ONE FRESHMAN ACADEMY’S INFLUENCE ON STUDENT ENGAGEMENT IN HIGH SCHOOL

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Abstract

This study investigated the impact of one large suburban high school’s ninth grade transition program, the freshman academy, on students’ cognitive and affective engagement in high school. Participants of the study embodied tenth grade students who had completed their freshmen year in the academy and freshmen academy staff who also worked with tenth graders. Using a concurrent triangulated mixed-method research design, equally weighted qualitative and quantitative data were collected and analyzed through the lenses of cognitive-stage and social cognitive theories. Key findings revealed that students measured statistically, significantly higher on affective engagement than on cognitive engagement in high school. Convergence and divergence of data confirmed common practices of the freshman academy that influenced students’ levels of engagement. Students’ focus on socialization and teachers’ focus on personalization supported the higher survey measures on affective engagement, while scheduling limitations and inconsistent instructional practices supported lower measures of cognitive engagement. Students’ sense of irrelevancy in coursework and teachers’ limited interdisciplinary, student-centered instructional practices led to a recommendation for professional development, supported with instructional coaching for staff. Ability group tracking emerged as a practice that contributed to problematic scheduling and classroom behaviors, suggesting investigation into heterogeneously mixed freshman academy classes.

Keywords: freshman academy, interdisciplinary teams, ability group tracking, school engagement: emotional, cognitive, behavioral.
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Chapter 1: Introduction

Statement of Problem

Grade nine is a crucial year in a child’s schooling. The First Year of High School: A Quick Stats Fact Sheet reports that a child’s success or failure in his/her first year of high school is an indicator of success throughout high school and beyond, yet more students fail grade nine than any other (Williams & Richman, 2007). Boston College researchers determined that the national average number of students retained in their freshman year tripled between 1970-2000, growing from 4% to 13% (Haney et al., 2004). This proportionately high enrollment in grade nine is often referred to as the “grade-nine bulge” (Lounsbury & Johnston, 1985; Haney, 2003; Reents, 2002; Black, 2004). Fewer than 10% of students who fail freshman year go on to graduate high school.

Nationally, research puts the graduation rate between 68 and 71%; almost one-third of all public high school students in America fail to graduate (Bridgeland, Dilulio, and Morrison, 2006: Herlihy, 2007). Levin, Belfield, Muenning and Rouse (2007) note that high school graduates produce financial benefits to the public through greater tax payments than their dropout counterparts, they’re less likely to require public welfare assistance, and they’re less likely to engage in criminal activity leading to incarceration. The educational and economic forecast for our nation is woeful if the dropout epidemic is not addressed intensively and comprehensively. Clearly, the problematic transition from eighth to ninth grade warrants nationwide focus, as high school freshmen unsuccessfully struggle with social and academic pressures of adjusting to larger, unfamiliar environments. The need for design and implementation of effective grade nine-transition programming is well established in research
spanning four decades (Blyth, Simmons, & Carlton-Ford, 1983; Eccles, Midgley & Adler, 1984; Eccles, Lord & Midgley, 1991; Wheelock, 1993, Roeser et al., 1999; Mac Iver, 1990; Haney et al., 2004; Christie, 2008). Cohen and Smerdon’s (2009) study cites a number of programs addressing “ninth-grade bulge and bust transition” (p.183), including freshman academies, yet there appears to be a dearth of research on the efficacy of these programs in initiating and sustaining student engagement, particularly in suburban and rural areas.

The school of this study is a large suburban high school in Southeastern Massachusetts. In 2004, 15% of its ninth graders failed one core academic course. Other indicators of both passive and active disengagement included a high absentee rate as well as a high volume of disciplinary infractions. Among the 1,700 Grade 9–12 students enrolled, the average number of days absent was 15. The dropout rate among upperclassmen was 6% (DESE, 2009). In response to this crisis, a freshman academy was implemented in 2005 as the school’s first small learning community initiative. Adopting a middle school model, the freshman academy established four-person core academic teaching teams, each team sharing the same 100 students. Initiation of this small learning community model was a step toward reforming the school. Cushman (2006) notes, “new high school students are more likely to find their academic and social bearings in a smaller learning community” (p. 47). Teaming teachers also provided opportunity for collaboration and earlier detection of social and behavioral factors interfering with students’ academic performance, enabling early intervention. The program, now in its seventh year, has not been formally studied for its effect on student engagement.

