletic teams include a variation of men's and women's sports (baseball, basketball, bowling, cheerleading, cross country, fast pitch softball, football, golf, half marathon, ice hockey, indoor track and field, lacrosse, outdoor track and field, soccer, swimming and diving, tennis, volleyball, and wrestling). Intercollegiate athletic

programs on community college campuses provide opportunities for shared activity for all students, potentially creating a sense of connectivity to the institution and the community (Miller & Tuttle, 2007).

Findings from multiple studies (Berson, 1996; Kuh, Kinzie, Schuh, Whitt, & Associates, 2005; Pascarella & Smart, 1991; Wolniak, Pierson, & Pascarella, 2001) indicated that the more engaged community college students were with activities outside the classroom, the more likely they enhanced their overall collegiate experience through tighter connections to the institution. Pascarella and Terenzini (2005) stated, “If individual effort or engagement is the critical determinant of the impact of college, then it is important to focus on the ways in which an institution can shape its academic, interpersonal, and extracurricular offerings to encourage student engagement” (p. 602). The researchers noted that extracurricular involvement had “modest, positive effects on institutional persistence and educational attainment” (Pascarella & Terenzini, 2005, p. 616).

Community college administrators suggested that engaged students remain in school and matriculate to graduation if they feel a sense of connectedness to the institution (Poindexter, 2006). Extracurricular offerings such as intercollegiate athletics were linked to studies that indicated intercollegiate sports participation increased social self-confidence and interpersonal skills (Pascarella & Terenzini, 2005). Furthermore, the evidence indicated that intercollegiate sports also promote educational attainment (Pascarella & Terenzini, 2005).



While the extant of literature includes support substantiating student engagement as an outcome of intercollegiate athletics on community college campuses, difficulty is encountered in stimulating student engagement for the community college student. Nationally, community colleges enroll an estimated 11.5 million students (American, 2008). Many of these students, according to Astin (1984, 1999) commuted to campus, attended on a part-time basis, worked a full or part-time job, and supported a family. These circumstances typically resulted in minimal student engagement in campus activities (Astin, 1984, 1999) and a higher occurrence of student attrition (Tinto, 1993). In addition, community college campuses were predominately non-residential; therefore, community college students were less involved in extracurricular activities (Dougherty, 1992). According to Cohen and Brawer (2003), involving the non-traditional community college student in activities outside their regularly scheduled classes has been difficult. Cohen and Brawer (2003) stated, “Various types of extracurricular activities have been in place since the earliest institutions organized student clubs and athletic events” (p.207).

Although intercollegiate athletics have long been a part of the community college students’ experiences, developing programs on these campuses over the years was erratic due to student or community lack of interest, funding, or inability to comply with gender equity requirements (Byrd, 2007). In addition, minimal research studies exist, which focus solely on intercollegiate athletics and the community college student. In contrast, several research studies on four-year institutions have focused on the role of intercollegiate athletics as a means of engagement outside of the classroom (Knapp, Rasmussen, & Barnhart, 2001; Mangold, Bean, & Adams, 2003; Wolniak, Pierson, &

Pascarella, 2001). The majority of these studies focused on the role intercollegiate athletics play in the lives of college students' on the four-year campuses (Long & Caudill, 1991; Putler & Wolfe, 1999; Shulman & Bowen, 2001; Toma, 1998; Toma & Cross, 1998). Findings from these studies indicated both male and female athletes that participate in either high or low profile intercollegiate athletic programs persisted and graduated at rates well above the national averages and participating in an intercollegiate athletic program benefited students academically.

The few research studies focused on community college intercollegiate athletics were predominately qualitative or were conducted at single institutions. In general, these research studies (Berson, 1996; Burgess, 2006; Byrd, 2007; Cigliano, 2006; Knapp, Rasmussen, & Barnhart, 2001; Nanney, 2008; Williams & Pennington, 2006) explored the perceptions of university and community college students and community college presidents in regards to their perceptions of intercollegiate athletics. Variables used in these studies included institution pride, enrollment, retention, financial support, revenue, and support of the mission statement. General findings indicated community colleges interest in intercollegiate athletics, but concerns with students' interest and budgeting were predominate.

#### *Statement of the Problem*

The lack of community college student engagement outside the classroom posed a challenge to administrators (Astin, 1984, 1999; Chaves, 2006; Pascarella & Terenzini, 2005; Tinto, 1993, 1997;). Decades of research studies consistently reported high attrition rates at community colleges as a major problem (Summers, 2003). Because most

community college students commuted to campus (Astin, 1984, 1999), engagement in campus activities was minimal. In addition, lack of involvement resulted in a lack of connectivity, resulting in higher occurrences of student attrition (Tinto, 1993). According to Tinto (1993), community college students were more prone to leave before accomplishing their academic goals. Tinto (1993) further noted, “The organization of educational institutions, their formal structures, resources, and patterns of association, does impact student retention” (p.89). Astin (1984, 1999) offered similar observations as Tinto, asserting that students found it easier to become involved in campus activities when they identify with the college environment. Intercollegiate athletics utilized as an activity to promote student engagement, may decrease student attrition (Tinto, 1993).

Because the scholarly research regarding intercollegiate athletics at the community college is limited, community college student affairs administrators, historically, have had to rely on the research conducted at the four-year universities (Williams & Pennington, 2006). The inadequate level of information limits community college student affairs administrators from making informed decisions regarding the institutional impacts involving the creation of an intercollegiate athletic program on a community college campus (Williams & Pennington, 2006). Community college student affairs administrators must consider whether their institutions can maintain the level of community and campus pride, student connectedness, and engagement needed to be successful, as well as handle the potential impact on student enrollment and retention. Community college student affairs administrators must also ensure they have the

resources to budget in support of athletic programs and bring in significant revenue, and have the wherewithal to support the mission of the community college.

### *Purpose of the Study*

The purpose of this dissertation research study was to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. Participants were student affairs administrators selected from community colleges within the southeastern region of the United States. The community college student affairs administrators included the position titles of chief student affairs officer, chief student development officer, chief student services officer, and/or chief student activities officer.

More specifically, the study included three major goals. First, the researcher investigated community college student affairs administrators' perceptions regarding intercollegiate athletics. Second, the researcher sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. Third, the researcher sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

### *Research Questions*

The following specific research questions guided the study:

1. What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?
2. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?
3. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?

### *Research Design*

A quantitative study using a survey research design was selected to address sufficiently the research questions in this study. Community college student affairs administrators from among the eleven states within the jurisdiction for accreditation of the Commission on Colleges of the Southern Association of Colleges and Schools (SACS) were selected because of the limited amount of research data available within these states concerning intercollegiate athletics at the community college level. Five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) were included as independent variables (predictor variables) in the study. Two variables student enrollment and retention rate were used as the dependent variables (criterion variables) in the study. The researcher collected data using the web-based survey instrument, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire* (see Appendix A for the research

study questionnaire). Prior to conducting the research study, a pilot study was conducted to measure the face and content validity and reliability of the web-based survey instrument, *Community College Student Affairs Administrators' Intercollegiate Athletics Pilot Questionnaire*. The researcher analyzed the collected data using PASW<sup>®</sup> Statistics GradPack 17.0 for Windows, formerly known as Statistical Package for Social Science (SPSS<sup>®</sup>). The analysis of the data collected for the research study included descriptive statistics and computation of correlations.

### *Conceptual Framework*

The purpose of this research was to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. Figure 1.1 provides an illustration of the conceptual framework of the research study. Data were entered using the web-based survey instrument from community college student affairs administrators.

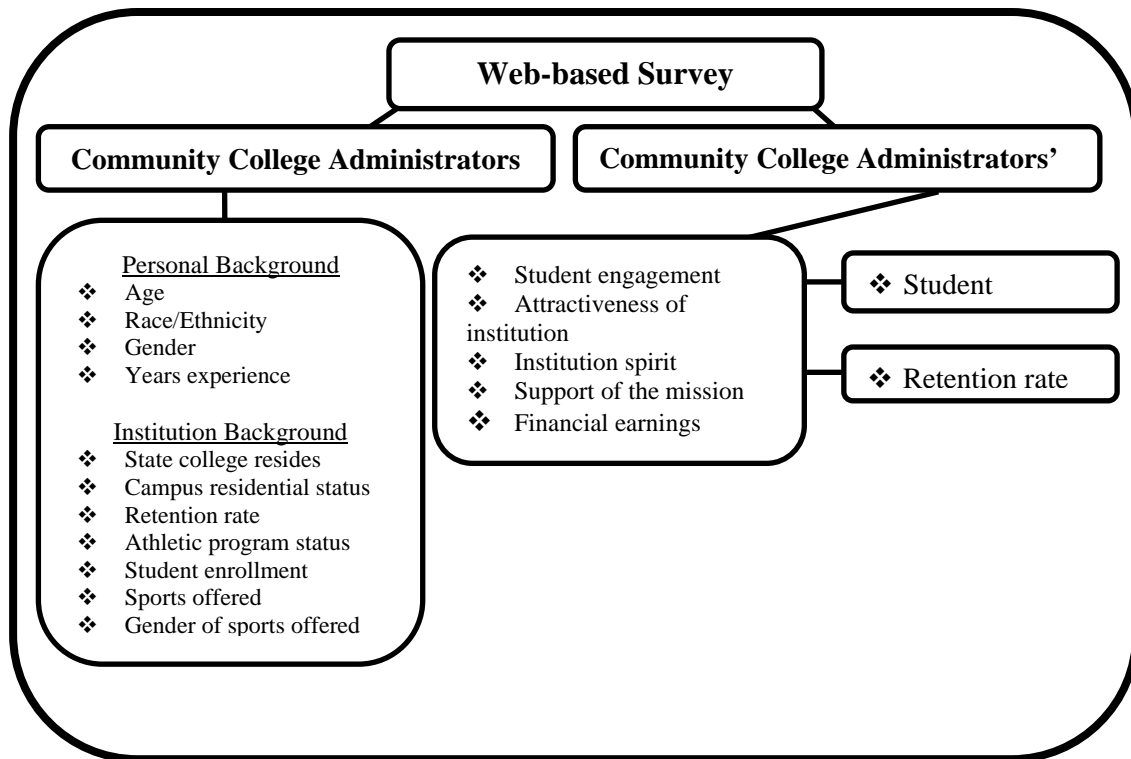


Figure 1.1 Conceptual Framework of the Research Study

The researcher gathered descriptive variable information to include personal and institutional background data. Personal background data included age, race/ethnicity, gender, and years experience working as an administrator in higher education. Institutional background data included state college resides, campus residential status, retention rate, athletic program status, student enrollment, sports offered, and gender of sports offered. To answer the research questions, community college student affairs administrators' perceptions of intercollegiate athletics regarding the five independent variables were collected. These variables included student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. Dependent

variables included student enrollment and student retention as displayed in the conceptual framework.

### *Theoretical Framework*

Student development theories and models offer understanding of students and their collegiate experiences. Currently, several student development theories and models exist to assist researchers in better understanding student behavior. Ortiz (1995) argued that popular student development theories were developed from and based on traditional student populations, which often prohibits direct application of such theories in the community college setting. However, particular elements of existing theories and models assist researchers in finding relevance to the community college student.

Pike and Kuh (2005) traced the origins of Student Engagement Theory from the works of Astin and Pace in the 1980s, and extended through to the 1990s by Kuh and his colleagues. However, Astin can be traced back even further to the mid 1970s where the roots of his theory of student involvement originated in a longitudinal study of college dropouts (Astin, 1975, 1984, 1999). Astin (1975) found that a students' ability to identify with an institution made it easier for the student to become involved in the college environment. Although these educational researchers used a variety of terminology to describe their views toward student engagement, they all shared the same basic train of thought that students learn from what they do in college (Pike & Kuh, 2005). The most prominent and relevant student engagement theories and models include Astin's (1975, 1993, 1984/1999) Theory of Student Involvement, Tinto's (1975, 1993) Interactionalist



Theory of Student Persistence and Student Integration Model, and Pace's (1979b, 1984) Model of College Impress.

### *Definition of Terms*

The following are definitions of terms used in this research study.

*Attractiveness of institution* refers to students' attraction to a particular institution due to their intercollegiate athletic program (Williams & Pennington, 2006).

*Community college student affairs administrators* represent community college student affairs personnel with the closest link to students by function. Community college student affairs sample titles included but were not limited to one of the following positions of chief student affairs officer, chief student development officer, chief student services officer, and/or chief student activities officer.

*Financial earnings* refer to resources needed to monetarily sustain a program or project (Williams & Pennington, 2006).

*Institution spirit* references personal value a student places on identifying with an institution (Williams & Pennington, 2006).

*Intercollegiate athletics* refer to intercollegiate athletic programs at community colleges holding memberships within the National Junior College Athletic Association (NJCAA) (National, 2009).

*National Junior College Athletic Association* (NJCAA) is the governing body for intercollegiate athletic programs for two-year colleges (National, 2009).

*Retention* refers to students' status of continual matriculation within an active program towards completion (Williams & Pennington, 2006).

The *retention rate* is the pace at which a student continues to matriculate within an active program towards completion (Williams & Pennington, 2006).

*Revenue* refers to the funds received from an outside source (Williams & Pennington, 2006).

*SACS – Southern Association of Colleges and Schools* is the regional body for the accreditation of degree-granting higher education institutions in the Southern states (Southern, 2009).

*Student engagement* refers to students' expenditure of personal time and effort to become involved in the collegiate events outside the classroom (Astin, 1984, 1999).

*Student enrollment* refers to students' academic status of being enrolled in the institution (Williams & Pennington, 2006).

*Support of the mission* refers to an intercollegiate athletic programs' ability to uphold and demonstrate all aspects of the published academic institutions mission statement (Williams & Pennington, 2006).

### *Significance of the Study*

The results from this study provided more awareness and attention to community college student affairs administrators' perceptions of intercollegiate athletics in regards to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. Such insights are beneficial to community college student affairs leaders as they consider establishing intercollegiate athletic programs to encourage student connectedness and engagement. Furthermore, a need to contribute to the body of knowledge regarding community college intercollegiate athletics is important due to the

limited data available. The findings from this study may allow community college student affairs administrators the opportunity to better understand the perceptions of their peers in regards to the benefits and challenges intercollegiate athletics bring to the community college. This newly acquired knowledge base will provide the foundation of continued implementation of intercollegiate athletic programs as a means of increasing student engagement and student retention.

#### *Delimitations*

The research study focused on a regional group of community college student affairs administrators within the Southern Association of Colleges and Schools. The research study was further delimited to student affairs administrators that held positions such as chief student services officer, chief student development officer, chief student affairs officer, and/or chief student activities officer. The use of the survey design was bound to the self-reported data of these participants' perceptions of intercollegiate athletics' in relation to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. The intent of this research study was to add to the minimal body of knowledge pertaining to community college intercollegiate athletics.

#### *Organization of the Study*

This research study is divided into five chapters. The first chapter included an introduction to existing literature and research pertaining to intercollegiate athletics on the community college campus. The statement of the problem and the purpose of the study followed the introduction. The research questions, overview of the research design,

and definition of terms were provided. Last, the significance of the study and the delimitations of the study concluded the first chapter.

The second chapter provided a review of the literature on intercollegiate athletics and the community college student. Other topics linked with community college athletics included student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings at the community college.

The third chapter covered the research design and methodology, research questions, and the survey instrument design. Chapter Three also presented information on the data collection, statistical procedures, and data analysis procedures.

The fourth chapter presented the results from the analysis of the data collected for the research study. Descriptive tables and narratives were used to report the findings of the study.

The fifth chapter included a summary of the findings, and conclusions of the study. Recommendations for future research were also presented.

## CHAPTER TWO

### LITERATURE REVIEW

The purpose of this chapter is to present a summary review of the existing literature and research related to intercollegiate athletics and the community college. Topics related to intercollegiate athletics in community colleges cover student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. The literature review begins with an historical overview of intercollegiate athletics and the community college. This section is followed by a review of literature and research to include the topics of student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings in relation to intercollegiate athletics at the community college. The chapter concludes with a theoretical overview of Astin's (1975, 1993, 1984/1999) Theory of Student Involvement, Tinto's (1975, 1993) Interactionist Theory of Student Persistence and Student Integration Model, and Pace's (1979b, 1984) Model of College Impress.

#### *Historical Overview of Intercollegiate Athletics and the Community College*

Historically, for the four-year university, according to Gerdy (1997), "A successful athletic team offered a common activity that an increasingly fragmented university community could rally around, thereby promoting the old college spirit" (p.30). From the first intercollegiate athletic contest, a boat race, between Harvard and Yale in 1852 to the 21<sup>st</sup> century, students and communities have embraced athletics (Gerdy, 1997). Shulman and Bowen (2001) proclaimed, "Intercollegiate athletic programs have become thoroughly institutionalized within American higher education"

(p.1). The American perception that athletics are integral to higher education institutions resonates from within the four-year university student to the non-traditional, community college student. Athletic programs on community college campuses provide a shared activity for all students, thus creating a sense of connectivity to the institution and the community.

Initially, as higher education leaders were moving to incorporate athletics into the academe, little mention was made of the personal and character development benefits associated with athletic participation (Gerdy, 1997). However, in the early 20<sup>th</sup> century, college administrators had to justify athletics place on the university campus. According to Gerdy (1997), administrators argued that participation in athletics supplemented the educational process. College administrators professed that coaches were also teachers and as educators they solidified “the link between athletics and education” (Gerdy, 1997, p.33).

Generally, one of the most serious issues facing college sports was the academic performance of student-athletes. The academic success of most athletes was comparative to that of the student body (Duderstandt, 2003). Duderstandt (2003) further noted many coaches consistently felt a “sense of personal responsibility for the total college experience of their student-athletes, not only athletic but academic and even social as well” (p.200). This philosophy holds true within the overall mission of the community college.

