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# IMPROVING ON-TIME GRADUATION FOR AT-RISK STUDENTS: PERCEPTIONS OF INTERVENTIONS INTENDED TO IMPROVE ON-TIME GRADUATION IN ONE FLORIDA SCHOOL DISTRICT 

## by

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#### Abstract

The focus of this research was to identify primary interventions that participants in the study perceived to have influenced them to persist to remain in high school. This was accomplished by analyzing data gathered in a survey administered to 901 program completers who were rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders who completed the Eighth-to-Ninth-Grade Summer Transition Program in 2009, 2010, and 2011 in one Florida School District.


I dedicate my dissertation work to my wife, Lori, who supported me, understood the time I needed, handled many duties alone and always encouraged me. I want to give a special thank you to my family and my colleagues who have supported me over the past three years. I would like to give a special dedication to my beautiful granddaughter who was born during my last semester at UCF. I must acknowledge my two canine companions, Penny and Jett, who sat with me in the middle of dark nights and very early mornings, while I researched, typed, and never left my side. A sincere thank you to my Board Members who supported me in my first year as superintendent and final year as a graduate student.

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# CHAPTER 1 <br> THE PROBLEM AND ITS CLARIFYING COMPONENTS 

## Introduction

Persistence of students through high school to achieve graduation has long been a problem in the United States. Students who do not reach graduation have less earning power and often live in poverty compared to their peers who graduate (Alexander, Entwisle, \& Horsey, 1997). Students who earn graduation have been shown to be better contributors to society through increased earning power. (U.S. Bureau of the Census, 2006).

The reduced earning potential of individuals who do not graduate is equal to a salary reduction of approximately $\$ 9,000$ per year or $\$ 270,000$ over the career of the average adult who does reach high school graduation (U.S. Bureau of the Census, 2006). Individuals who do not complete their high school careers are more likely to be dependent on local, state, and federal government financial assistance. (Waldfogel, Garfinkel, \& Kelly, 2007).

As students transition from middle to high school they encounter increased education affiliated stress brought on by a change in their school environment, larger class sizes, reduced opportunities for adult interaction, and reduced autonomy (Eccles, 1991). Students entering the ninth grade who are unprepared to succeed in high school, for whatever reason, have a reduced chance of reaching graduation with their peers. This is true for students who have not connected with the school as well as those who have low self-confidence in their academic abilities (Scheel, Madabhushi, \& Backhaus, 2009).

According to Lan and Lanthier (2003), these students have been labeled at risk academically and socially and need intervention and support in order to persist through their freshman year and eventually reach high school graduation.

According to the National Center for Education Statistics (2007b), only 73.2\% of the U.S. high-school freshman cohort graduated within four years in 2005-06. This percentage is the average cohort graduation rate. Furthermore, using regional statistics, Florida was identified as one of 10 states with an average freshman graduation rate below $70 \%$. Students not persisting until graduation place a greater burden on society, have a greater chance of substance related issues, have an increased chance of becoming part of the justice system and have contribute less to society. (Scheel et al., 2009).

## Statement of the Problem

One of the common concerns of high school administrators and school district leaders is the number of students who do not choose to stay in high school and graduate. Although research abounds on this topic, the findings have often been contradictory. There are many variables that impact students' decisions to drop out of high school. Similarly, there are intervening variables that increase the self-efficacy of students and cause them to stay in school. School leaders continue to seek solutions to the drop-out problem that are within their control (Balfanz, Bridgeland, Moore \& Fox, 2010). The Eighth-to-Ninth Grade Summer Transition Program was one district’s response to this problem. It is this program that was the subject of this study.

## Purpose of the Study

The purpose of this research was to identify primary interventions that participants in the study perceived to have influenced their persistence to remain in high school. This was accomplished by analyzing data gathered in a survey administered to 901 program completers who were rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders who completed the Eighth-to-Ninth-Grade Summer Transition Program in 2009, 2010, and 2011.

## The Eighth-to-Ninth-Grade Summer Transition Program

Beginning in 2009, with the assistance of a $\$ 358,000$ AT\&T Achieve Grant, the target school district identified rising ninth graders who were not successful in eighth grade as determined by a grade point average (GPA) below 2.0 In addition, administrators in feeder middle schools identified students in April of 2009, 2010, and 2011 each school year who they believed were not going to earn promotion to ninth grade as determined by a GPA below 2.0, non-proficient FCAT scores, and/or were two or more years behind their cohort. Transition Program administrators, through articulation with their feeder high schools, arranged enrollment in and transportation to the program. Thus, in 2009, 2010, and 2011, at-risk students were encouraged to enroll in a six-week summer Transition Program in the target school district. Students who completed the sixweek program with letter grade of "A", "B", or "C" earned one high school credit, were permitted to participate in sports and other extracurricular activities their freshman year, and were assured of tutorial, mentoring, and special opportunities throughout their four years in high school. As an additional incentive, a local college offered a one-semester
scholarship for all participating transition students who graduated from high school with greater than a 2.50 GPA.

The Transition Program is an academic "teach forward" model. During the six weeks of the program, students actually begin work in ninth-grade language arts, mathematics, and biology curricula. They focus on the first six-weeks of the freshman year for the three courses, develop vocabulary, and complete the summer literature requirements. Key areas of emphasis in the program are study skills, high school writing and reading skills, and an affective component. A concerted effort has been made each year to schedule all Transition students in the regular year with at least one teacher they had during the summer Transition Program. To provide further support, students are assigned either a student or adult mentor, or both. Individual student academic growth and attendance have been watchfully scrutinized beginning in the ninth grade and continuing into each subsequent school year.

Over 1,700 high school students had completed the Eighth-to-Ninth-Grade Summer Transition Program during the summers of 2009, 2010 and 2011. It was these students (rising $10^{\text {th }}-, 11^{\text {th }}$-, and $12^{\text {th }}$-grade students) who were the focus of the research. This study utilized historical data gathered from the "Transition Program Survey" developed and implemented by the target district. Using the data gathered by surveying program completers, primary interventions that participants in the study perceived to have influenced their persistence to remain in high school were able to be identified.

## Conceptual Framework

This study was grounded, in part, in a conceptual framework developed around several factors that have been determined to place high school students at risk academically. Malloy (1997) identified a comprehensive list of factors including: a high rate of non-attendance, being retained in elementary or middle school, poor grades, nonproficient standardized test scores, non-involved parents and families, lack of school participation, weakened self-confidence, communal problems, and a lack of inspiration to persist annually until graduation. Of particular interest in this study were three major constructs: (a) social structures, (b) lack of academic success, and (c) lack of student engagement. It is two of these factors, lack of academic success and lack of student engagement that led to the admission of participants to the Eighth-to-Ninth-Grade Summer Transition Program.

Of equal importance in the conceptual framework of the study were the identified constructs of the Eighth-to-Ninth-Grade Summer Transition Program: (a) student-adult relationships, (b) student study skills, (c) student motivation, and (d) school provided resources. The program was developed to provide support in these areas, and the Transition Program Survey was designed to measure the extent to which students perceived their persistence to remain in school was influenced by these constructs.

## Factors Putting Students At Risk

## Truancy

Truancy, or a high rate of absenteeism, has been defined as students who are regularly not present in class, and it has been identified as a major cause of students being categorized as at risk for dropping out (Lever et al., 2004). Absenteeism includes missing all or part of a school day on a recurring basis. Frequent absenteeism can begin because of issues related to the student's family situation, friendship groups, health issues, financial problems, neighborhood issues, lack of involvement, or alcohol and drug problems. Prescribed intervention programs, such as a quality eighth to ninth transition program, focused on students who exhibit specific at-risk issues or behaviors, may provide advantageous support for persisting until graduation (Hallfors et al., 2002).

## Retention

Although many factors contribute to a students' lack of persistence to remain in high school, being retained one or more years greatly contributes to a student's lack of motivation to persist in high school.(Lee \& Burkham, 2003). Students who have been retained because of failure and are behind their cohort are at greater risk of dropping out of school (Rumberger \& Palardy, 2005). According to Dr. Deborah Camilleri, Coordinator of Assessment and Accountability for the target school district, "students who have been retained two or more times and are two or more years behind their cohort
have a near zero percentage chance of graduating in the target school district" (personal communication, November 19, 2010).

## Academic Success

Academic success, as defined by grade point average, has been judged to be an indicator of persisting until graduation (Roderick \& Camburn, 1999). Students who have ongoing academic issues usually do not graduate; they fall further behind each year and have a difficult time catching up with their cohort. Organizational skills, assignment completion, test preparation, background knowledge, and knowing how to study are some of the factors that are necessary for a student to experience academic success (Wehlage, 1989). According to Borg, Plumlee, and Stranahan (2007), students who are not at least achieving in the grade they are enrolled, as defined by standardized tests, are also at risk. The inability to read at grade level becomes more difficult as students move from middle to high school. The Florida Comprehensive Assessment Test (FCAT) at the ninth- and tenth-grade levels requires a developmental scale score (DSS) gain of 78 or greater points in order to achieve one year's learning gain. The problem compounds as students get older, because they need to not only achieve one year's worth of learning gains but also make up for lost ground, sometimes having to achieve up to two or three year's growth annually to be considered at grade level.

## Student Engagement

Student engagement is critical to persisting until graduation. Engagement involves meaningful interaction in class activities, participation in organized athletics or clubs, good discipline in class and in school. (Goldschmidt \& Wang, 1999; Rumberger \& Larson, 1998). Although dropping out usually occurs during high school, the disengagement process may begin in elementary and middle school Young people typically establish a pattern of school persistence at an early age. They establish an interest in school and develop the academic and motivational skills necessary to progress through school with the appropriate cohort. During the elementary and middle school years, students’ interest in school and academic skills may begin to lag. By the time students transition to high school, those who are at risk of dropping out may need intensive individual support or other supports to re-engage them in the purpose of education (Cohen \& Smeardon, 2009). School administrators, teachers, and lawmakers need to consider how to support and replicate sustainable and proven strategies focused on increasing student engagement in class and at school and fostering motivation (Dynarski et al., 2008).

## Constructs of the Eighth-to-Ninth-Grade Summer Transition Program

## Student-Adult Relationships

For the purpose of this study, student-adult relationships were measured using student responses on the Transition Survey. This enabled a determination of students'
perceptions of the extent to which having a mentor assigned throughout high school as well as positive relationships with teachers, guidance counselors, and administrators and parental expectations may or may not have helped them be more confident and stay on course to graduate. Students need individual attention and support to engage them in their education and to refocus them on their studies (Cohen \& Smeardon, 2009). Poor relationships with teachers and achievement-related factors, coupled with feelings of isolation and behavioral disorders, are contributing factors leading to students' dropping out (Gunn, Chorney \& Poulsen, 2011). A common element of transition and dropout prevention programs is the assignment of adult advocates to students at risk of dropping out (MacIver, 2011). Another common and successful element is a greater personalization of the high school experience through the planned efforts of an adult advocate to increase student engagement and students' attachment to their school (MacIver, 2011). The effect of having positive student-adult relationships may prove to be a factor in student persistence to remain in school.

## Student Study Skills

For the purpose of this study, student study skills were measured, using the perceptions of students obtained from the Transition Survey, as to the extent to which numerous activities impacted students' confidence and helped them stay on course to graduate. Being prepared for class, completing homework, taking good class notes, completing work on time, preparing for tests, and participating in class are some of the study skill activities about which students will be queried. Students enter high school
with varying levels of preparedness, and teachers must be trained to teach students to develop study skills to become independent learners (Cohen \& Smerdon, 2010). The primary purpose of transition programs is to supplement basic classroom instruction and provide specific methods of support (Gunn et al., 2011). Successful programs provide academic support and adequate opportunities for skill development with student enrichment to improve academic performance (MacIver, 2011).

## Student Motivation

Backhaus et al. (2009) discussed the importance of the relationship between student engagement and academic and school success. Vallerand, Fortier, and Guay (1997) implied that poor motivation leads to academic underachievement which ultimately becomes a predictor of not persisting until high school graduation. Research in the target district was conducted to discover factors that contribute to high school students' staying in school and reaching graduation on time with their cohort. In this study, motivation was measured using school district attendance data and Transition Survey data. Students' perceptions of the extent to which self-monitoring of GPA and credits, getting help at school when needed, and doing well in their "toughest" class assisted them in staying on course for graduation and improved their confidence were determined.

## School Provided Resources

It is imperative that schools have a structured, long-term commitment to support students during the eighth-to-ninth-grade transition period and continuing through graduation. Well-developed support programs need to be established that include fluid planning to adjust to the needs of the individual students, provide frequent and ongoing communication, and conduct established assessment practices (Cohen \& Smerdon, 2010). Dropout rates decrease when there is a solid and planned school based commitment to address individual student needs (Gunn et al., 2011). For the purpose of this study, school provided resources were measured using data from the Transition Survey. Students indicated to what extent they were assisted in staying on course to graduate by additional resources provided by the school district. These included: (a) college scholarships, (b) summer transportation, (c) after-school tutorials, (d) study skills classes, and (e) having computer access at school.

## Definition of Terms

The following terms, relevant to the research, were defined as follows:
Achieve grant. This is a $\$ 358,000$ AT\&T funded grant earned by the district in which the study was conducted to support the Eighth-to-Ninth Grade Transition Program. Student transportation, curriculum development, mentoring support and instructional materials are the major components of the grant. The district's in-kind contribution provides the teachers' salaries for the six-week summer program.

At-risk. At-risk students are those who are not eligible for promotion from eighth to ninth grade because they did not earn a 2.0 GPA, failed one or more academic course, are non-proficient in reading and math (as evidenced by their eighth-grade FCAT performance), and/or have been retained two or more times. For the purpose of this study, and to avoid common, negative perceptions, at-risk students will often be referred to as promise students.

Course grades. Course grades are assigned at the completion of each course. Individual student performance is reported as a letter grade (A, B, C, D, F). Each letter grade is defined numerically as a point-value range: $\mathrm{A}=90-100, \mathrm{~B}=80-89, \mathrm{C}=70-79$, $\mathrm{D}=60-69$, and $\mathrm{F}=0-59$.

Eligibility. Students who achieve or maintain extracurricular eligibility are given the opportunity to participate in high school sports and/or extracurricular activities during a specified semester.

Grade point average (GPA). The Grade point average, or GPA, is the numeric average of a student's grades. A 2.50 GPA is the midpoint between a " B " (3.0) and a "C" (2.0). For the purposes of this study, the year-end and cumulative GPA were used. The year-end GPA is the average of all of the courses taken during a specific school year. The cumulative GPA is the average of all courses attempted while enrolled four-years in high school.

Graduation cohort. Students entering their freshman year of high school for the first time, i.e. non-repeaters, are used to build the graduation cohort. Each cohort is tracked for four consecutive school years, with the expectation that students within the
cohort will graduate at the end of the four years. Students graduating with their cohort are considered as on-time graduates.

Promise Students. This term is used interchangeably with at-risk students. Promise students are learners who are not eligible for promotion from eighth to ninth grade because they did not earn a 2.0 GPA, failed one or more academic courses, are non-proficient in reading and math (as evidenced by their eighth-grade FCAT performance), and/or have been retained two or more times.

Scholarship. A 12-credit scholarship for the local state college is granted to participants in the Transition Program upon graduation if they earn a 2.50 cumulative high-school GPA.

Teach Forward. Students are taught the first six-weeks of the language arts, mathematics, and biology regular year curricula during the summer term.

Transition Program. The Transition Program is an academic teach forward model which has been implemented in the target district. At-risk/promise students actually begin work in their ninth-grade English, algebra and science classes during a six-week summer program.

## Research Questions and Hypotheses

Each of the four research questions correspond to the subsequent stated hypotheses. The hypotheses are meant to provide testable standards for the data analysis.

1. To what extent is the school district successful in placing students identified as at-risk on four criteria (discipline referrals, days absent, FCAT scores, and grade point average) in the intervention program?
$H_{1 a}$ : The school district will be more successful in placing students in the transitions program who were identified as at-risk according to GPA criterion rather than identified as at-risk according to discipline and absence criteria. $H_{1 b}$ : All four at-risk variables will be significantly associated with participation in the intervention program net of student demographic covariates.
2. Which features of the intervention program do students perceive as most critical in contributing to high school persistence?
$\mathrm{H}_{2}$ : Students in the school district will identify student-adult relationships as the most critical factor that impacts their high school persistence after entering the intervention program.
3. For which tasks associated with high school persistence do high school students have the highest perception of mastery or concern?
$H_{3}$ : Students in the school district will identify their motivation as the most critical factor related to their self-efficacy that impacts their high school persistence after entering the intervention program.
4. To what extent do the results found in Research Questions 2 and 3 vary by school and entering ninth-grade cohort?
$H_{4}$ : When hypotheses 2 and 3 are analyzed by school and cohort, there will not be significant differences in the school district by either school or cohort, nor will interaction effects by school and cohort be found.

## Research Design

This research constituted one part of a mixed-method study conducted in the target district by three researchers. This study used a district-compiled survey given to 901 rising $10^{\text {th }}$-, $11^{\text {th }}-$, and $12^{\text {th }}$-grade students who participated in the intervention program. In this survey, students provided their perceptions of multiple components of the intervention program to gauge which characteristics they believed were associated with their high school persistence. Students also answered questions on their ability to complete tasks critical to high school success.

## Population

The population will consist of students who participated in the Eighth-to-NinthGrade Summer Transition Program in the summers of 2009, 2010, and 2011 and who were enrolled in the target school district in 2011-2012. The students were distributed among all the high schools in the school district. Over 900 rising $10^{\text {th }}-11^{\text {th }}$-, and $12^{\text {th }}-$ grade Transition students were surveyed, and 901 students actually completed the Transition Survey. Responses were confidential and obtained electronically. As of May 1 of 2012 , there were over 1,000 rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders enrolled in the school district who had completed the Transition Program during the summers of 2009, 2010,
and 2011. Approximately 100 students did not complete the survey, as they were not available due to absence or end of course testing during the four-day survey window. The survey responses were confidential and obtained electronically.

## Instrumentation

The Assessment and Accountability Department of the target district designed the Transition Program Survey (Appendix A) which was administered electronically in May of 2012 to all rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders who participated in the Eighth-to-NinthGrade Summer Transition Program during the summers of 2009, 2010, and 2011. It consisted of 41 multiple choice items and one narrative response question. Identified constructs within the Transition Program Survey were: (a) student-relationships, (b) student study skills, (c) student motivation, and (d) school provided resources. Item 42 in the survey elicited narrative responses from participants. A 5-point Likert-type scale was utilized for all multiple-choice items.

Items 1-17 in Section A of the survey requested that respondents indicate their perceptions of the factors that assisted them in remaining in school and on target to graduate. Items 18-40 in Section B of the survey quantified students' levels of confidence (self-efficacy) in regard to factors that lead to student success. Item 41 in Section C asked students to identify three things from the previous listing that had been most helpful in keeping them on track to graduate. Item 42 was an open-ended response item in which respondents had the opportunity to "compare the student you were in middle school to the student you are now."

## Data Collection

All data analyzed for the study were archival and available within the offices of the target district that indicated its support for the research. No research activity was initiated until the proposal was reviewed and approved by the Institutional Review Board of the University of Central Florida (Appendix B). The data used came from two primary areas. The district's student data system was used to access the data related to student attendance in eighth grade, number of retentions, GPA, and test scores. The collected data were disaggregated by gender, ethnicity, socioeconomic status, grade level, and enrolled school. An initial analysis of data involved the simple calculation of means, medians, and standard deviations to produce descriptive statistics.

## Data Analysis

Survey responses were attached to district-maintained data on students through a unique identifier to assist in answering the research questions presented in Table 1. Research Question 1 was used to analyze the degree to which the district placed students identified as at-risk in the intervention program as measured by defined at-risk variables. Through the use of attendance data, grade-point average data, retention data, socioeconomic status, and FCAT assessment data, the district's success in assisting the most at-risk students in participating in the program was analyzed. To identify which students participating in the program may have been identified as at-risk, the at-risk variables were analyzed separately and together using a logistic regression to determine the stronger predictor of being at-risk. Descriptive statistics for participating and non-
participating students identified as at-risk were provided in order to determine if the district was placing a higher percentage of students in some risk categories than others in the intervention program. Additionally, these descriptive statistics were also used to suggest whether or not some at-risk categories were too large or narrow given the number of student spots available in the transition program each year.

Research Questions 2 and 3 were used to examine students' perceptions of the importance factors that influence their persistence and their perceptions of their ability to complete tasks associated with high school success. Student responses for Research Question 2 were measured using a modified Likert-type scale on the first 17 questions asked in the Intervention Program Survey. The calculation of an exploratory factorial analysis, permitted the determination of four major constructs: (a) student-adult relationships, (b) student study skills, (c) student motivation, and (d) school-provided resources.

For Research Question 3, students answered questions on their ability to complete tasks associated with high school success. Student responses on each of the constructs for each research question were examined by survey item and construct. Descriptive statistics for items and constructs were used to display factors students found most important to their high school persistence.

Research Question 4 expanded on Research Questions 2 and 3 to examine differences in the survey results by intervention cohort and school. Data gathered in response to Research Question 4 were grouped together to calculate a factorial ANOVA. This was used to determine if there were significant differences in student perceptions of
the relationships between high school persistence in the three cohorts and the eight schools examined. Table 1 displays the research questions and sources of data.

Table 1
Research Questions and Sources of Data
Research Questions
Sources of Data

1. To what extent is the district effective in placing School district database students identified as at-risk on three criteria into the invention?
2. Which features of the intervention program Transition Survey: Items 1-17 (individually or represented as constructs) do students perceive as most critical in contributing to high school persistence?
3. For which tasks associated with high school

Transition Survey: Items 18-41 success do intervention students have the highest perception of mastery or concern?
4. To what extent do the results found in Research

Transition Survey: Items 1-41 Questions 2 and 3 vary by school and entering $9^{\text {th }}$ grade student cohort?

## Significance of the Study

Students dropping out of high school has resulted in a national, state and local crisis. With the national graduation rate at $77 \%$, there are thousands of students leaving school each year without the skills necessary for post-secondary career or college readiness (Scheel et al., 2009). This study provided fundamental insight into the factors that students perceive as important in keeping them on a positive trajectory towards graduation. The study added value to the knowledge regarding students' perceptions of
major mitigating factors in high school as compared to middle school that engaged them in school. The interventions that appear to have importance in assisting promise students in getting on track towards high school graduation were identified for replication in other programs throughout the target district.

## Limitations

1. This study was conducted in a single district using an existing population. The mobility rate for this group of students was high, and students who withdrew from their schools between 2009 and 2012 were not surveyed.
2. The survey used in the study was designed by the target district. The researcher did not design the instrument and was limited to utilizing what was created and administered in the district.
3. By surveying existing students in this school district, the objectivity of the respondents may come into question.

## Delimitations

1. This research was delimited to a specific population of students. The students in this study enrolled and completed the Transition Program the summer prior to their ninth-grade year. The students in the study remained in high school persisting to graduation. Students who were not admitted to and did not complete the Eighth-to-Ninth-Grade Summer Transition Program in 2009,

2010, or 2011 were excluded from this study and were only identified to gather demographic data as it related to Research Question 1.
2. Data collected to measure students' perceptions regarding the four constructs of the instrument (student-adult relationships, student study skills, student motivation, and school provided resources) were delimited to that which could be obtained from the Transition Program Survey.

## Assumptions

1. It was assumed that the Transition Program Survey was adequate to elicit information regarding students’ perceptions of influences on their persistence toward graduation.
2. It was assumed that participants in the study responded accurately and honestly to the questions asked in the survey.

## Summary

Over the years, there has been much research conducted pertaining to the dropout problem in high schools. That problem has emerged as a crisis, and the debate has focused on interventions that increase a student's chance of graduating. Numerous programs and practices have been implemented, researched, and aligned to improved graduation rates. Some programs have been determined to have no effect. Others have been judged to have limited or longer lasting effects (Astbury, 2010).

This study was conducted to investigate the perceptions of high school students in identifying interventions put in place by one school district in a teach forward Eighth-to-Ninth-Grade Summer Transition Program. The specific factors that students perceived as the intervening measures to mitigate their deficiencies and keep them engaged in school were identified.

# CHAPTER 2 <br> REVIEW OF THE LITERATURE AND RELATED RESEARCH 

## Introduction

This chapter has been organized to present the major factors which lead to an unsuccessful eighth-grade year and, conversely, the mitigating factors that may engage unsuccessful eighth-grade students in high school. This study was grounded in a conceptual framework developed around factors that had been determined to place high school students at risk academically. Four of these factors were used to identify students for admission into the Eighth-to-Ninth-Grade Summer Transition Program. Thus, of particular interest in this review was literature and research related to these four factors: (a) a high rate of absence or truancy, (b) retention, (c) lack of academic success, and (d) lack of student engagement.

Literature related to the four constructs emphasized in the program was also reviewed. Included was literature and research related to elements that were emphasized in the Eighth-to-Ninth-Grade Summer Transition Program: (a) student-adult relationships, (b) study skills, (c) student motivation, and (d) school provided resources. In the final section in the review, the importance of intervention and intervention programs was explored with particular emphasis on transition program design, implementation, and evaluation.