**Significance of the Problem**
Although the dropout epidemic in the United States disproportionately affects low-income, minority, urban, single-parent adolescents attending large, public high schools in the inner cities, the problem is not unique to these populations (Roderick 1993; Neild, Stoner-Eby & Furstenberg, 2001; Dedmond, Brown, & LaFauci, 2006, Neild, 2009). Research has established that students bulging the grade-nine pipeline are nine times more likely to drop out of school than their peers who are not retained (Schreiber, 1963; Clark, 1991; Roderick, 1993; Haney, 2003; Neild et al, 2001; Neild, 2009). Poor and failing grades are strong predictors for dropping out of school (Roderick, 1993; Wehlage et al., 1999). Students whose grades drop significantly during major schooling transitions (from elementary to secondary) are at increased risk to dropping out (Roderick, 1993).

Dropping out of school is a process of disengagement from school and learning that occurs over many years, often beginning early in elementary school (Christenson & Thurlow, 2004). Moving from middle school to high school is the most problematic, often traumatic, transitional experience for young adolescents. Inadequate performance during this crucial transition exacerbates the disengagement process and sets many students on the tumultuous track of dropping out (Lounsbury & Johnston, 1985; Wheelock, 1993: Mizelle & Irvin, 2000; Hertzog & Morgan, 1998; Neild et al., 2001). The most important concept in preventing school dropout, or promoting completion is school engagement (Anderson, Christenson, Sinclair, & Lehr, 2004). Anderson & Christenson (2004) explain engagement as more than class participation:

Engagement is much more than the time students spend on task; rather, students’ engagement with school and learning includes their behavior (e.g., attendance, participation), cognition (e.g., value of education, relevance to future, self-regulation),
and psychological/interpersonal experiences (e.g., feeling that he or she belongs at school, relationships with teachers and peers). (p. 66)

This study investigated the impact of one large, suburban high school’s freshman academy on student engagement. According to teachers in the program, many incoming students were continually challenged to meet course expectations or become actively engaged in extracurricular activities, while others met tremendous success. A close examination of documents, in addition to students and staff’s perceptions, informed the school community and the district of the program’s effectiveness in promoting student engagement in school and learning. The results of this study yielded recommendations for new directions in existing practices, to ensure forward momentum of the freshman academy in facilitating successful high school transition and engaging all students in school and learning. This small-scale study, upon which others can build, makes a significant contribution to literature on the efficacy of freshmen academies, suggesting that continual evaluation and modification of grade nine transitioning program components promotes adolescent school engagement and deters high school dropout.

**Practical and Intellectual Goals:**

The practical and intellectual goals that fueled this study and directed the research questions were interrelated. Of practical importance was hearing the students’ voices as they articulated which components of the program facilitated and impeded student engagement. Of similar importance was gathering teacher perspectives on their students’ transitional experiences. Meeting this practical goal assessed an issue with an understudied group or population (Creswell, 2007), empowered this population to impact the programming of the academy, while facilitating the opportunity for active citizenship and leadership in their school and community.
The intellectual goal was applying theory and effectively weaving bodies of substantial literature into the study design, data collection, instrumentation, and data analysis. This study aimed to result in research-based, theoretically framed documentation of one freshman academy’s impact on student engagement, advising forward momentum of this school’s freshman academy while adding to educational research on the efficacy of freshmen transition programs. Using school documents, student surveys, and student and faculty focus group interviews provided opportunity for abundant data collection and triangulation for robust analysis.