Collectively, community college athletic programs’ public mission statements reflect benefits related to the development of the individual student. Benefits most

commonly cited, like work ethic, self-discipline, sportsmanship, teamwork, pursuit of excellence, and personal development mirrored that of the benefits of the four-year university intercollegiate athletic program. Williams and Pennington (2006) noted that data regarding intercollegiate athletic programs at community colleges was limited and two-year college leaders may not have had the opportunity to learn from the experiences of their colleagues at institutions with long athletic traditions.

Offering or sustaining an intercollegiate athletic program on the community college campus was a relatively new concept, compared to the four-year university. According to Frey (1982), as the junior college movement in the United States grew; it was only a matter of time until the interest in intercollegiate athletics developed. This interest was evident with the foundation of the National Junior College Athletic Association (NJCAA) in 1938. The purpose of the NJCAA is to promote and foster junior college athletics on intersectional and national levels so that results will be consistent with the total educational program of its members (National, 2008). Williams, Byrd, and Pennington (2008), reported that the NJCAA works closely with the National Collegiate Athletic Association (NCAA) to ensure that both 2- and 4- year institutions and student athletes meet certain minimum academic standards.

With the establishment of the NJCAA, many community colleges acquired memberships. The addition of competitive intercollegiate athletic programs to community college campuses fostered a new-found sense of student connectivity to these institutions historically witnessed on four-year college campuses. Since the inception of

the NJCAA over 70 years ago, intercollegiate athletics have slowly become an integral part of college life on many community college campuses.

*Intercollegiate Athletics and Student Engagement at the Community College*

According to Pike and Kuh (2005), several studies have shown that living on campus, as opposed to commuting to college, was positively related to engagement (Astin, 1975, 1984; Chickering, 1975; Chickering & Reisser, 1993). A study conducted by Williams and Pennington (2006) reported community college presidents supported the idea that institutional practices, such as providing athletic programs on the community college campus, promoted student involvement. Pike and Kuh (2005), agreed that the most important institutional factors were thought to be the policies and practices adopted by institutions to increase student engagement.

Moreover, a tremendous amount of research using Astin's (1984, 1999) Theory of Student Involvement identified significant findings attributed to the effects of positive and negative environments on student involvement on a variety of college campuses. The most consistent finding has been that the student's chances of dropping out were substantially greater at a 2-year college than at a 4-year college (Astin, 1984, 1999). According to Astin (1984, 1999), community colleges were places where involvement of both faculty and students seemed minimal provided an explanation for community colleges consistently low levels of student engagement and retention.

Astin (1984, 1999) cited in his research from the 1970s that the negative effects of attending a community college were observed even after the variables of entering student characteristics and lack of residence and work were considered. These findings, both past



and present, presented a reoccurring theme in relation to community college student engagement, which is that the community college student is reportedly less engaged outside the classroom than the university student.

To improve the level of student engagement on the community college campus, intercollegiate athletic programs were implemented to combine the academic and social community of the institution. Community college and four-year institution policy-literature both have recommended out-of-class social involvement enhanced student development and success (Maxwell, 2000; Ortiz, 1995). Researchers who conducted a yearlong investigation of 14 four-year colleges and universities, called the College Experiences Study, found that students who were actively involved in both academic and out-of-class activities gained more from the college experience than those who were not so involved (Kuh, Kinzie, Schuh, Whitt, & Associates, 1991). In addition, both student effort and institutional effort were required to promote student involvement (Kuh, Kinzie, Schuh, Whitt, & Associates, 1991). In regards to the community college, intercollegiate athletic programs provide an opportunity to further encourage student engagement on the campus.

Pascarella and Smart (1991) examined the effects of athletic participation on educational attainment after controlling for various pre-college characteristics. The findings from the Pascarella and Smart (1991) study indicated that intercollegiate athletic participation had a positive impact on students' social involvement during college, satisfaction with their college experience, interpersonal and leadership skills, and motivation to complete their degree.

Kuh, Kinzie, Schuh, Whitt, and Associates (1991) noted the impact of the college experience on students increased when they were more actively engaged in various aspects of college life. Using athletic programs to add to the college experience on the community college campus was identified as a key component to increasing student engagement.

*Intercollegiate Athletics and Attractiveness of Institution at the Community College*

Athletic programs on the community college campus provide additional opportunities for students to become involved and better connected to the institution. Many faculty, staff, and administrators believe athletics attract students to their campuses, thus increasing enrollment. Jenkins (2006) remarked that community college athletic programs “increase enrollment and retention, enable a college to serve a wider variety of students by including athletes, and help foster a sense of community without which a community college is just a college” (p.B13). In addition, a number of college officials believe that winning teams attract more and better applicants because many students are sports fans and because a big-time athletic programs serve much like a national advertising campaign (Jacobson, 2004).

Even at the smaller NCAA Division III (nonscholarship) and NAIA (scholarship) schools, athletics play a significant role in meeting new student enrollment targets (Kurz, Scannell, & Veeder, 2007). Community colleges also share identical pressures as the larger institutions for increased enrollment.

Community colleges are not immune to using athletics to attract new students. According to Ashburn (2007), athletic programs help to legitimize the community college

since many people think that if you don't have an athletics program, you're not a real college.

In 1995, Benedict College, a small, private, co-educational college in South Carolina, reinstated its football program. One year later, the college experienced the highest growth rate of any of the forty-one private Black United Negro College Fund colleges (Lofton & Hamilton, 1996). President David H. Swinton of Benedict College felt the addition of the football program played a key role for the record enrollment growth the college experienced (Lofton & Hamilton, 1996). One Benedict College football player noted that although getting an education was his primary reason for enrolling at Benedict, part of the college's attraction was the football team (Lofton & Hamilton, 1996).

In addition to increasing enrollment, the football team increased revenue for the college. President Swinton stated, "General contributions...from alumni and corporations have been positively impacted. And we expect there will be more contributions" (Lofton & Hamilton, 1996, p.24). President Swinton further affirmed the direct impact the national, state and local exposure had when students chose Benedict College and declared that the football program allowed the college to be a more attractive institution for students looking for a well-rounded college experience (Lofton & Hamilton, 1996).

Certain community college athletic directors believed that adding athletics allowed institutions to attract a special kind of student who might not go to a community college at all if it did not have sports, or would opt instead to go to the nearest four-year college (Boulard, 2008). The researcher observed how athletics enabled the institution to

attract students who before would not have even considered the institution (Boulard, 2008). The attraction of the institution extended not only for student athletes, but for those in the community who become interested. If a two-year college won a league championship in basketball or football, the excitement from the surrounding community can be great (Boulard, 2008).

The Dean of Health, Physical Education and Athletics at Solano Community College in California further supported the idea of maintaining athletic programs on the two-year college campus because of value in attracting new students (Boulard, 2008). Boulard reported that the goal was to attract students who would normally not attend college. Further, Boulard stated, “Once such students, attracted to a two-year college’s athletic offerings, are enrolled, they are often more likely to remain in college, according to several athletic directors and physical education deans” (Boulard, 2008).

Another example of how athletics attract students to an institution is known as the “Flutie Factor,” which was coined after the historic 1984 college football face-off between Boston College (Massachusetts) and the University of Miami (Florida) (Boulard, 2008). According to reports, when Doug Flutie played for Boston College and effectively won the game that gave Boston the league championship, applications to Boston College for the next semester increased substantially (Boulard, 2008). Boston College officials reported an increase in interest towards their institution due to having a winning team. However, in regards to the community college, they were reluctant to profess that a winning athletics program actually does generate more interest at the two-year level, but there are many community college leaders who think it does (Boulard, 2008).

At Adrian College in Michigan, college officials anticipated the addition of an ice arena, football and baseball stadiums, a track, and a dozen tennis courts in 2005 would attract more students to their campus (Sander, 2008). The addition of athletic facilities resulted in a 57% increase in enrollment in 2005. More than half of those incoming students participated in varsity sports (Sander, 2008). In addition, administrators at Adrian College were optimistic that athletics recruiting would be a lasting antidote to the sinking enrollment and moribund student life that had plagued the institution (Sander, 2008). The college's president further noted that offering additional sports to students attending Adrian College was the key element in attracting more students to the college, thus increasing enrollment (Sander, 2008).

#### *Intercollegiate Athletics and Institution Spirit at the Community College*

Intercollegiate athletics on community college campuses provide a unique opportunity for social integration not often found on community college campuses. A study was conducted by Williams and Pennington (2006) in which community college presidents in six states were surveyed regarding their perceptions of intercollegiate athletics' ability to increase enrollment, enhance pride in the institution, and support the mission of the community college. The researchers concluded that many community college leaders believe that intercollegiate athletics increased pride in the community college among current students and the general community (Williams & Pennington, 2006).

Tinto (1997) pointed out that academic involvement promoted social involvement. However, according to Mangold, Bean, and Adams (2003) social

involvement does not promote academic involvement. Even so, the researcher advocated that community college leaders should not be deterred from offering athletics. Mangold, Bean, and Adams (2003) stated, “One of the benefits attributed to college sports programs is the ability to bring students together and provide them with a sense of pride and identification with the institution” (pp.543-544). This assertion supported the hypotheses, “Intercollegiate athletic programs would enhance the attainment of institutional goals” (Mangold, Bean, & Adams, 2003, p.543-544).

Chairman of the NCAA’s Division I Board of Directors stated, “Winning football and basketball teams created a sense of community and a kind of social capital that justified their expense” (Suggs, 2004, p.A35). A sense of community was also evident when an increase in school spirit and campus community was experienced at Benedict College in South Carolina, after the reinstatement of their football program. College officials noted the positive effects on both the community and the economy (Lofton & Hamilton, 1996). Coaches and trainers further noted how the football team provided an atmosphere of community togetherness and sense of belonging to the institution (Lofton & Hamilton, 1996). “There is so much spirit behind this thing,” proclaimed Head Coach Harold Jackson (Lofton & Hamilton, 1996, p.24).

#### *Intercollegiate Athletics and Support of the Mission at the Community College*

Minimal research has been conducted on the role of intercollegiate athletics in regards to community college education or relevance to the mission of the community college. Chen (2008) asserted that a lack of clarity even existed in the conclusions formulated from studies conducted on four-year institutions in reference to the relevance

to education or mission. Chen (2008) cited differing student bodies, educational missions, and relationships to the community were applicable at the two-year colleges. From their beginning, community colleges have operated as open-door admissions institutions with a shared mission of providing students with an accessible, adaptable, and affordable 2-year education (Abelman & Dalessandro, 2008). This shared sense of purpose, according to Abelman and Delessandro (2008), has the capacity to inspire and motivate those within an institution and to communicate to external constituents.

Mission statements at the community college have evolved to meet the demands of the changing economic climate and the needs of its students (Abelman & Dalessandro, 2008). Abelman and Dalessandro (2008) reported that successful community college leaders must invest in organizational renewal and in a reinterpretation of the mission, philosophy, functions, and modus operandi of the institutions they serve. In addition, community college leaders must articulate the adaptive challenges ahead if colleges are to respond to learner needs in a rapidly changing environment (Ayers, 2002). Abelman and Dalessandro (2008) further stated how mission statements typically defined the physical, social, fiscal, and political contexts of the institution. Community college mission statements continued to communicate a dedication to open access, workforce and economic development, comprehensiveness, and quality (Ayers, 2002).

For many community colleges, determining what the mission of the institution should be was deemed a difficult task (Dougherty & Townsend, 2006). Dougherty and Townsend (2006) stated, “When community college administrators consider the mission of the institution, they should consider public statements by authoritative policymakers

and community college leaders as well as examine the operations and effects of the institution” (p. 6).

In regard to the mission of national athletic organizations, the NJCAA believed that athletics enhanced community college life and brought more students and more money to the colleges. Community colleges that offer intercollegiate sports regarded the athletics programs as an integral part of the education they offer (Chen, 2008). According to the NJCAA website (2009), the purpose of this corporation shall be to promote and foster junior college athletics on intersectional and national levels so that results will be consistent with the total educational program of its members.

In addition to the NJCAA mission and purpose, the California Commission on Athletics (2008) provided a meaningful account of the value of intercollegiate sports in the community college setting:

Sports are educational in the best sense of that word because they teach the participant and the observer new truths about testing oneself and others, about the enduring values of challenge and response, about teamwork, about discipline and perseverance. Above all, intercollegiate contests — at any level of skill — drive home a fundamental lesson: goals worth achieving will be attained only through effort, hard work and sacrifice, and sometimes even those will not be enough to overcome the obstacles life places in our path. (Chen, 2008)

A paper presented by Tucker (1992) analyzed whether athletics indeed contributed to the academic mission of colleges and universities. Tucker concluded in his



empirical analysis that “big-time football enhances the academic mission through an advertising effect” (p.72). Further, in a study by Perry and Raepple (1980), the researchers reported that most college administrators insisted that intercollegiate athletic programs could be justified only if they contributed to the educational missions of the institutions. With rapid changes in junior and community colleges and the transition to growth or enrollment of older aged students, the changing aggravations and oversight of athletics created a more urgent need for athletic programs to justify their existence as part of the 2-year institution mission (Perry and Raepple, 1980).

Community colleges differ from four-year colleges with their multiple missions and more diverse student bodies. The community college students compared to peers at four-year institutions were more likely to be older, attended part-time, have a more diverse racial makeup, have lower socioeconomic background, and attended for more varying reasons than four-year students (Astin, 1984, 1999; Cohen & Brawer, 1989). The diversity in mission and student body witnessed on the community college campus tended to create normative peer environments that were a part of the socialization that community college students experienced and that socialization differed from the experiences by four-year students (Ethington, 2000, p.704).

According to Gerdy (1997), athletics, to have any relevance within the educational community, must have a connection between its purpose and the purpose of higher education. Gerdy stated, “Coaches and athletic administrators must be aware of the rapidly changing needs of higher education and how their programs can be altered to meet those needs more effectively” (p.21). Williams and Pennington (2006) reported that

the research study findings indicated that leaders of institutions with athletic teams felt athletics promoted community interaction with the college and that athletics supported the mission of the community college.

*Intercollegiate Athletics and Financial Earnings at the Community College*

From the large, Division I universities, to the small rural community colleges, financing intercollegiate athletics on any campus has historically remained a controversial issue due to continual inadequacies between athletic and academic budgets. According to Sylwester and Witosky (n.d.), “Spending on Division I intercollegiate athletics has increased on average about 25%, while university spending has increased on average 10%, after inflation” (p.1A). The yearly cost of maintaining an athletic team remains high as colleges have to account for any increase in scholarships and travel cost. Sylwester and Witosky (n.d) advocated that intercollegiate athletic programs typically did not generate the revenue to keep pace with costs, so they turned to alumni and community donations and increases in student body fees.

Boulard (2008) reported most athletic departments were funded by a combination of student and specific athletic fees, as well as general funds. For decades, athletics departments have relied on private donations, but in recent years, as spending on sports has grown at a rate three times faster than that for spending on the rest of the campus, athletics programs have turned to donors as never before (Wolverton, 2007).

At Benedict College in South Carolina, the return of the long suspended football program in the mid-1990s not only reported a boost in enrollment, but rejuvenated alumni and community support (Lofton & Hamilton, 1996). The return of the football program

gave the city something about which to cheer, along with the positive media exposure generated by the athletic program (Lofton & Hamilton, 1996).

Conversely, in a report released by the Knight Foundation Commission on Intercollegiate Athletics, Jacobson (2004) pointed out that winning athletic teams did not necessarily translate into bigger gifts from alumni or better students in the applicant pool. The report, "Challenging the Myth: A Review of the Links among College Athletic Success, Student Quality, and Donations," contradicted the universal belief that a successful athletic team translated to increased alumni donations and student applications to a college (Jacobson, 2004). Jacobson (2004) shared that Robert H. Frank, professor of economics at Cornell University and author of the report, stated, "If success in athletics does generate the indirect benefits in question, the effects are almost surely very small," (p.A35).

The findings in the report were based on several empirical reports more relevant to big-time college athletic programs, which are typically more expensive to operate than smaller athletic programs. Overall, Jacobson (2004) found that the majority of intercollegiate athletic departments spent more money than they brought in because they competed in a winner take all market in which success was defined by relative performance.

The philosophy supporting the belief that successful sports teams produced an increase in alumni donations and community financial support, in addition to increased student admissions applications was coined the "Flutie Factor" (Jacobson, 2004). Many defenders of the "Flutie Factor" often referred to the 30 percent increase in student

applications to Boston College (Jacobson, 2004). According to a Boston College official, student applications increased only 12 percent in 1985 and decreased the following year (Jacobson, 2004). In addition, the College reported that it never observed a positive correlation between Mr. Flutie's glory days and an increase in alumni donations or student applicants (Jacobson, 2004).

Peter Orszag of the Brookings Institution, supported opponents of the “Flutie Factor,” and stated, “Winning teams in either football or basketball do not necessarily lead to increases in donations, but they do correlate with increases in student applications” (Jacobson, 2004, p. A35). Alumni donations and applications for admission sometimes rise in the wake of conspicuously successful seasons at a small number of institutions, but such increases are likely to be both small and transitory (Jacobson, 2004).

#### *Research Related to Intercollegiate Athletics at the Community College*

Intercollegiate athletics have formally existed on the community college campus since 1938. During its charter meeting in Fresno, California in 1938, the National Junior College Athletic Association (NJCAA) had its constitution accepted and became a functioning organization. Nevertheless, over the past 70 years, minimal research has been conducted in regard to intercollegiate athletics on the community college campus.

Williams and Pennington (2006) stated, “Data regarding intercollegiate athletic programs at community colleges is limited, and two-year college leaders may not have had the opportunity to learn from the experiences of their colleagues at institutions with long athletic traditions” (p.92-93).