In preparation for the study, the researcher conducted an extensive search of relevant literature and research-based dropout prevention practices in the United States. Articles, case studies, and research-based dropout prevention practices were collected and
categorized by topics directly correlated to the major questions being researched in this study. The researcher conducted the literature review by searching scholarly, peerreviewed journals, articles, research reports, and tests related to the singular and cumulative factors that often result in a lack of success in the eighth-grade year. Literature was also reviewed on the constructs and mitigating factors that motivate students to persist through high school graduation. Searches for reports at the national and local levels were accomplished by utilizing the University of Central Florida (UCF) online library and databases. Searches for reports and published findings were also conducted through websites and databases offered by the (a) U.S. Department of Education, (b) National Center of Statistics (NCES), (c) the Center for Education Reform (CER), and (d) the Florida Department of Education.

## The Identification of At-Risk Students

The high school dropout epidemic in the United States has had a negative effect on the community, the nation, and the work force. Astbury (2010) estimated that all of the United States students in one academic year who did not persist to complete high school would, over the span of their productive years in the work force, cost the nation $\$ 310$ billion in lost wages and productivity. The effect of students dropping out on the total economy has resulted in increased numbers of individuals unemployed and in low paying jobs. Lan and Lanthier (2003), discussed poverty as it relates to employed and unemployed dropouts. Because income from low paying jobs is insufficient to move them out of poverty, dropouts live with financial issues during the majority of their
working lives. In contrast, unemployed workers and workers earning incomes below the poverty level are an increased burden on the state and federal welfare and unemployment programs. Astbury (2010) found that over 70\% of prisoners in state correctional facilities never completed high school. He further observed that with an increase as small as $5 \%$ in the high school graduation rate of males, the United States' state and federal prison systems, including costs related to criminal activity, would save over $\$ 4.9$ billion annually.

Dropping out of school is not a sudden event. It is a process of the non-engaged and their academic withdrawal over a prolonged time period (Scheel et al., 2009). The dropout dilemma is a complex issue which is directly related to environmental factors, school climate and culture, grade level configuration, family attributes and community characteristics, and the individual characteristics of the dropout (Lan \& Lanthier 2006). In the following sections, literature is reviewed related to four factors that were used to identify students for admission into the Eighth-to-Ninth-Grade Summer Transition Program in the target school district: (a) a high rate of absence or truancy, (b) retention, (c) lack of academic success, and (d) lack of student engagement.

## Absenteeism and Truancy

Attendance is a key indicator of attachment and persistence to achieve in school. Students who become truants may begin to exhibit signs of excessive absences in the primary years with an increased pattern as they progress through school (Alexander et al., 1997). Students who attend classes in school $70 \%$ of the time or less are vulnerable to
not persisting in high school (Astbury, 2010). Students frequently absent are more vulnerable to not achieving academically and to receiving lower academic grades (Gutman, Sameroff, \& Cole, 2003). When a pattern of frequent absenteeism or truancy emerges, even in earlier school years, students are more at-risk for achieving graduation (Hallfors et al., 2002).

Frequent school absence is a sign of a student disconnecting from school and a warning signal that the student may be heading towards dropping out (Schoeneberger, 2012). Sometimes family situations combined with weak emotional, social, and financial resources may cause students to gradually disconnect from school. As students miss school they become less connected, fall behind academically and gradually begin the trajectory towards dropping out (Schoeneberger, 2012).

Truancy, lack of participation and not being present in class and school are frequently escape mechanisms and signs of lack of school engagement which can lead to a student not persisting to graduation and school and district policies being enacted. (Heck \& Mahoe, 2006). The ways students are dealt with must be fair and provide an opportunity for them to get back on track. According to Smith (2009), students with discipline and behavior issues, i.e., students who do not conform to the rules, regulations and practices of a school, are more at-risk of not persisting in school until graduation. As a result of not achieving academically, the students become less engaged in school, have increased absenteeism and stop attending school (Cohen \& Smerdon, 2009). Like truancy, the disciplinary policies and procedures in place must encourage students’ improvement, be fair, and give students the opportunity to persist in school. Attendance
data can dictate the creation and implementation of strategies, rules and consequences for being truant. Targeted, specific, and customized truancy interventions coupled with a communication plan for dealing with parents can have a positive effect on students' attendance (Astbury, 2010).

## Retention

Students falling behind in their schoolwork and not keeping up academically with their cohorts, being retained at some point in their school career, and needing additional resources are all early indications of dropping out (Heck \& Mahoe, 2006). Poverty and low socioeconomic status students have been determined to be statistically more likely to experience difficulty in academics and, as a result, more frequent retentions. (Gutman et al., 2003). Neild (2009) found that $30 \%$ of the nation's dropouts were never promoted beyond grade 9.

According to Leckrone and Griffith (2006), students who fall behind their cohort academically during their ninth-grade year have a very slim chance of earning a high school diploma. Ninth-grade students who have been retained in a grade have been found to be six times more likely to not persist until graduation when compared to their cohort members who were not retained (Bornsheuer, Polonyi, Andrews, Fore \& Onwuegbuzie, 2011). Although sometimes viewed as a way to catch students up, retention in grade appears to have only a temporary positive academic effect. Neild found that within three years, students regressed. Smith (2009) observed that the number
of times and the grades at which a student has been retained have an impact on students persisting to graduation.

## Lack of Academic Success

Academic success has been judged to be a leading predictor of persistence to graduate from high school, and there are several academic factors that have been viewed as causing students to fail to persist to graduation. Poor academic preparation prior to entering the high school environment can lead to a poor transition to high school (Barclay \& Doll, 2001). Low academic expectations for students, coupled with a lack of academic preparation for the rigors of high school are part of the high school dropout crisis (Cohen \& Smerdon, 2009). As stated by Capella and Weinstein (2001), the areas of literacy, including reading comprehension, vocabulary, and mathematics, are leading readiness indicators for academic success and persistence to complete high school course work. These authors posited that students who are not successful in elementary school and proceed down a negative academic trajectory have a more difficult time getting back on track to be successful in later school years. The negative trajectory towards persisting in high school may be due to a lack of early experiences with rigorous academic content, the lack of differentiated instruction in a structured traditional school environment, limited school and individual resources, low school and student expectations, and a high school environment that does not motivate the student to be successful (Cappella \& Weinstein, 2001).

Weak academic performance in reading, mathematics, and other curricular content is a major factor frequently cited in research on students not persisting until graduation (Lan \& Lanthier, 2003). Capella and Weinstein (2001) discussed reading level as an academic predictor of future school success, observing that students who are non-proficient readers upon entering high school are more likely than proficient readers to struggle academically in coursework. Langenkamp (2010) investigated students’ progress in mathematics and found that students who were tracked in lower level mathematics courses prior to entering high school were at an academic disadvantage when they began high school and were less likely to meet graduation requirements. Langenkamp also found that students who were academically unsuccessful in their first year of high school were more likely to be unsuccessful in the remainder of their high school years and earn sufficient credits to graduate. Students who do not receive rigorous preparation in middle school for high school frequently are unsuccessful in high school (Neild, 2009).

A rigorous and relevant academic experience appears noteworthy as a way to academically engage students. A demanding, meaningful, and challenging school curriculum was discussed by Heck and Mahoe (2006) as increasing students’ probability of persisting until graduation. They indicated that regardless of the school structure or socioeconomic status of a community, students having access to advanced coursework can override the negative effects of a weak school climate. Fries, Carney, BlackmanUrteaga, and Sayas (2012) concurred that a disinterest in school caused by a lack of a challenging and meaningful curriculum and academic experience can negatively
influence students' decisions to persist in high school until graduation. Students' attitudes towards school, including commitment and motivation, are strong predictors of students' likelihood of persisting until graduation (Janosz, LeBlanc, Boulerice \& Tremblay, 1997). Students from low socioeconomic backgrounds, ethnic minority backgrounds and students for whom English is a second language earn lower grades and have lower graduation rates (Lan \& Lanthier, (2003). Latino students, as an example, perceive the transition from eighth to ninth grade to be more difficult when compared to African-American and white students (Cohen \& Smerdon, 2009). These perceptual differences, especially for Latino students, may be related to the literacy differences in that English may not be their primary home language. Students' overall literacy skills, as well as varying degrees of parental participation, may play a role in the transition from eighth grade to ninth grade. After controlling other factors, such as academic support and adult relationships, ethnicity in and of itself has had little, if any, effect on school success (Lan \& Lanthier, 2003).

## Lack of Student Engagement

Other factors which put students at-risk, particularly in the middle to high school transition, include student engagement (Smith, 1997), the type of middle school structure, and overall school engagement (Cohen \& Smerdon, 2009). Girls do not always feel as engaged or connected to their schools as boys do and often express more concerns about peer acceptance and academic success than boys do (Cohen \& Smerdon, 2009).

Students who attend a traditional Grade 6-8 structured school appear to be more at-risk during the transition process and in graduating from high school than students who attend a K-8 structured school (Cohen \& Smerdon, 2009). The stress of multiple transitions combined with other at-risk factors can increase a student's chance of not persisting in high school (Cohen \& Smerdon, 2009). According to Cohen and Smeardon (2009), students in the transition period from middle school to high school are at differing academic levels of engagement and success. These differing levels are often based on the level of rigor in terms of preparation for a rigorous high school curriculum. This is made more complex by the emotional stability of transitioning students and their ability to assimilate in a new environment (Cohen \& Smearden, 2009). The structure of the transitioning student's school (heterogeneous vs. homogeneous grouping, scheduling practices and teacher assignment) all have an effect (Heck \& Mahoe, 2006). Horwitz and Snipes (2008) discussed the importance of a number of variables to decrease students’ chances of being retained or falling behind their cohorts in high school. These authors included positive social structures, positive peer support, and solid family support as important along with students' being properly and meaningfully accepted at their schools, receiving the academic tutoring and support they need. Students having a genuine connection to middle school at the end of eighth grade was viewed by Smith (1997) as a predictor for those students having a higher grade point average in high school. According to Smith, students engage in school through a combination of meaningful work, caring adults, positive peer support and involvement in activities.

## Constructs of the Eighth-to-Ninth-Grade Summer Transition Program

The Eighth-to-Ninth-Grade Summer Transition Program which is the target of this study was designed around four constructs that were deemed to be important in putting students on a positive path to graduating from high school: (a) student-adult relationships, (b) school provided resources, (c) student motivation, and (d) student study skills. The following sections of the review address the literature and research associated with these important elements and provide a rationale for their inclusion in the instrument used in this study.

## Student, Adult, and Family Relationships

Social structures and friendship groups are disrupted when students transition from eighth to ninth grade (Morgan \& Herzog, 2001). Programs that are specifically designed and customized to support this difficult middle to high school transition appear to be effective (Smith, 2009). Morgan and Hertzog (2001) believed that quality personalized programs that include positive participation in activities in school could minimize the effect of the disruption from middle to high school. They also agreed that interaction with peers, the types of relationships among students at the end of eighth grade, and the inherent built-in peer support mechanisms affected a student's grade-point average.

Motivation created by positive adult relationships may be one of the most powerful forces in guiding and encouraging a student to persist with their studies. Scheel et al. (2009) found that schools that focused on standardized or state test scores and not
on relationships did see an improvement in the scores. They did not see an improvement in graduation. A focus on academic achievement must include academic motivations, student engagement, safety, and students' having a sense of belonging to their schools. It is essential to include learning processes and academic motivation as a result of a positive relationship (Scheel et al., 2009).

In order to customize the educational experience and focus on attaining graduation for each student, a focused approach of creating and building students’ relationships with other students, teachers, school staff, mentors and parents is essential. Christianson et al. (2008) advocated for students and mentors to work together, thereby developing students’ problem-solving skills, providing support for success in academic work, creating a nurturing and supportive environment, setting short and long term grades, and assisting students with their social and personal issues. MacIver (2011) viewed relationships as very important, linking student academic and school performance to positive relationships with teachers, the application of classroom instruction to the real world, and even how teachers work cooperatively with each other within a school. Scheel et al. (2009) also discussed relationships, indicating that a student who is motivated to succeed academically usually has (a) a positive relationship with other motivated students, (b) has a positive relationship with teachers who are supportive and encouraging, and (c) is a member of a family that sees graduation from high school as essential. Such students are also supported by guidance counselors who prevent them from being invisible at school. All of these conditions lead to a greater tendency for students to persist. The student's family situation, demographics, and socioeconomic
status all play a role in a transitioning student persisting to high school graduation (Cohen \& Smerdon, 2009).

The positive and supportive attitude of teachers makes a genuine difference to a student's education. teRiele (2006) wrote that the understanding and trust between a teacher and a student is a major factor in helping students to learn, feel confident, and to succeed in school. Whether they have a positive relationship with their teachers and whether or not they are liked by their teachers matters greatly to students. Furthermore, when schools alienate students, the students will look outside of school to validate relationships (Scheel et al., 2009).

If students perceive that teachers provide positive, genuine, caring support to them, there is a lower rate of academic failure (MacIver, 2011). Thus, it follows that failure rates are lower at schools where students report a positive, open, trusting atmosphere with their teachers. teRiele (2006) addressed the importance of fairness in dealing with students and the need for students to believe they are treated fairly and reasonably even in cases of discipline. She emphasized the need for students to believe that there was support and a real desire on behalf of teachers to get them through school as opposed to simply imposing punitive measures for punishment. Langenkamp (2010) concurred as to the value of positive relationships created and fostered at school, particularly affective relationships with teachers and peers, as a vital element of schools that promote academic success. MacIver (2011) found the relationships among teachers and staff members, including the presence of collaborative responsibility for student
academic and school success, as evidenced by coherence in academic planning among the teachers, was significantly related to student attendance and academic performance.

Ou and Reynolds (2008) posited that a positive and caring school environment and high school and teacher expectations could be proactive factors in the individual student development of children at risk. Academically challenged and motivated students, according to Scheel et al. (2009), develop a realistic and balanced view of themselves as they develop the ability to discern their personal strengths and weaknesses when engaged in an environment that fosters positive student-adult relationships. The day-to-day interactions among students, adults, and community agencies contribute to the development of the whole school culture that can have a positive impact on the development of students (teReile, 2006).

There are numerous factors that have been determined to lead to students not persisting in high school. Malloy (1997) identified a comprehensive list of factors including family related issues and school related issues including: a high rate of absenteeism, failure and retention at previous grade levels, lack of academic success, poor standardized test scores, lack of parental support, lack of school engagement, low self-esteem, community issues, and a lack of motivation to succeed in school.

Family-related issues have an effect on school success and academic achievement. Such factors as individual and/or family stress, family financial issues, the mobility of a family, health issues within the family, separation, divorce and death are all linked and related to students not achieving academically (Verdugo, 2011). Students
from lower socioeconomic groups are frequently less engaged in school and are more prone to not achieving academically (Neild, 2009).

Family factors play a role in increasing or decreasing the chances of students having a smooth transition from middle to high school and persisting to graduation. These situational factors include the parents' level of education (non-high school graduate, high school graduate, some college, and college graduate), the literacy level of the parents and other family members, the places lived and immigration status (Heck \& Mahoe, 2006). Family engagement and participation in their students' education are important components to keep students on a positive trajectory toward graduation. In Capella and Weinstein’s 2001 study of eighth-grade students, those students from families that (a) had rules governing and limiting the amount of time students watched television and (b) were enrolled at a school that had fair discipline and caring teachers, experienced improved grades in English between Grades 8 and 10. The same students demonstrated greater confidence in mathematics, higher participation in extracurricular activities, and an overall higher academic resiliency (Capella \& Weinstein, 2001). Environmental factors, including families and schools and communities, have been directly correlated to a student's persistence to stay in school. The most powerful and influential factor in a student's immediate decision to drop out of school, as found by Lan and Lanthier (2003), was related to the personal attributes of the student as defined by the student's school, community, and family.

Common forms of community involvement in successful intervention programs include engaged and active parenting, meaningful student and child services, mental
health support and staff, positive police interaction, and active and regular mentoring (Burzichelli, Mackey, \& Bausmith, 2011). Community factors that need to be considered in developing early intervention and identification are the total number of children in households, the percentage of community members who did not earn a high school diploma, the percentage of single parents, and the concentration of subgroups within a community (Lan \& Lanthier, 2003). Family factors that seem to indicate necessary early intervention are membership in a single family home, weak academic performance, and reading achievement (Capella \& Weinstein, 2001).

Strong family, school, and community support mechanisms are imperative during personal crises that students may encounter. Crisis that can have a negative effect toward achieving graduation may include emotional and psychiatric issues, depression, bipolar disorder, attention deficit hyperactivity disorder, student working to support self or family, homelessness, being in foster care, teen parent, and substance abuse or legal issues (Fries et al., 2012). Other factors that need strong family, school and community support mechanisms are behavior related issues (legal issues, delinquency, and rebellion), school failure, low motivation, low cognitive abilities, poor parenting (child supervision, parental support, and school expectations), and drug-related issues (Janosz et al., 1997).

Issues related to family structure, marital status, income level, and native language are all demographic factors that can be addressed, in part, by community services when family assistance is needed (Lan \& Lanthier, 2003). Risk factors for school dropouts can be found in all phases of a child's development. Personal, interpersonal, poverty level, community support, and school characteristics need to be
understood by the schools and community in order to provide personalize support to students (Janosz et al., 1997). Families, communities, and schools cooperatively working together can identify potential early dropouts and provide early intervention and support (MacIver, 2011).

Communities, families, and schools that implement intervention programs that provide wraparound services have a greater chance of improving a student's chance of persisting until graduation (Fries et al., 2012). Researchers have shown that students, teachers, parents, and administrators have varying perspectives on the causes of dropping out of school, the importance of clear and high expectations and the power of engaging parents and the community in improving student achievement (Balfanz et al., 2010). Demographic factors alone do not predict to any degree of accuracy whether or not a student will drop out (MacIver, 2011). Intervention to mitigate demographic factors and program development to provide equality in opportunities to graduate can assist students in persisting through school (Christenson \& Thurlow, 2004).

## School Provided Resources

School provided resources include more than the school providing a backpack of school supplies at the beginning of each school year. The resources in a school include the way the school is organized, the experiences afforded to students and families, the way students are treated with regard to disciplinary and academic issues, retention and attendance policies, extracurricular activities, transportation, and a philosophical work ethic of high standards for all students (Capella \& Weinstein, 2001). The combination of
school involvement and positive relationships within the school appear to be factors leading to graduation. Scheel et al. (2009) found that positive relationships with teachers, either through classroom interaction, mentoring or extracurricular participation, contributed to students’ sense of well-being. Capella and Weinstein found that involvement in school activities, as measured by extracurricular participation, increased connectedness to school, mitigated other factors, and increased a student's chance of graduating.

School leaders are considered to be a primary resource of the school, and they can foster positive relationships among adults and students in a school. The leadership can define the way academic progress is measured, using individual progress with a customized plan for success as opposed to large group comparisons. They can promote school belongingness and self-efficacy (Scheel et al., 2009). Relationships with adults in the building must emphasize and develop students' strengths and not focus solely on their weaknesses.

Christenson et al. (2008) found that schools with the greatest ability to retain students until graduation tended to be smaller in size, enforce fair disciplinary standards, employ caring teachers, have high individualized student expectations, and provide for meaningful student participation. Teachers who are able to engage students in school are a critical factor in bolstering student persistence to remain in school. Classroom and school behavior such as classroom participation and engagement, school attendance, tardiness, and preparation for class can predict future school success and student persistence beyond psychological, family, and community resources (Cappella \&

Weinstein, 2001). Holding all students and schools to a high academic standard of excellence with clear state and district grades that prepare students for career and college appear to provide the sustainability necessary to persist to graduation (Balfanz et al., 2010). High standards, coupled with early warning and customized intervention systems to foster high student engagement and rigorous coursework, appear to be important in improving persisting towards graduation (Balfanz et al., 2010).

## Student Motivation

Cohen and Smerdon (2009) expressed the belief that students who lose motivation to persist in school often believe that the classes in which they are enrolled are not interesting, and they are not motivated by their school experience to work hard. These authors explained that the lack of expectations placed on students and the lack of useful, applicable, real-world experiences in school often result in a lack of interest in school.

The transition from middle school to high school is a crucial step for students as to whether they will or will not persist to graduation due to an array of other intervening circumstances. Losing interest in school does not suddenly happen. Losing interest in school is a process that takes place from birth to high school (Verdugo, 2011). The transition period from middle school to high school, from Grade 8 to Grade 9, begins early in middle school and continues through high school (MacIver \& MacIver, 2010). Thus, the process or cycle of not persisting in high school begins very early in a student's academic career (Heck \& Mahoe, 2006).

Furthermore, about one-third of the students that leave high school prior to graduation do so for personal reasons and for reasons over which they feel they have little control. Some leave because they have found employment and need the financial resources to support themselves or their families; some leave because they become parents while still in school, and others stop attending school so they can provide for a family member (Cohen \& Smerdon, 2009).

## Student Study Skills

Effective study skill strategies include a defined range of cognitive skills that assist students in acquiring and mastering the material they need to be academically successful (Devine, 1987). Understanding how to study, what to study, and when to study is fundamental to overall school success. Study skills must be taught to all learners, not just those at-risk, as even average learners frequently demonstrate weaknesses in basic study skill strategies (Nicaise \& Gettinger, 1995). Students who have been taught and possess strong study habits and study skill strategies have a greater chance of achieving academically (Gettinger \& Siebert, 2002). Although students are expected to complete homework assignments, study for examinations, and prepare for class, little time is typically devoted to teaching students these important academic survival skills. Planned lessons are frequently not scheduled to teach students how to maximize their time, how to get organized, how to memorize, research, and apply newly learned information (Zimmerman, 1998).

Gettinger and Siebert (2002) have advocated for increased emphasis on study skills due to their belief that effective study skills make students and adults life-long learners, empower students to make informed decisions, and teach students how to manage their time. Lenz, Ellis, and Scanlon (1996) categorized study skills as operative and acquired. Operative study skills were described as a toolbox of strategies and tactics that students can use to help them navigate through their coursework, assignments, and testing. Acquired study skills provide students with the tools they need to be prepared in class and increase their connectedness to the class and teacher. As a result, according to Gettinger and Siebert (2002), classroom and school engagement are increased for students. Schunk and Zimmerman (1998) have stressed the need for all students to be equipped with strong study skills to engage them in school and ultimately empower them to persist in high school.

Much has been written about the importance of study skills and best practices in teaching study skills and organizational skills. However, there has been limited research linking strong study skills to high school graduation.

## Interventions

## Early Intervention

Early intervention is an important factor in giving students the skills they need to persist to graduation. The success or lack of success that a student experiences in
elementary and middle school, according to Heck and Mahoe (2006), can be directly correlated to their success in high school.

Christenson and Thurlow (2004) addressed the importance of early intervention, supported and sustained by the school over time, as a major factor in student success to persist to graduation. MacIver (2011) also spoke to the importance of early intervention, noting that students on the path to dropping out can be identified early and that intervention can lead to success in high school. He observed that intervention as early as pre-school and elementary school can level the playing field for students from different backgrounds who arrive at school with different academic experiences. Potential dropouts can be identified as early as elementary and middle school by their attendance, academic achievement, and behavior (Balfanz et al., 2010). Gutman et al. (2003) found that children from lower socioeconomic backgrounds and disadvantaged backgrounds experienced increased academic problems early on in their schooling and gradually fell further behind their cohort as they matriculated through school. As these students who were at-risk to graduate transitioned from elementary to middle to high school, their academic achievement dropped, and their absences became notably more statistically significant than those of their peers. Alexander et al. (1997) concurred with this line of thinking, expressing the belief that providing interventions for students already in the transition process from middle to high school, who are at risk of dropping out, may be too late to help them.

Early identification and intervention is important, as waiting until a student transitions to high school is probably too late to provide the effect needed to persist to
high school graduation (Gutman et al., 2003). Many potential dropouts begin to disengage from middle school at an early age; and over a short amount of time, the achievement gap begins to grow. By the time these potential dropouts enter high school, they are not motivated or academically prepared to succeed in a challenging career and college-ready curriculum (Balfanz, Bridgeland, Bruce, \& Fox, 2012). MacIver (2011) observed that $50 \%$ of eventual dropouts could be identified at the beginning of middle school by having good data systems on attendance (school participation), academic achievement, and discipline issues. Astbury (2010) noted that early warning data that were beneficial to early intervention included standardized test scores, school attendance records, academic history, exceptional student status, English as a secondary language status, and demographic data.

## Intervention Programs

The factors that lead students to persist to graduation are varied and nonconclusive, and no single strategy or single combination of strategies has emerged as responsible for students’ success in persisting. In their research, Heck and Mahoe (2006) found that there was strong evidence that students’ academic experiences in elementary and middle school influenced the chances of a successful transition to high school and ultimately persisting to graduation. A school culture that actively promotes graduation for all students, provides a staff member to work with dropout prevention, and funds the needs of at-risk students encourages persistence to graduation (Fries et al., 2012).

Though intervening at an early age is most desirable, it is not always possible. Balfanz et al. (2010) posited that interventions must be intense, customized, and part of a whole school philosophy and continuum. Examples of specific interventions as part of a customized plan for a student are: advocating for the student, academically and socially; having rigorous, engaging and meaningful academic programs; and supporting good school attendance (Burzichelli et al., 2011). Supporting students to the point that they believe they have control over their own destiny has shown to be positively correlated to school success at the middle and high school levels. Being independent and having a sense of control over one’s destiny may positively influence a student's academic achievement by increasing (a) motivation toward completion of school work, (b) the confidence to seek academic assistance, and (c) the motivation to want to learn (Capella \& Weinstein, (2001).

Intensive, personalized interventions are a crucial part of any program. Common and widespread supplementary services such as school wide tutoring and infrequent counseling have not been found to have a positive impact on academic achievement, standardized and state test scores, school attendance, or graduation rate if they are not customized for the student (Christenson et al., 2008). Because no single program can adequately and successfully meet the needs of every student, an important element of successful programs is to customize the specific academic and motivational intervention to match a student's most vulnerable areas as related to dropout risk (Janosz et al., 1997). Providing the individualized academic support coupled with meaningful and appropriate enrichment can influence academic performance (MacIver, 2011). Astbury (2010)
demonstrated a direct link between academic failure and complex, interrelated attributes of individual students, adults and school climate, thus supporting the need for targeted academic support and enrichment to increase academic performance.

Successful intervention programs utilize efficient data systems to identify students who are at risk of not completing school. Core success factors including attendance, academic achievement, behavior, socioeconomic background, retention history, standardized and state testing data, reading level, and mathematics level should be part of a data base for early identification of potential dropouts (MacIver, 2011). MacIver also supported the need to select and implement with fidelity programs to improve student conduct and social skills, the need to customize the learning environment and to provide meaningful, applicable, and challenging instruction to better engage students in learning.

An important intervention strategy identified by MacIver (2011) is to assign adult mentors to students throughout their school years to assist them to persist to graduation. Adults in school who support student individual learning and social abilities positively impact the motivation of at-risk students (Scheel et al., 2009). Intervention programs that include participation in school-related extracurricular activities may reduce the risk of dropping out (Ou \& Reynolds, 2006). Career education, vocational education, and readiness for the workforce in an environment that includes an individualized student plan, community support, coordination of support services, and engaged families have shown to be successful interventions that motivated high school students (Myint-U, O'Donnell, \& Phillips, 2012). The most common objectives of intervention programs are
to improve academic performance, to reduce the number of days absent, and to provide support during the transition from eighth to ninth grade (Burzichelli et al., 2011).

## Transition Programs

In developing transition programs that are sustainable and effective in helping students to persist to graduation, specific and strategic components of the school academic structure must be addressed. Clearly understanding the early intervention indicators that empower low-achieving students to significantly raise their level of academic success and linking them to research-proven interventions can prevent the cycle of low achievement, e.g., not persisting until graduation (Cappella \& Weinstein, 2001). Statistically, many of the students who fail to persist in high school have been low achieving academic students when they enter high school. Once identified as low achieving, the students are frequently scheduled in non-challenging academic and elective courses. There are positive effects to exposing low achieving students to a challenging curriculum (Cappella \& Weinstein, 2001).

Specific structures within a school or part of a whole school concept appear to personalize the educational experience of students and improve the likelihood of students persisting to graduation. MacIver (2011) recognized career academies, talent development high schools, accelerated middle schools, and high school reduction as having incorporated curricular and individualized approaches in their respective programs that encourage school success and give students the support they need to progress in school. Career academies are small learning communities located either on
traditional high school campuses or on their own campuses. The concept is that students matriculate through a combination of traditional academic courses and career technical courses. Students are frequently afforded mentorship or apprenticeship opportunities that provide a connection from school to the work force (MacIver, 2011).

A Talent Development High School is one reform model that changes the structure of a traditional high school to one that is focused on identifying and building on the strengths of each individual student. The organization and management of the school is structured around individual student success by utilizing a personalized model for each student. Curriculum and instructional planning and implementation are innovative and centered on a customized approach. There is also specific targeted professional development and a strategically planned parent and community component (MacIver, 2011).

The Accelerated Middle School model provides additional instruction and support to students who have fallen behind their cohort. This customized approach affords students the extra time needed to focus on clearly identified deficiencies so that they can regain the skills necessary to matriculate through middle school and ultimately transition to high school (MacIver, 2011).

School Reduction is a third model which provides an opportunity for students who have already dropped out of school to return to school. This program includes a process used to identify and communicate with dropouts. Trained adults are utilized to reach out to students, counsel them, and design a course of study which ultimately leads
to high school graduation. This customized program frequently incorporates computerbased instruction focused on skill mastery and course completion (MacIver, 2011).

School structure and organization may also have a role in encouraging persistence to graduation. Ou \& Reynolds (2008) reported that there are two major factors associated with high levels of academic success: early expectations of high school graduation and attendance in specific magnet schools. There are also indicators that student participation in planned, individualized long-term interventions, e.g., unique school structures or organizational models, empowers students to persist in school (Christenson et al., 2008). As students make the transition, the amount of success students experience is based in part on the way school districts and schools are organized (Langekamp, 2010). Numerous researchers have investigated school structure and organization and have come to the conclusion that traditional high schools are not properly equipped to motivate and encourage at-risk students to persist in their academic studies and ultimately achieve graduation (Astbury, 2010; MacIver, 2011; Scheel et al., 2009).

Astbury (2010) emphasized the importance of the transition in the ninth-gradeyear from middle to high school for all students, but especially for at-risk students. She saw ninth grade as a critical year marked by increased academic failure, increased suspension and expulsion rates, and a higher dropout rate than any other year in high school. She also noted that of those ninth-graders who were in the top quartile of their eighth-grade class, only $75 \%$ were likely to persist and earn enough credits to be on track to graduation.

Many well-intentioned educators have organized transition programs that did not meet the individual needs of the students and did not motivate students to persist to graduation. Changes to the social structure of high school can be exceptionally challenging, as they are accompanied not only by a shift in peer relationships but also by changes in school context. Having teachers, administrators, and parents who are aware of and sensitive to the social challenges students face as they transition from middle to high school is important. As an example, Heck and Mahoe (2006) found that among AfricanAmerican students, schools that had as part of their organizational structure an increased percentage of African-American teachers also had a reduced negative relationship between academic persistence and school persistence. Gutman et al. (2003) advocated for building protective factors to compensate for the individual risk factors that are part of the students' lives into transition program structures.

## Transition Program Design

The development of a transition program to increase the odds of students persisting to graduation must be personalized for the student and customized for the cohort. In the design of the program, it is important to be cognizant of the effect of school size and to create smaller learning environments (Lan \& Lanthier, 2003). Understanding the way students learn, the life events that interfere with students’ persisting until graduation, and building a program that goes beyond academic failure, test scores, and academic achievement, will increase students' likelihood of successfully completing high school (Scheel et al., 2009). Programs need to be community based and
locally organized and supported at the state and federal levels (Balfanz et al., 2010). According to Christenson \& Thurlow (2004), in order for a successful transition process from middle to high school to take place, five essential components must be addressed. First, dropping out should be considered as a process. Students do not suddenly wake up one day and make a decision to drop out of school. The indicators leading to students dropping out need to be part of an early intervention and early identification process for all students. Second, context is important. Not persisting in high school reflects a complex interaction of variables among students, parents, siblings, education, and community variables. School structure, class structure, school policies, family factors, and student-teacher relationships need to be included in program design consideration (Christenson \& Thurlow, 2004).

Christenson \& Thurlow's (2004) third component is alterable variables. There are some variables in a student's life that school cannot alter. Factors such as family structure, socioeconomic status and demographics are part of who the student is. The alterable variables are those that the school has the power and ability to control. Alterable variables include suspension policies, attendance policies, retention policies, grading procedures, school and class structure, and internal and extracurricular experiences available to students.

Completion and engagement is the fourth component Christenson and Thurlow (2004) viewed as essential. School programs that are designed to encourage students to persist until graduation include a focus on student engagement, motivating students to stay in school, to perform well, and to be part of the school community. Students'
engagement is evidenced in their motivation to learn and the level of importance they place on academics and school. The authors defined two kinds of engagement: (a) academic and behavioral engagement and (b) cognitive and psychological engagement. Academic and behavioral engagement refers to the matriculation of credits, completion of schoolwork, and participation in school, suspension, behavior-referrals and attendance. Cognitive and psychological engagement refers to the internal indicators including the self-monitoring of progress, identity within a school, organization and processing of academic knowledge, and positive relationships with peers and teachers.

Christenson and Thurlow's (2004) fifth component dealt with empirical evidence. They reported that the majority of the published, peer-reviewed research dealt directly with the reasons students drop out of school and not with successful interventions needed to encourage students to persist until graduation. Most documented interventions have been reports of targeted programs to remediate specific predictions that lead to dropping out.

Astbury (2010) has written about the value of comprehensive, long-term transition programs. Such programs and activities have long-term sustainability results for students and increase the tendency of students to persist through school and work towards graduation (Astbury, 2010). Successful comprehensive programs are interwoven programs that incorporate family, community, and school efforts. The programs are individualized to create custom intervention plans for students over an extended period of time (Christenson et al., 2008). Long-term transition programs that are comprehensive do not end when students complete eighth grade. Rather, the comprehensive transition-
related experiences continue throughout the entire ninth-grade year and frequently until graduation (Janosz et al., 1997). The comprehensive transition program activities include the students, their parents, their counselors, and their academic advisors.

In structuring and designing a program, one must accept that there are certain social variables such as socioeconomic status, family structure and composition, ethnicity, and community structures over which educators and program designers have no control. In spite of different social variables, focusing programs on behavioral and psychological attributes including academic performance, connectedness to school, mentor support, school attendance, discipline, engagement, and academic support can help students improve their personal perception of self and encourage them to persist in school (Lan \& Lanthier, 2003).

Scheel et al. (2009) suggested that, in designing programs, it is important to focus on the ninth grade as the most critical year. Astbury (2010) shared this view, indicating that programs should build a supportive mechanism for at-risk students who continue through high school until graduation. Barclay and Doll (2001) called upon program designers to consider that ninth graders who enter high school labeled as at-risk have earned several failing grades, have had troubled and negative peer relationships, were less motivated than non-at-risk peers, were more withdrawn, apathetic, and were not as well adjusted.

Christenson \& Thurlow (2004) stressed the importance of a personal-affective focus as the beginning stages of developing a transition program. They believed that successful transition programs should stress the importance of one-on-one counseling for
every student with short and long-term personal, academic, and career planning as the central focus. They recommended participation in a class that deals with the affective domain. In this type of class, students would learn more about their academic and social strengths and weaknesses and develop problem-solving strategies to help the students deal with common social issues. In this class structure, students can work on variables that can be modified if they have support from the school, family, and community. Alterable variables, such as school attendance, poor academic achievement, attitude towards school, extracurricular participation, and adult relationships, are studied; and strategies are taught to help students deal with these variables (Christenson \& Thurlow, 2004).

One program component recommended by Christenson et al. (2008) is academic support. This critical component includes intensive reading and mathematics course participation, academic tutoring, specialized courses, and an engaging curriculum. Organizational skills, study skills, testing skills, and academic planning are a vital part of this component.

Hertzog and Morgan (2000) concentrated on eighth graders and five areas of concern that need to be addressed in transition programs and prior to students’ beginning high school. The five areas are (a) curriculum; (b) facilities; (c) safety and discipline; (d) teachers, administrators, and counselors; and (e) general. Examples of the questions students have in each of the areas provide a good picture of the multitude of changes and unknowns that students deal with as they progress from eighth to ninth grade.

Hertzog and Morgan (2000) identified curriculum as an area about which students would have numerous questions. In regard to curriculum, students ask: How difficult is the high school curriculum? What courses and in what sequence will I be taking them? How do I earn a credit? How many credits to I need to graduate from high school? What is a grade point average? How much homework is assigned? How do I manage to stay organized with seven different classes? What tutoring is available? Who should I see if I need help?

Students find themselves in new facilities and express the following concerns (Hertzog \& Morgan, 2000): How do I find my way around the high school campus? Where are the restrooms? Where is the cafeteria? Do I have enough time to move from building to building? How do I get a locker?

Concerned with their safety and discipline, students have numerous questions (Hertzog \& Morgan, 2000). They ask: Am I safe at high school? Do upper classmen bully under classmen? What do I do if someone is harassing or bothering me? Is there a drug problem at the school? What do I wear to conform to the dress code? What do I do if I am absent or late to class or school? What do I do if I see a fight? How do I learn the rules of the school? What are the consequences for poor conduct? (Hertzog \& Morgan, 2000)

Students are also interested in the adults in the school, teachers, administrators and counselors (Hertzog \& Morgan, 2000). They ask: Who are my teachers? Will I get to meet my teachers prior to the start of school? Am I assigned a counselor? What does each administrator do? Who is the principal of the school? How do I arrange a meeting
with a counselor? How do I talk to an administrator? Who do I go to if I am concerned or worried about something? How do I get my schedule?

Hertzog and Morgan (2000) also identified a range of general questions that ninth graders typically have as they enter a new school: How much does lunch cost? Where is the lunch menu posted? How do I know when and where to get my bus? What is the attendance policy? How often do we get progress reports and report cards? What is the bell schedule? How do I sign up for sports and other extracurricular activities? How do I use a computer during the school day? Are we permitted to use our smart phones in class? What school supplies do I need? How do I apply for free/reduced lunch?

## Transition Program Implementation

Programs must be initiated that provide the necessary support to parents and students to transition to high school from the eighth grade. The activities and programs should not be single events, but a planned and personalized program that extends over several years (Astbury, 2010). The activities and personalized programs must be implemented based on individual student needs as clearly defined by a systematic data collection process. Successful plans built around the needs of students, as defined by the data, should be implemented by an individual specifically assigned to the transition program (Fries et al., 2012).

The elements of the transition program rely on interactive connections that have taken place over an extended period of time (Gutman et al., 2003). The services provided to the students must be comprehensive, wraparound services. The advantage of
wraparound services is that the options for students preparing to drop out are based on many more factors than academics and demographics. Life events that block students’ persistence are dealt with in wraparound services on an individualized basis with the appropriate interventions and support being provided to the student as required (Fries et al., 2012). Janosz et al. (2000) stressed the importance of programs being developed by guidance counselors and administrators that are specific for each individual cohort. The planned program must involve a transition team approach that includes students, parents, guidance counselors, teachers, and administrators. A personalized cohort and customized individual approach that incorporates wraparound services over time is more effective than a piecemeal approach in assisting students to persist until graduation (MacIver, 2011).

The final piece of a well-designed program is a planned program evaluation to measure the effectiveness of the program. The transition program evaluation should be formulated in nature with clearly defined benchmarks. Waiting until graduation or toward the end of a program is too late. Based on formative evaluations along the way, programs need to be adjusted on a regular basis to meet each student's needs (Janosz et al., 2000).

## Summary

This chapter has provided a review of the literature related to four factors that were determined to place high school students at risk academically in the target school district: (a) a high rate of absence or truancy, (b) retention, (c) lack of academic
success, and (d) lack of student engagement. It was these four factors that were used to establish criteria for admission into the Eighth-to-Ninth-Grade Summer Transition Program. Literature related to the following four constructs associated with the Eighth-to-Ninth-Grade Summer Transition Program was also reviewed: (a) studentadult relationships, (b) study skills, (c) student motivation, and (d) school provided resources. The final section of the chapter was devoted to a review of the literature related to intervention and the design and implementation of transition programs for eighth-to-ninth graders. Chapter 3 contains the methodology that was used to conduct the study. Chapter 4 contains the results of the data analyses related to the four admission factors and the four constructs associated with the target district's Eighth-to-Ninth-Grade Summer Transition Program. Chapter 5 contains a summary of the findings, implications for policy and practice, and recommendations for future research.

# CHAPTER 3 <br> RESEARCH METHODS 

## Introduction

The school district supported in this study developed and implemented a transition program to assist students in transitioning between middle school and high school. Students identified as high risk for not graduating from high school on time by school-based administrators were selected for participation in the program. Program participation started with a summer course and continued with additional support services to help ensure yearly grade promotion and steady progress through high school graduation. This program has operated in the target school district since the conclusion of the 2008-2009 school year, and the first three cohorts of students in the school district intervention program participated in this study.

The Transition Program begins as an academic "teach forward" model. During the six weeks of the summer portion of the program, students actually begin work in ninth-grade English, algebra, and science curricula. The students focus on the first few chapters of texts for three courses, develop background vocabulary, and familiarity with some of readings that will be required of them as ninth graders. Key areas of emphasis in the program are organizational and study skills, high school writing, algebra, reading skills, and an affective component. A concerted effort has been made in all cohorts to schedule all Transition students in the regular year with at least one teacher they had during the summer. To provide further support, students have been assigned either a student or adult mentor, and in some cases both. Individual student academic
performance and attendance have been closely monitored beginning in the ninth grade and continuing into each subsequent school year. The summer program between eighth and ninth grades is the beginning of the transition program followed by mentored and customized support throughout high school, leading to graduation.

Over 1,700 high school students had completed the Eighth-to-Ninth-Grade Summer Transition Program during the summers of 2009, 2010, and 2011. It was these students (rising $10^{\text {th }}-, 11^{\text {th }}$-, and $12^{\text {th }}$-grade students) who were the focus of the research. This study utilized historical data gathered from the Transition Program Survey developed and implemented by the target district. Primary interventions that participants in the study perceived to have influenced their persistence to remain in high school were able to be identified.

There were two primary goals of this study. First, this research sought to identify the at-risk factors that best predicted participation in the program and to identify the degree to which the target school district was successful in placing the highest at-risk students in the intervention program. Second, this research sought to identify program and personal characteristics that students perceived to be most important in their high school persistence and whether or not these perceptions differed between schools and cohorts. Along with demographic data provided by the district, a school district developed survey of 40 multiple-choice Likert-type items and two additional items was utilized to measure the perceived factors that influenced the surveyed population to remain in high school. The methodology employed to test the research questions is
presented in this chapter which includes five sections: (a) selection of the participants, (b) instrumentation, (c) data collection, (d) research questions, and (e) data analysis.

## Selection of Participants

The intervention program developed by the school district identified existing eighth graders to participate in the program. These students were selected by schoolbased administrators using multiple variables associated with a high risk of not graduating from high school. These factors included GPA, FCAT scores, discipline referrals and absences. It is important to note that precise thresholds for at-risk variables used to identify program participants were not used and school-based administrators used their discretion in assigning students. Even with this discretion, administrators were asked to use these variables to guide their decisions. The Executive Directors who oversee middle and high schools in the school district met individually with a designated administrator at each school prior to and after student selection to ensure that the identified variables were utilized in student selection. Attendance in the summer transition course that initiated participation in the intervention program was used to indicate whether or not a student was in the treatment group (defined as participation in the transition program).

The population surveyed for this study included 901 rising $10^{\text {th }}-, 11^{\text {th }}-$ and $12^{\text {th }}-$ grade students who participated in the school district's summer transition program as rising ninth graders. These students entered high school in August of 2009, 2010, and 2011 respectively. The students who participated in this survey stayed in school,
persisting until the survey administration one, two, or three years later. These students received ongoing support services each school year. The population of 901 students consisted of students from the eight comprehensive district high schools and from the one magnet high school in the district. The students surveyed were the students who remained in school from the original cumulative total of 1,279 students who participated in the transition program as measured by students identified as summer class participants. Of the 379 students who did not participate in the survey, 183 of the students were no longer in the school district's system and 60 of the students were not present during the survey window used for data collection. Students not in the school district's system had withdrawn from the district prior to the administration of the survey. The student survey was administered at the school level during the instructional day. Students received a secure identifier that would be used to attach other demographic, instructional, and assessment information.

## Instrumentation

The Assessment and Accountability Department of the target district designed the Transition Program Survey (Appendix A) which was administered electronically in May of 2012 to all rising $10^{\text {th }}-, 11^{\text {th }}$-, and $12^{\text {th }}$ - grade students who participated in the Eighth-to-Ninth-Grade Summer Transition Program during the summers of 2009, 2010, and 2011. It consisted of 40 Likert-type items and two extended response items. The 40 Likert-type items were separated into two smaller surveys. The first survey asked student perceptions of the effectiveness of different aspects of the Transitions program. The
second asked students about their feelings of confidence in completing tasks crucial to high school success.

The Assessment and Accountability Office at the school district identified constructs through confirmatory factor analyses. Confirmatory factor analyses is a multivariate technique for assessing construct validity when a specific number of factors and relations between observed items have already been identified. Because the school district grouped and identified items for its needs and concerns, survey data were separated into factors relevant for its processes. These analyses allowed for a post-hoc understanding of the choices that were made to assess the fit and appropriateness of the factors chosen. The school district planned to use these analyses to identify areas for survey improvement over time.

The constructs identified in the Transition Program Surveys were: (a) studentrelationships, (b) student study skills, (c) student motivation, and (d) school-provided resources. Table 2 contains a listing of the constructs and the respective survey items associated with each. Correlation matrices identified that some items were not strongly associated with the other items in their factor designation, specifically Items 9 and 40 in the student study skill construct and Item 22 in the student-adult relationship construct. Items 19 and 40 asked students about class participation in asking questions (Item 19) and participating in class discussions (Item 40). This may have occurred because class participation may not have correlated to study skills identified in other questions such as homework and studying that primarily occur at home. Item 22 asked about students’ meeting parental expectations of grades. This item may not have been structured in a
way that clearly identified strength or weakness in parent-student relationships. For example, a low score on this item could indicate that an involved parent was not satisfied with a student's performance or it could indicate that a parent had low expectations. Item 41 asked students to identify the aspects of the Transitions program that they perceived to be most important to their persistence. Item 42 of the survey elicited narrative responses from participants asking their feedback on the program in general.

Table 2
Transition Program Survey Constructs and Items

| Survey Constructs | Survey Items (\#) |
| :--- | :--- |
| Student-adult relationships | Having a good mentor (1), Having good teachers (2), <br> Having good guidance counselors (3), Having good <br> administrators (4), Support from family (12), <br> Understanding my teachers (20), Meeting my <br> parent’s expectations of my grades (22), Talking to <br> my teachers (34). |
| Student study skills | Preparing for class (6), Completing homework (7), <br> Asking questions in class (19), Writing papers (21), <br> Doing well on tests (24), Getting work done on time <br> (25), Taking good class notes (27), Preparing for tests <br> (29), Improving reading and writing skills (31), |
|  | Finding time to study (38), Participating in class <br> discussions (40). |
| Student motivation | Having good attendance (5), Keeping track of my <br> GPA (10), Keeping track of my credits (11), Getting <br> help at school (35), Doing well in my toughest class <br> (36). |
| School provided resources | Computer access at school (8), Extracurricular <br> participation (9), After-school tutorial (14), Study <br> skills class (15), Transportation (16), Receiving a <br> scholarship from Seminole State (17). |

The results of the confirmatory factor analyses met only some of the criteria for model fit. Because the Root Mean Square Error of Approximation was 0.193 and values above 0.06 indicate an acceptable model fit, the fit test was not met. The Chi-Square test also slightly missed the fit test with a p-value of 0.039 where a value greater than 0.05 indicates a good model fit. However, Comparative Fix Index (0.9268) and Normed Fit Index (0.9178) values provided evidence of a good model fit with values above 0.9.

Further exploratory factor analyses were not conducted, but it is important to note that the school district desired to ask some questions without regard to concern for fit. These tests were only conducted by the school district to provide information to be used in future surveys.

Item 41 asked students to identify the aspects of the Transitions program that they perceived to be most important to their persistence. Item 42 in the survey elicited narrative responses from participants asking their feedback on the program in general. A 5-point Likert-type scale was utilized for other items.

For the purpose of this survey, the school district intended to see the results of certain questions that were not anticipated to load into particular factors. The items, themselves, were of interest. The confirmatory factor analysis process was conducted by the district to see how well items loaded into the predicted factors. Because of the interest in the answers to these items, the school district opted to retain the three items that the correlation matrices identified as not successful for the factors.

The survey was divided into three sections. Items 1-17 in Section A of the survey requested that respondents indicate their perceptions about factors that assisted them in persisting in high school and kept them on target to graduate. Items 18-40 in Section B of the survey quantified students' perceived levels of confidence (self-efficacy) in regard to factors that lead to student success. Section C consisted of Items 41 and 42. Item 41 asked students to identify three things from the previous list of factors in Section A that had been most helpful in keeping them on track to graduate. Item 42 was an open-ended response item in which respondents had the opportunity to provide feedback. Students
were asked to "compare the student you were in middle school to the student you are now." The goal of Item 42 was to evaluate student thinking in regard to the contribution of the Transition program to their educational trajectory between middle school and high school.

## Data Collection

All data analyzed for the study were obtained from archival and survey data sources from the school district. The data cleaning processes were conducted within the school district, and all students received a study identification number constructed by the target district. The school district indicated its support for the research in multiple ways. First, the school district met with the researcher to identify research questions that would help the district analyze data associated with its goals. These discussions led to the research questions chosen in this study and in other parallel school district research studies. Second, the school district changed processes on its survey and Transition data collection processes to prepare for the researcher. Finally, the school district assisted with the data formatting and retrieval to assist with the research study. No research activity was initiated until the proposal was reviewed and approved by the Institutional Review Board of the University of Central Florida (Appendix B).

The data used came from two primary areas. The school district's student data system was used to access the data related to student attendance in eighth grade, number of retentions, GPA, and FCAT scores. Data for all rising ninth graders for 2009, 2010, and 2011 were collected to compare data for participating and non-participating students.