In 2006, Cigliano conducted a phenomenological qualitative study to examine the economic, institutional, and human impact of athletic programs at community colleges in the Tennessee Board of Regents community college system. The purpose of the study was to determine how the athletic programs affected the benefits, or lack of benefits, for students, the institutions, and the communities. Due to the type of research methodology used, Cigliano (2006) was unable to make generalizations; however, he was able to gather perceptions of several groups of individuals pertaining to the impact of athletic programs at their respective institutions. Participants in the study included two presidents, two athletic directors, two coaches, and four student-athletes (Cigliano, 2006). From the participant feedback, Cigliano (2006) made several conclusions in regard to the economic, institutional, and human impact of intercollegiate sports specific to community colleges in the Tennessee Board of Regents community college system. In reference to the economy, Cigliano (2006) reported that some institutions cut programs, some eliminated programs that were not cost effective, and others required athletic departments to raise private funds. Cigliano further explained the depth of community colleges' reliance on student fees, FTE, scholarships, staff, and facilities to serve athletes who were full-time students (Cigliano, 2006). Participants also noted their athletic programs were very frugal and provided opportunities to a large number of students. Participation in athletics was determined a powerful motivator to succeed in academics (Cigliano, 2006).

In 2006, Burgess conducted a qualitative multi-site case study to learn more about the perceptions of selected community college presidents regarding intercollegiate athletics at selected community colleges. Due to the type of research methodology used,

Burgess (2006) was unable to make generalizations; however, three themes emerged from the data. The first theme, *The Mission of the Institution Directs the Athletic Program*, indicated that the mission of the college drove the athletic department (Burgess, 2006). Several benefits were reported by Burgess (2006) in the second theme, *Athletic Programs Provide Benefits to the Institution, Students and the Community*. Burgess reported benefits for students were the opportunity for student athletes to participate in athletics and be exposed to post secondary education, access to higher education, access for first generation college students to higher education, and the opportunity to set and achieve goals, both academic and athletic. Other reported benefits were opportunities for students to become engaged into the education process and the community college culture as well as provide the community with entertainment activities. Burgess (2006) further reported a sense of togetherness of the student body was perceived as valuable to the campus by the majority of participants in this study. Burgess' final and third theme, *Athletic Programs Have Some Challenges within the Campus and Local Community*, revealed that participants perceived that money corrupts and creates a blind ambition to win at all costs. Overall, from the findings Burgess (2006) concluded that community college intercollegiate athletics need to be in alignment with the mission and educational objectives of the institution.

Byrd (2007) conducted a quantitative study using survey research design in which she created a survey instrument to investigate the perceptions of community college presidents and board of trustee chairs' on how and why intercollegiate athletic programs were established, continued, or terminated at community colleges in North Carolina. The

delimitations of Byrd's study included North Carolina community colleges' limited amount of athletic programs and North Carolina was the only state surveyed. The findings from Byrd's (2007) study suggested that North Carolina community college presidents and board chairs felt they should be actively involved in decisions to initiate, continue, or terminate intercollegiate athletics programs at community colleges. Byrd (2007) also reported significant differences between the presidents and board chairs' understanding of the process of establishing a new intercollegiate athletic program, compliance with Title IX, and the funding process. In terms of implications for further research, Byrd suggested the need to explore private funding for community college athletic programs and the role of the board of trustees in establishing teams. Further implications were to encourage community support, advance private funding sources, and determine if athletics encourage local students to continue their education (Byrd, 2007).

In 2008, Nanney conducted a comparative case study of two community colleges to determine why one North Carolina community college fielded athletic teams and why a comparable one did not. Due to the type of research methodology used, Nanney (2008) was unable to make generalizations. Nanney's data revealed themes to include enrollment and admissions, fundraising and funding, and publicity and marketing.

Community college intercollegiate athletic programs may perhaps attract more students and increase enrollment, while encouraging campus and community pride (Chen, 2008). According to Chen (2008) the educational value of athletics in higher education will continue to generate controversy and with the uncertainty of funding sources, the future could be ambitious.

### *Theoretical Framework*

A variety of student development theories and models exist to help researchers better understand student behavior. However, Ortiz (1995) argued that because popular student development theories were developed from and based on traditional student populations, application of these elements in the community college setting have historically been difficult. Even so, certain elements of existing student development theories and models have assisted researchers in making connections to the community college student. Developers of these student development theories and models for the traditional college student (Astin, 1984, 1999; Pascarella & Terenzini, 2005; Tinto, 1993, 1997) agreed that student engagement and student attrition pose the greatest challenge for four-year college administrators, which can also be said for the community college administrator.

Pike and Kuh (2005) traced the origins of Student Engagement Theory from the works of Astin and Pace in the 1980s, and extended through to the 1990s by Kuh and his colleagues. Astin can be traced back even further to the mid 1970s where the roots of his theory of student involvement originated in a longitudinal study of college dropouts (Astin, 1975, 1984, 1999). Astin (1975) found that a student's ability to identify with an institution made it easier for the student to become involved in the college environment.

The most prominent and relevant student engagement theories and models include Astin's (1975, 1993, 1984/1999) Theory of Student Involvement, Tinto's (1975, 1993) Interactionist Theory of Student Persistence and Student Integration Model, and Pace's (1979b, 1984) Model of College Impress.



### *Alexander Astin's Theory of Student Involvement*

Alexander Astin's (1984, 1999) Theory of Student Involvement combines participation on the student's part with the encouragement of the instructor, administrator, or other student personnel. Astin (1984, 1999) defined student involvement as "the amount of physical and psychological energy that the student devoted to the academic process" (p. 518). Astin explained, "It is not so much what the individual thinks or feels, but what the individual does, how he or she behaves, that defines and identifies involvement" (p. 519). Astin's (1984, 1999) theory includes five basic postulates:

1. Involvement refers to the investment of physical and psychological energy in various objects.
2. Involvement occurs along a continuum.
3. Involvement has both quantitative and qualitative features.
4. The amount of student learning and personal development associated with any educational program is directly proportional to the quality and quantity of student involvement in that program.
5. The effectiveness of any educational policy or practice is directly related to the capacity of that policy or practice to increase student involvement.

Astin (1999) suggested a practical application of his theory which included an institution finding an approach that would "stimulate students to get more involved in the college experience" (p.527). If campus involvement of the non-traditional, community college student is so critical to the enrichment of students' college experience, then it is important for community college administrators to concentrate on the various ways in which to shape the colleges extracurricular offerings to encourage student engagement (Pascarella & Terenzini, 2005). Theoretically, intercollegiate athletic programs,

especially successful programs, should have a positive effect on the creation of social communities (Mangold, Bean, & Adams, 2003, p.543). Mangold, Bean, and Adams (2003) further hypothesized that intercollegiate sports facilitate and sustain the development of social communities, adding that there is no reason to deny the function and meaning sports play on a student.

Astin's (1975, 1984, 1999) Theory of Student Involvement also complements Tinto's (1975, 1986, 1993) Theory of Student Persistence. Tinto's (1993) theory asserts that the matching between the student's motivation and academic ability and the institution's academic and social characteristics help shape two underlying commitments: (a) commitment to an educational goal, and (b) commitment to remain with the institution (Cabrera, Nora & Castaneda, 1993). Tinto (1997) further noted that numerous researchers have pointed out (e.g., Astin, 1984; Mallette & Cabrera, 1991; Nora, 1987; Pascarella & Terenzini, 1980; Terenzini & Pascarella, 1977) the greater students' involvement or integration in the life of the college, the greater the likelihood that they will persist.

*Vincent Tinto's Theory of Student Persistence and Student Integration Model*

Tinto's (1975, 1986, 1993) Theory of Student Persistence investigated and reviewed longitudinal studies on student attrition (Metz, 2002). Inspired by the work of Durkheim (1953) and Spady (1970), Tinto used the idea of egotistical departure, a person's inability to become integrated into a community and focused it on the four-year college student to explain student departure (Metz, 2002). Tinto then incorporated the components derived from his work with Cullen (1973) to develop his theory of student departure.

Tinto's original theoretical model of attrition and persistence included the following components: (a) pre-entry attributes; (b) goals/commitment; (c) institutional experiences; (d) integration; (e) goals/commitment; and (f) outcome. The third component was essential in forming the foundation for Tinto's (1975) Theory of Student Persistence. Tinto's theory suggests that students arrive at college with certain expectations and aspirations, and their ability to integrate into the college environment depends on institutional influences such as faculty-student interaction, peer group interaction, and extracurricular involvement that help shape their progression through college (Metz, 2002). Positive interaction and involvement in the college environment promote the possibility of increasing overall student retention.

In 1987, Tinto revised his previous work to include the following five major theoretical bases for developing and understanding the evolving nature of student persistence research: (a) psychological, (b) societal, (c) economic, (d) organizational, and (e) interaction factors (Metz, 2002). Not long after the revision of Tinto's student persistence theory, researchers began to apply its concepts to the community college student. Bers (1988) and Halpin (1990) were some of the initial researchers to suggest Tinto's model could be applied to two-year colleges (Metz, 2002).

In addition to his Theory of Student Persistence, Tinto (1975, 1986, 1993) initially developed an integration model that placed a greater emphasis on the role of within-institution peer culture called the Student Integration Model (Thomas, 2000). This model postulated the higher the level of social integration, the greater will be the commitment to the institution (Thomas, 2000). Thomas (2000) stated, "Successful

student integration yields a level of satisfaction, which enhances these commitments and positively influences students' intentions to persist on a particular campus" (p.593). Maxwell (2000) explained, "Most reports on social integration have researched the concept, as have the studies on involvement, with measures of contacts with faculty and participation in student organizations" (p.208). The main issue with Tinto's Student Integration Model is that it has been argued to only apply to the traditional four-year college student, and unfortunately, for the community college student, social involvement has a smaller effect (Mangold, Bean, & Adams, 2003). The connection between theory based on the four-year college student and the community college student is a reoccurring theme in most student development theory research. Although students at two-year institutions typically spend less time together outside of the classroom (social interaction) than students at four-year institutions, providing intercollegiate athletics on the community college campus in combination with encouragement to participate by the administration promotes social interaction and opportunity for increased student engagement (Mangold, Bean, & Adams, 2003). "A theory of social integration has become a dominant theme in community college research" (Maxwell, 2000, p.208).

#### *Robert C. Pace's Model of College Impress*

Robert C. Pace developed the Model of College Impress. Paces' perspective is similar to Astin's (1975, 1984, 1999) and Tinto's (1975, 1986, 1993) in that each postulates that the extent to which students' exert their time and efforts in the educational opportunities and activities provided by institutions directly impact their growth and development as a result of attending college (Ethington & Horn, 2007). Examples of

educational opportunities could include involvement in an academic organization or attending a guest lecturer presentation along with other extracurricular activities such as participating in an athletic event or campus social event.

Studies by Pace (1989) and Astin (1993) regarding four-year undergraduates, presented correlations between extracurricular involvement, leadership roles, campus residence and both academic success and degree completion (Maxwell, 2000). Students' efforts in meeting their educational goals combined with successful participation in an athletic program, added to the quality of the athletic programs offered by the community colleges. By Pace's (1979) assertion, these findings theoretically impact the growth of the student in a positive manner.

Pace's (1979) model includes three basic propositions. These three propositions state, (a) the college experience encompasses the events in which students engage while in college; (b) the sense made of these experiences is impacted by the characteristics of the environment and the quality of effort that students expend; and (c) the combination of environment and student effort contributes to student development (Ethington & Horn, 2007). The propositions collectively suggest that the student's engagement in college experiences and their interpretation of those experiences contributes to their development (Ethington & Horn, 2007).

### *Chapter Summary*

The purpose of this chapter was to provide a summary review of the existing research related to intercollegiate athletics and the community college, as well as intercollegiate athletics and student engagement, attractiveness of institution, institution

spirit, support of the mission, and financial earnings at the community college. The literature review began with an historical overview of intercollegiate athletics and the community college. The literature review continued with an examination of existing literature and research on intercollegiate athletics and student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings at the community college. The chapter concluded with a theoretical overview of Astin's (1975, 1984, 1993, 1999) Theory of Student Involvement, Tinto's (1975, 1986, 1993) Interactionalist Theory of Student Persistence and Student Integration Model, and Pace's (1979b, 1984) Model of College Impress. These specific models provided possible explanations to the dynamics of intercollegiate athletics in community college.

## CHAPTER THREE

### RESEARCH DESIGN AND METHODOLOGY

#### *Introduction*

This chapter presents the research design, variables, research questions, and instrumentation. In addition, the chapter covers the preliminary data analysis, sampling, data collection, and final data analysis procedures associated with the research methodology utilized in this study.

The purpose of this research study was to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. There were two primary objectives of this research study. The first objective was to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. The second objective was to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five same variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

#### *Research Design*

Selecting an appropriate research design allowed the researcher to as accurately as possible answer the research questions and control for the experimental, extraneous, and error variances of the particular research problem under study (Kerlinger & Lee, 2000).

Kerlinger and Lee (2000) further suggested that the two basic purposes of research design were to provide answers to the research questions and to control variance.

For this research study, a cross-sectional, quantitative survey research design was used. The administration of the survey was cross-sectional, with the data collected at one point in time. The use of quantitative survey research design allowed the researcher to select participants and administer a questionnaire to collect data at one point in time (Creswell, 2003; McMillan & Schumacher, 2006). The research questions used in the study enhanced the structure of the study and allowed for better focus of the purpose of the study. Survey research design was selected due to its prevalent use in social science research and recognition of being exceedingly flexible and efficient in terms of gathering large amounts of data with minimal cost and effort (Muijs, 2004). Furthermore, the intent of survey design is to emphasize the importance and usefulness of the scientific study of socially and educationally significant problems (Kerlinger & Lee, 2000).

The design of the survey was web-based. Web-based surveys provide efficiency and low cost, which allow for an increase in participant response (Porter, 2004). The following guidelines presented by Dillman, Tortora, and Bowker (1999) were taken into account when designing the questions used in the web-based survey: (a) respondents' inability to receive and respond to web questionnaires due to equipment limitations; (b) the logic of both the computer and the operator; and (c) the likelihood of the questionnaires use in mixed-mode survey situations. In addition, the following eleven principles for designing a web-based questionnaire created by Dillman, Tortora, and



Bowker (1999) to assist in content development and graphic design were also considered.

The eleven principles include the following:

1. Begin with a welcome statement that has energy and is motivational
2. Make sure entire first question is visible on first page
3. Use graphics
4. Limit the length of the questionnaire
5. Avoid open-ended questions
6. Provide questionnaire instructions on how to answer the questions
7. Provide computer operation instructions
8. Double bank questions if they are too long
9. Write questions similar to the format traditionally seen in paper versions
10. Make sure questions scroll smoothly from one question to another
11. Make sure questions can be answered before moving to next question

(Dillman, Tortora, & Bowker, 1999). Descriptive statistics and correlations were run to analyze the data for the study.

### *Research Questions*

The research study was guided by three specific research questions. The conceptual framework, data collection, data analysis, findings, and conclusions were also based on these three research questions. The research questions were as follows.

1. What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?
2. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student

engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?

3. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?

### *Variables*

The researcher gathered personal and institutional background data from community college student affairs administrators. In addition, perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment were collected. As well, perceptions of intercollegiate athletics and the same five variables and student retention were collected as described in the conceptual framework.

Descriptive variable information included both personal and institutional background data. Personal background data included age, race/ethnicity, gender, and years experience working as an administrator in higher education. Institutional background data included state college resides, campus residential status, retention rate, athletic program status, student enrollment, sports offered, and gender of sports offered. The five independent variables (predictor variables) collected were student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. Dependent variables (criterion variables) included student enrollment and retention rate as displayed in the conceptual framework in the first chapter. Table 3.1 lists the variables used in the research study.

Table 3.1  
*Descriptive, Independent (Predictor), and Dependent (Criterion) Variables Used in the Study*

Type of Variable	Variable
Descriptive variable	Age
	Race/Ethnicity
	Gender
	Years experience working as an administrator in higher education
	State college resides
	Campus residential status
	Retention rate
	Athletic program status
	Student enrollment
	Sports offered
Independent (predictor) variable	Gender of sports offered
	Student engagement
	Attractiveness of institution
	Institution spirit
	Support of the mission
Dependent (criterion) variable	Financial earnings
	Student enrollment
	Retention rate

All personal and institutional background data were self-reported and collected using the web-based survey, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*. All perception statements in relation to student engagement, attractiveness of institution, student spirit, support of the mission, and financial earnings were also self-reported and collected from the web-based survey, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*.

### *Population*

The population for the research study consisted of community college student affairs administrators from the eleven states within the jurisdiction for accreditation of the Commission on Colleges of the Southern Association of Colleges and Schools (SACS). Community college student affairs administrators were selected because of lack of research available based on student affairs administrators' perceptions. The SACS accreditation region was selected due to the limited amount of research data available within these states concerning intercollegiate athletics at the community college. The eleven states included Alabama, Florida, Georgia, Kentucky, Louisiana, Mississippi, North Carolina, South Carolina, Tennessee, Texas, and Virginia. Table 3.2 provides a list of the states with the total number of valid email addresses for the population of community college student affairs administrators within the SACS accreditation region.

Table 3.2  
*Population of Community College Student Affairs Administrators per State*

States within SACS accredited region	No. of Community College Student Affairs Administrators per State
Alabama	16
Florida	15
Georgia	25
Kentucky	14
Louisiana	6
Mississippi	14
North Carolina	47
South Carolina	14
Tennessee	11
Texas	53
Virginia	22
Valid email addresses	237

*Note.* The total number represents valid number of email addresses for community college student affairs administrators within the SACS accreditation region.

To obtain email contact information for the population, the researcher first referred to the SACS website homepage to obtain names of every SACS accredited community college. Secondly, the researcher visited institutions' websites to obtain community college student affairs administrators' email contact information.

### *Sampling*

A purposive sampling method was used in this research study. Purposive sampling is a form of nonprobability sampling best characterized by its deliberate effort to obtain representative samples by including presumably typical areas or groups in the sample (Kerlinger & Lee, 2000). The basic goal of purposive sampling is to select participants that are likely to be “information-rich” with respect to the purposes of the study (Gall, Borg, & Gall, 1996). With purposive sampling, the researcher is more inclined to obtain the opinions of the population targeted for the study (Trochim, 2006).

Community college student affairs personnel with the closest link to students by function, who also held one of the position titles of chief student affairs officer, chief student development officer, chief student services officer, and/or chief student activities officer were recruited to participate. Once the emails were obtained, a listserv account was created to send a large number of emails efficiently. The e-mail message from the researcher explained the purpose of the research study and the content of the web-based survey. An excel spreadsheet housed the contact information (state community college resides, community college names, community college student affairs administrators’ names, titles, and email addresses).

The initial email listserv included 282 email addresses. After deleting failed email addresses, the listserv was reduced to 237. Out of the 237 functioning email addresses, 64 (27%) participated in the research study. After the data from each survey response were entered, the researcher searched for missing data. The researcher determined that 13 participants failed to answer the question regarding retention rate for fiscal year 2007-

2008, therefore disqualifying those surveys from use in the study. The final total of utilizable survey responses were 51 (22%). Samples used in correlational research traditionally should be a minimum of 30 (Gall, Borg, & Gall, 1996; McMillan & Schumacher, 2006). The number of useable surveys met the criterion established by other researchers. These researchers agreed that care in selecting the sample is more important than increasing the size of the sample. The appropriate sample size to have for the research study was determined using Cochran's formula (Ahghar, 2008). According to the computation using the formula, 22.0 would be an appropriate sample size for this research study.

#### *Instrumentation*

As mentioned earlier, data were collected using the web-based survey instrument, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*. The web-based survey instrument was used to collect demographic data as well as community college student affairs administrators' perceptions in relation to intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings).

Prior to conducting the research study, a pilot study was conducted using the *Community College Student Affairs Administrators' Intercollegiate Athletics Pilot Questionnaire*. A panel of experts recruited to pilot test the survey instrument was selected by the researcher based on each individual's knowledge and experiences with intercollegiate athletics, community college settings, and/or survey research design. Participants evaluated the survey instrument during the pilot study to measure the survey

instruments' face and content validity and reliability. The researcher considered it to be most beneficial to the pilot study to recruit a minimum of ten participants familiar with the survey content as suggested by McMillan and Schumacher (2006). The majority of community college personnel asked to participate in the pilot study resided in four of the SACS accredited states. These states were North Carolina, South Carolina, Tennessee, and Florida. In addition, one was selected outside the SACS accredited region, New York. Individuals from the SACS accredited states were selected for the pilot study in order to best mimic the types of institutions used in the research study.

Data collected from the pilot study were entered into a database using PASW<sup>®</sup> Statistics GradPack 17.0. Personal and institutional background data were coded and entered into the database. Frequency and mean scores were computed for each variable. Perception statements for each scale were individually coded, and entered into the database (see Appendix B for perception statement codes). New target variables were created for each scale total. Cronbach's Alphas were run to test for reliability of the scale individually and combined. According to Santos (1999), Cronbach's alpha determines the internal consistency or average correlation of items in a survey instrument to gauge its reliability. The cutoff score for an acceptable Cronbach's alpha is .70 (Santos, 1999). The Cronbach's alpha of the combination of all five scales on the *Community College Student Affairs Administrator's Intercollegiate Athletic Pilot Questionnaire* was .864, which revealed reliability in the survey instrument.

The pilot survey instrument, *Community College Student Affairs Administrator's Intercollegiate Athletic Pilot Questionnaire*, also allowed participants to critique the



survey instrument for its face and content validity, reliability and design. The feedback received from the pilot study participants provided the researcher valuable insight when making revisions to the web-based survey instrument.

The final version of the web-based survey instrument, *Community College Administrators' Intercollegiate Athletics Questionnaire*, resulted from revisions made based on pilot study participants' feedback. The web-based instrument was composed of Likert scale items with 30 declarative perception statements. Content for the survey instrument originated from a review of the literature and selected questions from test instruments used in previous research studies with similar content (Knapp, Rasmussen, & Barnhart, 2001; Williams & Pennington, 2006). The researcher modified the test instrument statements and content for the purpose of conducting the research study, which focused on the community college student affairs administrators' perceptions of intercollegiate athletics instead of the university students' perceptions (Knapp, Rasmussen, & Barnhart, 2001) or community college presidents' perceptions (Williams & Pennington, 2006). The *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire* survey instrument was designed to collect data that reflected only community college student affairs administrators' perceptions of intercollegiate athletics.

The following five scales, modified from scales used in a similar research study (Williams & Pennington, 2006) were used.

- (1) Student engagement,
- (2) Attractiveness of institution,

- (3) Institution spirit,
- (4) Support of the mission, and
- (5) Financial earnings.

A Likert scale was used to measure community college student affairs administrators' agreement concerning their perceptions of community college intercollegiate athletics. The participants were asked declarative statements using the following Likert scale options: (a) strongly agree, (b) agree, (c) neutral, (d) disagree, and (e) strongly disagree. The Likert scale provided the researcher with flexibility since the descriptors on a scale can be varied to fit the nature of the question or statement (Gall, Borg, & Gall, 1996; McMillan & Schumacher, 2006).

In addition to the Likert items, personal and institutional background data were gathered from the research study participants. Personal background information from participating community college student affairs administrators included gender, race/ethnicity, age, and years of experience working as an administrator in higher education. Institutional background information included the home state of the community college, community college residential status, student enrollment, retention rate, intercollegiate athletic program status, intercollegiate athletic teams offered, and gender of each team, if applicable.

#### *Data Collection*

Data collection began once approval was received from the Clemson University Institutional Review Board from the Office of Research Compliance at Clemson University (see Appendix C for validation email). Data for the pilot study were collected

using an email survey instrument. Data for the research study were collected using a web-based survey instrument created using Survey Monkey. Survey Monkey is an online service that assists any person interested in creating a professional online survey efficiently and easily (SurveyMonkey, 2009).

The research study began after all revisions to the web-based survey instrument were completed as a result of feedback from the pilot study and a Cronbach's Alpha was conducted to test reliability of the scales. The timeline to complete all data collection for the research study was over a period of three weeks.

The first step in the data collection was to obtain email addresses of potential participants. Once all emails were collected, the researcher created a participant contact list. The obtained email addresses were put into a listserv created by the Clemson University's Clemson Computing and Information Technology (CCIT) department for easier distribution of the research study information.

Once the listserv was created, the researcher sent an informational email that included a link to the web-based survey instrument (see Appendix D for research study informational email). An attachment was included with the email that included a letter with additional information concerning the purpose of the research study along with additional contact information. Several reminder emails were sent after the initial invitation to participate in the study. Data collection ceased on June 17, 2009. The response rate consisted of 51 participants who fully completed the survey instrument.

### *Consideration of Sampling, Measurement, and Non-response Errors*

During data collection, the researcher considered possible coverage, sampling, measurement, and non-response errors (Dillman, Tortora, & Bowker, 1999). Coverage errors occur when all qualifiers of the specified population have no chance to represent the entire specified population (Dillman, Tortora, & Bowker, 1999). These errors are due to unawareness of the participants of the research survey. Sampling errors occur when a small portion of a specified population are surveyed (Dillman, Tortora, & Bowker, 1999). To reduce coverage and sampling error, a large sample size of community college student affairs administrators from eleven states in the southeastern portion of the country were contacted to participate in the research study. Measurement errors occur when questions are answered inaccurately due to inadequate data collection methods (Dillman, Tortora, & Bowker, 1999). To avoid measurement error, the pilot study was conducted to ensure questions were asked in an appropriate and clear manner. Nonresponse errors occur as a result of participants' lack of response to the research survey (Dillman, Tortora, & Bowker, 1999). To lessen the amount of non-responders, two follow-up emails were sent after initial contact was made with participants.

### *Data Analysis Procedures*

Prior to analyzing the data, steps for handling the data as presented by Sproull (2002) were followed, which included coding and editing the data, examining the data for unanticipated findings, entering the data into the computer, summarizing the data, and computing the data using statistical analysis coding procedures. The data collected from the research study were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

### *Preliminary Data Analysis*

Parametric statistics tested for statistical significance based upon certain assumptions about population parameters (Gall, Borg, & Gall, 1996). First, the researcher assumed scores in the population mean were normally distributed. Kerlinger and Lee (2000) stated, “The best-known assumption behind the use of many parametric statistics is the assumption of normality” (p.415). A Kolmogorov-Smirnov test was run, which evaluates whether the data on a quantitative variable are normally distributed (Green, Salkind, & Akey, 2000). The Kolmogorov-Smirnov test allowed for visual examination of the data for normality. Visual examination indicated that the data for the present study were normally distributed.

Again, Cronbach’s alpha was also run to further test reliability of the scales. According to Santos (1999), an acceptable Cronbach’s alpha is .70. Table 3.3 provides the Cronbach alpha scores for each scale items used in the research study.

Table 3.3  
*Cronbach alpha Scores for Instrument Scales*

Item	<i>N</i>	Cronbach alpha
Student Engagement	7	.837
Attractiveness of Institution	6	.847
Institution Spirit	6	.920
Support of Mission	5	.739
Financial Earnings	6	.311
Overall Cronbach alpha	30	.938

The Cronbach alpha scores indicated a high level of reliability for the scales of student engagement, attractiveness of institution, and institution spirit used in the study. Support of mission was also acceptable with a Cronbach alpha of .739. The score for financial earnings was well below acceptable with .311. However, the cumulative Cronbach alpha indicated a score of .938, which was well above the acceptable score of .70, indicating the instrument as a whole was reliable.

To answer the second research question, the combined mean outcome of all perception statements under each item was given a new coded variable. A Pearson *r* correlation was executed to determine if a relationship existed between each new mean coded variable and student enrollment. To answer the third research question, the combined mean outcome of all perception statements under each item was given a new coded variable. A Pearson *r* correlation was also run to determine if a relationship existed between each new mean coded variable and retention rate.

### *Statistical Computations*

The analysis of the data collected for the research study included descriptive statistics and computation of correlations. Descriptive statistics were computed from the self-reported, personal and institutional background information. Frequencies and percentages were reported for the descriptive statistics. For the first research question, means and standard deviations were reported as appropriate.

For the second and third research questions, correlation analyses were to provide for examination of relationships between variables (Sproull, 2002). Means, standard deviations, correlations, and significance were reported as appropriate. The most appropriate method used to analyze the relationship between two continuous variables is called the correlation coefficient (Muijs, 2004). A Pearson  $r$  was used to measure the correlation coefficients. Pearson  $r$  is noted as the most commonly used correlation technique, symbolized by an  $r$  (McMillan & Schumacher, 2006). The degree to which two quantitative variables are related was indicated by the correlation coefficient ( $r$ ), which is a decimal number between .00 and  $\pm 1.00$ . Correlation data were interpreted according to Green, Salkind, and Akey (2000) noting “a correlation of +1 indicates that as scores on strength increase across cases, the scores on awkwardness increases at a constant rate” as well “a correlation of -1 indicates that as scores on strength increase across cases, the scores on awkwardness decreases at a constant rate” (p.236). Therefore, the “strength of the relationship becomes higher as the correlation approaches either +1 or -1 from zero” (McMillan & Schumacher, 2006, p.171).

In addition, for behavioral science research, correlation coefficients of .10, .30, and .50, are interpreted as low, medium, and high (Green, Salkind, & Akey, 2000). The level of statistical significance used was  $p < .01$  and .05. A p-value of .01 was used because using  $p < .01$  reduced the probability of Type I error.

### *Ethical Considerations*

Prior to conducting any data collection, the researcher successfully completed the required training modules in the protection of human subjects. The following documentations were submitted to the Clemson University Institutional Review Board:

1. Application for Exemption Certification by Clemson University Institutional Review Board (IRB);
2. Information Concerning Participation in a Research Study at Clemson University document (see Appendix E for document);
3. The Word 2007 version of the *Community College Student Affairs Administrator's Intercollegiate Athletic Pilot Questionnaire*;
4. The pilot study informational email;
5. The research study informational email; and
6. The Word 2007 version of the *Community College Student Affairs Administrator's Intercollegiate Athletic Questionnaire*.

After submission of all required documentation, the researcher received email confirmation of approval from the Coordinator within the Office of Research Compliance at Clemson University of validation of IRB protocol # IRB2009-127, entitled "Community College Student Affairs Administrators' Perceptions of Intercollegiate Athletics." Attached to the email confirmation were the Clemson University Institutional



IRB's Principal Investigator Responsibilities document and the Clemson University IRB's Responsibilities for Members of the Research Team document.

### *Chapter Summary*

Chapter three provided a thorough explanation of the research design and methodology, and the data collection and data analysis procedures used in this study. For this research study, a cross-sectional, quantitative survey research design was used. Data were collected from community college student affairs administrators from among the eleven states within the jurisdiction for accreditation of the Commission on Colleges of the Southern Association of Colleges and Schools (SACS). Data obtained during the pilot study from the *Community College Student Affairs Administrators Pilot Questionnaire* were tested for reliability using Cronbach's alpha. The Cronbach's alpha of the combination of all five scales from the pilot study was .864, which revealed reliability in the survey instrument. Cronbach's alpha for the survey data was .938. Test for normality of the data revealed a visual interpretation of normality. Data were analyzed using descriptive statistics and computation of correlations. Chapter Four presents descriptive statistics and findings from the correlation data analysis for the research study.

## CHAPTER 4

### ANALYSIS OF THE DATA

#### *Introduction*

The purpose of this chapter is to provide an in-depth summarization of the findings on perceptions of community college student affairs administrators regarding intercollegiate athletics within the eleven SACS accredited states. Participants were community college student affairs administrators selected from community colleges within the southern region of the country. The purpose of the research study was threefold. First, the researcher examined community college student affairs administrators' perceptions of intercollegiate athletics on the community college campus. Second, the researcher sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. Third, the researcher also sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate. Three research questions guided the study.

1. What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?

2. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?
3. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?

#### *Description of the Sample*

A web-based survey instrument was sent to community college student affairs administrators selected from community colleges within the SACS region of the country during spring 2009. The criteria for participation was that the community college student affairs administrator be employed at a community college within one of the eleven states within the jurisdiction for accreditation of the Commission on Colleges of the Southern Association of Colleges and Schools (SACS). The eleven states included: Alabama, Florida, Georgia, Kentucky, Louisiana, Mississippi, North Carolina, South Carolina, Tennessee, Texas, and Virginia.

Applying these criteria resulted in a possible sample size of 237 community college student affairs administrators. Survey responses included 51 participants. Descriptive data were collected on the following personal background demographics that included age, race/ethnicity, gender, and years experience working as an administrator in higher education. Descriptive data were also collected on institutional background demographics to include state college resides, campus residential status, retention rate, athletic program status, student enrollment, sports teams offered, and gender of sports teams offered.

Data were analyzed using descriptive statistics. The findings from the data analysis are presented beginning with demographic (personal and institutional) data. The demographic data findings are followed with the findings for the three research questions.

### *Demographic Data Findings*

The following tables present the frequencies and percentages of the descriptive data collected in regard to the personal and institution background of the population sample.

Table 4.1 presents the frequencies and percentages of the age ranges of the sample. The frequencies and percentages of the age ranges of participants were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

### Demographic Data Analysis

Table 4.1  
*Frequency and Percentage of Age Ranges of Participants*

	<i>N</i>	%
Less than 25	1	2.0
25 to 34	5	9.8
35 to 44	19	37.3
45 to 54	15	29.4
55 to 64	10	19.6
65 or older	1	2.0
Total	51	100.0

The data showed that there were 51 participants in the study. The majority of participants (37.3%) were within the age range of 35 to 44 ( $n = 19$ ). The age ranges of 45

to 54 ( $n = 15$ ) and 55 to 64 ( $n = 10$ ) were close behind with reported 29.4% and 19.6% respectively. In general, participants were over 35 years of age.

Table 4.2 provides the frequencies and percentages of the gender and race/ethnicity of participants. A cross-tabulation of gender and race are presented in the table to provide more specific demographic information. The frequencies and percentages of gender and race/ethnicity of participants were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.2  
*Frequency and Percentage of Gender and Race/Ethnicity of Participants*

	Male		Female	
	<i>N</i>	%	<i>N</i>	%
Native American	0	0.0	0	0.0
Asian or Pacific Islander	0	0.0	1	2.0
Black, African-American	8	15.7	9	17.6
Hispanic, Latino	0	0.0	0	0.0
White, Caucasian	17	33.3	16	31.4
Other	0	0.0	0	0.0
Total	25	49.0%	26	51.0%

These data indicated male ( $n = 25$ ) and female ( $n = 26$ ) participation were almost equal at 49.0% and 51.0% respectively. The majority of participants were White, Caucasian, with the male ( $n = 17$ ) percentage of 33.3 and female ( $n = 16$ ) percentage of 31.4. The percentage of participation of the Black, African-American males ( $n = 8$ ) and females ( $n = 9$ ) were half that of White, Caucasian male and females at 15.7 and 17.6 respectively.