The collected data for both groups were disaggregated by gender, ethnicity, socioeconomic status, grade level, and current enrolled school. Survey responses were attached to school district-maintained data on students through a unique identifier to assist in answering the research questions which guided the study and provide the students with required anonymity.

## Research Questions and Hypotheses

The researcher and school district representatives discussed research questions that would meet the school district's goals for evaluation. Four research questions were identified that would help the district analyze the Transition Program and better understand how to make program improvements in future years. The corresponding hypotheses were formulated to provide testable standards for the data analysis.

1. To what extent is the school district effective in placing students identified as at-risk on four criteria (discipline referrals, days absent, FCAT scores, and grade point average) in the intervention program? $H_{1 a}$ : The school district will be more effective in placing students in the transitions program who were identified as at-risk according to GPA criterion rather than identified as at-risk according to discipline and absence criteria. $H_{l b}$ : All four at-risk variables will be significantly associated with participation in the intervention program net of student demographic covariates.
2. Which features of the intervention program do students perceive as most critical in contributing to high school persistence?
$H_{2}$ : Students in the school district will identify student-adult relationships as the most critical factor that impacts their high school persistence after entering the intervention program.
3. For which tasks associated with high school persistence do high school students have the highest perception of mastery or concern?
$H_{3}$ : Students in the school district will identify their motivation as the most critical factor related to their self-efficacy that impacts their high school persistence after entering the intervention program.
4. To what extent do the results found in Research Questions 2 and 3 vary by school and entering ninth-grade cohort?
$H_{4}$ : When hypotheses 2 and 3 are analyzed by school and cohort, there will not be significant differences in the school district by either school or cohort, nor will interaction effects by school and cohort be found.

## Data Analysis

All analyses conducted in this research utilized SPSS Version 16.0 Version 12.1. Research Question 1 analyzed the degree to which the school district placed students identified as at-risk in the intervention program as measured by defined at-risk variables. Binary logistic regression was used to determine the impact of these covariates on intervention participation and to identify which at-risk characteristics most consistently
explained program participation. Binary logistic regression models predict the impact of covariates on a dichotomous dependent variable which, in this study, were participation or non-participation in the intervention program. For this research question, student demographic covariates and risk factors were chosen to determine which risk factors were most predictive of participation in the intervention program. The students who were asked to participate in the program but did not were students who had a combination of factors, including low GPA, non-proficient FCAT scores, excessive absences and/or discipline issues. The non-participants were assigned to the ninth grade without participating in the Transition Program. This analysis also determined whether or not all risk factors significantly predicted participation of other student demographic covariates.

Following this analysis, the program's interventions, as perceived by all students, were evaluated. Descriptive statistics for participating and non-participating students identified as at-risk were provided in order to determine if the school district was placing a higher percentage of students in some risk categories than others in the intervention program. Additionally, these descriptive statistics were also used to suggest thresholds for at-risk categories that were reasonable, given the number of student spaces available in the Transition Program each year.

Research Question 2 was used to examine students' perceptions of features of the intervention program that they perceived as most critical in contributing to high school persistence. Student responses for Research Question 2 were measured using a Likerttype scale on the first 17 items asked in the Intervention Program Survey. The median and mode of the Likert-type responses were presented, utilizing descriptive statistics by
question and construct for the entire sample, by school, by cohort, and by student subgroup.

For Research Question 3, students responded to items concerned with their ability to complete tasks associated with high school success. Student responses on each of the constructs and for each research question were examined by survey item and construct. As in Question 2, the median and mode of the responses were presented by question and construct for the entire sample, by school, by cohort, and by student subgroup. These descriptive statistics for items and constructs were used to display factors students found most important to their high school persistence.

Research Question 4 expanded on Research Questions 2 and 3 to examine differences in the survey results by intervention cohort and school. Factorial ANOVA analyses were conducted to determine the individual and joint effects of school and cohort on the four constructs. Factorial ANOVA analyses also allowed for the determination of potential interaction effects between school and cohort. Table 3 provides an overall summary of the research questions, sources of data, and the analysis used to analyze the data.

## Table 3

Research Questions, Sources of Data, and Analysis

| Research Questions | Sources of Data | Data Analysis |
| :---: | :---: | :---: |
| 1. To what extent is the school district effective in placing students identified as at-risk on four criteria (discipline referrals, days absent, FCAT scores, and GPA) into the invention program? | School district database | Binary logistic regression |
| 2. Which features of the intervention program do students perceive as most critical in contributing to high school persistence? | Transition Survey: Items 1-17 | Exploratory factor analysis |
| 3. For which tasks associated with high school success do intervention students have the highest perception of mastery or concern? | Transition Survey: Items 18-41 | Exploratory factor analysis |
| 4. To what extent do the results found in Research Questions 2 and 3 vary by school and entering ninth-grade cohort? | Transition Survey: Items 1-41 | Factorial analysis of variance |

## CHAPTER 4

RESULTS

## Introduction

The purpose of this research was to identify primary interventions that participants in the study perceived to have influenced their persistence in high school enrollment. This was accomplished by analyzing data gathered in a survey administered to 901 program completers who were rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders who completed the Eighth-to-Ninth-Grade Summer Transition Program in 2009, 2010, and 2011.

In this chapter, the results of the data analyses to answer the four research questions which guided the study are presented. First, the criteria used to place students in the school district's Transition Program were evaluated to determine what student performance characteristics act as strongest predictors to participation. Second, student survey responses concerning their perceived most critical characteristics of the program were evaluated to determine program strengths and weaknesses from the perspective of students who have persisted and remained in school. Third, student survey responses identifying tasks associated with student success from which participating students may have benefited were analyzed. Finally, constructs and survey items were analyzed by cohort and school to determine if there were significant differences in student responses.

## Data Analysis for Research Question 1

To what extent is the school district effective in identifying students as at-risk on four criteria (discipline referrals, days absent, FCAT scores, and GPA) into the invention program?

This question investigated the criteria that administrators in the target school district used to select students for the Transition Program who were at-risk for not graduating from high school using discipline, attendance, grade, assessment data, and demographic data. There was no metric of any single variable (e.g., 10 or more referrals result in automatic program selection) or combination of variables (e.g., five or more referrals and 10 or more absences result in automatic program selection) that resulted in program selection. Table 4 displays demographic data for the school district at large and for program participants. Because the students in the sample were chosen from three consecutive eighth-grade cohorts of students, the corresponding three eighth-grade cohorts of students in the target school district were aggregated for comparison.

## Table 4

Demographic Data for All Target School District Students and Program Participants

|  | Frequencies (Percentages) |  |
| :--- | :---: | :---: |
| Descriptors | School District | Participants |
| Race/Ethnicity | $7,023(59.60 \%)$ | $384(42.62 \%)$ |
| $\quad$ White Non-Hispanic | $2152(18.27 \%)$ | $183(20.31 \%)$ |
| Hispanic | $1,493(12.67 \%)$ | $249(27.64 \%)$ |
| Black | $456(3.87 \%)$ | $21(2.33 \%)$ |
| Asian | $659(5.59 \%)$ | $64(7.10 \%)$ |
| Other |  |  |
|  | $4,652(39.48 \%)$ | $532(59.05 \%)$ |
| Free/Reduced Lunch |  |  |
| Gender | $6,007(50.98 \%)$ | $545(60.49 \%)$ |
| $\quad$ Male | $5,776(49.02 \%)$ | $356(39.51 \%)$ |
| $\quad$ Female |  |  |
| Exceptional Student Education (ESE) | $1,383(11.74 \%)$ | $209(23.20 \%)$ |
| $\quad$ Non-Gifted | $846(7.18 \%)$ | $2(0.22 \%)$ |
| $\quad$ Gifted | $445(3.78 \%)$ | $60(6.66 \%)$ |
|  |  |  |
| English Language Learners (ELL) |  |  |

Note. Percentages represent averages from 2009, 2010, and 2011 school years.

Compared to the total school district eighth-grade student population, Black students and students with a racial/ethnic designation of Other were overrepresented in the participant group. White and Asian students were underrepresented in the participant group, and Hispanic students were represented in the program slightly above their proportion in the district at large. The student transition group had a Free or Reduced Lunch (FRL) participation rate of 59\%, nearly 20\% higher than that of the school district at large, 39\%. This difference between the transition students and the total student population in the school district is notable because FRL participation rates tend to decline
in late middle school and high school due to student and family non-participation. Male students, exceptional education students (ESE) with non-gifted exceptionalities, and English Language Learners (ELL) were also overrepresented in the sample, but few gifted students were transition program participants.

These data indicated that some groups of students (including Black, FRL, male, and ESE students) appear to have been selected more often for program participation than other subgroups. Though these groups, apart from male students, have had lower graduation rates in the school district, it was unclear, based on these demographics whether or not program selection in the target school district selected these students based on these or other relevant characteristics.

Table 5 displays reading standardized assessment performance for the state of Florida, the target school district, and program participants. The target school district outperformed the state of Florida overall during this time period by $12 \%$ among every student subgroup in eighth-grade FCAT Reading. However, a considerably larger percentage of program participants were non-proficient in Grade 8 when compared to the target school district and the state. Over 67\% of students in the target school district scored proficient on their eighth-grade reading assessment compared to $34 \%$ of students participating in the Transition Program. Students who do not pass certain statewide assessments in high school are not permitted a standard diploma outside of exceptional circumstances; thus, non-proficiency on state assessments may be an important indicator of potential non-graduation.

## Table 5

Students Proficient in Eighth-Grade FCAT Reading: Florida Target School District, Program Participants (Frequencies and Percentages)

| Descriptors | State | School District | Program <br> Participants |
| :--- | :---: | :---: | ---: |
| All Students | $55 \%$ | $67 \%$ | $306(34 \%)$ |
| Race/Ethnicity |  |  |  |
| White Non-Hispanic | $66 \%$ | $75 \%$ | $154(40 \%)$ |
| Hispanic | $50 \%$ | $56 \%$ | $55(30 \%)$ |
| Black | $36 \%$ | $45 \%$ | $55(22 \%)$ |
| Asian | $72 \%$ | $81 \%$ | $7(33 \%)$ |
| Other | $62 \%$ | $66 \%$ | $24(38 \%)$ |
|  |  |  |  |
| Free/Reduced Lunch Qualified |  |  |  |
| $\quad$ Yes | $41 \%$ | $51 \%$ | $154(29 \%)$ |
| $\quad$ No | $70 \%$ | $78 \%$ | $147(40 \%)$ |
|  |  |  |  |
| Gender | $51 \%$ | $65 \%$ | $185(34 \%)$ |
| $\quad$ Male | $60 \%$ | $68 \%$ | $121(34 \%)$ |
| Female |  |  |  |
| Exceptional Student Education |  |  |  |
| (ESE) | $22 \%$ | $29 \%$ | $29(14 \%)$ |
| $\quad$ Non-Gifted ESE | $60 \%$ | $73 \%$ | $270(39 \%)$ |
| Non-ESE and Gifted |  |  |  |
| English Language Learners (ELL) | $11 \%$ | $13 \%$ | $8(13 \%)$ |
| ELL | $57 \%$ | $68 \%$ | $294(35 \%)$ |
| Non-ELL |  |  |  |

Note. Percentages represent averages from 2009, 2010, and 2011 school years.

These students would also have taken remedial reading classes in prior years, further suggesting a need for assistance in the transition to high school. It is important to note that despite low Florida Comprehensive Assessment Test (FCAT) reading proficiency rates, over one-third of program students scored above proficiency on their
eighth-grade FCAT Reading. This places them outside of the state of Florida accountability metric definition of 'at-risk' (i.e., one who scores in the non-proficient range in both mathematics and reading in eighth grade).

With few exceptions, the distribution shown in Table 5 of program participants' other scores follows the same trends as state and school district scores. Though there was a large statewide and small target school district gender gap in reading performance, this gap did not exist among program participants. Asian students were not the highest performing race/ethnic subgroup, though as previously mentioned, Asian students were underrepresented in program participation overall. The absolute size of the gaps as measured by percentage points was smaller among race/ethnic, FRL, ESE, and ELL populations in the program group compared to the target school district and state. The proportional gaps are very similar when a floor effect is taken into account. The overall low reading scores among participants did not provide the same variability and resulting differentiation in scores.

Table 6 presents similar data for student performance on FCAT mathematics. A total of $67 \%$ of students were proficient state-wide. The target school district's students achieved $79 \%$ proficiency, thereby exceeding the state by $12 \%$. However, only $45 \%$ of Transition Program students were proficient in mathematics, indicating a 34\% mathematics proficiency difference in students proficient in the target school district and program participation group. This lower level of proficiency was similar to the 33\% difference found in reading.

The FCAT Mathematics scores were higher than FCAT Reading scores at all levels statewide and in the target school district, but comparisons between the two may be flawed. Because the state of Florida did not actively pursue assessments of comparable difficulty in all subjects and grades until the standard setting process that occurred in the 2011-2012 school year, grade/subject level assessments were difficult to compare. Tracking student performance over time was also complicated, as students could fall in or out of proficiency based on different grade level assessment standards rather than improvements or declines in performance.

Almost one-half of program participants (45\%) scored proficient on eighth-grade FCAT Mathematics. Statewide and in the target school district, there was only $1 \%$ difference in the performance of male and female students on this assessment. In the Transition Program group, however, there was a 12\% difference with 49\% of males and $37 \%$ of females attaining proficiency. The achievement gaps in the Transition Program group were again smaller than in the state and target school district, due primarily to the lower scores among students in the program group.

Table 6

Students Proficient on Eighth-Grade FCAT Mathematics: Florida, Target School District, and Program Participants (Frequencies and Percentages)

| Descriptors | State | School District | Program Participants |
| :---: | :---: | :---: | :---: |
| All Students | 67\% | 79\% | 405 (45\%) |
| Race/Ethnicity |  |  |  |
| White Non-Hispanic | 78\% | 86\% | 211 (55\%) |
| Hispanic | 64\% | 69\% | 68 (37\%) |
| Black | 48\% | 55\% | 70 (28\%) |
| Asian | 87\% | 93\% | 13 (62\%) |
| Other | 73\% | 77\% | 30 (47\%) |
| Free/Reduced Lunch Qualified |  |  |  |
| Yes | 56\% | 65\% | 202 (38\%) |
| No | 81\% | 87\% | 203 (55\%) |
| Gender |  |  |  |
| Male | 67\% | 79\% | 267 (49\%) |
| Female | 68\% | 78\% | 132 (37\%) |
| Exceptional Student Education (ESE) |  |  |  |
| Non-Gifted ESE | 34\% | 44\% | 58 (28\%) |
| Non-ESE plus Gifted | 72\% | 83\% | 346 (50\%) |
| English Language Learners (ELL) |  |  |  |
| ELL | 30\% | 35\% | 10 (17\%) |
| Non-ELL | 69\% | 80\% | 395 (47\%) |

Note. Percentages represent averages from 2009, 2010, and 2011 school years.

In selecting students for the Transition Program, administrators were encouraged to take into account other student data including attendance, discipline records, and grade point average (GPA). These data are presented in Table 7. In all attendance, discipline,
and GPA measures analyzed, Transition Program participants can be identified as at higher risk, though the gaps between the school district overall and program participants range in size from a few percentage points to over $60 \%$. As with all other data presented, these data were only calculated for eighth-grade students in the year prior to program participation.

Table 7
Discipline, Attendance, and Eighth-Grade GPA: Target School District and Program Participants

| Descriptors | School District | Program Participants |
| :--- | :---: | :---: |
| Attendance |  |  |
| Mean \# days missed | $\mathbf{8 . 0 6}$ | $\mathbf{1 1 . 6 5}$ |
| Students with 10+ absences | $29.79 \%$ | $45.06 \%$ |
| Students with 20+ absences | $8.16 \%$ | $17.84 \%$ |
| Students with 30+ absences | $2.24 \%$ | $7.26 \%$ |
|  |  |  |
| Discipline | $\mathbf{0 . 9 7}$ |  |
| Mean \# of referrals | $6.67 \%$ | $\mathbf{2 . 7 4}$ |
| Students with 5+ referrals | $1.91 \%$ | $22.48 \%$ |
| Students with 10+ referrals | $11.90 \%$ | $62.35 \%$ |
| Students with 1 in-school suspension | $5.98 \%$ | $20.77 \%$ |
| Students with 2+ in-school suspensions | $11.34 \%$ | $29.03 \%$ |
| Students with 1 out-of-school suspension | $4.43 \%$ | $22.48 \%$ |
| Students with 2+ out-of-school suspensions |  |  |
|  |  |  |
| Mean Grade Point Average (GPA) | 2.76 | $\mathbf{1 . 6 7}$ |
| Mean GPA | $18.32 \%$ | $82.46 \%$ |
| Students with GPA under 2.0 | $10.04 \%$ | $31.85 \%$ |
| Students with GPA under 1.5 | $6.99 \%$ | $10.58 \%$ |
| Students with GPA under 1.0 |  |  |

Note. Percentages represent Means from 2009, 2010, and 2011 school years.

District-wide, students missed on average of eight days per school year. Among program participants, students missed closer to 12 days each school year. This gap amounts to nearly one additional week of missed instruction for Transition Program participants. A comparison of average days of absence may, however, overlook the number of students reaching thresholds of absences that typically catch the attention of school administrators. Though there were no metrics administrators used that guaranteed program selection, a certain number of absences may cause a student to stand out on this metric. Almost $3 \%$ of students in the district overall missed ten or more days, but slightly over $45 \%$ of program participants missed 10 or more days. Approximately $8 \%$ of students in the school district missed 20 or more days compared to nearly $18 \%$ of Transition Program participants, and slightly over 2\% of students in the school district missed thirty or more days compared to over 7\% for program participants.

Discipline referrals and suspensions were also suggested as potential data to use in making recommendations for Transition Program participation. Discipline referral and suspension data were highly skewed in the state and target school district with a small group of students accounting for the majority of referrals and suspensions. Additionally, the median student in the state and target school district groups did not receive a referral or suspension. Though the rate of referrals and suspensions was higher for the program participation group, the median student in the participation group also did not receive a referral or suspension. This means that the majority of students who participated in the Transition Program did not receive a referral or suspension in the prior year.

Students in the district averaged slightly less than one referral per student, and program participants averaged slightly less than three referrals per student. As with attendance, it was useful to designate some referral categories to compare the percentage of students who received various numbers of referrals. Fewer than $7 \%$ of students in the target school district received five or more referrals, and fewer than $2 \%$ of students in the target school district received 10 or more referrals. This compares to the higher percentages of 22\% and 6\% respectively for Transition Program participants.

Referrals were infrequent for both participants and non-participants with the average being less than three for both groups. Still, referrals may be too common an occurrence to suggest program participation, and administrators may be more likely to use suspension data in their decision-making process. Around $12 \%$ of students in the school district received an in-school-suspension compared to over 32\% in the participant group. A total of only $6 \%$ of students in the school district received multiple in-school suspensions compared to almost 21\% of the Transition Program group. A similar pattern was observed in regard to out-of-school suspensions. Over $11 \%$ of all students in the school district received an out-of-school suspension compared to $29 \%$ of the participant group, and approximately $4 \%$ of school district students received multiple out-of-school suspensions compared to $22 \%$ in the participant group.

Administrators also considered grade point average in their program recommendations. The average end-of-year GPA for the three cohorts of eighth-grade students in 2009, 2010, and 2011 was 2.76 in the school district overall compared to 1.67 for Transition Program participants. In the school district, around $18 \%$ of students
received a GPA below 2.00, but over $82 \%$ of students participating in the Transition Program earned a GPA below 2.00. This number suggests that a GPA below 2.00 was one of the main criteria used for participation. Only 10\% of students in the school district received a GPA less than 1.5, and 7\% of students in the school district received a GPA less than 1.0. This compares with the Transition Program participant group where approximately one-third (32\%) of students received a GPA less than 1.5 , and $11 \%$ of students received a GPA less than 1.0. In the target school district, one failed academic course final average can result in eighth-grade retention and could lead to recommendation to the transition program. This one factor may account for some of the students who were in the program but had achieved the school district's required passing 2.0 GPA.

The descriptive data presented suggest that the program participants differed substantially from the school district students overall. The data did not identify, however, if some covariates that may be associated with program participation were more important than other covariates. Table 8 displays the results of the analysis to further investigate variables associated with Transition Program participation.

Table 8
Demographic and Educational Covariates of Transition Program Participation on Student Characteristics ( $N=901$ )

| Descriptor | Model 1 |  |  | Model 2 |  |  | Model 3 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | OR | 95\% CI | P | OR | 95\%СI | P | OR | 95\% CI | P |
| Hispanic | 1.13 | (0.91, 1.35) | 0.202 | 1.09 | (0.85, 1.33) | 0.405 | 1.11 | (0.87, 1.35) | 0.328 |
| Black | 1.44 | (1.16, 1.72) | 0.000 | 0.95 | $(0.73,1.17)$ | 0.655 | 0.90 | (0.70, 1.10) | 0.352 |
| Asian | 0.49 | (0.23, 0.75) | 0.009 | 0.84 | $(0.34,1.34)$ | 0.553 | 0.95 | (0.39, 1.51) | 0.857 |
| Other | 1.05 | (0.73, 1.37) | 0.734 | 1.10 | (0.74, 1.46) | 0.578 | 1.08 | (0.72, 1.44) | 0.635 |
| Gifted | 0.28 | (0.16, 0.44) | 0.000 | 0.43 | (0.23, 0.63) | 0.000 | 0.45 | (0.23, 0.67) | 0.001 |
| ESE | 1.45 | (1.19, 1.70) | 0.000 | 0.64 | (0.50, 0.78) | 0.000 | 0.60 | (0.38, 0.82) | 0.000 |
| ELL | 0.82 | (0.56, 1.08) | 0.191 | 0.64 | (0.42, 0.86) | 0.008 | 0.67 | (0.43, 0.91) | 0.022 |
| Gender | 0.56 | (0.48, 0.64) | 0.000 | 0.58 | $(0.48,0.68)$ | 0.000 | 0.60 | (0.50, 0.70) | 0.000 |
| FRL | 2.27 | $(1.91,2.63)$ | 0.000 | 1.44 | $(1.20,1.68)$ | 0.000 | 1.31 | (1.07, 1.55) | 0.002 |
| GPA |  |  |  | 0.40 | $(0.38,0.42)$ | 0.000 | 0.41 | (0.37, 0.45) | 0.000 |
| Proficient Read |  |  |  | 0.41 | (0.33, 0.49) | 0.000 | 0.42 | (0.34, 0.50) | 0.000 |
| Proficient Math |  |  |  | 0.50 | (0.40, 0.60) | 0.000 | 0.52 | (0.42, 0.62) | 0.000 |
| Referrals |  |  |  |  |  |  | 1.17 | (1.11, 1.23) | 0.000 |
| Total ISS |  |  |  |  |  |  | 1.01 | (0.91, 1.11) | 0.783 |
| Total OSS |  |  |  |  |  |  | 0.72 | (0.62, 0.82) | 0.000 |
| Total Absences |  |  |  |  |  |  | 1.01 | (1.01, 1.02) | 0.000 |
| Pseudo $R$-squared |  | 0.0619 |  |  | 0.2451 |  |  | 0.2592 |  |

Note: OR = Odds Ratios calculated through binomial logistic regression. ISS = in-school suspensions. OSS = out-of-school suspensions. $95 \%$ CI $=95 \%$ Confidence Interval.

Table 8 displays odds ratios calculated through binomial logistic regression of transition participation on student characteristics. Odds ratios, 95\% Confidence Intervals, and $p$-values are presented. Confidence intervals which overlap 1.00 indicate that the covariate chosen did not meet significance where $p<0.05$. Odds ratios significantly greater than one indicate that for a unit increase in the covariate, the odds of program participation increase by the factor displayed. In contrast, odds ratios significantly less than one indicate that for a unit decrease in the covariate the odds of program participation decrease by the factor displayed.

Model 1 only examines demographic variables and displays results consistent with Table 4. Black, ESE, and FRL students appear to be overrepresented in participation, and Asian, gifted, and female students appear to be underrepresented. Model 2 adds academic and assessment predictors. These covariates are significantly associated with participation, where higher GPA and proficiency on state assessments result in lower odds of program participation. Notably, the predictive power of the model increases as measured by the Pseudo R-squared. All race and ethnic predictors also fall out of significance, though FRL participation continues to be a predictor of program participation net of academic and assessment variables. Gifted, ESE, ELL, and female students continue to be less likely to participate. Model 3 adds discipline and attendance variables to the model. All discipline and attendance variables apart from in-school suspensions are associated with program participation. Although increased referrals, in-school-suspensions, and absences are associated with higher odds of program
participation, increased out-of-school suspensions are associated with lower odds of program participation.

Descriptive statistics showed that Black and Hispanic students (apart from Asian students), ESE non-gifted students, ELL students, FRL students, and male students were more likely to be participants in the transition program. Other variables such as assessment, grade, discipline, and attendance data showed significant differences between the participant and non-participant groups of students. When these variables are considered concurrently in logistic regression models, race/ethnicity is not a significant predictor of program participation net of other covariates. Both descriptive statistics and regression results support the importance of GPA as a main indicator of performance as proposed in $H_{1 a}$. Though all four additional variables (GPA, assessment, discipline, and attendance data) were associated with program participation as hypothesized, not all data moved in an expected direction. Out-of-school suspensions were associated with lower participation and other at-risk variables were associated with higher program participation.

## Data Analysis for Research Question 2

Which features of the intervention program do students perceive as most critical in contributing to high school persistence?

This question was used to analyze data gathered from a survey designed by the target school district regarding the perceptions of Transition Program students as to the usefulness of characteristics of the program. In this section of Chapter 4, the results are
presented by survey item for all students enrolled in the Transition Program in 2009, 2010, and 2011 and for each of the three cohorts for those years. Transition Program students were asked to respond to 17 items describing characteristics of the program as to whether they (a) helped very much, (b) helped a little, (c) did not help or hurt, (d) hurt a little, or (e) hurt very much.

## School District Data

As shown in Table 9, students in the school district viewed nearly all aspects of the target school district's Transition Program as positive. All program characteristics, with the exception of after-school tutorial, were viewed by a majority of students as either helping very much or helping a little. Good teachers were seen as the most helpful characteristic of the transition program with nearly two-thirds (64.8\%) of students describing teachers as helping very much and slightly more than one-fourth (27.8\%) of students describing teachers as helping a little. Eight additional variables were seen as helping very much by a majority of students: Having good guidance counselors (51.5\%), Having good attendance (53.1\%), Preparing for class (54.6\%), Completing homework (57.5\%), Computer access at school (54.3\%), Keeping track of my credits (50.1\%), Support from family (55.2\%), and Transportation (56.2\%).

However, after-school tutorial was the only characteristic of the transition program to have a majority of students not rate it as helping very much or helping a little, there were still very few students who rated this characteristic (or any other characteristic) as hurting their experience in the transition program. Only slightly over
$8 \%$ of students found that a particular characteristic of the transition program was not helpful. In combining percentages for students who responded hurt a little and hurt very much, only four characteristics had more than $5 \%$ of students describing these characteristics of the program as negative. They were having good guidance counselors (7.0\%), having good attendance (8.1\%), completing homework (5.7\%), and keeping track of my GPA (5.7\%).

The percentage of students reporting that a characteristic hurt or did not help may also serve as another measure to identify areas of potential improvement in program characteristics. Five characteristics had over $25 \%$ of students identifying these characteristics as either not helping or hurting their experience in the transition program. These characteristics were: after-school tutorial (52.2\%), study skills class (34.9\%), extracurricular participation (33.6\%), receiving a scholarship at Seminole State College (32.1\%), and good administrators (27.9\%).

Table 9
Program Participants' Overall Perceptions of Helpfulness of Transition Program Characteristics ( $N=901$ )

|  | Frequencies and Percentages |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | ---: |
| Characteristics | Helped Very | Helped a <br> Did not Help | Huch | Little | or Hurt | Hurt a Little | Hurt Very |
| :---: |
| Much |
| Having a good mentor |

## Cohort Data

Most of the cohort results related to characteristics of the transition program were similar to the school district results. Tables 10 through 12 show that for all three cohorts, the only program characteristic not viewed as having helped very much or helped a little by a majority of students was the after-school tutorial. Also mirroring the school district results, no cohort had more than approximately $8 \%$ responding that a particular program characteristic either hurt a little or hurt very much. For Cohorts 1 and 2, the most important program characteristic students recognized as having helped very much was having good teachers. This was similar to the school district results. For Cohort 3, however, having good guidance counselors received a slightly higher percentage of students responding helped very much than having good teachers.

Table 10
Cohort 1 Program Participants' Perceptions of Helpfulness of Transition Program Characteristics ( $N=424$ )

| Characteristics | Frequencies and Percentages |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Helped Very Much | Helped a Little | Did not Help or Hurt | Hurt a Little | Hurt Very Much |
| Having a good mentor | 199 (47.0\%) | 122 (28.8\%) | 95 (22.4\%) | 3 (0.6\%) | 5 (1.2\%) |
| Having good teachers | 270 (63.6\%) | 109 (25.8\%) | 35 (8.2\%) | 7 (1.8\%) | 3 (0.6\%) |
| Having good guidance counselors | 207 (48.5\%) | 109 (25.8\%) | 96 (22.7\%) | 7 (1.8\%) | 5 (1.2\%) |
| Having good administrators | 173 (40.9\%) | 126 (29.7\%) | 105 (24.5\%) | 9 (2.1\%) | 11 (2.7\%) |
| Having good attendance | 208 (48.8\%) | 136 (32.4\%) | 49 (11.5\%) | 17 (3.9\%) | 14 (3.3\%) |
| Preparing for class | 218 (51.5\%) | 156 (36.7\%) | 43 (10.3\%) | 4 (0.9\%) | 3 (0.6\%) |
| Completing homework | 224 (52.7\%) | 141 (33.0\%) | 42 (10.0\%) | 11 (2.7\%) | 6 (1.5\%) |
| Computer access at school | 217 (51.2\%) | 126 (29.7\%) | 75 (17.6\%) | 5 (1.2\%) | 1 (0.3\%) |
| Extracurricular participation | 161 (37.9\%) | 120 (28.2\%) | 136 (32.1\%) | 5 (1.2\%) | 3 (0.6\%) |
| Keeping track of my grade point average | 207 (48.8\%) | 134 (31.5\%) | 65 (15.5\%) | 13 (3.0\%) | 5 (1.2\%) |
| Keeping track of my credits | 201 (47.6\%) | 131 (30.9\%) | 75 (17.6\%) | 13 (3.0\%) | 4 (0.9\%) |
| Support from family | 245 (57.6\%) | 107 (25.2\%) | 61 (14.5\%) | 7 (1.8\%) | 4 (0.9\%) |
| Support from friends | 189 (44.8\%) | 142 (33.6\%) | 85 (20.0\%) | 5 (1.2\%) | 1 (0.3\%) |
| After-school tutorial | 96 (22.7\%) | 92 (21.8\%) | 217 (50.9\%) | 6 (1.5\%) | 13 (3.0\%) |
| Study skills class | 148 (34.8\%) | 120 (28.2\%) | 135 (31.8\%) | 6 (1.5\%) | 15 (3.6\%) |
| Transportation | 234 (55.2\%) | 80 (18.8\%) | 96 (22.7\%) | 11 (2.7\%) | 3 (0.6\%) |
| Receiving scholarship/Seminole State College | 207 (48.8\%) | 93 (21.8\%) | 117 (27.6\%) | 1 (0.3\%) | 6 (1.5\%) |

Table 11

Cohort 2 Program Participants' Perceptions of Helpfulness of Transition Program Characteristics ( $N=278$ )

| Characteristics | Frequencies and Percentages |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Helped Very Much | Helped a Little | Did not Help or Hurt | Hurt a Little | Hurt Very Much |
| Having a good mentor | 94 (33.5\%) | 84 (30.3\%) | 87 (31.4\%) | 9 (3.2\%) | 4 (1.6\%) |
| Having good teachers | 190 (68.4\%) | 47 (16.9\%) | 29 (10.4\%) | 8 (2.7\%) | 4 (1.6\%) |
| Having good guidance counselors | 115 (41.5\%) | 87 (31.4\%) | 67 (23.9\%) | 3 (1.1\%) | 6 (2.1\%) |
| Having good administrators | 77 (27.7\%) | 96 (34.6\%) | 93 (33.5\%) | 8 (2.7\%) | 4 (1.5\%) |
| Having good attendance | 160 (57.4\%) | 58 (21.3\%) | 43 (15.4\%) | 9 (3.2\%) | 8 (2.7\%) |
| Preparing for class | 158 (56.9\%) | 89 (31.9\%) | 27 (9.6\%) | 0 (0.0\%) | 4 (1.6\%) |
| Completing homework | 163 (58.5\%) | 72 (26.6\%) | 27 (9.6\%) | 8 (2.7\%) | 8 (2.7\%) |
| Computer access at school | 140 (50.5\%) | 77 (27.7\%) | 52 (18.6\%) | 6 (2.1\%) | 3 (1.1\%) |
| Extracurricular participation | 84 (30.3\%) | 96 (34.6\%) | 89 (31.9\%) | 8 (2.7\%) | 1 (0.5\%) |
| Keeping track of my grade point average | 129 (46.3\%) | 83 (29.8\%) | 52 (18.6\%) | 10 (3.7\%) | 4 (1.6\%) |
| Keeping track of my credits | 133 (47.9\%) | 88 (31.6\%) | 53 (19.1\%) | 3 (0.9\%) | 1 (0.5\%) |
| Support from family | 146 (52.7\%) | 74 (26.6\%) | 46 (16.5\%) | 8 (2.7\%) | 4 (1.6\%) |
| Support from friends | 108 (38.8\%) | 93 (33.5\%) | 69 (24.5\%) | 4 (1.6\%) | 4 (1.6\%) |
| After-school tutorial | 68 (24.5\%) | 64 (22.8\%) | 138 (49.5\%) | 4 (1.6\%) | 4 (1.6\%) |
| Study skills class | 102 (36.7\%) | 62 (22.3\%) | 96 (34.6\%) | 10 (3.7\%) | 8 (2.7\%) |
| Transportation | 142 (51.1\%) | 65 (23.4\%) | 64 (22.9\%) | 6 (2.1\%) | 1 (0.5\%) |
| Receiving scholarship/Seminole State College | 137 (48.9\%) | 38 (13.8\%) | 102 (36.7\%) | 0 (0.0\%) | 1 (0.5\%) |

Table 12

Cohort 3 Program Participants' Perceptions of Helpfulness of Transition Program Characteristics ( $N=199$ )

| Characteristics | Frequencies and Percentages |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Helped Very Much | Helped a Little | Did not Help or Hurt | Hurt a Little | Hurt Very Much |
| Having a good mentor | 98 (49.2\%) | 51 (25.4\%) | 50 (24.6\%) | 0 (0.0\%) | 2 (0.8\%) |
| Having good teachers | 134 (67.2\%) | 57 (28.7\%) | 7 (3.3\%) | 0 (0.0\%) | 2 (0.8\%) |
| Having good guidance counselors | 135 (68.0\%) | 34 (17.2\%) | 25 (12.3\%) | 3 (1.6\%) | 2 (0.8\%) |
| Having good administrators | 75 (37.7\%) | 73 (36.9\%) | 47 (23.8\%) | 2 (0.8\%) | 2 (0.8\%) |
| Having good attendance | 103 (51.6\%) | 60 (30.3\%) | 19 (9.8\%) | 10 (4.9\%) | 7 (3.3\%) |
| Preparing for class | 109 (54.9\%) | 62 (31.1\%) | 23 (11.5\%) | 2 (0.8\%) | 3 (1.6\%) |
| Completing homework | 126 (63.1\%) | 38 (19.7\%) | 21 (10.7\%) | 10 (4.9\%) | 3 (1.6\%) |
| Computer access at school | 109 (54.9\%) | 51 (25.4\%) | 33 (16.4\%) | 3 (1.6\%) | 3 (1.6\%) |
| Extracurricular participation | 77 (38.5\%) | 44 (22.1\%) | 73 (36.9\%) | 5 (2.5\%) | 0 (0.0\%) |
| Keeping track of my grade point average | 112 (56.6\%) | 59 (29.5\%) | 21 (10.7\%) | 2 (0.8\%) | 5 (2.5\%) |
| Keeping track of my credits | 124 (62.3\%) | 47 (23.8\%) | 23 (11.5\%) | 0 (0.0\%) | 5 (2.5\%) |
| Support from family | 117 (59.0\%) | 32 (15.6\%) | 44 (22.1\%) | 3 (1.6\%) | 3 (1.6\%) |
| Support from friends | 78 (39.3\%) | 65 (32.8\%) | 54 (27.0\%) | 0 (0.0\%) | 2 (0.8\%) |
| After-school tutorial | 59 (29.5\%) | 28 (13.9\%) | 109 (54.9\%) | 0 (0.0\%) | 3 (1.6\%) |
| Study skills class | 65 (32.8\%) | 54 (27.0\%) | 77 (38.5\%) | 0 (0.0\%) | 3 (1.6\%) |
| Transportation | 117 (59.0\%) | 33 (16.4\%) | 44 (22.1\%) | 3 (1.6\%) | 2 (0.8\%) |
| Receiving scholarship/Seminole State College | 108 (54.1\%) | 29 (14.8\%) | 58 (29.5\%) | 2 (0.8\%) | 2 (0.8\%) |

Table 13 displays students' perceptions of the most useful portions of the transition program. Students were provided the opportunity to consider all of the 17 characteristics of the transition program and decide which three characteristics were most important to their high school persistence. Over one-third of students chose having good teachers (46.6\%), having a good mentor (34.2\%), and completing homework (33.5\%) as one of the three most useful elements of the Transition Program. Six program characteristics were chosen by less than $15 \%$ of students: transportation (13.3\%), computer access at school (13.2\%), receiving a scholarship from Seminole State College(13.1\%), having good administrators (11.5\%), extracurricular participation (8.2\%), and after-school tutorial (6.0\%).

Table 13
Program Participants' Perceptions of the Most Useful Characteristics of the Transitions Program ( $N=901$ )

| Descriptors | Frequency | Percentage |
| :--- | :---: | :---: |
| Having good teachers | 406 | 46.6 |
| Having a good mentor | 298 | 34.2 |
| Completing homework | 292 | 33.5 |
| Keeping track of my grade point average | 253 | 29.0 |
| Support from family | 195 | 22.4 |
| Having a good guidance counselor | 192 | 22.0 |
| Keeping track of my credits | 180 | 20.7 |
| Having good attendance | 167 | 19.2 |
| Preparing for class | 161 | 18.5 |
| Study skills class | 150 | 17.2 |
| Support from friends | 138 | 15.8 |
| Transportation | 116 | 13.3 |
| Computer access at school | 115 | 13.2 |
| Receiving a scholarship from Seminole State College | 114 | 13.1 |
| Having good administrators | 100 | 11.5 |
| Extracurricular participation | 71 | 8.2 |
| After-school tutorial | 52 | 6.0 |

## Data Analysis for Research Question 3

For which tasks associated with high school success do intervention students have the highest perception of mastery of concern?

This question was used to analyze data gathered from a survey designed by the target school district regarding the perceptions of Transition Program students as to their self-confidence in completing tasks associated with high school persistence. In this section of Chapter 4, the results are presented by survey item for all students enrolled in the Transition Program in 2009, 2010, and 2011 and for each of the three cohorts for
those years. Transition Program students were asked to respond to 23 items as to their feelings of self-efficacy at tasks associated with high school success. They were asked to indicate their levels of confidence using a scale where $0=$ no confidence and $10=$ very confident.

## School District Data

Table 14 displays the average rating for each task and also displays the median score for each item. Making friends at school was the task for which Transition Program students reported the highest level of self-efficacy with an average score of 8.37. The median response for this answer was 10 , indicating that the majority of students were highly confident in their ability to make friends. The next three highest responses, improving writing and reading skills, taking good class notes, and participating in class discussions, all had an average rating exceeding 7 on a 10 -point scale with a median score of 8 . These tasks, and many of the other tasks in the rank-order list, suggest that students were relatively confident overall in their ability to achieve success at school.

Six characteristics had an average rating below 6.0 with a median score of either 5 or 6 , with a mean of 6.20 or below. The lowest ranked efficacy item, talking to principals and other administrators, had an average rating of 5.32 and a median score of 5 . The other five characteristics, which included doing well in my toughest class, finding time to study, taking two or more tests in the same week, studying, and getting the grades I want, were associated more with students extending their school-related skills outside of the classroom and school day.

Table 14
Program Participants' Personal Self-Efficacy Ratings: Tasks Associated with High School Success ( $N=901$ )

| Tasks |  |  | Median |
| :--- | :---: | :---: | :---: |
|  | $M$ | $S D$ | Score |
| Making friends at school | 8.37 | 2.30 | 10 |
| Improving writing and reading skills | 7.37 | 2.24 | 8 |
| Taking good class notes | 7.25 | 2.59 | 8 |
| Participating in class discussions | 7.09 | 2.62 | 8 |
| Asking questions in class | 6.86 | 2.72 | 7 |
| Understanding my teachers | 6.81 | 2.49 | 7 |
| Getting work done on time | 6.71 | 2.47 | 7 |
| Talking to my teachers | 6.69 | 2.73 | 7 |
| Having enough time to finish work | 6.59 | 2.66 | 7 |
| Getting help at school | 6.39 | 2.84 | 7 |
| Researching papers | 6.38 | 2.78 | 7 |
| Writing papers | 6.38 | 2.64 | 7 |
| Understanding my textbooks | 6.27 | 2.84 | 7 |
| Doing well on tests | 6.20 | 2.55 | 6 |
| Managing both school and work | 6.12 | 2.92 | 6 |
| Preparing for tests | 6.08 | 2.55 | 6 |
| Meeting parental grade expectations | 6.06 | 2.95 | 6 |
| Getting the grades I want | 5.94 | 2.80 | 6 |
| Studying | 5.82 | 2.56 | 5 |
| Taking two or more tests in the same week | $5.78)$ | 3.00 | 6 |
| Finding time to study | 5.68 | 2.85 | 6 |
| Doing well in my toughest class | 5.34 | 3.02 | 5 |
| Talking to principals and other administrators | 5.32 | 3.32 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Cohort Data

Transition Program student cohorts' ratings of their self-efficacy in tasks related to high school success were nearly identical in ranking to the overall district results. For ease of comparison in Tables 15-17, the same order of display used in the district table
has been maintained in the cohort tables. The two sets of tables, however, generally followed the same ranked order and had the same median score. For all cohorts, the highest rated three items and the lowest rated five items were identical. This suggests consistency over time in the tasks where students feel higher and lower amounts of selfefficacy. The cohort data showed that survey results by cohort were strongly consistent with the school district data, particular for student self-efficacy questions.

Table 15
Cohort 1 Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success ( $N=901$ )

| Tasks |  |  | Median |
| :--- | :---: | :---: | :---: |
|  | M | SD | Score |
| Making friends at school | 8.44 | 2.32 | 10 |
| Improving writing and reading skills | 7.44 | 2.22 | 8 |
| Taking good class notes | 7.41 | 2.57 | 8 |
| Participating in class discussions | 7.07 | 2.49 | 8 |
| Asking questions in class | 6.80 | 2.61 | 7 |
| Understanding my teachers | 6.74 | 2.31 | 7 |
| Getting work done on time | 6.75 | 2.25 | 7 |
| Talking to my teachers | 6.63 | 2.54 | 7 |
| Having enough time to finish work | 6.52 | 2.44 | 7 |
| Getting help at school | 6.44 | 2.73 | 7 |
| Researching papers | 6.25 | 2.67 | 7 |
| Writing papers | 6.24 | 2.55 | 6 |
| Understanding my textbooks | 6.16 | 2.63 | 7 |
| Doing well on tests | 6.11 | 2.32 | 6 |
| Managing both school and work | 6.09 | 2.72 | 6 |
| Preparing for tests | 5.96 | 2.49 | 6 |
| Meeting parental grade expectations | 6.11 | 2.55 | 6 |
| Getting the grades I want | 5.94 | 2.18 | 6 |
| Studying | 5.70 | 2.45 | 6 |
| Taking two or more tests in the same week | 5.57 | 2.88 | 6 |
| Finding time to study | 5.56 | 2.75 | 6 |
| Doing well in my toughest class | 5.40 | 2.88 | 5 |
| Talking to principals and other | 5.02 | 3.06 | 5 |
| administrators |  |  |  |

Note. $0=$ not confident and $10=$ very confident.

Table 16
Cohort 2 Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success ( $N=901$ )

| Tasks | M(SD) | SD | Median <br> Score |
| :--- | :---: | :---: | :---: |
| Making friends at school | 8.49 | 2.25 | 10 |
| Improving writing and reading skills | 7.22 | 2.35 | 8 |
| Taking good class notes | 7.34 | 2.65 | 8 |
| Participating in class discussions | 7.30 | 2.45 | 8 |
| Asking questions in class | 6.69 | 2.68 | 8 |
| Understanding my teachers | 6.76 | 2.44 | 7 |
| Getting work done on time | 6.67 | 2.50 | 7 |
| Talking to my teachers | 6.88 | 2.56 | 7 |
| Having enough time to finish work | 6.47 | 2.69 | 7 |
| Getting help at school | 6.33 | 2.78 | 7 |
| Researching papers | 6.33 | 2.64 | 7 |
| Writing papers | 6.01 | 2.49 | 6 |
| Understanding my textbooks | 6.31 | 2.83 | 7 |
| Doing well on tests | 6.24 | 2.59 | 7 |
| Managing both school and work | 6.12 | 2.98 | 7 |
| Preparing for tests | 6.08 | 2.47 | 6 |
| Meeting parental grade expectations | 5.82 | 2.91 | 6 |
| Getting the grades I want | 5.78 | 3.02 | 6 |
| Studying | 5.53 | 2.52 | 5 |
| Taking two or more tests in the same week | 5.57 | 2.89 | 6 |
| Finding time to study | 5.68 | 2.81 | 6 |
| Doing well in my toughest class | 5.28 | 3.09 | 5 |
| Talking to principals and other administrators | 5.02 | 3.18 | 5 |

Note. $0=$ not confident and $10=$ very confident.

Table 17
Cohort 3 Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success ( $N=901$ )

| Tasks | M | SD | Median <br> Score |
| :--- | :---: | :---: | :---: |
| Making friends at school | 8.46 | 2.33 | 10 |
| Improving writing and reading skills | 7.57 | 2.19 | 8 |
| Taking good class notes | 7.59 | 2.57 | 8 |
| Participating in class discussions | 7.30 | 2.76 | 7 |
| Asking questions in class | 7.30 | 2.78 | 8 |
| Understanding my teachers | 7.18 | 2.59 | 7 |
| Getting work done on time | 7.05 | 2.53 | 7 |
| Talking to my teachers | 6.99 | 2.89 | 7 |
| Having enough time to finish work | 6.77 | 2.73 | 7 |
| Getting help at school | 6.37 | 2.92 | 6 |
| Researching papers | 6.68 | 2.90 | 7 |
| Writing papers | 6.89 | 2.74 | 7 |
| Understanding my textbooks | 6.33 | 2.92 | 6 |
| Doing well on tests | 6.71 | 2.59 | 7 |
| Managing both school and work | 6.52 | 2.96 | 7 |
| Preparing for tests | 6.44 | 2.61 | 7 |
| Meeting parental grade expectations | 6.64 | 3.10 | 7 |
| Getting the grades I want | 6.72 | 2.83 | 7 |
| Studying | 6.75 | 2.55 | 7 |
| Taking two or more tests in the same week | 6.11 | 3.10 | 7 |
| Finding time to study | 6.11 | 2.90 | 6 |
| Doing well in my toughest class | 5.61 | 3.04 | 6 |
| Talking to principals and other administrators | 5.80 | 3.46 | 6 |

Note. $0=$ not confident and $10=$ very confident.

## Data Analysis for Research Question 4

To what extent do the results found in Research Questions 2 and 3 vary by school and entering ninth-grade cohort?

This question asked if the usefulness of program characteristics (Research Question 2) and the self-efficacy of students in regard to tasks leading to school success (Research Question 3) varied by school and cohort. The researcher also sought to identify significant differences across schools and cohorts using factor analysis among the four constructs of the survey instrument: (a) student/adult relationships, (b) student study skills, (c) student motivation, and (d) school provided resources.

## School Data

To respond to the fourth research question, data for each of the nine schools with a Transition Program were analyzed to determine the usefulness of program characteristics and the self-efficacy students experienced in regard to their ability to perform tasks associated with school success. To accomplish this, Transition Program students were asked to respond to 17 items describing characteristics of the program as to whether they (a) helped very much, (b) helped a little, (c) did not help or hurt, (d) hurt a little, or (e) hurt very much. The ranking of characteristics was determined using the percentage of responses indicating the characteristic of helped very much. In the case of similar scores, scores of helped a little were used to assist in understanding the ordering of items. The resultant data for each of the schools are presented in Tables 23-31 (Appendix C). Transition Program students also offered their personal ratings of self-
efficacy as to the levels of confidence they had regarding their ability to perform 23 tasks using a 10 -point scale where $0=$ no confidence and $10=$ very confident. These data are contained in Tables 32-40 (Appendix D).

Since none of the nine school programs were conducted in exactly the same way, analysis of the school data was assumed to be helpful in determining perceived best practices for future program development. Following are brief discussions of the data related to each of the schools based on the tabular displays contained in Appendices C and D. Characteristics students perceived as most and least helpful and the highest and lowest ranked tasks leading to school success are highlighted in each of the discussions.

## School A

The aspects of the program that students perceived as most helpful were having good teachers (73.3\%), completing Homework (73.3\%), and support from family (73.3\%). The three lowest ranked characteristics were having a good mentor (40\%), support from friends (46.7\%), and extracurricular participation (46.7\%). There was a range of $43.3 \%$ between the highest and lowest ranked characteristics.

The highest-ranked tasks associated with high school success as rated by students on a 10-point scale were making friends at school (8.80), taking good class notes (7.60), and improving reading and writing skills (7.40). The tasks students ranked as the three lowest were doing well in my toughest class (4.47), preparing for tests (5.57) and studying (5.60). There was a range of 4.33 points on a 10 -point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School B

The aspects of the program that students perceived as most helpful were having good teachers (75.9\%), having good guidance counselors (63.8\%), and having a good mentor (62.1\%). The three lowest ranked characteristics were after-school tutorial (18.6\%), extracurricular participation (25.9\%), and support from friends (30.5\%). There was a range of $57.3 \%$ between the highest and lowest ranked characteristics.