Table 4.3 displays the frequencies and percentages of the community college student affairs administrators' years experience working in higher education as an administrator. The frequency and percentage of community college student affairs administrators' years experience working in higher education as an administrator were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.3  
*Frequency and Percentage of Community College Student Affairs Administrators' Years Experience Working in Higher Education as an Administrator*

	<i>N</i>	%
Less than 1	1	2.0
1 to 4	9	17.6
5 to 9	15	29.4
10 to 14	9	17.6
15 to 19	7	13.7
20 or more	10	19.6
Total	51	100.0%

The data revealed that the majority of participants (29.4%) worked in higher education as an administrator between 5 to 9 years ( $n = 15$ ). The range of 20 or more years ( $n = 10$ ) followed close behind with 19.6%. The ranges 1 to 4 ( $n = 9$ ) and 10 to 14 years ( $n = 9$ ) were tied with both having a reported 17.6%.

Table 4.4 shows the frequencies and percentages of states in which the participants' community colleges were located. The chief student affairs administrators were from the 11 states with colleges accredited by the Southern Association of Colleges

and Schools. The frequencies and percentages of the state residency of community colleges' student affairs administrators were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.4  
*Frequency and Percentage of States Community College Student Affairs Administrators Resided*

	<i>N</i>	%
Alabama	1	2.0
Florida	4	7.8
Georgia	3	5.9
Kentucky	1	2.0
Louisiana	1	2.0
Mississippi	3	5.9
North Carolina	13	25.5
South Carolina	9	17.6
Tennessee	6	11.8
Texas	5	9.8
Virginia	5	9.8
Total	51	100.0%

The data showed the majority of participants resided in North Carolina ( $n = 13$ ) with a percentage of 25.5. South Carolina followed with nine participants (17.6%). Tennessee had six participants (11.8%) and Texas and Virginia both had five participants (9.8%).

Table 4.5 displays the frequencies and percentages of reported student enrollment of participants. The frequencies and percentages of student enrollment were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.5  
*Frequency and Percentage of Reported Student Enrollment of Participants*

	<i>N</i>	%
Less than 1,000	2	3.9
1,000 to 4,999	27	52.9
5,000 to 9,999	12	23.5
10,000 to 14,999	5	9.8
15,000 to 19,999	3	5.9
20,000 or more	2	3.9
Total	51	100.0%

The data indicated the majority of community colleges reported a student enrollment range of 1,000 to 4,999 ( $n = 27$ , 52.9%). The student enrollment range 5,000 to 9,999 ( $n = 12$ ) followed with 23.5%. Overall, the participants worked at colleges that are considered small (S2) to medium (M2) two-year based on Carnegie classifications. A small two year college Carnegie classification reported FTE enrollment between 500 to 1,999 and a medium two year college Carnegie classification reported FTE enrollment between 2,000 to 4,999 (Carnegie, 2004).

Table 4.6 reports the frequencies and percentages of the community colleges' residential status of participants. The frequencies and percentages of community colleges' residential status of participants were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.



Table 4.6  
*Frequency and Percentage of Community Colleges' Residential Status of Participants*

	<i>N</i>	%
Residential	9	17.6
Non-residential	42	82.4
Total	51	100.0%

The data reported an overwhelming majority of participants in the study were from community colleges that were non-residential ( $n = 42$ ) at 82.4%. There were very few participants included in the study who indicated they were from residential ( $n = 9$ ) community colleges.

Table 4.7 shows the frequencies and percentages of the self-reported student retention rate range for fiscal year 2007-2008 of the participants. The frequencies and percentages of the self-reported student retention rates ranges for fiscal year 2007-2008 of the participants were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.7  
*Frequency and Percentage of Student Retention Rate for FY 2007-2008 of the Participants*

	<i>N</i>	%
Below 20%	0	0.0
21% - 30%	3	5.9
31% - 40%	7	13.7
41% - 50%	12	23.5
51% - 60%	17	33.3
Over 61%	12	23.5
Total	51	100.0%

The data showed the majority of the community colleges reported a student retention rate percentage range for fiscal year 2007-2008 between 51% - 60% ( $n = 17$ , 33.3%). The student retention rate range 41% - 50% ( $n = 12$ ) and over 61% ( $n = 12$ ) tied at 23.5%.

Table 4.8 displays the frequencies and percentages of the intercollegiate athletic program status of the participants. The frequencies and percentages of the intercollegiate athletic program status of the community colleges were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.8  
*Frequency and Percentage of Community Colleges With Intercollegiate Athletic Programs*

	<i>N</i>	%
Yes	28	54.9
No	23	45.1
Total	51	100.0%

The majority of community colleges indicated they offered intercollegiate athletics. Findings showed that 54.9% of the community colleges reported yes ( $n = 28$ ) to offering intercollegiate athletics and 45.1% of the community colleges reported no ( $n = 23$ ) to offering intercollegiate athletics.

Table 4.9 shows the frequencies and percentages of years' intercollegiate athletic programs have existed at community colleges. The frequencies and percentages of years intercollegiate athletic programs existed at community colleges were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.9  
*Frequency and Percentage of Years Intercollegiate Athletic Programs Existed at Community Colleges*

	<i>N</i>	%
Less than 1	1	2.0
1 to 4	2	3.9
5 to 9	2	3.9
10 to 14	5	9.8
15 to 19	3	5.9
20 or more	15	29.4
Did not have programs	23	45.1
Total	51	100.0%

The data showed 28 community colleges reported having an intercollegiate athletic program. Of the 28 participants, 15 (29.4%) reported their community colleges had intercollegiate athletics 20 or more years. Other community college participants reported having an intercollegiate program with three offering an athletic program between 15 to 19 years and five offering an athletic program between 10 to 14 years.

For the community colleges that reported not having an athletic program, Table 4.10 displays their plans regarding an intercollegiate athletic program. The frequencies and percentages of community colleges reported not having an intercollegiate athletic program's plan was analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.10

*Frequency and Percentage of Community College Participants who Reported Not Having an Intercollegiate Athletic Program and Their Plans Regarding Beginning a Program*

	<i>N</i>	%
Plan to begin a program	2	3.9
No plans to begin a program	21	41.2
Have programs	28	54.9
Total	51	100.0%

The majority of community college student affairs administrators reported as not having an intercollegiate athletic program have no plans to begin a program ( $n = 21$ , 41.2%). Only two community colleges reported as not having an intercollegiate athletic program ( $n = 2$ ), plan to begin a program (3.9%).

Table 4.11 displays the frequency and percentage of the types of athletic teams offered and the gender of teams. The frequency and percentage of the types of athletic teams offered and the gender of teams were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.11

*Frequency and Percentage of Types of Athletic Teams Offered and Gender of Teams*

Sport	Male		Female		Both		None		Total	
	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%
Baseball	22	43.1	0	0.0	2	3.9	27	52.9	51	100.0%
Basketball	5	9.8	0	0.0	20	39.2	26	51.0	51	100.0%
Bowling	0	0.0	0	0.0	0	0.0	51	100.0	51	100.0%
Cheerleading	1	2.0	5	9.8	8	15.7	37	72.5	51	100.0%
Cross country	0	0.0	0	0.0	1	2.0	50	98.0	51	100.0%
Fast-pitch softball	0	0.0	17	33.3	1	2.0	33	64.7	51	100.0%
Football	2	3.9	0	0.0	0	0.0	49	96.1	51	100.0%
Golf	3	5.9	0	0.0	2	3.9	46	90.2	51	100.0%
Half marathon	0	0.0	0	0.0	0	0.0	51	100.0	51	100.0%
Ice hockey	0	0.0	0	0.0	0	0.0	51	100.0	51	100.0%
Indoor track & field	0	0.0	0	0.0	1	2.0	50	98.0	51	100.0%
Lacrosse	0	0.0	0	0.0	0	0.0	51	100.0	51	100.0%
Outdoor track & field	0	0.0	0	0.0	2	3.9	49	96.1	51	100.0%
Soccer	1	2.0	0	0.0	3	5.9	47	92.2	51	100.0%
Swimming & diving	0	0.0	1	2.0	3	5.9	47	92.2	51	100.0%
Tennis	0	0.0	3	5.9	3	5.9	45	88.2	51	100.0%
Volleyball	0	0.0	10	19.6	0	0.0	40	78.4	51	100.0%
Wrestling	0	0.0	0	0.0	1	2.0	50	98.0	51	100.0%

The data showed basketball ( $n = 25$ ) as being offered at the majority of community colleges either to males ( $n = 5$ ) or both males and females ( $n = 20$ ). In addition, baseball ( $n = 24$ ) was offered for males ( $n = 22$ ) and even for both males and females ( $n = 2$ ). Fast-pitch softball ( $n = 18$ ) predominately known to be offered to only females ( $n = 17$ ) was also offered to both males and females ( $n = 1$ ). Volleyball ( $n = 10$ ) was also reported as a popular sport offered to females ( $n = 10$ ). The participants reported that sports not offered included bowling, half marathon, ice hockey, and lacrosse. In general, the participants reported basketball and baseball as major sports offered at the community colleges.

#### *Data Analysis by Research Question*

This research study was guided by three research questions regarding community college student affairs administrators' perceptions of intercollegiate athletics. The three research questions and results of the statistical analysis are presented in this section.

##### *Research Question One*

The first research question investigated the community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings.

Research question 1: What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?

Descriptive data were collected from the web-based survey instrument and analyzed using PASW<sup>®</sup> Statistics GradPack 17.0 for Windows. The following tables present the means and standard deviations of the community college student affairs administrators from SACS accredited institutions perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. Participants were asked to indicate their agreement or disagreement with declarative statements, which included student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings in regard to intercollegiate athletics on the community college campus. The means in the tables show the measure of central tendency and the standard deviation show the measure of the extent to which the scores deviate from their means (Gall, Borg, & Gall, 1996).

Table 4.12 reports the means and standard deviations of the perception statements regarding student engagement in regards to intercollegiate athletics on the community college campuses. The means and standard deviations of the perception statements regarding student engagement in regards to intercollegiate athletics on the community college campuses were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.12  
*Mean and Standard Deviation of Participants' Perceptions Regarding Intercollegiate Athletics and Student Engagement*

	<i>M</i>	<i>SD</i>
Intercollegiate athletics programs benefit the community college.	4.15	.85
Intercollegiate athletic programs benefit the general student body.	3.96	.89
Most community college students have an interest in intercollegiate athletic events.	2.98	1.10
Intercollegiate athletic sporting events should be attended by the student body regardless of win/loss records.	3.86	.72
Students' memories of their college experiences are enhanced by intercollegiate athletic events.	4.00	.77
Intercollegiate athletic programs increase student engagement outside the classroom.	4.03	.87
Intercollegiate athletic programs encourage students' school spirit and increase their connectedness to the community college.	3.80	1.03
Overall Student Engagement	3.87	.63

The data showed that the majority of community college student affairs administrators strongly agreed that intercollegiate athletic programs benefited the community college ( $M = 4.15$ ) and the general student body ( $M = 3.96$ ), students' memories of their college experiences are enhanced by intercollegiate athletic events ( $M = 4.00$ ), and intercollegiate athletic programs increase student engagement outside the classroom ( $M = 4.03$ ). The participants reported having a neutral perception on the statement, "Most community college students have an interest in intercollegiate athletic



events” ( $M = 2.98$ ). The overall mean score reported by the participants for intercollegiate athletics related to student engagement was  $M = 3.87$ .

Table 4.13 reports the means and standard deviations of the perception statements regarding attractiveness of institution in regards to intercollegiate athletics on the community college campuses. The means and standard deviations of the perception statements regarding attractiveness of institution in regards to intercollegiate athletics on the community college campus were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.13  
*Mean and Standard Deviation of Participants’ Perceptions Regarding Intercollegiate Athletics and Attractiveness of Institution*

	<i>M</i>	<i>SD</i>
There is a proper balance between athletics and academics at community colleges with athletic programs.	3.52	.98
Students enroll in a particular community college because of a specific athletic program.	3.39	1.13
Intercollegiate athletic programs increase overall student retention.	3.49	1.08
Intercollegiate athletic programs increase the graduation rates of the community college.	3.27	1.05
Intercollegiate athletics lead to higher enrollment.	3.59	1.04
Intercollegiate athletics at the community college encourage local students to attend the college.	3.57	1.17
Overall Attractiveness of Institution	3.61	.74

The data revealed overall that community college student affairs administrators’ perceptions of intercollegiate athletics in regard to attractiveness of institution fell between neutral and agree. However, the community college student affairs administrators agreed that intercollegiate athletics lead to higher enrollment ( $M = 3.59$ )

and intercollegiate athletics at the community college encourage local students to attend the college ( $M = 3.57$ ). The overall mean score reported by the participants for intercollegiate athletics related to attractiveness of institution was  $M = 3.61$ .

Table 4.14 reports the means and standard deviations of the perception statements regarding institution spirit in regards to intercollegiate athletics on the community college campuses. The means and standard deviations of the perception statements regarding institution spirit in regards to intercollegiate athletics on the community college campuses were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.14  
*Mean and Standard Deviation of Participants' Perceptions Regarding Intercollegiate Athletics and Institution Spirit*

	<i>M</i>	<i>SD</i>
Intercollegiate athletic programs increase overall community support of the community college.	3.35	1.09
Intercollegiate athletics promote student pride.	3.82	1.01
Intercollegiate athletics promote faculty pride.	3.43	1.19
An athletic team's accomplishments promote a positive reputation of the community college.	3.80	1.15
Intercollegiate athletic programs promote community pride and interaction.	3.86	.94
Intercollegiate athletic programs enhance the community college's atmosphere.	3.92	.98
Overall Institution Spirit	3.84	.74

The data reported community college student affairs administrators agreed that intercollegiate athletics promote student pride ( $M = 3.82$ ), an athletic team's accomplishments promote a positive reputation of the community college ( $M = 3.80$ ),

intercollegiate athletic programs promote community pride and interaction ( $M = 3.86$ ), and intercollegiate athletic programs enhance the community college's atmosphere ( $M = 3.92$ ). The overall mean score reported by the participants for intercollegiate athletics related to institution spirit was  $M = 3.84$ .

Table 4.15 reports the means and standard deviations of the perception statements regarding support of mission in regards to intercollegiate athletics on the community college campuses. The means and standard deviations of the perception statements regarding support of the mission in regards to intercollegiate athletics on the community college campuses were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.15  
*Mean and Standard Deviation of Participants' Perceptions Regarding Intercollegiate Athletics and Support of the Mission*

	<i>M</i>	<i>SD</i>
Intercollegiate athletic programs support the mission of the community college.	3.57	1.02
Intercollegiate athletics encourage involvement of the entire community college student body, whether through participation or attendance.	3.92	1.04
Intercollegiate athletics should be on community college campuses only if they support the mission of the college.	3.98	.93
Intercollegiate athletics should be a part of the community college experience regardless of its support of the mission statement.	2.94	1.22
Intercollegiate athletics promote educational opportunities for students.	3.76	1.18
Overall Support of the Mission	3.77	.70

The data showed community college student affairs administrators agreed intercollegiate athletics encouraged involvement of the entire community college student

body, whether through participation or attendance ( $M = 3.92$ ) and intercollegiate athletics should be on community college campuses only if they support the mission of the college ( $M = 3.98$ ). The overall mean score reported by the participants for intercollegiate athletics related to support of the mission was  $M = 3.77$ .

Table 4.16 reports the means and standard deviations of the perception statements regarding financial earnings in regards to intercollegiate athletics on the community college campuses. The means and standard deviations of the perception statements regarding financial earnings in regards to intercollegiate athletics on the community college campuses were analyzed using PASW<sup>®</sup> Statistics GradPack 17.0.

Table 4.16  
*Mean and Standard Deviation of Participants' Perceptions Regarding Intercollegiate Athletics and Financial Earnings*

	<i>M</i>	<i>SD</i>
A winning athletic program increases overall donations to the community college.	3.80	1.08
Monies spent on intercollegiate athletic programs would be better spent on the general student body.	3.14	1.22
Donations to the community college as a result of a winning athletic program should benefit primarily the athletic program.	2.75	1.07
Revenue funds from intercollegiate athletic events financially benefit the entire community college.	3.50	1.10
Intercollegiate athletic programs are worth the funding needed to maintain them.	3.48	1.10
Alumni donations increase with a successful intercollegiate athletic program.	3.40	1.11
Overall Financial Earnings	3.37	.47

The data indicated community college student affairs administrators agreed a winning athletic program increases overall donations to the community college ( $M = 3.80$ ). Overall, participants perceived financial earnings in regard to intercollegiate athletics on a community college campus neutrally ( $M = 3.37$ ).

Table 4.17  
*Overall Mean and Standard Deviation Scores of Participants' Perceptions Regarding Intercollegiate Athletics*

	<i>M</i>	<i>SD</i>
Student Engagement	3.87	.63
Attractiveness of Institution	3.61	.74
Institution Spirit	3.84	.74
Support of the Mission	3.77	.70
Financial Earnings	3.37	.47

Community college student affairs administrators' perceived intercollegiate athletics as beneficial to student engagement ( $M = 3.87$ ) and attracted students to the institution ( $M = 3.61$ ). In addition, community college student affairs administrators' perceived intercollegiate athletics promoted institutional pride on community college campuses ( $M = 3.84$ ) and supported the mission of the community college ( $M = 3.77$ ). Results of community college student affairs administrators' perceptions of intercollegiate athletics regarding financial earnings were neutral ( $M = 3.37$ ).

#### *Research Question Two*

The second research question was to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution,

institution spirit, support of the mission, and financial earnings) and student enrollment.

Research Question No. 2: Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?

Computations of correlations were computed for each of the five scales (predictor variables) and student enrollment (criterion variable) used in the study. Pearson's  $r$  was used to measure the correlation coefficients. The correlation coefficient expresses in mathematical terms, the degree and direction of a relationship between two or more variables between .00 and  $\pm 1.00$  (Gall, Borg, & Gall, 1996; Gay, Mills, & Airasian, 2006). Guidance for interpreting the size of the correlation coefficient in Table 4.18 was provided by Hinkle, Wiersma, and Jurs (1998).