The highest-ranked tasks associated with high school success as rated by students on a 10-point scale were making friends at school (8.82), understanding my teachers (7.23), and taking good notes in class (7.00). The tasks students ranked as the three lowest were doing well in my toughest class (5.10), talking to principals and other administrators (5.32), and finding time to study (5.70). There was a range of 3.72 points on a 10-point scale between the lowest and the highest rank tasks that students associated with high school success.

## School C

The aspects of the program that students perceived as most helpful were having good teachers (63.6\%), completing homework (56.4\%), and preparing for class (53.6\%). The three lowest ranked characteristics were study skills class (18.7\%), after-school tutorial (20.1\%), and having good administrators (26.4\%). There was a range of 44.9 points between the highest and lowest ranked characteristics.

The highest-rated tasks associated with school success, as perceived by students on a 10-point scale, were making friends at school (8.58), improving reading and writing
skills (7.42), and participating in class discussions (7.33). The tasks students ranked as the three lowest were talking to principals and other administrators (4.90), finding time to study (5.20), and doing well in my toughest class (5.35). There was a range of 3.68 points on a 10-point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School D

The aspects of the program that the students perceived as most helpful were having good teachers (60.8\%), support from family (56.6\%), and transportation (56.6\%). The three lowest ranked characteristics were after-school tutorial (19.2\%), having a good mentor (24.6\%), and having good administrators (27.7\%). There was a range of $41.6 \%$ between the highest and lowest ranked characteristics.

The highest-rated tasks associated with school success as rated by students on a 10-point scale were making friends at school (8.37), taking good class notes (7.48), and participating in class discussions (7.03). The tasks students ranked as the three lowest are talking to principals and other administrators (4.79), doing well in my toughest class (5.20), and taking two or more tests in the same week (5.23). There was a range of 3.58 points on a 10-point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School E

The aspects of the program that the students perceived as most helpful were having good teachers (63.5\%), support from family (62.1\%), and having good guidance counselors (61.6 \%). The three lowest ranked characteristics were after-school tutorial (23.0\%), having good administrators (34.9\%), and support from friends (43.7\%). There was a range of $40.5 \%$ between the lowest and highest ranked characteristics.

The highest-ranked tasks associated with school success as rated by students on a 10-point scale were making friends at school (8.17), taking good class notes (7.63) and improving reading and writing skills (7.56). The tasks ranked as the three lowest were talking to principals and other administrators (4.68), taking two or more tests in the same week (5.70), and doing well in my toughest class (5.79). There was a range of 3.49 points on a 10-point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School F

The aspects of the program that the students perceived as most helpful were having good teachers (63.8\%), transportation (63.8\%), and completing homework (59.6\%). The three lowest ranked characteristics were after-school tutorial (28.3\%), extracurricular participation (32.6\%), and keeping track of my GPA and study skills class, both at $38.3 \%$. There was a range of $35.5 \%$ between the lowest and highest ranked characteristics.

The highest-ranked tasks associated with school success as rated by students on a 10-point scale were Making friends at school (8.81), improving reading and writing skills (7.55), and participating in class discussions (7.32). The tasks ranked as the three lowest were talking to principals and other administrators (4.98), doing well in my toughest class (4.96), and Studying (5.52). There was a range of 3.85 points on a 10 -point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School G

The aspects of the program that the students perceived as most helpful were having good teachers (55.0\%), having good attendance (53.2\%), and having computer access at school (48.7\%). The three lowest ranked characteristics are after-School Tutorial (20.3\%), study Skills Class (20.3\%) and extracurricular participation (26.3\%). There was a range of 34.7 points between the lowest and highest ranked characteristics.

The highest-ranked tasks associated with school success as rated by students on a 10-point scale were making friends at school (8.25), improving reading and writing skills (7.23), and taking good class notes (6.88). The tasks ranked as the three lowest were talking to principals and other administrators (5.11), doing well in my toughest class (5.12), and getting the grades I want (5.21). There was a range of 3.14 points on a 10point scale between the lowest and the highest ranked tasks that students associated with high school success.

## School H

The aspects of the program that the students perceived as most helpful were keeping track of my credits (64.2\%), having good teachers (62.4\%), and preparing for class (62.2\%). The three lowest ranked characteristics were after-school tutorial (31.2\%), study skills class (33.1\%), and extracurricular participation (41.3\%). There was a range of 32\% between the lowest and the highest ranked characteristics.

The highest-ranked tasks associated with school success, as rated by students on a 10-point scale, were making friends at school (8.44), improving reading and writing skills (7.87), and taking good notes in class (7.80). The tasks ranked as the three lowest were doing well in my toughest class (5.64), finding time to study (6.03), and talking to principals and other administrators (6.03). There was a range of 2.41 points between the lowest and highest ranked tasks that students associated with high school success.

## School I

The aspects of the program that the students perceived as most helpful were study skills class (87.7\%), completing homework (81.0\%), and having good teachers (79.3\%). The three lowest ranked characteristics were after-school tutorial (32.8\%), support from friends (40.4\%), and extracurricular participation (48.3\%). There was a range of 54.9\% between the lowest and highest ranked characteristics.

The highest-ranked tasks associated with school success, as rated by the students on a 10-point scale, were making friends at school (8.53), understanding my teachers (7.83), and improving reading and writing skills (7.76). The tasks ranked as the three
lowest were doing well in my toughest class (6.41), studying (6.76), and finding time to study (6.88). There was a range of 2.12 points between the lowest and the highest ranked tasks that students associated with high school success.

The individual school results show many consistent results across schools. In all schools, having good teachers was one of the three most important program characteristics. This finding was consistent with the strong district-level findings. Students across schools also shared many of the same perceptions of their strengths and weaknesses. Students tended to be confident of their social and school-related abilities and less confidence in their abilities to extend their study and academic skills outside of the classroom and school setting. There was less consistency across schools in other important program characteristics. This suggested that schools have different strengths that may allow for positive and helpful interactions across schools. These will be discussed in Chapter 5.

## Survey Constructs

The target school district identified four constructs from the survey for analysis to determine if there were differences in groupings of like items by school and/or cohort. These constructs and the highest possible scores attainable were as follows: (a) student/adult relationships, 80; (b) student study skills, 110; (c) student motivation, 50; and (d) school provided resources, 60. Table 18 displays survey construct totals for the district and for the nine individual schools.

For all constructs, School I had the highest construct scores indicating the highest total combined student/program efficacy. The lowest scores in each construct, however, were not located at the same school. School D had the lowest construct score in student/adult relationships, and School G had the lowest construct score in student study skills, student motivation, and school provided resources. For all constructs, however, there was a relatively small difference between the highest and lowest school score.

Table 18
Survey Construct Totals by School District, Schools, and Cohort

|  | Student/Adult <br> Relationships | Student Study <br> Skills | Student <br> Motivation | School <br> Provided <br> Resources |
| :--- | :---: | :---: | :---: | :---: |
| Distriptors | $\mathbf{5 9 . 6 7}$ | $\mathbf{7 3 . 3 5}$ | $\mathbf{3 7 . 6 1}$ | $\mathbf{4 7 . 6 2}$ |
| School A | 62.53 | 70.60 | 39.47 | 51.73 |
| School B | 61.53 | 74.52 | 37.32 | 46.83 |
| School C | 59.01 | 73.88 | 36.69 | 46.67 |
| School D | 57.51 | 71.17 | 36.81 | 46.11 |
| School E | 60.44 | 75.80 | 39.17 | 49.08 |
| School F | 59.77 | 73.81 | 36.83 | 48.89 |
| School G | 57.59 | 69.68 | 35.54 | 45.13 |
| School H | 61.82 | 76.37 | 39.55 | 48.97 |
| School I | 65.58 | 82.27 | 41.07 | 52.44 |
|  |  |  |  |  |
| Cohort 1 | 59.75 | 73.06 | 37.42 | 47.52 |
| Cohort 2 | 58.09 | 73.08 | 37.88 | 47.15 |
| Cohort 3 | 62.28 | 76.07 | 39.03 | 48.43 |

Note. Highest Possible Construct Scores: Student/Adult Relationships = 80; Student Study Skills = 110; Student Motivation = 50; School Provided Resources $=60$.

Table 18 also displays survey construct totals for the school district by cohort.
Though the cohort totals were similar to those of the individual schools, the differences
were smaller. The magnitude of the difference between the lowest and highest score was even smaller than seen in the school district and school totals. In all cases, Cohort 3 had the highest survey construct totals. Cohort 3 represented the most recent cohort of Transition Program students for the target school district.

Overall, students believed that teachers were the most important and helpful characteristic of the Transition Program. Students also, however, saw the importance of attendance, preparation, and homework, as more helpful overall than other adult relationships and resources such as those with counselors and administrators.

Administrator relationships in particular were viewed as not as important, and students reported difficulty in communicating with administrators. These findings partially support $H_{2}$. Students showed very high confidence in their ability to make friends and to accomplish their goals in the classroom. They were less confident, however, in their ability to have and use the time to extend these successes at home or outside the classroom. These findings were particularly interesting considering that students rated the study skills class and after-school tutorial among the lower rated characteristics of the Transition Program. This suggests that student study skills were more important than student motivation, rejecting $H_{3}$. When results were separated by school and cohort, there were small differences by school and even smaller differences by cohort.

## Differences Across Schools and Cohorts Among Constructs

Factorial ANOVA analyses were conducted to determine if school or cohort differences existed. Tables 20 through 23 display factorial ANOVA analyses for each of
the four client selected constructs. These two-factor ANOVA analyses were conducted to determine differences in construct scores based on cohort (three levels) and school (nine levels). The null hypotheses tested for each construct included: (a) construct scores for each school are equal, (b) construct scores for each cohort are equal, and (c) construct scores in each cell (school by cohort) are equal. No outliers were detected in the data. For all analyses, assumptions of normality were reinforced by skewness and kurtosis data. Students are not randomly assigned to schools; however, residual values (unstandardized) did not suggest independence violations.

Table 19 displays the results of a factorial analysis of variance (ANOVA) to determine if the mean value for the student/adult relationship construct differed based on school and cohort. A significant main effect for school was found but no significant main effect was found for cohort. The eta-squared value for the school main effect of 0.0313 suggested a small effect size. No significant interaction effect was found between school and cohort. The eta squared for the significant main effect indicated that the proportion of construct score variation accounted for by school was slightly above $3 \%$.

Table 19

Factorial ANOVA of Student-Adult Relationships ( $n=901$ )

| Partial Sum of |  |  |  |  |  |
| :--- | :---: | ---: | ---: | :---: | :---: |
| Squares | Squares | $d f$ | Squared | $F$ | Significance |
| School | 3478.01 | 8 | 434.75 | 3.62 | $0.0004^{*}$ |
| Cohort | 276.50 | 2 | 138.25 | 1.15 | 0.3165 |
| School X Cohort | 2598.65 | 16 | 162.42 | 1.35 | 0.1580 |
| Residual | 104651.20 | 872 | 120.013 |  |  |
| $R$-Squared: 0.0652 |  |  |  |  |  |
| Adjusted $R$-Squared: 0.0373 |  |  |  |  |  |

Note. * $=\mathrm{p}<.05$
Post hoc analyses were conducted due to the statistically significant findings.
Tukey HSD tests were conducted on all pairwise contrasts. For the main effect of School, post hoc comparisons revealed that School I had significantly higher construct scores than four other schools. Specifically, the following group pairs were identified as significantly different ( $\mathrm{p}<.05$ ):

- School I ( $M=65.58, S D=8.77)$ and School C $(M=59.01, S D=10.89)$;
- School I and School D ( $M=57.51, S D=10.47)$;
- School I and School F ( $M=59.77, S D=11.08)$; and
- School I and School G ( $M=57.59, S D=11.39)$.

Overall, School I was the only school found to have significantly higher construct scores for the student-adult relationship construct.

Table 20 displays the factorial ANOVA analysis for the student study skills construct by school and cohort. A significant main effect for school was found, but no significant main effect was found for cohort. A significant interaction effect was found
between school and cohort. The effect size for this interaction was small but approaching moderate where eta squared $=0.0521$. The significant interaction effect indicated that the school and cohort interaction effect accounted for over 5\% of the construct score variation.

Post hoc analyses were conducted for the interaction effect due to statistically significant findings. The levels of the school by grade interactions were recoded to run pairwise contrasts using Tukey HSD tests. In these post hoc analyses, five school by grade combinations were found to have significantly different construct scores. Specifically, the following interactive group pairs were identified as significantly different ( $\mathrm{p}>.05$ ):

- Cohort 2 of School I $(M=88.20, S D=15.43)$ and Cohort 2 of School A $(M=$ 63.09, $S D=14.72$ );
- Cohort 2 of School I and Cohort 2 of School B $(M=60.95, S D=16.69)$;
- Cohort 2 of School D $(M=82.76, S D=17.30)$ and Cohort 1 of School $H(M=$ 60.33, $S D=18.21$ );
- Cohort 3 of School H ( $M=83.08, S D=22.63$ ) and Cohort 1 of School H;
- Cohort 2 of School I $(M=88.20, S D=15.59)$ and Cohort 1 of School H.

Table 20
Factorial ANOVA of Student Study Skills $(N=901)$

|  | Partial Sum of |  |  | Mean |  |
| :--- | :---: | ---: | ---: | ---: | :--- |
| Source | Squares | $d f$ | Squared | $F$ |  |
| School | 9542.81 | 8 | 119.85 | 3.48 | $0.0006^{*}$ |
| Cohort | 672.66 | 2 | 336.33 | 0.98 | 0.3757 |
| School X Cohort | 17022.1662 | 16 | 1063.89 | 3.10 | $0.0000^{*}$ |
| Residual | 299254.55 | 872 | 343.18 |  |  |
| $R$-Squared: 0.0814 |  |  |  |  |  |
| Adjusted $R$-Squared: 0.0540 |  |  |  |  |  |

Note. * $=\mathrm{p}<.05$

Table 21 displays the factorial ANOVA analysis for the student motivation construct by school and cohort. A significant main effect was found for school, but no significant main effect was found for cohort. In addition, no significant interaction effect was found for school and cohort. The eta squared for the significant main effect, 0.0323 , indicated that there was a small effect size and that the proportion of construct score variation accounted for by school was slightly above 3\%.

Post hoc analyses were conducted due to the statistically significant findings.
Tukey HSD tests were conducted on all pairwise contrasts. For the main effect of School, post hoc comparisons revealed that School I had significantly higher construct scores than three other schools. Specifically, the following group pairs were identified as significantly different ( $\mathrm{p}<.05$ ):

- School I $(M=41.07, S D=6.00)$ and School C $(M=36.69, S D=8.06)$;
- School I and School F ( $M=36.83, S D=7.60$ ); and
- School I and School G $(M=35.54, S D=9.50)$.

Construct scores from School I were significantly higher than those of Schools C, F, and G. The same school relationships were also present in the previously discussed studentadult relationships construct.

Table 21
Factorial ANOVA of Student Motivation $(n=901)$

| Source | Partial Sum <br> of Squares | $d f$ | Mean <br> Squared | $F$ | Significance |
| :--- | ---: | ---: | ---: | :---: | :---: |
| School | 1762.18 | 8 | 220.27 | 3.74 | $0.0003^{*}$ |
| Cohort | 54.41 | 2 | 27.21 | 0.46 | 0.6304 |
| School X Cohort | 1333.54 | 16 | 83.34 | 1.41 | 0.1273 |
| Residual | 51393.25 | 872 | 83.34 |  |  |

R-Squared: 0.0596
Adjusted R-Squared: 0.0316
Note. $*=\mathrm{p}<.05$

Table 22 displays the factorial ANOVA analysis for the school provided resources construct by school and cohort. As in the three previous ANOVA analyses, a significant main effect for school was found. No significant main effect was found,and no significant interaction effect was found between school and cohort. The eta squared for the significant main effect of 0.0502 indicated that the proportion of construct score variation accounted for by school was slightly above 5\%.

Table 22
Factorial ANOVA of School Provided Resources ( $n=901$ )

| Source | Partial Sum <br> of Squares | $d f$ | Mean <br> Squared | $F$ | Significance |
| :--- | ---: | ---: | ---: | ---: | :---: |
| School | 2469.74 | 8 | 308.72 | 5.86 | $0.0000^{*}$ |
| Cohort | 18.42 | 2 | 9.21 | 0.17 | 0.8396 |
| School X Cohort | 717.52 | 16 | 44.84 | 0.85 | 0.6265 |
| Residual | 45926.42 | 872 | 52.67 |  |  |
| R-Squared: 0.0740 |  |  |  |  |  |
| Adjusted R-Squared: 0.0464 |  |  |  |  |  |

Note. * $=\mathrm{p}<.05$

Post hoc analyses were conducted due to the statistically significant findings. Tukey HSD tests were conducted on all pairwise contrasts. For the main effect of School, post hoc comparisons revealed that School I had significantly higher construct scores than seven other schools. Specifically, the following group pairs were identified as significantly different ( $\mathrm{p}<.05$ ):

- School I $(M=52.44, S D=5.13)$ and School B $(M=46.83, S D=6.73)$;
- School I and School C $(M=46.67, S D=6.73)$;
- School I and School D ( $M=46.11, S D=7.63)$;
- School I and School E ( $M=49.09, S D=6.74$ );
- School I and School F ( $M=48.89, S D=7.03$ );
- School I and School G ( $M=45.13, S D=7.95$ ); and
- School I and School H ( $M=48.97, S D=7.70)$.

For all four factorial ANOVA analyses, there was a significant effect for school and a non-significant effect for cohort. Of the four ANOVA analyses, only the analysis of the student study skills construct yielded a significant interaction effect. These findings supported the previous descriptive analysis suggesting that the range of construct scores across cohorts was smaller than the range of construct scores across schools. These additional analyses confirmed that schools varied more significantly than did cohorts.

Ancillary analyses of all survey items were conducted to broadly determine if trends existed among factorial ANOVA analyses of items that were similar to those found among constructs. Only two program characteristics varied significantly by cohort: Good mentors and Good counselors. The single student efficacy item that varied significantly by cohort was Confidence in studying. In contrast, 12 Transition Program characteristic items and five student efficacy items varied by school. The 12 program characteristic items were Good mentors, Good counselors, Good administrators, Good attendance, Preparing for class, Computer access at school, Keeping track of my GPA, Keeping track of my credits, Support from family, After-school tutorial, Study skills class, and Receiving a scholarship from Seminole State College. The five student efficacy items were: Having enough time to finish work, Improving reading and writing skills, Writing papers, Taking to principals and other administrators, and Finding time to study.

Significant differences were found in constructs by school, though no differences were found by cohort. This was a partial rejection of $H_{4}$. Only one interaction effect was
found to be significant in the factorial ANOVA calculations. This further confirmed that variability among schools for both constructs and items was much greater than the variability across cohorts.

## Summary

This chapter has presented an analysis of the data to respond to the four research questions. Criteria used to place students in the school district’s Transition Program were evaluated to determine what student performance characteristics served as predictors of participation. Responses to a student survey were used to identify (a) perceptions of program participants who have persisted and remained in school as to the usefulness of program characteristics and (b) tasks associated with student success from which participating students may have benefited. Constructs and survey items were also analyzed by cohort and school to determine if there were significant differences in student responses.

Chapter 5 contains a summary and discussion of the results of the data analyses. The answers to the four research questions in this study were intended to assist the target school district in selecting students for the program and identifying program strengths and weaknesses. Thus, Chapter 5 includes implications for policy and practice for the target school district as well as recommendations for future research.

# CHAPTER 5 <br> SUMMARY, DISCUSSION, AND RECOMMENDATIONS 

## Introduction

This chapter includes a summary of the background of the study, the purpose of the research, and the methods and procedures used to conduct the study. Key findings, as related to each of the four research questions, are summarized and discussed. These findings relate to characteristics identified in the study that encourage at-risk middle and high school students to persist in high school. Implications and recommendations for school district practitioners and recommendations for future research are also offered.

## Background of the Study

There are many variables that impact students' decisions to drop out of high school (Alexander et al., Asbury, 2010; Lan \& Lanthier, 2003; Leckrone \& Griffith, 2006; Smith, 2009). Similarly, there are intervening variables that increase the selfefficacy of students and cause them to stay in school (Heck \& Mahoe, 2006). School leaders have continued to seek solutions to the drop-out problem that are within their control (Balfanz et al., 2010). The Eighth-to-Ninth Grade Summer Transition Program was one school district's response to this problem. It was this program that was the subject of this study.

## Purpose of the Study

The purpose of this research was to identify primary interventions that participants in the study perceived to have influenced their persistence to remain in high school. Of particular interest in this study were three major constructs: (a) social structures, (b) lack of academic success, and (c) lack of student engagement. It was two of these factors, lack of academic success and lack of student engagement that led to the admission of participants to the Eighth-to-Ninth-Grade Summer Transition Program.

## Population

The population for the study consisted of students who participated in the Eighth-to-Ninth-Grade Summer Transition Program in the summers of 2009, 2010, and 2011 and who were enrolled in the target school district in 2011-2012. The students were distributed among all the high schools in the school district. Over 900 rising $10^{\text {th }}-, 11^{\text {th }}-$, and $12^{\text {th }}$-grade Transition students were surveyed, and 901 students actually completed the Transition Survey.

## Transition Program Survey

The Assessment and Accountability Department of the target school district designed the Transition Program Survey (Appendix A) that was administered electronically in May of 2012 to all rising $10^{\text {th }}, 11^{\text {th }}$, and $12^{\text {th }}$ graders who participated in the Eighth-to-Ninth-Grade Summer Transition Program during the summers of 2009, 2010, and 2011. It consisted of 41 multiple-choice items and one narrative response
question. In this survey, students provided their perceptions of multiple components of the intervention program to gauge which characteristics they believed were associated with their high school persistence. Students also answered questions on their ability to complete tasks critical to high school success. Identified constructs of the Eighth-to-Ninth-Grade Summer Transition Program were: (a) student-adult relationships, (b) student study skills, (c) student motivation, and (d) school provided resources. The program was developed to provide support in these areas, and the Transition Program Survey was designed to measure the extent to which students perceived their persistence to remain in school was influenced by these constructs.

## Summary and Discussion of Findings

This section has been organized to respond to the four research questions and accompanying hypotheses which guided the study. The findings of the study are summarized and discussed as they relate to the literature review conducted in this research.

## Research Question 1

To what extent is the school district successful in placing students identified as atrisk on four criteria (discipline referrals, days absent, FCAT scores, and grade point average) in the intervention program?
$H_{1 a}$ : The school district will be more successful in placing students in the transitions program who were identified as at-risk according to GPA criterion rather than identified as at-risk according to discipline and absence criteria. $H_{1 b}$ : All four at-risk variables will be significantly associated with participation in the intervention program net of student demographic covariates.

The findings for Research Question 1 indicated that, of the four criteria analyzed (discipline referrals, days absent, FCAT scores and GPA), there was no metric of any single variable that significantly resulted in program selection. Program participants overall averaged more discipline referrals than the general population (2.74 compared to 0.97), had more days absent than the general population (11.65 compared to 8.06) and had lower FCAT scores in reading and mathematics and lower GPAs. Still, no single variable could clearly be defined as "the determining factor" for students to be labeled as at-risk.

The data did support the first hypothesis, that using GPA to place students in the program was one of the more relevant identifiers, as $82.46 \%$ of the program participants had a GPA of less than 2.0. Both descriptive statistics and regression results supported the importance of GPA as a main indicator of performance as proposed in $H_{1 a}$.

The data did not completely support $H_{l b}$, as all four variables (discipline referrals, days absent, FCAT scores, and GPA) were associated with participation in the intervention program. Not all data from eighth-grade, however, predicted program participation. This was consistent with prior research findings indicating that there is no one factor or combination of factors that labels a student as at-risk (MacIver, 2011, Scheel et al., 2009).

## Research Question 2

Which features of the intervention program do students perceive as most critical in contributing to high school persistence?
$H_{2}$ : Students in the school district will identify student-adult relationships as the most critical factor that impacts their high school persistence after entering the intervention program.

The findings from the data collected to answer Research Question 2 indicated that all aspects of the program, with the exception of after-school tutorial, were viewed by the majority of program participants as either helping very much or helping a little. Good teachers were seen as the most helpful characteristic of the transition program. Nearly two-thirds (64.8\%) of students described good teachers as helping very much, and slightly more than one-fourth (27.8\%) of students described teachers as helping a little. Eight additional variables were viewed by a majority of students as helping very much. They were having good guidance counselors (51.5\%), having good attendance (53.1\%), preparing for class (54.6\%), completing homework (57.5\%), computer access at school
(54.3\%), keeping track of my credits (50.1\%), support from family (55.2\%), and transportation (56.2\%).

However, after-school tutorial was the only characteristic of the transition program to have a majority of students not rate it as helping very much or helping a little, there were still very few students who rated this characteristic (or any other characteristic) as hurting their experience in the transition program. It must be noted that after-school tutorials have been established randomly at each participating school. They have not been formalized across the school district.

In regard to program characteristics that were not perceived as helpful, approximately $8 \%$ of students identified a particular characteristic of the transition program as not being helpful. In combining percentages for students who responded hurt a little and hurt very much, only four characteristics had more than $5 \%$ of students describing these characteristics of the program as negative. They were having good guidance counselors (7.0\%), having good attendance (8.1\%), completing homework (5.7\%), and keeping track of my GPA (5.7\%).

The percentage of students reporting that a characteristic hurt or did not help may also serve as another measure to identify areas of potential improvement in program characteristics. Five characteristics had over $25 \%$ of students identifying these characteristics as either not helping or hurting their experience in the transition program. These characteristics were after-school tutorial (52.2\%), study skills class (34.9\%), extracurricular participation (33.6\%), receiving a scholarship at Seminole State College (32.1\%), and good administrators (27.9\%).

The data did, however, support $H_{2}$. In considering the four constructs of the instrument (student/adult relationships, student study skills, student motivation, and school provided resources), student adult relationships were found to be the most critical factor that impacted students' high school persistence after entering the intervention program. Good teachers, good counselors and involved families with open lines of communication among themselves and with the student can provide the support necessary for a student to persist to graduation. These results were supported by other researchers who also found that student-adult relationships were key to encouraging students to persist in high school. Ou and Reynolds (2008) expressed the thoughts of numerous researchers in describing student-adult relationships as being a vital component of student success.

Program participants overwhelmingly ranked Having good teachers as the most positive influence supporting them to persist in high school. Having good teachers was the top factor at every high school. As observed by MacIver (2011), good teachers understand their students and address their academic needs by encouraging success and by motivating their students to succeed. Good teachers know their students as individuals, care about their students, and have a positive, professional relationship with them.

Surveyed students also ranked good counselors as an important factor in their persistence to succeed in school. Good counselors provide positive mentorship; assist students with transcript analysis and goal setting with graduation as the target (Langenkamp, 2010). They also provide support when needed and can serve as the
liaison between students’ school and home lives, bridging gaps that may exist between the two.

Surveyed students indicated that support from family was another major factor in their persisting to graduation. Involved families provide academic, emotional and physical support to their children (Verdugo, 2011). Involved families are aware of their child's school schedule, attend school functions, and know their child's teachers and administrators. Involved families provide proper shelter and nutrition, clothing, and school supplies to help their child achieve in school. They understand the importance of providing structured study time at home, assisting with organization, providing homework assistance, and assisting with examination preparation.

## Research Question 3

For which tasks associated with high school persistence do high school students have the highest perception of mastery or concern?
$H_{3}$ : Students in the school district will identify their motivation as the most critical factor related to their self-efficacy that impacts their high school persistence after entering the intervention program.

To respond to Research Question 3, data were analyzed using both school district and cohort data sets, and results were similar in all of the analyses. Overall, making friends at school was the task for which Transition Program students reported the highest level of self-efficacy with an average score of 8.37. Using a scale ranging from $0=$ not confident to $10=$ very confident, the median response for this task was 10 , indicating that
a majority of students was highly confident in their ability to make friends. The next three highest overall responses (improving writing and reading skills, taking good class notes, and participating in class discussions) all had average ratings exceeding 7 on the 10 -point scale with a median score of 8 . These tasks, and many of the other tasks in the rank-order list, suggested that students were relatively confident overall in their ability to achieve success at school.

Six tasks had an average overall rating below 6.0 with a median score of either 5 or 6. The lowest ranked task, talking to principals and other administrators, had an average rating of 5.32 and a median score of 5 . The other five tasks (doing well in my toughest class, finding time to study, taking two or more tests in the same week, studying, and getting the grades I want) were associated more with students extending their schoolrelated skills outside of the classroom and school day.

When data were analyzed by cohort, the rankings were identical for the three groups completing the Eighth-to-Ninth-Grade Summer Transition Program in 2009, 2010, and 2011. These rankings matched those of the school district overall. The five highest rated personal self-efficacy ratings were making friends at school, improving writing and reading skills, Taking good class notes, participating in class discussions, and asking questions in class. The five lowest rated personal self-efficacy ratings were talking to principals and other administrators, doing well in my toughest class, finding time to study, taking two or more tests in the same week, and studying. This suggests consistency over time in the tasks where students feel higher and lower amounts of confidence in their ability to be successful in high school.

The analyses of data did not, however, support $H_{3}$. In considering the four constructs of the instrument (student/adult relationships, student study skills, student motivation, and school provided resources. Student data as compiled and calculated at the school and cohort levels indicated student study skills as having a slightly higher construct average than student motivation. Thus, students in the school district did not identify their motivation as the most critical factor related to their self-efficacy that impacted their high school persistence after entering the intervention program.

The results of this research were in agreement with much of the at-risk research reviewed in the literature. Students consistently ranked making friends at school as the highest task in self-efficacy rankings. Both Sheel et al. (2009) and Langenkamp (2010) commented on the importance of positive peer relationships in persisting to graduation and being successful in high school. Conversely, negative peer relationships can derail a student. Students who surround themselves with goal-oriented peers have been found to have a greater likelihood of success in school.

Students reported that improving reading and writing skills were an important part of their reasons for persisting to graduation. Sound comprehension and at-grade-level reading ability give students the tools they need to be successful in all academic subjects (Christenson et al., 2008). Sound vocabulary acquisition, the ability to draw conclusions and strong comprehension skills are essential to school success.

Transition students reported high levels of confidence in regard to class participation. Students’ self-efficacy ratings indicated they were confident in asking questions and participating in class discussions. As noted by numerous researchers
(Heck \& Mahoe, 2006, Schoeneberger, 2011, 2012 ), participation or engagement are important to students’ persistence to graduation.

## Research Question 4

To what extent do the results found in Research Questions 2 and 3 vary by school and entering ninth-grade cohort?
$H_{4}$ : When Research Questions 2 and 3 are analyzed by school and cohort, there will not be significant differences in the school district by either school or cohort, nor will interaction effects by school and cohort be found.

The target school district identified four constructs from the survey for analysis to determine if there were differences in groupings of like items by school and/or cohort. These constructs were (a) student/adult relationships, (b) student study skills, (c) student motivation, and (d) school provided resources. A total of 12 Transition Program characteristics and five student efficacy tasks varied by school. The 12 program characteristics were good mentors, good counselors, good administrators, good attendance, preparing for class, computer access at school, keeping track of my GPA, keeping track of my credits, support from family, after-school tutorial, study skills class, and receiving a scholarship from Seminole State College. The five student efficacy tasks were having enough time to finish work, improving reading and writing skills, writing papers, talking to principals and other administrators, and finding time to study.

Though no differences were found by cohort, significant differences were found among constructs by school. This was a partial rejection of $H_{4}$. Only one interaction
effect was found to be significant in the factorial ANOVA calculations. Having good teachers was the only variable consistently rated as the most important as perceived by the surveyed students. This finding held true for all nine individual high schools, the three cohorts, and the school district as a whole. This further confirmed that variability among schools for both constructs and items was much greater than the variability across cohorts.

## Implications and Recommendations for the School District

The following recommendations are directed to creating a quality experience for students enrolled in the Eighth-to-Ninth-Grade Summer Transition Program are based on the findings of this study and the professional knowledge the researcher has acquired through personal visits to each of the high school transition programs over the course of four years. Data particularly valuable in making these recommendations are contained in Appendix C, School Data: Participants’ Perceptions of Helpfulness of Transition Program Characteristics and Appendix D, School Data: Program Participants’ Personal Self-Efficacy Ratings: Tasks Associated With High School Success. In making the recommendations, survey data from each school were considered in light of the transition program structure at each school. Recommendations have been based on selecting the best practices from each program as perceived by the students to have assisted them to persist to graduation. Qualitative comments garnered from the school district survey were also considered in the recommendations. Recommendations are offered as they
relate to the design of the Summer Transition Program (characteristics of the program) and improving the self-efficacy (confidence in performing tasks) of program participants.

## Design of the Summer Transition Program

## Student Assignment

Student assignment practices related to the Eighth-to-Ninth-Grade Summer Transition Program need to be standardized at all schools throughout the school district. It is recommended that the following criteria be utilized to identify Transition Program participants. Students need to only meet one of the following stated criteria to be offered admission to the summer transition program:

1. Florida Comprehensive Assessment Test (FCAT) Reading Level 1 in Grades 6 , 7 , or 8 ,
2. FCAT Mathematics Level 1 in Grades 6, 7, or 8,
3. Grade 8 students identified in the Florida Department of Education "At-Risk" cohort (FCAT Reading and Mathematics Level 1 or 2 in eighth-grade),
4. Grade Point Average of below 2.0 in Grade 8,
5. Eighth graders with a final grade of D or F in an academic course,
6. Students with 10 or more unexcused absences in Grade 8.

## Curriculum

The summer transition program consists of 24 days (six 4-day weeks) with 300 minutes allocated daily. It is recommended that the following time allocations and curricula be utilized:

1. Technology Based-Reading (60 minutes daily). Select a research-based intervention that is individualized to meet the specific reading needs of each student. It is important that the selected program be carried over to be used by the student as a ninth-grader.
2. Language Arts (90 minutes daily). The Language Arts curriculum should be a modification of the English I course with a heavy emphasis on FCAT Writing and vocabulary. The literature components in the course should be similar to those in English One. If there is a summer reading requirement for ninth graders, the requirement should be accomplished through this course.
3. Algebra I (60 minutes daily utilizing a rigorous discovery-based series The first six-weeks of Algebra I standards should be taught. Only teachers with specific discovery-based and cooperative learning training and experience should teach this component.
4. Florida Department of Education web-based Algebra One Series (30 minutes daily). The Florida Department of Education Algebra I End-of-Course preparation should be a part of this course.
5. Biology I (60 minutes daily). Chapters 1 and 2 of the Biology I curriculum should be taught. A minimum of one laboratory per week should be included along with a required written report of the laboratory results.

Study and organizational skills are an integral part of the Transition Program. Study skills, the use of a student planner, and organizational and time management skills need be incorporated in each course.

## Mentor Selection and Assignment

Selecting and assigning mentors is key to assisting Transition Program students to persist to graduation. Mentors must be prepared in strategies to assist students academically, emotionally, and socially. Mentors must be available to students frequently and have strong interpersonal skills that relate well to teenagers. Their meetings should consist of formal and informal activities.

Structured activities as related to academic progress must be a part of mentoring. Specifically, reviewing grades, upcoming deadlines, keeping track of credits, being aware of semester and cumulative grade point averages, progress towards graduation, encouragement to participate in tutoring and other provided opportunities must be part of frequent ongoing meetings.

The informal part of mentoring should provide an opportunity for students to discuss whatever is on their minds through guided questions from their mentors. Obstacles that mentees may be experiencing include academic and social issues, health and family issues, peer and teacher relationships. These topics should all be part of the
meetings. Based on information gained through discussions, mentors can provide resources for support to assist their mentees. Resources can include health services, counseling, college and career counseling, mental health assistance, and family support. The blending of both the formal and informal portions of the mentoring sessions provides an opportunity for support for the total student.

## Blended Model with Upperclassmen

An important element of the Eighth-to-Ninth-Grade Summer Transition Program is the appropriate use of upperclassmen to assist transition students. Positive peer influence that supports their academic needs can be a powerful tool for struggling students. This model requires that upperclassmen be professionally trained to assist transition students in their study skills class as well as in the tutorial component.

## Extracurricular Opportunity

Being connected to school through involvement in extracurricular activities can encourage students to persist to graduation. The school district in this study averages over 70 extracurricular teams and clubs available to students. A vital element of the summer induction process is to acclimate students to the extracurricular opportunities available on their respective campuses and to encourage them to seek out an activities that may interest them. In the data students consistently rated this low. Effort must be made to improve the introduction of activities to students during the summer program. It is recommended that one day after the first regular class meeting of Transition Program
students that an extracurricular fair be held for incoming freshman and that all of the transition students be encouraged to participate.

## Transportation

Transportation for students is key to their ease of participation in school activities. It is key that transportation be provided for both the summer program as well as for after school tutorial and extracurricular activities.

## Improving Self-efficacy of Program Participants

## Teacher Assignment

It is recommend that high quality, motivating teachers be assigned to the summer transition program. In addition, every effort should be made to assign Transition Program students to at least one of their summer transition teachers during the regular school year.

## Parent Involvement

Parents of transition students play an important role in the success of their students (Horwitz \& Snipes, 2008) . Parent training should be made available. Parents need to be made aware of graduation requirements, the components of the transition program, the connection to college, strategies to provide structured study time at home,
ways to seek assistance for health services and scholarship opportunities. Parents need to be introduced to and have a supportive relationship with their child's mentor.

## College Connection

From the outset, each Transition Program student needs to have a connection with college. It is recommended that the school district in this study strengthen and formalize its relationship with the local state college. Transition students need to have annual opportunities to visit the college to discover the wide array of academic, career and technical programs available. As frequently as possible, parents need to be included in college visits and informational meetings as related to applying to college, the financial aid process, academic, career and technical programs available and of the scholarships specifically available to their child.

It is recommended that the school district work with the state college to maintain the scholarship for the successful graduates of the Transition Program. First generation students need to be advised of the specific additional scholarship opportunities available to them.

## Tutorial

Tutorial experiences are those experiences individualized to meet the specific needs of individual students. They are more useful if provided in two distinct formats. The first is preparation for standardized assessments. The second is preparation for upcoming examinations and homework preparation.

Tutorial experiences designed to prepare students for standardized assessments need to be individualized to meet the specific needs of the students who are involved. A reliable and valid assessment must be utilized with specific standards measured. The measurement must clearly dictate the areas of need/student weakness. The tutorial experience must include instruction in specific standards as well as short formative assessments to ensure mastery. The instructional delivery of the standards-based tutorial can be face-to-face, computer-based or a blended model. Of importance to students is that their time is scheduled (and the tutorial is focused) so that they may gain assistance in their areas of specific need. The "shotgun" approach is viewed by students as a waste of time and not helpful in their quest to persist to graduation.

Another important element related to the tutorial is providing resources that students need to manage their personal progress. Students need to set clear goals for themselves, and all tutorial instruction provided must support the targets that the students establish. The tutorial should not be an isolated experience but a continuous, measurable and meaningful experience for the individual learner. Tutorials need to be carefully scheduled and structured with the highest quality teachers and/or software available to the students.

It is recommended that the school district have clear accountability measures in place for teachers who are paid to tutor and for the administrators who design and implement the programs at the various schools. Adult ownership of the program is critical to students perceiving the program as a reason to persist in school. Students must
see and experience their individual growth and understand that program design and staff are integral to their standards mastery.

The second type of tutorial is that associated with test preparation and homework assistance. It is recommended that preparation for tests be very specific and take place several days before the actual tests. An important part of test preparation is teaching the student being tutored how to study and how to organize in preparation for upcoming exams. Students should be asked to provide any study materials provided by the teacher, and sessions should be built around the teacher's expectations for the upcoming tests. Because this tutoring involves student tutors, such students should meet with the classroom teacher to make sure that they have a clear understanding of what is being tested and can prepare the students that they are tutoring for the exam.

Another support mechanism is homework and assignment assistance. Homework and assignment assistance can also be provided by high achieving upperclassman. Tutors need to have access to assignments as posted by the teachers of the students they are tutoring. Homework and assignment assistance needs to be individualized and planned. A critical part of this assistance is teaching students to plan so they can set short-term goals and become independent in completing their assignments and organizing.

## Study Skills Class

A meaningful scheduled time during the school day devoted to study skills was perceived by surveyed students to positively influence their persistence to stay in school. Best practice calls for a regularly scheduled period every day for the entire freshman year
with a highly motivating, demanding, caring teacher. Tenth-grade Transition Program students with below a 2.50 grade point average have been scheduled for the course a second time, during their $10^{\text {th }}$-grade year. Teachers organize each period so that every student receives the assistance needed to be academically prepared for upcoming classes. The class provides specific guided homework assistance, assessment review and access to technology to complete projects.

Very important are the high achieving upperclassmen who assist the Transition Program students in this class. The researcher observed numerous instances of high quality assistance, i.e., students receiving Algebra assistance from an AP Calculus student, biology students being tutored by anatomy students and English 1 students receiving help from AP English Language students. The tutors produced evidence of assisting with End-of-course examination preparation as well as FCAT skill building. It was very evident that the solid relationship between the tutors and the students motivated the Transition Program students to work hard. The upperclassmen assisted with homework, and checked Transition Program students’ planners. They also provided evidence of frequent after-hours communication such as texting, telephone calls, and use of blackboard.

Access to technology as well as school supplies are a vital part of this class. Students in the class need to have the playing field leveled in terms of access. Many assignments are web-based and a much research is conducted using the internet. In addition, research papers and projects frequently are completed using Word, Excel or PowerPoint. Students need assistance in blending the use of these tools so that they can
produce quality assignments that are a source of pride for them. A mechanism must be provided to learn use of these tools so Transition Program students have the lifelong skills that will assist them in future studies and in the workplace.

## Upperclassman Preparation

As high achieving upperclassman are utilized to provide tutorial assistance in both tutorials and study skills classes, it is imperative that they receive specific training in methods of standardized test preparation, homework assistance and project assistance. To accomplish this, it is recommended that an honors level semester-long course be offered during the summer for students selected to serve as tutors. The six-week course should be blended with one hour of practical experience daily. The practical experience can be accomplished by providing support to the enrolled Eighth-to-Ninth-Grade Summer Transition Program students. It is recommended that this class be taught by the teacher who will be assigned to the study skills course the upcoming year.

In the summer course, tutors need to learn to interpret formative data so they can plan customized test preparation experiences for the students they are tutoring. Florida Comprehensive Assessment Tests (FCAT) and end-of-course examinations (EOC) present major hurdles for Transition Program students, and from "Day One" targets must be set that lead to success on these tests. Tutors should be graded on their planning of FCAT and EOC preparation for the students that they are assigned. Study sessions individualized to meet the needs of the students being tutored must be documented and substantiated by the formative assessments. It is vital that tutors are given frequent
opportunity to discuss formative data interpretation and instructional strategies with high quality teachers to guide them.

Tutors need to learn that their goal is to support the students that they are tutoring to be successful and at the same time increase their independence. It is natural for tutors to want to do too much of the work for Transition Program students. It is highly recommended that trained quality student tutors be compensated (an hourly rate) for their after-hours work in assisting Transition Program students after they have met their community service hour requirements.

## Recommendations for Future Research

The following recommendations for further research are offered to encourage future researchers to expand the research base and investigate questions raised in this study.

1. Conduct an analysis and build a profile of students who do not persist to graduation, with an emphasis on their academic profiles in the primary years.
2. Conduct a study of how mandatory retention in Grade 3 (as a result of nonproficiency on the Florida Comprehensive Assessment Test) affects persistence to graduation.
3. Conduct a qualitative study of students who persist to graduation to determine what factors motivated them to persist.
4. Study the effect of intensive programs in the middle school as related to persistence to graduation.
5. Study the characteristics of transition programs that have a five-year history of increasing graduation rates.
6. Evaluate the impact of mentors and mentoring programs as related to graduation and persistence to graduation.
7. Conduct a study of post-secondary students two years after they graduated from high school who were identified as at-risk in middle school but who persisted to graduation.
8. Conduct a study of programs that have identified students as at-risk to graduate in elementary school and the effects of long-term support on persistence.

## Summary

Persisting to graduate from high school is a multi-faceted issue for at-risk students, and the factors that are causing students to fall behind their peers academically need to be identified and addressed as early as possible. As students progress to middle and high school, specific and strategic academic support mechanisms need to be in place.

In this study, having good teachers was rated by students in all three cohorts and all nine schools as the characteristic that most enabled students to persist to graduation. It is absolutely essential that the strongest teachers are assigned to the most at-risk students and financially rewarded for enabling these students to graduate.

Solid programs such as the one which was the focus of this research need to be evaluated annually to be certain that they are continuing to meet the academic, emotional,
and social needs of the students most at risk of not persisting to graduation. School districts interested in truly meeting the needs of these students need to embrace diversity and customized supports for students. Educators need to understand that from birth the playing field is not level for all learners. A school district's goal should be to level the playing field for students at risk, set high standards for all students, and create pathways for all children to develop into productive, employed citizens. Fostering persistence to remain in high school requires attention to a combination of academic, emotional, and social factors. Support mechanisms for at-risk students need to be customized, realistic, structured, and carried out by dedicated and trained professionals.

APPENDIX A
TRANSITION PROGRAM SURVEY

## Transition Program Survey

Section A: This section lists people and things in the Transition program that may or may not have helped you stay on course to graduate.

Directions: For each question, choose whether or not you think this helped or hurt you in staying on course to graduate. Please choose one of the following for each question on this page:

Helped Very Much
Helped a Little
Did not Help or Hurt
Hurt a Little
Hurt Very Much

1. Having a Good Mentor
2. Having Good Teachers
3. Having a Good Guidance Counselor
4. Having Good Administrators
5. Having Good Attendance
6. Preparing for Class
7. Completing Homework
8. Computer Access at School
9. Extracurricular Participation
10. Keeping Track of My GPA
11. Keeping Track of My Credits
12. Support from Family
13. Support from Friends
14. After-School Tutorial
15. Study Skills Class
16. Transportation
17. Receiving a Scholarship from Seminole State

Section B: For each of the following questions on this page, please indicate how confident you are in doing these things where $0=$ not confident and $10=$ very confident.
18. Studying
19. Asking Questions in Class
20. Understanding My Teachers
21. Writing Papers
22. Meeting My Parent's Expectations of My Grades
23. Making Friends at School
24. Doing Well on Tests
25. Getting Work Done on Time
26. Taking Two or More Tests in the Same Week
27. Taking Good Class Notes
28. Managing Both School and Work
29. Preparing for Tests
30. Having Enough Time to Finish What I Need to Do
31. Improving Reading and Writing Skills
32. Researching Papers
33. Getting the Grades I Want
34. Talking to My Teachers
35. Getting Help at School
36. Doing Well in My Toughest Class
37. Talking to Principals and Other Administrators
38. Finding Time to Study
39. Understanding My Textbooks
40. Participating in Class Discussions

## Section C:

41. What three things about the Transition program do you think have been most helpful in helping you to stay on track to graduate? Please select three (3) of the following. -All answer selections from Section A presented here
42. How would you compare the student you were in Middle School to the student you are now?
43. Please enter your unique student identifier

Source: Seminole County Public School District (2012). Transition Program Survey, Unpublished Survey

APPENDIX B
INSTITUTIONAL REVIEW BOARD APPROVAL

University of Central Florida Institutional Review Bcard
Office of Research \& Commercialization
12201 Research Parkway, Suite 501
Orlando, Florida 32826-3246
Telephone: 407-823-2901 or 407-882-2276
www.research.wef.edu/compliance/irb/html

## Approval of Exempt Human Research

| From: | UCF Institutional Review Board til <br> FWA00000351, IRB00001138 |
| :--- | :--- |
| Tor | Walter D. Griffin |
| Date: $\quad$ August 27, 2012 |  |
| Dear Rescarcher |  |

On $8 / 27 / 2012$, the IRB approved the following activity as human participant research that is exempt from regulation:

| Type of Review: | Exempt Determination |
| ---: | :--- |
| Project Title: | IMPROVING ON-TIME GRADUATION FOR AT-RISK |
|  | STUDENTS: AT-RISK STUDENTS' PERCEPTIONS OF |
|  | SCHOOL INTERVENTIONS THAT ARE INTENDED TO |
|  | IMPROVE ON-TIME GRADUATION |
| Investigator: | Walter D, Griffin |
| IRB Number: | SBE-12-08632 |
| Funding Agency: |  |
| Grant Title: |  |
| Research ID: | N/A |

This determination applies only to the activities deseribed in the IRB submission and does not apply should any changes be made. If changes are made and there are questions about whether these changes affect the exempt status of the human rescarch. please contact the IRB. When you have completed your research. please submit a Study Closure request in iRIS wo that IRB reserols will beaccurate.