Table 4.18  
*Guidelines for Interpreting the Size of the Correlation Coefficient*

Size of the Correlation Coefficient	Relationship
.90 to 1.00 (-.90 to -1.00)	Very high positive (negative) correlation
.70 to .90 (-.70 to -.90)	High positive (negative) correlation
.50 to .70 (-.50 to -.70)	Moderate positive (negative) correlation
.30 to .50 (-.30 to -.50)	Low positive (negative) correlation
.00 to .30 (-.00 to -.30)	Little if any correlation

The level of statistical significance used was  $p < .01$  and  $.05$ . Using  $p < .01$  reduced the probability of Type I error. Correlations provide the size and direction of the relationship between variables (Gay, Mills, & Airasian, 2006). In addition, an increase on

one variable is associated with a decrease on the other variable, and vice versa (Gay, Mills, & Airasian, 2006).

*Student Engagement and Student Enrollment*

Table 4.19 displays the findings of relationships between the community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement and student enrollment. Pearson *r* was determined for relationships between each of the individual items in the scale for student engagement and student enrollment as well as the overall scale score for student engagement and student enrollment. The individual items and overall scores in the scale for student engagement were coded using abbreviated terms.

Table 4.19  
*Pearson Correlation between Student Engagement and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
STENG1	4.16	.86	-.10	.50
STENG2	3.96	.89	-.21	.15
STENG3	2.98	1.10	-.13	.36
STENG4	3.86	.72	-.05	.75
STENG5	4.00	.77	-.14	.35
STENG6	4.04	.87	-.13	.37
STENG7	3.80	1.04	.02	.88
Overall STENM	3.87	.63	-.11	.53

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed a negative correlation ( $r = -.11$ ) between overall community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student engagement and student enrollment. The negative correlation of  $r = -.11$  indicated little if any relationship and  $p = .53$  indicated no statistical significance. The individual statement, STENG7 and student enrollment had a positive relationship, however, indicated nearly an absence of an association ( $r = .02$ ) between the two variables. All other relationships between individual items and student engagement were negative.

#### *Attractiveness of Institution and Student Enrollment*

A Pearson correlation analysis was performed to assess the relationships between each of the individual items in the scale for attractiveness of institution and student enrollment as well as the means of attractiveness of institution and student enrollment. The individual items and total scale scores in the scale for attractiveness of institution were coded using abbreviated terms. Table 4.20 displays the correlation between community college student affairs administrators' perceptions of intercollegiate athletics regarding attractiveness of institution and student enrollment.



Table 4.20

*Pearson Correlation between Attractiveness of Institution and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
ATRIN1	3.53	.99	-.35	.01**
ATRIN2	3.39	1.13	-.10	.49
ATRIN3	3.49	1.08	-.18	.21
ATRIN4	3.27	1.06	-.10	.48
ATRIN5	3.59	1.04	-.10	.50
ATRIN6	3.57	1.17	.03	.84
Overall ATINM	3.61	.74	-.16	.34

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data indicated a negative correlation ( $r = -.16$ ) between overall community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and student enrollment. The negative correlation of  $r = -.16$  showed little if any relationship with  $p = .34$  as not statistically significant. The individual statement, ATRIN1 showed a negative correlation ( $r = -.35$ ), which was statistically significant at  $p = .01$ . The individual statement, ATRIN6 showed a positive correlation ( $r = .03$ ), indicating nearly an absence of correlation between the two variables.

### *Institution Spirit and Student Enrollment*

Table 4.21 displays the findings of relationships between the community college student affairs administrators' perceptions of intercollegiate athletics regarding institution spirit and student enrollment. Pearson  $r$  was determined for each of the individual items in the scale for institution spirit and student enrollment as well as the overall scale score for institution spirit and student enrollment. The individual items and total score in the scale for institution spirit were coded using abbreviated terms.

Table 4.21  
*Pearson Correlation between Institution Spirit and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
INSPR1	3.35	1.09	-.05	.73
INSPR2	3.82	1.01	-.10	.51
INSPR3	3.43	1.19	-.03	.84
INSPR4	3.80	1.15	-.12	.41
INSPR5	3.86	.94	.04	.79
INSPR6	3.92	.98	.09	.54
Overall INSPM	3.85	.74	-.07	.68

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data revealed a negative correlation ( $r = -.07$ ) between overall community college student affairs administrators' perceptions of intercollegiate athletics in regard to institution spirit and student enrollment. The negative correlation of  $r = -.07$  indicated little if any relationship and  $p = .68$  denoted no statistical significance. Both individual statements, INSPR5 ( $r = .04$ ) and INSPR6 ( $r = .09$ ) showed positive relationships with

student enrollment. However, both indicated little if any correlation between the two variables.

*Support of the Mission and Student Enrollment*

A Pearson correlation analysis was performed to assess the relationships between each of the individual items in the scale for support of the mission and student enrollment as well as the overall mean of support of the mission and student enrollment. The individual items in the scale and the total for support of the mission were coded using abbreviated terms. Table 4.22 displays the correlation between community college student affairs administrators' perceptions of intercollegiate athletics regarding support of the mission and student enrollment.

Table 4.22  
*Pearson Correlation between Support of Mission and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
SPMIS1	3.57	1.02	-.05	.72
SPMIS2	3.92	1.04	-.00	.99
SPMIS3	3.98	.93	-.14	.34
SPMIS4	2.94	1.22	.12	.42
SPMIS5	3.76	1.18	-.12	.39
Overall SPMIM	3.77	.70	-.02	.90

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed a negative correlation ( $r = -.02$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to support of mission and student enrollment. The negative correlation of  $r = -.02$  showed nearly an

absence of relationship indicating  $p = .90$  as not statistically significant. Individual statement, SPMIS4 and student enrollment showed a positive relationship, however, indicated nearly an absence of correlation ( $r = .12$ ) between the two variables.

*Financial Earnings and Student Enrollment*

Table 4.23 displays the findings of relationships between the community college student affairs administrators' perceptions of intercollegiate athletics regarding financial earnings and student enrollment. Pearson  $r$  was determined for each of the individual items in the scale for financial earnings and student enrollment as well as the overall scale score for financial earnings and student enrollment. The individual items in the scale for financial earnings were coded using abbreviated terms.

Table 4.23  
*Pearson Correlation between Financial Earnings and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
FINEA1	3.80	1.08	.02	.89
FINAE2	3.14	1.22	.21	.13
FINEA3	2.75	1.07	.10	.47
FINEA4	3.50	1.10	-.10	.50
FINEA5	3.48	1.10	-.12	.41
FINEA6	3.39	1.11	-.02	.87
Overall FIEAM	3.37	.47	-.04	.82

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data indicated a negative correlation ( $r = -.04$ ) between overall community college student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and student enrollment. The negative correlation of  $r = -.04$  revealed little if any relationship denoting that  $p = .82$  as not statistically significant. Both individual statements, FINAE2 ( $r = .21$ ) and FINEA3 ( $r = .10$ ) showed a positive relationship with student enrollment. However, both indicated little if any correlation between the two variables.

*Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission, Financial Earnings and Student Enrollment*

Table 4.24 displays the findings of relationships between community college student affairs administrators' perceptions of intercollegiate athletics regarding all the five variables and student enrollment. Pearson  $r$  was determined for each overall scale score means for the five variables and student enrollment as well as the overall scale score means for the five variables and student enrollment. The overall scale item means for each of the five variables were coded using abbreviated terms.

Table 4.24

*Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission, Financial Earnings and Student Enrollment*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
STENM	3.87	.63	-.11	.53
ATINM	3.61	.74	-.16	.34
INSPM	3.85	.74	-.07	.68
SPMIM	3.77	.70	-.02	.90
FIEAM	3.37	.47	-.04	.82

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed a negative correlation between overall community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. The negative correlations all indicated little if any relationship, indicating no statistical significance.

### *Research Question Three*

The third research question sought to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

Research Question No. 3: Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics

regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?

Computations of correlations were computed for each of the five scales (predictor variables) and retention rate (criterion variable) used in the study. Pearson's  $r$  was used to measure the correlation coefficients. The level of statistical significance used was  $p < .01$  and  $.05$ . Using  $p < .01$  reduced the probability of Type I error.

#### *Student Engagement and Retention Rate*

Table 4.25 displays the findings of relationships between the community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement and retention rate. Pearson  $r$  was determined for each of the individual items in the scale for student engagement and retention rate as well as the overall scale score for student engagement and retention rate. The individual items and total scale in the scale for student engagement were coded using abbreviated terms.

Table 4.25

*Pearson Correlation between Student Engagement and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
STENG1	4.16	.86	.07	.62
STENG2	3.96	.89	.04	.78
STENG3	2.98	1.10	.01	.95
STENG4	3.86	.72	.04	.76
STENG5	4.00	.77	.11	.44
STENG6	4.03	.87	.08	.59
STENG7	3.80	1.03	-.04	.77
Overall STENM	3.87	.63	.01	.96

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\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed a positive correlation ( $r = .01$ ) between community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student engagement and retention rate. The positive relationship indicated little if any relationship and denoted  $p = .96$  as not statistically significant. The individual statement STENG5 and retention rate had a positive relationship, however, indicated nearly an absence of an association ( $r = .11$ ) between the two variables. Individual statement STENG7 and retention rate had a negative relationship, however, also indicated nearly an absence of an association ( $r = -.04$ ) between the two variables.

*Attractiveness of Institution and Retention Rate*

A Pearson correlation analysis was performed to assess the relationships between each of the individual items in the scale for attractiveness of institution and retention rate



as well as the overall score of attractiveness of institution and retention rate. The individual items in the scale for attractiveness of institution were coded using abbreviated terms. Table 4.26 displays the correlation between community college student affairs administrators' perceptions of intercollegiate athletics regarding attractiveness of institution and retention rate.

Table 4.26  
*Pearson Correlation between Attractiveness of Institution and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
ATRIN1	3.53	.99	.02	.89
ATRIN2	3.39	1.13	.35	.01**
ATRIN3	3.49	1.08	.23	.11
ATRIN4	3.27	1.06	.15	.29
ATRIN5	3.59	1.04	.16	.27
ATRIN6	3.57	1.17	.22	.12
Overall ATINM	3.61	.74	.32	.05*

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\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data indicated a low positive correlation ( $r = .32$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and retention rate. The positive correlation of  $r = .32$  was statistically significant at  $p = .05$ . The individual statement ATRIN2 showed a low positive correlation ( $r = .35$ ), which was also statistically significant at  $p = .01$ . This indicated a low positive correlation between the two variables.

### *Institution Spirit and Retention Rate*

Table 4.27 displays the findings of relationships between the community college student affairs administrators' perceptions of intercollegiate athletics regarding institution spirit and retention rate. Pearson  $r$  was determined for each of the individual items in the scale for institution spirit and retention rate as well as the overall scale score for institution spirit and retention rate. The individual items in the scale for institution spirit and total score were coded using abbreviated terms.

Table 4.27  
*Pearson Correlation between Institution Spirit and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
INSPR1	3.35	1.09	.10	.50
INSPR2	3.82	1.01	.05	.73
INSPR3	3.43	1.19	.10	.49
INSPR4	3.80	1.15	.13	.38
INSPR5	3.86	.94	.05	.72
INSPR6	3.92	.98	.04	.79
Overall INSPM	3.85	.74	.04	.83

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data revealed a positive correlation ( $r = .04$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to institution spirit and retention rate. The positive correlation of  $r = .04$ , however, indicated little if any relationship denoting  $p = 83$  as not statistically significant. Both individual statements, INSPR3 ( $r = .10$ ) and INSPR4 ( $r = .13$ ) showed positive relationships with

retention rate. However, both indicated little if any correlations between the two variables.

*Support of Mission and Retention Rate*

A Pearson correlation analysis was performed to assess the relationships between each of the individual items in the scale for support of the mission and retention rate as well as overall score of support of the mission and retention rate. The individual items in the scale for support of the mission and overall score were coded using abbreviated terms. Table 4.28 displays the correlation between community college student affairs administrators' perceptions of intercollegiate athletics regarding support of the mission and retention rate.

Table 4.28

*Pearson Correlation between Support of Mission and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
SPMIS1	3.57	1.02	.09	.56
SPMIS2	3.92	1.04	-.03	.84
SPMIS3	3.98	.93	.10	.48
SPMIS4	2.94	1.22	.15	.30
SPMIS5	3.76	1.17	.08	.57
SPMIM	3.77	.70	.11	.52

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed a positive correlation ( $r = .11$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to support of mission and retention rate. The positive correlation of  $r = .11$  showed nearly an

absence of relationship identifying  $p = .52$  as not statistically significant. Individual statement, SPMIS2 and retention rate showed a negative relationship, however, indicated nearly an absence of correlation ( $r = -.03$ ) between the two variables. All other individual statements showed a positive relationship with retention rate.

*Financial Earnings and Retention Rate*

Table 4.29 displays the findings of relationships between the community college student affairs administrators’ perceptions of intercollegiate athletics regarding financial earnings and retention rate. Pearson  $r$  was determined for each of the individual items in the scale for financial earnings and retention rate as well as the overall scale score for financial earnings and retention rate. The individual items in the scale and overall scale score for financial earnings were coded using abbreviated terms.

Table 4.29  
*Pearson Correlation between Financial Earnings and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
FINEA1	3.80	1.08	.10	.47
FINAE2	3.14	1.22	.07	.61
FINEA3	2.75	1.07	.03	.81
FINEA4	3.50	1.10	.05	.72
FINEA5	3.47	1.10	-.02	.90
FINEA6	3.39	1.11	-.12	.39
FIEAM	3.37	.47	-.06	.72

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data indicated a negative correlation ( $r = -.06$ ) between community college student affairs administrators’ perceptions of intercollegiate athletics in regard to

financial earnings and retention rate. The negative correlation of  $r = -.06$  revealed little if any relationship denoting  $p = .72$  as not statistically significant. Individual statement FINEA1 and retention rate ( $r = .10$ ) showed a positive correlation and individual statement FINEA6 and retention rate ( $r = -.12$ ) showed a negative correlation. However, both indicated little if any correlation between the two variables.

*Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission and Financial Earnings and Retention Rate*

Table 4.30 displays the findings of relationships between community college student affairs administrators' perceptions of intercollegiate athletics regarding all the five variables and retention rate. Pearson  $r$  was determined for each overall scale score means for the five variables and retention rate as well as the overall scale score means for the five variables and retention rate. The overall scale item means for each of the five variables were coded using abbreviated terms.

Table 4.30

*Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission, Financial Earnings and Retention Rate*

	<i>M</i>	<i>SD</i>	<i>Pearson Correlation</i>	<i>Sig. (2-tailed)</i>
STENM	3.87	.63	.01	.96
ATINM	3.61	.74	.32	.05*
INSPM	3.85	.74	.04	.83
SPMIM	3.77	.70	.11	.52
FIEAM	3.37	.47	-.06	.72

\* Correlation is significant at the  $p < 0.05$  level.

\*\* Correlation is significant at the  $p < 0.01$  level.

The data showed positive correlations between community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student engagement, institution spirit, support of the mission, and retention rate. The positive relationships indicated little if any relationship, denoting no statistical significance. A negative correlation ( $r = -.06$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and retention rate was showed. The negative correlation of  $r = -.06$  revealed little if any relationship denoting  $p = .72$  as not statistically significant.

The data further indicated a low positive correlation ( $r = .32$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and retention rate. Statistical significance was indicated between attractiveness of institution and retention rate at  $p = .05$ , with a positive correlation of  $r = .32$ .

### *Chapter Summary*

This chapter presented the personal and institutional demographic descriptive statistics, in addition to the percentages, frequencies, standard deviations, and means of the community college student affairs administrators from SACS accredited institutions perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. This chapter also presented computation of correlations for the second research question to assess the relationships between the five scales (student engagement, attractiveness of institution, institution pride, support of the mission, and financial earnings) and student enrollment. In addition, computation of correlations for the third research question were completed to assess the relationships between the five scales (student engagement, attractiveness of institution, institution pride, support of the mission, and financial earnings) and student retention.

The findings from this study indicated significant relationships existed between student engagement and student enrollment, student engagement and retention rate, and attractiveness of institution and retention rate. Chapter Five provides a summary of the findings and conclusions of the research study. In addition, general recommendations, and recommendations for future research are provided in Chapter Five.

## CHAPTER 5

### SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

The purpose of this dissertation research study was threefold. The first purpose was to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. Second, from the analyzed data collected during the research study, the researcher determined if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. Third, the researcher also determined if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

For the purpose of this study, student engagement was defined as students' expenditure of personal time and effort to become involved in the collegiate events outside the classroom. Attractiveness of institution was defined as a students' lure to a particular institution due to their intercollegiate athletic program. Institution spirit was defined as the personal value students' place on identifying with an institution. Support of the mission was defined as an intercollegiate athletic programs ability to uphold and demonstrate all aspects of the published academic institutions mission statement. Financial earnings were defined as resources needed to monetarily sustain a program. Intercollegiate athletics were defined as official athletic programs at community colleges



holding memberships within the National Junior College Athletic Association (NJCAA). The NJCAA is the governing body for intercollegiate athletic programs for two-year colleges.

The following specific research questions guided the study.

1. What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?
2. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?
3. Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?

The participants for the study were student affairs administrators selected from community colleges within the southeastern region of the country. Community college student affairs administrators selected for this study were community college student affairs personnel with the closest link to students by functions, who held position titles such as chief student affairs officer, chief student development officer, chief student services officer, and/or chief student activities officer.

The researcher collected data using the web-based survey instrument, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*. The researcher analyzed the collected data using PASW<sup>®</sup> Statistics GradPack 17.0 for Windows, formerly known as Statistical Package for Social Science (SPSS<sup>®</sup>). The

analysis of the data collected for the research study included descriptive statistics and computation of correlations.