In the conduct of this research, you are responsible to follow the requirements of the Investigator Manual
On behalf of Sophia Driegielewski, Ph.D., L.C.S.W., UCF IRB Chair, this letter is signed by:
Signature applied by Joanne Muratori on 08/27/2012 04:07:53 PM EDT
gane Smuntoi
IRB Coordinator

APPENDIX C
SCHOOL DATA: PARTICIPANTS' PERCEPTIONS OF HELPFULNESS OF TRANSITION PROGRAMS

Table 23
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School A)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 40.0 | 40.0 | 20.0 | 0.0 | 0.0 |
| Having good teachers | 73.3 | 26.7 | 0.0 | 0.0 | 0.0 |
| Having good guidance counselors | 66.7 | 26.7 | 6.7 | 0.0 | 0.0 |
| Having good administrators | 53.3 | 33.3 | 13.3 | 0.0 | 0.0 |
| Having good attendance | 60.0 | 33.3 | 6.7 | 0.0 | 0.0 |
| Preparing for class | 53.3 | 40.0 | 6.7 | 0.0 | 0.0 |
| Completing homework | 73.3 | 20.0 | 6.7 | 0.0 | 0.0 |
| Computer access at school | 66.7 | 20.0 | 13.3 | 0.0 | 0.0 |
| Extracurricular participation | 46.7 | 33.3 | 20.0 | 0.0 | 0.0 |
| Keeping track of my grade point average | 53.3 | 40.0 | 0.0 | 6.7 | 0.0 |
| Keeping track of my credits | 66.7 | 20.0 | 6.7 | 6.7 | 0.0 |
| Support from family | 73.3 | 13.3 | 13.3 | 0.0 | 0.0 |
| Support from friends | 46.7 | 40.0 | 6.7 | 0.0 | 6.7 |
| After-school tutorial | 53.3 | 26.7 | 20.0 | 0.0 | 0.0 |
| Study skills class | 60.0 | 13.3 | 26.7 | 0.0 | 0.0 |
| Transportation | 73.3 | 6.7 | 20.0 | 0.0 | 0.0 |
| Receiving scholarship/Seminole State College | 53.3 | 6.7 | 26.7 | 0.0 | 13.3 |

Table 24
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School B)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 62.1 | 31.0 | 5.2 | 1.7 | 0.0 |
| Having good teachers | 75.9 | 24.1 | 0.0 | 0.0 | 0.0 |
| Having good guidance counselors | 63.8 | 24.1 | 12.1 | 0.0 | 0.0 |
| Having good administrators | 41.4 | 31.0 | 27.6 | 0.0 | 0.0 |
| Having good attendance | 39.7 | 43.1 | 13.8 | 3.4 | 0.0 |
| Preparing for class | 42.4 | 39.0 | 15.3 | 1.7 | 1.7 |
| Completing homework | 59.3 | 25.4 | 6.8 | 1.7 | 6.8 |
| Computer access at school | 54.2 | 25.4 | 16.9 | 3.4 | 0.0 |
| Extracurricular participation | 25.9 | 34.5 | 32.8 | 5.2 | 1.7 |
| Keeping track of my grade point average | 44.1 | 39.0 | 11.9 | 1.7 | 3.4 |
| Keeping track of my credits | 47.5 | 32.2 | 15.3 | 1.7 | 3.4 |
| Support from family | 39.0 | 27.1 | 30.5 | 1.7 | 1.7 |
| Support from friends | 30.5 | 33.9 | 33.9 | 0.0 | 1.7 |
| After-school tutorial | 18.6 | 13.6 | 62.7 | 1.7 | 3.4 |
| Study skills class | 44.1 | 11.9 | 40.7 | 1.7 | 1.7 |
| Transportation | 52.5 | 13.6 | 28.8 | 1.7 | 3.4 |
| Receiving scholarship/Seminole State College | 55.9 | 20.3 | 23.7 | 0.0 | 0.0 |

Table 25
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School C)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 44.3 | 33.6 | 20.7 | 0.7 | 0.7 |
| Having good teachers | 63.6 | 26.4 | 7.1 | 2.9 | 0.0 |
| Having good guidance counselors | 40.0 | 29.3 | 25.7 | 1.4 | 3.6 |
| Having good administrators | 26.4 | 32.9 | 35.7 | 2.9 | 2.1 |
| Having good attendance | 47.5 | 28.8 | 15.1 | 2.2 | 6.5 |
| Preparing for class | 53.6 | 34.3 | 12.1 | 0.0 | 0.0 |
| Completing homework | 56.4 | 25.0 | 10.7 | 4.3 | 3.6 |
| Computer access at school | 51.4 | 28.3 | 19.6 | 0.7 | 0.0 |
| Extracurricular participation | 27.9 | 35.0 | 34.3 | 2.1 | 0.7 |
| Keeping track of my grade point average | 40.0 | 32.1 | 20.0 | 6.4 | 1.4 |
| Keeping track of my credits | 39.6 | 33.8 | 20.9 | 5.0 | 0.7 |
| Support from family | 51.8 | 25.2 | 18.0 | 3.6 | 1.4 |
| Support from friends | 41.7 | 30.2 | 25.9 | 2.2 | 0.0 |
| After-school tutorial | 20.1 | 18.7 | 56.8 | 2.2 | 2.2 |
| Study skills class | 18.7 | 30.2 | 45.3 | 2.9 | 2.9 |
| Transportation | 45.3 | 20.9 | 30.9 | 2.9 | 0.0 |
| Receiving scholarship/Seminole State College | 45.7 | 19.3 | 34.3 | 0.7 | 0.0 |

Table 26
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School D)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 24.6 | 24.0 | 46.4 | 2.2 | 2.8 |
| Having good teachers | 60.8 | 27.8 | 8.0 | 2.3 | 1.1 |
| Having good guidance counselors | 42.7 | 28.1 | 28.1 | 0.6 | 0.6 |
| Having good administrators | 27.7 | 36.7 | 31.1 | 2.3 | 2.3 |
| Having good attendance | 45.5 | 28.7 | 16.3 | 6.2 | 3.3 |
| Preparing for class | 46.6 | 34.3 | 15.7 | 1.1 | 2.2 |
| Completing homework | 51.1 | 29.5 | 13.6 | 4.0 | 1.7 |
| Computer access at school | 40.9 | 34.1 | 19.3 | 3.4 | 2.3 |
| Extracurricular participation | 30.9 | 29.1 | 37.7 | 1.7 | 0.6 |
| Keeping track of my grade point average | 47.5 | 28.8 | 19.8 | 2.3 | 1.7 |
| Keeping track of my credits | 43.2 | 32.4 | 22.7 | 0.0 | 1.7 |
| Support from family | 56.6 | 23.4 | 16.6 | 1.7 | 1.7 |
| Support from friends | 35.6 | 39.5 | 22.6 | 1.7 | 0.6 |
| After-school tutorial | 19.2 | 22.0 | 57.1 | 0.0 | 1.7 |
| Study skills class | 35.8 | 25.0 | 30.1 | 3.4 | 5.7 |
| Transportation | 56.6 | 18.3 | 22.9 | 1.7 | 0.6 |
| Receiving scholarship/Seminole State College | 41.7 | 18.3 | 38.3 | 0.6 | 1.1 |

Table 27
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School E)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 48.3 | 26.4 | 23.0 | 1.1 | 1.1 |
| Having good teachers | 63.5 | 2.1 | 7.1 | 1.2 | 1.2 |
| Having good guidance counselors | 61.6 | 20.9 | 12.8 | 3.5 | 1.2 |
| Having good administrators | 34.9 | 34.9 | 26.7 | 0.0 | 3.5 |
| Having good attendance | 60.5 | 24.4 | 9.3 | 4.7 | 1.2 |
| Preparing for class | 56.5 | 36.5 | 5.9 | 1.2 | 0.0 |
| Completing homework | 54.0 | 32.2 | 10.3 | 2.3 | 1.1 |
| Computer access at school | 56.3 | 25.3 | 17.2 | 0.0 | 1.1 |
| Extracurricular participation | 44.2 | 23.3 | 32.6 | 0.0 | 0.0 |
| Keeping track of my grade point average | 55.8 | 26.7 | 14.0 | 0.0 | 3.5 |
| Keeping track of my credits | 52.9 | 26.4 | 17.2 | 1.1 | 2.3 |
| Support from family | 62.1 | 18.4 | 18.4 | 0.0 | 1.1 |
| Support from friends | 43.7 | 27.6 | 26.4 | 1.1 | 2.3 |
| After-school tutorial | 23.0 | 19.5 | 52.9 | 2.3 | 2.3 |
| Study skills class | 46.0 | 24.1 | 26.4 | 1.1 | 2.3 |
| Transportation | 56.3 | 24.1 | 17.2 | 0.0 | 2.3 |
| Receiving scholarship/Seminole State College | 48.3 | 16.1 | 33.3 | 0.0 | 2.3 |

Table 28
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School F)

|  |  | Percentages <br> Did not |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |  |
| Having a good mentor | 46.8 | 29.8 | 17.0 | 4.3 | 2.1 |  |
| Having good teachers | 63.8 | 29.8 | 6.4 | 0.0 | 0.0 |  |
| Having good guidance counselors | 44.7 | 21.3 | 25.5 | 4.3 | 4.3 |  |
| Having good administrators | 41.3 | 23.9 | 26.1 | 4.3 | 4.3 |  |
| Having good attendance | 40.4 | 29.8 | 17.0 | 10.6 | 2.1 |  |
| Preparing for class | 48.9 | 27.7 | 17.0 | 4.3 | 2.1 |  |
| Completing homework | 59.6 | 27.7 | 2.1 | 2.1 | 8.5 |  |
| Computer access at school | 55.3 | 31.9 | 12.8 | 0.0 | 0.0 |  |
| Extracurricular participation | 32.6 | 32.6 | 30.4 | 2.2 | 2.2 |  |
| Keeping track of my grade point average | 38.3 | 31.9 | 23.4 | 4.3 | 2.1 |  |
| Keeping track of my credits | 43.5 | 39.1 | 13.0 | 2.2 | 2.2 |  |
| Support from family | 55.6 | 22.2 | 20.0 | 0.0 | 2.2 |  |
| Support from friends | 42.6 | 23.4 | 31.9 | 2.1 | 0.0 |  |
| After-school tutorial | 28.3 | 21.7 | 47.9 | 0.0 | 2.2 |  |
| Study skills class | 38.3 | 31.9 | 29.8 | 0.0 | 0.0 |  |
| Transportation | 63.8 | 14.9 | 14.9 | 2.1 | 4.3 |  |
| Receiving scholarship/Seminole State College | 55.3 | 8.5 | 31.9 | 2.1 | 2.1 |  |

Table 29
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School G)

|  | Percentages <br> Did not |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 33.8 | 37.5 | 26.3 | 0.0 | 2.5 |
| Having good teachers | 55.0 | 31.3 | 12.5 | 0.0 | 1.3 |
| Having good guidance counselors | 48.1 | 19.0 | 29.1 | 2.5 | 1.3 |
| Having good administrators | 41.3 | 33.3 | 22.7 | 1.3 | 1.3 |
| Having good attendance | 53.2 | 20.3 | 15.2 | 8.9 | 2.5 |
| Preparing for class | 46.8 | 31.6 | 20.3 | 0.0 | 1.3 |
| Completing homework | 43.6 | 33.3 | 9.0 | 5.1 | 9.0 |
| Computer access at school | 48.7 | 29.5 | 19.2 | 1.3 | 1.3 |
| Extracurricular participation | 26.3 | 25.0 | 42.5 | 5.0 | 1.3 |
| Keeping track of my grade point average | 34.2 | 29.1 | 21.5 | 10.1 | 5.1 |
| Keeping track of my credits | 41.0 | 32.1 | 24.4 | 1.3 | 1.3 |
| Support from family | 41.3 | 30.0 | 20.0 | 6.3 | 2.5 |
| Support from friends | 41.3 | 25.0 | 27.5 | 1.3 | 5.0 |
| After-school tutorial | 20.3 | 22.8 | 45.6 | 3.8 | 7.6 |
| Study skills class | 20.3 | 35.4 | 36.7 | 3.8 | 3.8 |
| Transportation | 47.4 | 24.4 | 20.5 | 3.8 | 3.8 |
| Receiving scholarship/Seminole State College | 31.3 | 17.5 | 48.8 | 1.3 | 1.3 |

Table 30
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School H)

|  | Percentages <br> Did not <br> Characteristics |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
|  | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 53.2 | 29.1 | 15.8 | 0.6 | 1.3 |
| Having good teachers | 62.4 | 25.5 | 8.9 | 1.3 | 1.9 |
| Having good guidance counselors | 53.2 | 24.1 | 19.0 | 2.5 | 1.3 |
| Having good administrators | 49.7 | 27.7 | 17.6 | 3.1 | 1.9 |
| Having good attendance | 58.7 | 27.1 | 8.4 | 3.2 | 2.6 |
| Preparing for class | 62.2 | 32.1 | 4.5 | 0.0 | 1.3 |
| Completing homework | 58.6 | 31.8 | 7.0 | 2.5 | 0.0 |
| Computer access at school | 56.3 | 26.6 | 15.8 | 1.3 | 0.0 |
| Extracurricular participation | 41.3 | 25.8 | 30.3 | 2.6 | 0.0 |
| Keeping track of my grade point average | 56.1 | 3.6 | 11.5 | 1.9 | 0.0 |
| Keeping track of my credits | 64.2 | 24.5 | 9.4 | 1.9 | 0.0 |
| Support from family | 59.0 | 26.9 | 10.9 | 1.9 | 1.3 |
| Support from friends | 48.4 | 34.0 | 17.0 | 0.0 | 0.7 |
| After-school tutorial | 31.2 | 24.2 | 40.1 | 1.3 | 3.2 |
| Study skills class | 33.1 | 33.1 | 32.5 | 0.0 | 1.3 |
| Transportation | 56.3 | 22.2 | 17.1 | 3.2 | 1.3 |
| Receiving scholarship/Seminole State College | 57.7 | 19.2 | 22.4 | 0.0 | 0.6 |

Table 31
Program Participants' Perceptions of Helpfulness of Transition Program Characteristics (School I)

|  |  | Percentages <br> Did not |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Characteristics | Helped <br> Very <br> Much | Helped a <br> Little | Help or <br> Hurt | Hurt a <br> Little | Hurt Very <br> Much |
| Having a good mentor | 72.4 | 20.7 | 6.9 | 0.0 | 0.0 |
| Having good teachers | 79.3 | 19.0 | 1.7 | 0.0 | 0.0 |
| Having good guidance counselors | 51.8 | 35.7 | 12.5 | 0.0 | 0.0 |
| Having good administrators | 51.7 | 34.5 | 13.8 | 0.0 | 0.0 |
| Having good attendance | 69.0 | 22.4 | 8.6 | 0.0 | 0.0 |
| Preparing for class | 70.1 | 24.6 | 5.3 | 0.0 | 0.0 |
| Completing homework | 81.0 | 15.5 | 3.4 | 0.0 | 0.0 |
| Computer access at school | 63.8 | 27.6 | 8.6 | 0.0 | 0.0 |
| Extracurricular participation | 48.3 | 34.5 | 17.2 | 0.0 | 0.0 |
| Keeping track of my grade point average | 56.9 | 31.0 | 12.1 | 0.0 | 0.0 |
| Keeping track of my credits | 57.6 | 32.2 | 10.2 | 0.0 | 0.0 |
| Support from family | 50.0 | 31.0 | 17.2 | 1.7 | 0.0 |
| Support from friends | 40.4 | 50.9 | 8.8 | 0.0 | 0.0 |
| After-school tutorial | 32.8 | 43.1 | 24.1 | 0.0 | 0.0 |
| Study skills class | 87.7 | 7.0 | 5.3 | 0.0 | 0.0 |
| Transportation | 72.4 | 19.0 | 8.6 | 0.0 | 0.0 |
| Receiving scholarship/Seminole State College | 58.6 | 17.2 | 24.1 | 0.0 | 0.0 |

## APPENDIX D

SCHOOL DATA: PROGRAM PARTICIPANTS' PERSONAL SELF-EFFICACY RATINGS: TASKS ASSOCIATED WITH HIGH SCHOOL SUCCESS

## Table 32

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School A)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.80 | 10 |
| Improving writing and reading skills | 7.40 | 7 |
| Taking good class notes | 7.60 | 7 |
| Participating in class discussions | 6.73 | 5 |
| Asking questions in class | 6.13 | 6 |
| Understanding my teachers | 6.72 | 7 |
| Getting work done on time | 5.20 | 5 |
| Talking to my teachers | 5.93 | 5 |
| Having enough time to finish work | 5.53 | 5 |
| Getting help at school | 6.20 | 5 |
| Researching papers | 6.13 | 6 |
| Writing papers | 5.79 | 5 |
| Understanding my textbooks | 7.00 | 6 |
| Doing well on tests | 5.87 | 5 |
| Managing both school and work | 5.80 | 5 |
| Preparing for tests | 5.57 | 4 |
| Meeting parental grade expectations | 5.67 | 5 |
| Getting the grades I want | 6.33 | 5 |
| Studying | 5.60 | 5 |
| Taking two or more tests in the same week | 6.13 | 5 |
| Finding time to study | 5.93 | 5 |
| Doing well in my toughest class | 4.47 | 4 |
| Talking to principals and other administrators | 5.53 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Table 33

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School B)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.82 | 10 |
| Improving writing and reading skills | 7.40 | 7 |
| Taking good class notes | 7.00 | 8 |
| Participating in class discussions | 7.03 | 7 |
| Asking questions in class | 6.87 | 8 |
| Understanding my teachers | 7.23 | 8 |
| Getting work done on time | 6.43 | 7 |
| Talking to my teachers | 6.85 | 7 |
| Having enough time to finish work | 6.80 | 7 |
| Getting help at school | 6.53 | 7 |
| Researching papers | 6.42 | 7 |
| Writing papers | 6.53 | 7 |
| Understanding my textbooks | 6.50 | 7 |
| Doing well on tests | 6.38 | 6 |
| Managing both school and work | 6.58 | 7 |
| Preparing for tests | 5.98 | 6 |
| Meeting parental grade expectations | 6.25 | 6 |
| Getting the grades I want | 5.76 | 6 |
| Studying | 6.34 | 6 |
| Taking two or more tests in the same week | 5.90 | 6 |
| Finding time to study | 5.70 | 5 |
| Doing well in my toughest class | 5.10 | 5 |
| Talking to principals and other administrators | 5.32 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Table 34

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School C)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.58 | 10 |
| Improving writing and reading skills | 7.42 | 8 |
| Taking good class notes | 6.92 | 7 |
| Participating in class discussions | 7.33 | 8 |
| Asking questions in class | 6.94 | 8 |
| Understanding my teachers | 6.89 | 7 |
| Getting work done on time | 6.81 | 7 |
| Talking to my teachers | 6.84 | 7 |
| Having enough time to finish work | 6.73 | 7 |
| Getting help at school | 6.23 | 7 |
| Researching papers | 6.32 | 7 |
| Writing papers | 6.32 | 6 |
| Understanding my textbooks | 6.17 | 7 |
| Doing well on tests | 6.46 | 7 |
| Managing both school and work | 6.33 | 7 |
| Preparing for tests | 6.04 | 6 |
| Meeting parental grade expectations | 5.88 | 6 |
| Getting the grades I want | 5.59 | 6 |
| Studying | 5.51 | 5 |
| Taking two or more tests in the same week | 5.61 | 6 |
| Finding time to study | 5.20 | 5 |
| Doing well in my toughest class | 5.35 | 5 |
| Talking to principals and other administrators | 4.90 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Table 35

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School D)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.37 | 10 |
| Improving writing and reading skills | 6.89 | 7 |
| Taking good class notes | 7.48 | 7 |
| Participating in class discussions | 7.03 | 7 |
| Asking questions in class | 6.99 | 7 |
| Understanding my teachers | 6.64 | 7 |
| Getting work done on time | 6.75 | 7 |
| Talking to my teachers | 6.69 | 7 |
| Having enough time to finish work | 5.96 | 6 |
| Getting help at school | 6.10 | 6 |
| Researching papers | 5.75 | 6 |
| Writing papers | 5.98 | 6 |
| Understanding my textbooks | 5.77 | 6 |
| Doing well on tests | 6.03 | 6 |
| Managing both school and work | 5.89 | 6 |
| Preparing for tests | 5.91 | 6 |
| Meeting parental grade expectations | 6.06 | 6 |
| Getting the grades I want | 6.19 | 6 |
| Studying | 5.54 | 5 |
| Taking two or more tests in the same week | 5.23 | 5 |
| Finding time to study | 5.42 | 6 |
| Doing well in my toughest class | 5.20 | 5 |
| Talking to principals and other administrators | 4.79 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Table 36

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School E)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.17 | 9 |
| Improving writing and reading skills | 7.56 | 8 |
| Taking good class notes | 7.63 | 8 |
| Participating in class discussions | 7.07 | 8 |
| Asking questions in class | 6.78 | 7 |
| Understanding my teachers | 6.62 | 7 |
| Getting work done on time | 7.05 | 7 |
| Talking to my teachers | 6.61 | 7 |
| Having enough time to finish work | 7.11 | 7 |
| Getting help at school | 6.29 | 7 |
| Researching papers | 6.84 | 7 |
| Writing papers | 6.30 | 7 |
| Understanding my textbooks | 6.21 | 7 |
| Doing well on tests | 6.36 | 7 |
| Managing both school and work | 5.99 | 6 |
| Preparing for tests | 6.34 | 7 |
| Meeting parental grade expectations | 6.60 | 7 |
| Getting the grades I want | 6.14 | 7 |
| Studying | 5.99 | 6 |
| Taking two or more tests in the same week | 5.70 | 6 |
| Finding time to study | 6.34 | 7 |
| Doing well in my toughest class | 5.79 | 6 |
| Talking to principals and other administrators | 4.68 | 5 |

Note. $0=$ not confident and $10=$ very confident.

## Table 37

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School F)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.81 | 10 |
| Improving writing and reading skills | 7.55 | 8 |
| Taking good class notes | 6.61 | 8 |
| Participating in class discussions | 7.32 | 8 |
| Asking questions in class | 6.64 | 7 |
| Understanding my teachers | 7.00 | 7 |
| Getting work done on time | 6.70 | 6 |
| Talking to my teachers | 6.47 | 7 |
| Having enough time to finish work | 6.98 | 7 |
| Getting help at school | 6.61 | 7 |
| Researching papers | 6.43 | 7 |
| Writing papers | 6.19 | 7 |
| Understanding my textbooks | 6.80 | 8 |
| Doing well on tests | 6.81 | 7 |
| Managing both school and work | 6.32 | 7 |
| Preparing for tests | 5.91 | 6 |
| Meeting parental grade expectations | 6.47 | 7 |
| Getting the grades I want | 5.77 | 6 |
| Studying | 5.52 | 5 |
| Taking two or more tests in the same week | 6.28 | 7 |
| Finding time to study | 5.38 | 6 |
| Doing well in my toughest class | 4.96 | 5 |
| Talking to principals and other administrators |  |  |

Note. $0=$ not confident and $10=$ very confident.

## Table 38

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School G)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.25 | 10 |
| Improving writing and reading skills | 7.23 | 8 |
| Taking good class notes | 6.88 | 8 |
| Participating in class discussions | 6.61 | 7 |
| Asking questions in class | 6.28 | 7 |
| Understanding my teachers | 6.54 | 7 |
| Getting work done on time | 6.38 | 7 |
| Talking to my teachers | 6.21 | 7 |
| Having enough time to finish work | 6.37 | 6 |
| Getting help at school | 6.04 | 6 |
| Researching papers | 6.04 | 6 |
| Writing papers | 6.11 | 6 |
| Understanding my textbooks | 5.81 | 7 |
| Doing well on tests | 5.86 | 6 |
| Managing both school and work | 5.51 | 5 |
| Preparing for tests | 5.77 | 6 |
| Meeting parental grade expectations | 5.31 | 5 |
| Getting the grades I want | 5.21 | 5 |
| Studying | 5.29 | 5 |
| Taking two or more tests in the same week | 5.71 | 6 |
| Finding time to study | 5.52 | 6 |
| Doing well in my toughest class | 5.12 | 5 |
| Talking to principals and other administrators | 5.11 | 5 |

Note. $0=$ not confident and $10=$ very confident.

Table 39
Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School H)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.44 | 10 |
| Improving writing and reading skills | 7.87 | 8 |
| Taking good class notes | 7.80 | 8 |
| Participating in class discussions | 7.38 | 8 |
| Asking questions in class | 7.08 | 8 |
| Understanding my teachers | 6.92 | 7 |
| Getting work done on time | 6.93 | 7 |
| Talking to my teachers | 6.91 | 7 |
| Having enough time to finish work | 6.75 | 7 |
| Getting help at school | 6.85 | 7 |
| Researching papers | 6.79 | 7 |
| Writing papers | 6.59 | 7 |
| Understanding my textbooks | 6.68 | 7 |
| Doing well on tests | 6.27 | 6 |
| Managing both school and work | 6.34 | 7 |
| Preparing for tests | 6.23 | 6 |
| Meeting parental grade expectations | 6.15 | 7 |
| Getting the grades I want | 6.23 | 7 |
| Studying | 6.26 | 6 |
| Taking two or more tests in the same week | 6.06 | 6 |
| Finding time to study | 6.03 | 6 |
| Doing well in my toughest class | 5.64 | 6 |
| Talking to principals and other administrators | 6.03 | 6 |

Note. $0=$ not confident and $10=$ very confident.

Table 40

Program Participants' Personal Self-Efficacy Ratings: Tasks Associated With High School Success (School I)

| Tasks | Mean Rating | Median Score |
| :--- | :---: | :---: |
| Making friends at school | 8.53 | 10 |
| Improving writing and reading skills | 7.76 | 8 |
| Taking good class notes | 7.56 | 8 |
| Participating in class discussions | 7.69 | 8 |
| Asking questions in class | 7.62 | 8 |
| Understanding my teachers | 7.83 | 8 |
| Getting work done on time | 7.29 | 7 |
| Talking to my teachers | 7.64 | 8 |
| Having enough time to finish work | 7.64 | 8 |
| Getting help at school | 7.70 | 8 |
| Researching papers | 7.72 | 8 |
| Writing papers | 7.09 | 8 |
| Understanding my textbooks | 7.52 | 8 |
| Doing well on tests | 7.16 | 8 |
| Managing both school and work | 7.26 | 8 |
| Preparing for tests | 7.43 | 8 |
| Meeting parental grade expectations | 6.90 | 7 |
| Getting the grades I want | 7.19 | 8 |
| Studying | 6.76 | 7 |
| Taking two or more tests in the same week | 6.95 | 7 |
| Finding time to study | 6.88 | 7 |
| Doing well in my toughest class | 6.41 | 7 |
| Talking to principals and other administrators | 7.42 | 8 |

Note. $0=$ not confident and $10=$ very confident.

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