In Chapters One through Four, the introduction, review of literature, research design and methodology, and results for this study were presented. Chapter summaries were provided at the end of each chapter.

This chapter presents a summary of the findings and conclusions resulting from the collected data. Limitations of the study, general recommendations, as well as implications for future research are discussed.

#### *Summary of Findings*

The purpose of the study was to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment. In addition, a second purpose of the study was to determine if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and retention rate.

#### *Alexander Astin's Theory of Student Involvement*

Postulate one of Astin's Theory of Student Involvement, involvement refers to the investment of physical and psychological energy in various objects, related to the data collection portion of the research study in which community college student affairs

administrator's perceptions of intercollegiate athletics in regards to student engagement and involvement were collected. Postulate five, involvement refers to the investment of physical and psychological energy in various objects, related to the data analysis portion of the research study in which the collected data were analyzed for findings that provided further insight to assist community college student affairs administrators in making more informed decisions concerning policy and practice needed to increase student engagement and involvement in regard to intercollegiate athletics. According to Pike and Kuh (2005) stated, "The most important institutional factors are thought to be the policies and practices adopted by institutions to increase student engagement" (p.187).

*Vincent Tinto's Theory of Student Persistence and Student Integration Model*

Tinto's original theoretical model of attrition and persistence included the following components: (a) pre-entry attributes; (b) goals/commitment; (c) institutional experiences; (d) integration; (e) goals/commitment; and (f) outcome. Three of the components most related to this research study. The goals/commitment component, which includes institutional goals, translated to support of the mission. The institutional experience component, which includes co-curricular involvement and peer group interaction, translated to involvement and interaction in a co-curricular activity such as intercollegiate athletics. A third component, integration, included the academic and social integration of the student into the overall college environment, which also included intercollegiate athletics (Metz, 2002).

### *Overall Description of the Sample*

The survey results included 51 participants. The personal background data showed that the majority of participants had worked in higher education as a student affairs administrator between 5 to 9 years ( $n = 15$ , 29.4%). The range of 20 or more years ( $n = 10$ , 19.6%) followed close behind. In addition, the ranges 1 to 4 ( $n = 9$ , 17.6%) and 10 to 14 years ( $n = 9$ , 17.6%) were equal. The majority of participants were within the age range of 35 to 44 ( $n = 19$ , 37.3%), followed by 45 to 54 ( $n = 15$ , 29.4%) with 55 to 64 ( $n = 10$ , 19.6%) close behind. The data also showed male ( $n = 25$ , 49.0%) and female ( $n = 26$ , 51.0%) participation were almost equal. The majority of male ( $n = 17$ , 33.3%) and female ( $n = 16$ , 31.4%) participants were White, Caucasian, followed by Black, African-American males ( $n = 8$ , 15.7%) and females ( $n = 9$ , 17.6%).

The institution background data showed that the majority of participants resided in North Carolina ( $n = 13$ , 25.5%) and South Carolina ( $n = 9$ , 17.6%). The data also showed an overwhelming majority of community colleges were non-residential ( $n = 42$ , 82.4%) and very few residential ( $n = 9$ , 17.6%). The student enrollment range of 1,000 to 4,999 ( $n = 27$ , 52.9%) was the most reported, followed by 5,000 to 9,999 ( $n = 12$ , 23.5%). The data also showed the majority of the community college student affairs administrators self-reported a student retention rate percentage range for fiscal year 2007-2008 between 51% - 60% ( $n = 17$ ). The student retention rate percentage 41% - 50% ( $n = 12$ ) and over 61% ( $n = 12$ ) were equal.

The data showed an almost even number of community colleges' reported yes ( $n = 28$ , 54.9%) to offering intercollegiate athletics. The community colleges reported as

having an intercollegiate athletic program had programs for 20 or more years ( $n = 15$ , 29.4%). The majority of community colleges reported no to having an intercollegiate athletic program ( $n = 23$ , 45.1%) have no plans to begin a program ( $n = 21$ , 41.2%). The data showed basketball as being offered at the majority of community colleges either to males ( $n = 5$ , 9.8%) or males and females ( $n = 20$ , 39.2%). Baseball was another popular sport offering predominately to males ( $n = 22$ , 43.1%) with fast-pitch softball predominately offered to females ( $n = 17$ , 33.3%). Volleyball was also reported as a popular sport offered to females ( $n = 10$ , 19.6%). The sports reported as not being offered in any of the colleges were bowling, half marathon, ice hockey, and lacrosse.

#### *Overall Summary of Findings from the Research Questions*

Three research questions guided this study. The first research question sought to examine community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. The second research question sought to determine if relationships existed between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. The third research question sought to determine if relationships existed between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate. The three research questions were analyzed using descriptive statistics and

computation of correlations. Participants were asked to respond to declarative statements indicating whether they strongly agreed, agreed, were neutral, disagreed, or strongly disagreed.

### *Research Question One*

In regard to student engagement, the data showed that the majority of community college student affairs administrators' strongly agreed that intercollegiate athletic programs benefited the community college ( $M = 4.15$ ) and the general student body ( $M = 3.96$ ), students' memories of their college experiences enhanced by intercollegiate athletic events ( $M = 4.00$ ), and intercollegiate athletic programs increase student engagement outside the classroom ( $M = 4.03$ ). The participants reported a neutral perception regarding community college students having an interest in intercollegiate athletic events ( $M = 2.98$ ).

In terms of attractiveness of institution, the data also showed that community college student affairs administrators' agreed that intercollegiate athletics lead to higher enrollment ( $M = 3.59$ ) and intercollegiate athletics at the community college encourage local students to attend the college ( $M = 3.57$ ).

In regard to institution spirit, community college student affairs administrators agreed that intercollegiate athletics promote student pride ( $M = 3.82$ ), an athletic team's accomplishments promote a positive reputation of the community college ( $M = 3.80$ ), intercollegiate athletic programs promote community pride and interaction ( $M = 3.86$ ), and intercollegiate athletic programs enhance the community college's atmosphere ( $M = 3.92$ ). With regard to support of the mission, the data indicated that community college

student affairs administrators' agreed that intercollegiate athletics encourage involvement of the entire community college student body, whether through participation or attendance ( $M = 3.92$ ). Participants also agreed that intercollegiate athletics should be on community college campuses only if they support the mission of the college ( $M = 3.98$ ).

Finally, in regard to financial earnings, community college student affairs administrators' agreed that a winning athletic program increases overall donations to the community college ( $M = 3.80$ ). Overall, participants' perceptions of financial earnings in regard to intercollegiate athletics on a community college campus were neutral ( $M = 3.37$ ).

#### *Research Question Two*

The second research question determined if relationships existed between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. For the second research a correlation analysis was completed to assess the relationships between the variable.

#### *Student Engagement and Student Enrollment*

The data results showed overall a negative correlation ( $r = -.11$ ) between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement and student enrollment. The negative correlation of  $r = -.11$  indicated little if any relationship and  $p = .53$  indicated no statistical significant.

#### *Attractiveness of Institution and Student Enrollment*

The data results also showed a negative correlation ( $r = -.16$ ) between community

college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and student enrollment. Furthermore, there was a significantly negative correlation ( $r = -.35$ ) between perceptions of intercollegiate athletics benefit to the community college and student enrollment. These results were significant at  $p < .05$  with a value of  $p = .01$ . In addition, there was nearly an absence of correlation ( $r = .03$ ) between perceptions of intercollegiate athletics ability to encourage local students to attend the community college and student enrollment.

#### *Institution Spirit and Student Enrollment*

The results from the data showed a negative correlation ( $r = -.07$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to institution spirit and student enrollment. An absence of correlation was found for both perceptions of intercollegiate athletics programs ability to promote community pride and student enrollment ( $r = .04$ ) and intercollegiate athletics programs ability to enhance the community college atmosphere ( $r = .09$ ) and student enrollment.

#### *Support of Mission and Student Enrollment*

An overall a negative correlation ( $r = -.02$ ) was found between community college student affairs administrators' perceptions of intercollegiate athletics in regard to support of mission and student enrollment. However, the data showed a slightly positive correlation ( $r = .12$ ) between perceptions that intercollegiate athletics should be a part of the community college experience regardless of its support of the mission statement and student enrollment.



### *Financial Earnings and Student Enrollment*

In regard to student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and student enrollment, the data showed a negative correlation ( $r = -.04$ ). The data showed a slightly positive correlation between perceptions that monies spent on intercollegiate athletic programs would be better spent on the general student body and student enrollment ( $r = .21$ ) and donations to the community college as a result of a winning athletic program should benefit primarily the athletic program ( $r = .10$ ) and student enrollment.

### *Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission, Financial Earnings and Student Enrollment*

The data indicated a negative correlation between overall community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. The negative correlations all indicated little if any relationship, which indicated no statistical significance.

### *Research Question Three*

The third research question sought to determine if relationships existed between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate. For the third research question, computations were completed to answer the research question regarding student engagement and retention rate.

### *Student Engagement and Retention Rate*

The data showed almost an absence of correlation ( $r = .01$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to student engagement and retention rate. A slightly positive correlation ( $r = .11$ ) was shown by the data between perceptions of students' memories of their college experiences being enhanced by intercollegiate athletic events and retention rates. However, the data also showed a slightly negative correlation ( $r = -.04$ ) between community college student affairs administrators' perceptions that intercollegiate athletic programs encourage students' school spirit and increase their connectedness to the community college and retention rates.

### *Attractiveness of Institution and Retention Rate*

The data revealed a significantly positive correlation ( $r = .32$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and retention rate. These results were significant at  $p < .05$  with a  $p$  value of .05. In addition, a significantly positive correlation was found between community college student affairs administrators' perceptions that students enroll in a particular community college because of a specific athletic program and retention rate ( $r = .35$ ). These results were also significant at  $p < .05$  with a  $p$  value of .01.

### *Institution Spirit and Retention Rate*

The data showed almost an absence of correlation ( $r = .04$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to institution spirit and retention rate. However, a slightly positive correlation was found

between community college student affairs administrators' perceptions that intercollegiate athletics promote faculty pride ( $r = .10$ ) and retention rate as well as perceptions that an athletic teams accomplishments promote a positive reputation of the community college ( $r = .13$ ) and retention rate.

#### *Support of Mission and Retention Rate*

The data further showed a slightly positive correlation ( $r = .11$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to support of mission and retention rate. However, a slightly negative correlation ( $r = -.03$ ) was found between community college student affairs administrators' perceptions that intercollegiate athletics encourage involvement of the entire community college student body, whether through participation or attendance and retention rate.

#### *Financial Earnings and Retention Rate*

Finally, the data showed a slightly negative correlation ( $r = -.06$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and retention rate. In addition, the data showed a slightly positive correlation ( $r = .10$ ) between community college student affairs administrators' perceptions that a winning athletic program increases overall donations to the community college and retention rate.

#### *Overall Pearson Correlation between Student Engagement, Attractiveness of Institution, Institution Pride, Support of the Mission and Financial Earnings and Retention Rate*

The data revealed positive correlations between community college student affairs administrators' perceptions of intercollegiate athletics regarding overall student

engagement, institution spirit, support of the mission, and retention rate. The positive relationships indicated little if any relationship, which denoted no statistical significance. A negative correlation ( $r = -.06$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and retention rate was showed. The negative correlation of  $r = -.06$  revealed little if any relationship denoting  $p = .72$  as not statistically significant.

The data further indicated a low positive correlation ( $r = .32$ ) between community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and retention rate. Statistical significance was indicated between attractiveness of institution and retention rate at  $p = .05$ , with a positive correlation of  $r = .32$ .

#### *Discussion of the Findings and Conclusions*

This study investigated research questions not previously reported in the literature regarding community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting. Research questions specific to determining if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and student enrollment were investigated. In addition, research questions specific to determining if relationships existed among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support

of the mission, and financial earnings) and retention rate were investigated. Although most of the results were not statistically significant, some of these results were consistent with previous research findings in regard to perceptions of community college presidents (Byrd, 2007, Williams & Pennington, 2006).

Research Question 1: What are community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings?

*Conclusion One: Community college student affairs administrators' perceived intercollegiate athletics as beneficial; however, sensed a lack of interest in intercollegiate athletics by community college students.*

Selected results from the data collected from research question one provided evidence that showed community college student affairs administrators perceived intercollegiate athletics as beneficial to the community college (43.1%) and to the student body (60.8%) in regard to student engagement, however, perceived there to be a lack of interest by the community college student in regard to intercollegiate athletics (33.3%). In a study by Byrd (2007), students' lack of interest was reported as a main determinant when administrators decide to discontinue an intercollegiate athletic program on their community college campus.

*Conclusion Two: Community college student affairs administrators' perceived intercollegiate athletics attracted students to the institution.*

The data also showed that a large percentage of community college student affairs administrators' perceived that intercollegiate athletics lead to higher enrollment (37.3%) and encouraged local students to attend the college (35.3%). A study by Williams and

Pennington (2006) found similar perceptual results from community college presidents in regard to student enrollment, reporting that “59% of respondents agree that athletics enhance a community colleges enrollment” (p.101).

*Conclusion Three: Community college student affairs administrators’ perceived intercollegiate athletics promoted institutional pride on the community college campus.*

The study by Williams and Pennington (2006) also reported “leaders of institutions with athletic teams strongly feel that having teams promotes student (97% agreed) and community pride (80% agreed) in the college, while leaders of institutions without teams agree with the perception at much lower rates (58% and 65% agreed)” (p.101). The data from this research study showed community college student affairs administrators at institutions with athletic programs agreed athletic teams promote student pride (42.9%) and community pride (50%). Unlike the perceptions of community college presidents without athletic programs, community college student affairs administrators also agree athletic teams promote student pride (47.8%) and community pride (47.8%).

*Conclusion Four: Community college student affairs administrators’ perceived intercollegiate athletics supported the mission of the community college.*

With regard to supporting the mission of the community college, results concluded overall that community college student affairs administrators agreed that intercollegiate athletic programs support the mission of the community college (39.2%) as well they agreed intercollegiate athletics should be on community college campuses only if they support the mission of the college (43.1%). These perceptions contradict results found in the Williams and Pennington (2006) study in which they stated, “Leaders

at institutions with athletic teams overwhelmingly agree that athletics support the mission of the college, while leaders of institutions without teams have no strong perceptions on the issue” (p.102).

*Conclusion Five: Community college student affairs administrators’ perceptions of intercollegiate athletics regarding financial earnings were neutral.*

Results from perception statements in regard to financial earnings and community college intercollegiate athletics overall were neutral with the exception that the majority of community college student affairs administrators agreed a winning athletic program increased overall donation’s to the community college (35.5%). Williams and Pennington (2006) reported a widespread misunderstanding about funding issues related to the discontinuing of intercollegiate athletics at community colleges.

Research Question 2: Do relationships exist between community college student affairs administrators’ perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment?

*Conclusion Six: Community college student affairs administrators’ perceived the relationship between student enrollment and student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings to be negative.*

Data results showed overall a negative relationship existed between community college student affairs administrators’ perceptions of intercollegiate athletics in regard to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. Furthermore, there was a significantly

negative relationship between perceptions of intercollegiate athletics benefit to the community college and student enrollment.

These results can be supported theoretically. Since the majority of community college students, according to Astin (1984, 1999), commuted to campus, attended on a part-time basis, worked a full or part-time job, and supported a family, student engagement in campus activities remained low. In addition, Astin (1975) found that a students' ability to identify with an institution made it easier for the student to become involved in the college environment. Acclimation to a large campus population may prove difficult for the non-traditional, community college student, which supported the negative relationship between community college student affairs administrators' perceptions of intercollegiate athletics in regard to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and student enrollment. The larger the student enrollment, the less likely students become involved due to lack of assimilation into the campus environment and the smaller the student enrollment, the increased likelihood of student involvement.

Research Question 3: Do relationships exist between community college student affairs administrators' perceptions of intercollegiate athletics regarding student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings and retention rate?



*Conclusion Seven: Although, community college student affairs administrators' perceived nearly an absence of relationship existed between student engagement, institution spirit, and support of the mission and retention rate, the relationship was positive.*

Data results overall indicated a positive relationship existed between community college student affairs administrators' perceptions of intercollegiate athletics in regard to student engagement, institution spirit, support of the mission and retention rate. However, the positive relationship showed little if any relationship denoting that as not statistically significant.

*Conclusion Eight: Community college student affairs administrators' perceived a significantly positive relationship existed between attractiveness of institution and retention rate.*

The data revealed a positive relationship between community college student affairs administrators' perceptions of intercollegiate athletics in regard to attractiveness of institution and retention rate. These results were significant at  $p < .05$ . In addition, a significantly positive relationship was showed between community college student affairs administrators' perception that students enroll in a particular community college because of a specific athletic program. These results were also significant at  $p < .05$ . These findings are supported in the literature, which suggested having intercollegiate athletic programs, especially successful athletic programs, attracts students and increases enrollment, even if temporarily (Boulard, 2008; Chen, 2008; Jacobson, 2004; Jenkins, 2006; Kurz, Scannell, & Veeder, 2007; Lofton & Hamilton, 1996; Sander, 2008).

*Conclusion Nine: Although community college student affairs administrators' perceived nearly an absence of relationship existed between financial earnings and retention rate, the relationship was negative.*

Data results overall indicated a negative relationship existed between community college student affairs administrators' perceptions of intercollegiate athletics in regard to financial earnings and retention rate. However, the negative relationship showed little if any relationship denoting that as not statistically significant.

#### *Limitations*

During the course of this research study, a couple of limitations were identified. First there were sampling limitations. The initial email listserv included 282 email addresses of community college student affairs administrators within the Southern Association of Colleges and Schools. After deleting failed email addresses, the listserv was reduced to 237. Of the 237 potential research study participants, 64 community college student affairs administrators returned that survey. Unfortunately, 13 of the 64 surveys had to be discarded due to missing data. Therefore, the final total of usable survey responses was reduced to 51. While researchers do indicate that a minimum of 30 participants is acceptable, generalizability is limited with the small sample sizes for this study.

The research study was further limited due to non-responses; therefore, data collected was extended five days. Because the study was cross-sectional, data were only to be collected at one point in time (spring 2009). According to Gall, Borg, and Gall (1996), a major limitation of cross-sectional research is the "effect of changes in the population that occur over time" (p.380).

### *General Recommendations*

Results of this study indicated that overall, community college student affairs administrators agree that intercollegiate athletics on the community college campus enhances student engagement, promotes institution spirit among the faculty, staff, and students, increases the attractiveness of the institution, and supports the mission of the community college. However, community college student affairs administrators had a neutral perception of the financial aspects of intercollegiate athletics. The following are general recommendations for community colleges student affairs administrators and policy makers as well as future educational leaders.

1. Recommend community colleges student affairs administrators conduct student opinion polls to acquire actual student insight on intercollegiate athletics on the community college campus.
2. Recommend community college policy makers explore funding opportunities for intercollegiate athletics.

### *Recommendations for Future Research*

Recommendations for future research should include the continued implementation of research methods to provide generalizations for community colleges in the area of intercollegiate athletics. The following recommendations are provided for quantitative research.

1. Continue use of the *Community College Student Affairs Intercollegiate Athletics Questionnaire* to gather community college student affairs administrators' perceptual data for generalizability of intercollegiate athletics in regard to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings.
2. Conduct research to include community college students' perceptions of intercollegiate athletics in regard to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings.

3. Conduct research during the fall or spring semester to enhance response rate.
4. Future educational leaders conduct more quantitative research in regards to the benefits and challenges of intercollegiate athletics on the community college campus.

The following recommendations are provided for qualitative research.

1. Conduct research to include community college student affairs administrators' perceptions of the benefits and challenges of intercollegiate athletics on the community college campus at institutions with an intercollegiate athletic program.
2. Conduct research to include community college students' perceptions of intercollegiate athletics on the community college campus at institutions with an intercollegiate athletic program.

## APPENDIXES

## APPENDIX A

### **Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire**

The main purpose of asking you to complete this web-based questionnaire is to examine community college student affairs administrators' general perceptions about intercollegiate athletic programs on the community college campus in relation to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. The information obtained from you and from other community college administrators from the southeastern portion of the country will present community college student affairs administrators' perceptions of the benefits and challenges intercollegiate athletics brings to the community college campus.

The web-based questionnaire will take approximately 10 to 15 minutes to complete. The initial questions will ask you to provide information concerning your personal demographics, followed by questions concerning background information about the institution in which you are employed as an administrator. The remaining items will be statements about intercollegiate athletics in general in relation to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings.

Whether your community college does or does not have an athletic program, your perception of intercollegiate athletics on the community college campus in general is valued and appreciated. The ultimate benefit from this or any other survey depends on the thoughtful responses and willing participation of those who are asked to help. Your willingness to participate is important and much appreciated.

## Personal Background

**DIRECTIONS:** Indicate your responses by filling in the appropriate box with an X.

<b>1. Years experience working in higher education as an administrator</b>
20 or more
15 to 19
10 to 14
5 to 9
1 to 4
Less than 1
<b>2. Age</b>
65 or older
55 to 64
45 to 54
35 to 44
25 to 34
Less than 25

<b>3. Gender</b>
Male
Female
<b>4. Race / Ethnicity</b>
Native American
Asian or Pacific Islander
Black, African-American
Hispanic, Latino
White, Caucasian
Other

## Institutional Background

**DIRECTIONS:** Indicate your responses by filling in the appropriate box with an X.

<b>1. State college resides in</b>
Alabama
Florida
Georgia
Kentucky
Louisiana
Mississippi
North Carolina
South Carolina
Tennessee
Texas
Virginia

<b>2. Student Enrollment</b>
20,000 or more
15,000 to 19,999
10,000 to 14,999
5,000 to 9,999
1,000 to 4,999
<b>3. Campus residential status</b>
Residential
Non-residential
<b>4. Student Retention Rate for FY 2007-2008</b>
Below 20%
21% - 30%
31% - 40%
41% - 50%
51% - 60%
Over 60%

<b>5. Athletic program status</b>
Have intercollegiate athletics
Do not have intercollegiate athletics
<b>6. Years intercollegiate athletic program has existed</b>
20 or more
15 to 19
10 to 14
5 to 9
1 to 4
Less than 1
Plan to begin a program
No plans to begin a program



### Intercollegiate Athletic Program Information

**DIRECTIONS:** If you indicated above that your institution has an intercollegiate athletic program or plans to begin one, please fill in the appropriate box beside each team your institution offers or plans to offer and gender of that team with an X.

<b>7. Athletic teams offered</b>	<b>M</b>	<b>F</b>		<b>M</b>	<b>F</b>
Baseball			Ice Hockey		
Basketball			Indoor Track & Field		
Bowling			Lacrosse		
Cheerleading			Outdoor Track & Field		
Cross Country			Soccer		
Fast Pitch Softball			Swimming & Diving		
Football			Tennis		
Golf			Volleyball		
Half Marathon			Wrestling		

### Perception Statements

**DIRECTIONS:** From the statements provided, please indicate your level of agreement or disagreement by filling in one of the boxes to the right of each statement with an X.

<b>Student Engagement</b>	<b>Strongly Disagree</b>	<b>Disagree</b>	<b>Neutral</b>	<b>Agree</b>	<b>Strongly Agree</b>
1. Intercollegiate athletics programs benefit the community college.					
2. Intercollegiate athletic programs benefit the general student body.					
3. Most community college students have an interest in intercollegiate athletic events.					
4. Intercollegiate athletic teams should be supported by the student body regardless of its win/loss record.					
5. Students' memories of their college experience are enhanced by intercollegiate athletic events.					
6. Intercollegiate athletic programs increase student engagement outside the classroom.					
7. Intercollegiate athletic programs encourage students' school spirit and increase their connectedness to the community college.					

<b>Attractiveness of institution</b>	<b>Strongly Disagree</b>	<b>Disagree</b>	<b>Neutral</b>	<b>Agree</b>	<b>Strongly Agree</b>
8. There is a proper balance between athletics and academics at community colleges with an athletic program.					
9. Students enroll in a particular community college because of the athletic program.					
10. Intercollegiate athletic programs increase overall student retention.					
11. Intercollegiate athletic programs increase the graduation rates of the community college.					
12. Intercollegiate athletics lead to higher enrollment.					
13. Intercollegiate athletics at the community college encourage local students to attend.					
<b>Institution spirit</b>	<b>Strongly Disagree</b>	<b>Disagree</b>	<b>Neutral</b>	<b>Agree</b>	<b>Strongly Agree</b>
14. Intercollegiate athletic programs increase overall community support of the community college.					
15. Intercollegiate athletics promote student pride.					
16. Intercollegiate athletics promote faculty pride.					
17. Athletic team accomplishments increase the prestige of the community college.					
18. Intercollegiate athletic programs promote community pride and interaction.					
19. Intercollegiate athletic programs enhance the community college's reputation.					

<b>Support of the mission</b>	<b>Strongly Disagree</b>	<b>Disagree</b>	<b>Neutral</b>	<b>Agree</b>	<b>Strongly Agree</b>
20. Intercollegiate athletic programs support the mission of the community college.					
21. Intercollegiate athletics promote student diversity.					
22. Intercollegiate athletics should be on community college campuses only if they support the mission of the college.					
23. Intercollegiate athletics should be a part of the community college experience regardless of its support of the mission statement.					
24. Intercollegiate athletics promote educational opportunities for students.					
<b>Financial earnings</b>	<b>Strongly Disagree</b>	<b>Disagree</b>	<b>Neutral</b>	<b>Agree</b>	<b>Strongly Agree</b>
25. A winning athletic program increases overall donations to the community college.					
26. Monies spent on intercollegiate athletic programs would be better spent on the general student body.					
27. Donations to the community college as a result of a winning athletic program should benefit primarily the athletic program.					
28. Revenue from intercollegiate athletic events financially benefits the entire community college.					
29. Intercollegiate athletic programs are worth the funding needed to maintain them.					
30. Alumni donations increase with a successful intercollegiate athletic program.					

**DIRECTIONS:** To obtain further understanding of community college administrators' perceptions of the benefits and challenges intercollegiate athletics brings to the community college campus, please answer the following questions in the space provided.

1. As an expert in the field of community colleges and/or intercollegiate athletics, what is the greatest benefit of having intercollegiate athletics on a community college campus?

Explain:

2. As an expert in the field of community colleges and/or intercollegiate athletics, what is the greatest challenge of having intercollegiate athletics on a community college campus?

Explain:

## APPENDIX B

### Perception Statement Codes

Codes	Perception Statements
	<b><u>Student Engagement</u></b>
STENG1	Intercollegiate athletics programs benefit the community college.
STENG2	Intercollegiate athletic programs benefit the general student body.
STENG3	Most community college students have an interest in intercollegiate athletic events.
STENG4	Intercollegiate athletic sporting events should be attended by the student body regardless of win/loss records.
STENG5	Students' memories of their college experiences are enhanced by intercollegiate athletic events.
STENG6	Intercollegiate athletic programs increase student engagement outside the classroom.
STENG7	Intercollegiate athletic programs encourage students' school spirit and increase their connectedness to the community college.
ATRIN1	
ATRIN2	<b><u>Attractiveness of Institution</u></b>
ATRIN3	There is a proper balance between athletics and academics at community colleges with athletic programs.
ATRIN4	Students enroll in a particular community college because of a specific athletic program.
ATRIN5	Intercollegiate athletic programs increase overall student retention.
ATRIN6	Intercollegiate athletic programs increase the graduation rates of the community college.
INSPR1	Intercollegiate athletics lead to higher enrollment.
INSPR2	Intercollegiate athletics at the community college encourage local students to attend the college.
INSPR3	
INSPR4	
INSPR5	<b><u>Institution spirit</u></b>
INSPR6	Intercollegiate athletic programs increase overall community support of the community college.
SPMIS1	Intercollegiate athletics promote student pride.
SPMIS2	Intercollegiate athletics promote faculty pride.
SPMIS3	An athletic team's accomplishments promote a positive reputation of the community college.
SPMIS4	Intercollegiate athletic programs promote community pride and interaction.
SPMIS5	Intercollegiate athletic programs enhance the community college's atmosphere.
	<b><u>Support of mission</u></b>
FINEA1	Intercollegiate athletic programs support the mission of the community college.
FINEA2	Intercollegiate athletics encourage involvement of the entire community college student body, whether through participation or attendance.
FINEA3	Intercollegiate athletics should be on community college campuses only if they support the mission of the college.
	Intercollegiate athletics should be a part of the community college experience

<p>FINEA4 FINEA5 FINEA6</p>	<p>regardless of its support of the mission statement. Intercollegiate athletics promote educational opportunities for students.</p> <p><b><i>Financial earnings</i></b> A winning athletic program increases overall donations to the community college. Monies spent on intercollegiate athletic programs would be better spent on the general student body. Donations to the community college as a result of a winning athletic program should benefit primarily the athletic program. Revenue funds from intercollegiate athletic events financially benefit the entire community college. Intercollegiate athletic programs are worth the funding needed to maintain them. Alumni donations increase with a successful intercollegiate athletic program.</p>
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## APPENDIX C

**Subject:** Validation of IRB protocol # IRB2009-127, entitled "Community College Student Affairs Administrators' Perceptions of Intercollegiate Athletics"  
**From:** "Rebecca Alley" <RALLEY@exchange.clemson.edu>  
**Date:** Wed, April 29, 2009 4:17 pm  
**To:** "Frankie Williams" <FKW@exchange.clemson.edu> ([more](#))  
**Priority:** Normal

Dear Frankie and Daphne,

The Chair of the Clemson University Institutional Review Board (IRB) validated the protocol identified above using Exempt review procedures and a determination was made on April 29, 2009, that the proposed activities involving human participants qualify as Exempt from continuing review under Category B2, based on the Federal Regulations (45 CFR 46). You may begin this study.

Please remember that no change in this research protocol can be initiated without prior review by the IRB. Any unanticipated problems involving risks to subjects, complications, and/or any adverse events must be reported to the Office of Research Compliance (ORC) immediately. You are requested to notify the ORC when your study is completed or terminated.

Attached are documents developed by Clemson University regarding the responsibilities of Principal Investigators and Research Team Members.

Please be sure these are distributed to all appropriate parties.

Good luck with your study and please feel free to contact us if you have

any questions. Please use the IRB number and title in all communications regarding this study.

Sincerely,

Becca

Rebecca L. Alley, J.D.

IRB Coordinator  
Office of Research Compliance  
Clemson University  
223 Brackett Hall  
Clemson, SC 29634-5704  
[ralley@clemson.edu](mailto:ralley@clemson.edu)  
Office Phone: 864-656-0636  
Fax: 864-656-4475

## APPENDIX D

Good Afternoon,

I would like to invite you to participate in the following research study, Community College Student Affairs Administrators' Perceptions of Intercollegiate Athletics. The main purpose of asking you to complete this web-based questionnaire is to examine community college student affairs administrators' general perceptions about intercollegiate athletic programs on the community college campus in relation to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings. The information obtained from you and from other community college student affairs administrators from the southeastern portion of the country will present community college student affairs administrators' perceptions of the benefits and challenges intercollegiate athletics brings to the community college campus. Attached is additional information concerning the research study.

The web-based questionnaire will take approximately 10 to 15 minutes to complete. The initial questions will ask you to provide information concerning your personal demographics, followed by questions concerning background information about the institution in which you are employed as an administrator. The remaining items will be declarative statements about intercollegiate athletics in general in relation to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings.

To access the web-based questionnaire, *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*, please click the following



website link:

[http://www.surveymonkey.com/s.aspx?sm=O\\_2bBB47PzVMl1wXmGAH6Q\\_2fg\\_3d\\_3d](http://www.surveymonkey.com/s.aspx?sm=O_2bBB47PzVMl1wXmGAH6Q_2fg_3d_3d)

Once you have completed the web-based questionnaire, do not forget to click the **Done** tab at the bottom. Your information will then be stored in a secure, computerized database.

Whether your community college does or does not have an athletic program, your perception of intercollegiate athletics on the community college campus in general is valued and appreciated. The ultimate benefit from this or any other survey depends on the thoughtful responses and willing participation of those who are asked to help. Your willingness to participate is important and much appreciated.

Sincerely,

Daphne Holland  
Clemson University, PhD Candidate  
daphneh@clemson.edu

## APPENDIX E

### **Information Concerning Participation in a Research Study Clemson University**

(Community College Student Affairs Administrators' Perceptions Regarding  
Intercollegiate Athletics)

#### **Description of the research and your participation**

You are invited to participate in a research study conducted by Daphne L. Holland, under the direction of Dr. Frankie Keels-Williams. The primary purpose of this research study is to (1) use the *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire* to examine community college student affairs administrators' perceptions of intercollegiate athletics in the community college setting, (2) analyze the data using PASW Statistics 17.0, (3) from the data collected during the research study, determine if relationships exist among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of five variables (student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings) and students' enrollment and determine if relationships exist among the selected community college student affairs administrators' perceptions of intercollegiate athletics in terms of the five variables mentioned and retention rate, and (4) formulate conclusions from the data to propose resolutions and recommendations for further research. Participants in the research study will be student affairs administrators selected from community colleges within the southeastern region of the country that are within the SACS accreditation region, which include: Alabama, Florida, Georgia, Kentucky, Louisiana, Mississippi, North Carolina, South Carolina, Tennessee, Texas, and Virginia.

Your participation will involve completing the *Community College Student Affairs Administrators' Intercollegiate Athletics Questionnaire*. You will be asked to provide the following information: (1) personal demographic information which includes the following: gender, race/ethnicity, age, and years of experience working in higher education, (2) institutional demographic information which includes the following: home state of the community college resides in, community college residential status, student enrollment, retention rate, intercollegiate athletic program status, intercollegiate athletic teams offered and gender of each team, if applicable, and (3) answer 30 declarative statements using the following Likert scale options: strongly disagree, disagree, neutral, agree, and strongly agree to measure their agreement concerning their perceptions of community college intercollegiate athletics in terms of the following five variables (1) Student engagement, (2) Attractiveness of institution, (3) Institution spirit, (4) Support of the mission, and (5) Financial earnings.

The amount of time required for your participation will be 10-15 minutes.

**Risks and discomforts**

There are no known risks associated with this research

**Potential benefits**

The results from this research study will provide the following: (1) more awareness and additional research to the body of knowledge concerning community college student affairs administrators' perceptions of intercollegiate athletics in regards to student engagement, attractiveness of institution, institution spirit, support of the mission, and financial earnings in relation to student enrollment and student retention rate, (2) beneficial information to community college student affairs leaders as they consider establishing intercollegiate athletic programs to encourage student connectedness and engagement, (3) increased opportunity to better understand the perceptions of their peers, allowing student affairs community college administrators to compare and contrast how their perceptions are different and similar, thus learning from each other, and (4) cause for further research in regards to community college intercollegiate athletics.

**Protection of confidentiality**

We will do everything we can to protect your privacy. Your identity will not be revealed in any publication that might result from this study.

**Voluntary participation**

Your participation in this research study is voluntary. You may choose not to participate and you may withdraw your consent to participate at any time. You will not be penalized in any way should you decide not to participate or to withdraw from this study.

**Contact information**

If you have any questions or concerns about this study or if any problems arise, please contact Dr. Frankie Keels-Williams at Clemson University at (864) 656-1491. If you have any questions or concerns about your rights as a research participant, please contact the Clemson University Office of Research Compliance at 864.656.6460.

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