**Research Question(s):**

Following Creswell’s (2007) recommendation to reduce one’s research study to one overarching question, followed by several sub questions, the following single question guided this investigation: *How does the freshman academy experience influence students’ engagement in school?*

Three sub questions addressed specific areas of investigation

**Sub questions:**

1. *What are the students’ self-reported perceptions of their cognitive and affective engagement in high school?*
2. *What are the teachers’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?*
3. *What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?*

**Definitions of Terminology:**
The following terminology should be clarified for interpretive lucidity in this study:

*Academic Achievement:* This is measured by the number of core courses students pass or fail for their freshmen year, rather than looking at GPA’s, which average in electives and non-academic courses. The study discusses core course retentions, since many students will fail one or two courses and still move on, either taking summer school or doubling up in concurrent years.

*Academic Tiered Tracking or Ability Grouping:* The practice of separating students by ability levels and aptitudes in specific course content areas. The tracking levels for the freshmen academy are honors, college prep (CP1), and a modified college prep (CP2). Placement of students was based on eighth grade teacher recommendations; however, parents could override these recommendations. Also, for the first three years of the academy’s implementation, there were only two tracked tiers, honors and CP1.

*At-risk Students:* Students with a history of poor academic performance, often exacerbated by poor attendance and notable disciplinary infractions.

*Attendance:* The cumulative unexcused absences of students. Unexcused absences excluded those for medical and/or legal appointments during the school day, as well as suspensions. Students were allowed eighteen unexcused absences before being denied credit for yearlong courses, nine for one-semester courses.

*Behavioral Engagement:* (a) Meeting behavioral expectations as outlined in student handbook, lack of disruptive behavior and disciplinary infractions (Finn, 1993; Finn & Rock, 1997; Fredricks et al., 2004); (b) active participation in learning and classroom activities, exemplified through effort, persistence, concentration, attention to detail, and
participating in class discussion (Fredricks et al., 2004; Skinner & Belmont, 1993); (c) participation in extra-curricula activities: athletics, clubs, and student government (Finn, 1993; Fredricks et al., 2004).

**Cognitive Engagement**: Student’s psychological investment in learning, self-regulation and being strategic (Fredricks et al., 2004; Newmann, Wehlage, & Lamborn, 1992).

**Core Academic Team**: Interdisciplinary team of teachers (English, history, math, science, and special education) assigned a common group of approximately 100 students and common planning time.

**Emotional Engagement**: Student’s emotional responses, psychological sense of belonging to community, and feelings of connectedness to teachers, classmates, and school (Fredricks et al., 2004; Skinner & Belmont, 1993).

**Disciplinary Infractions**: Disruptive behavior and breaking of rules resulting in office referral to administrator.

**Freshman Academy**: At this particular school the freshman academy embodied four core academic teams, located in different areas of the building, with the exception of the science teachers, who were located in the science wing for convenience of scheduling labs. The academy had its own housemaster who dealt with student discipline and attendance; and there were two guidance counselors, one assigned with three teams’ students, the other the fourth team’s students.

**High School Transition**: Period of adjustment as students acclimate to different academic and social expectations between high school and middle school, while adjusting to a new building environment.
Grade Nine Bulge: The larger number of students enrolled in grade nine compared with the number enrolled in grades eight the previous year, indicating proportionate retention, as much as 45% in urban areas (Hanley, 2003).

School Engagement: (a) Student’s participation in and positive associations with school; (b) “Student’s psychological investment in and effort directed toward learning, understanding, or mastering the knowledge, skills, or crafts that academic work is intended to promote” (Newmann et al., 1992, p. 12); (c) Student’s relationships with school, such as paying attention in class, acknowledging the seriousness of school, and desiring to achieve academically (Libbey, 2004).

Synaptic Formation: The formation of synapses, or connections, between neurons in the human brain is a key process in human brain development. “The rate of synapse formation peaks at age one, and slows down in early childhood, but the development of new synapses continues throughout life as we learn new skills, build memories, acquire knowledge and adapt to changing circumstances” (Steinberg, 2011, p. 44).

Synaptic Pruning: The brain produces more connections among cells than it will use; just as a gardener prunes vegetation to eliminate useless stems, the human brain prunes unnecessary connections to facilitate healthy development of those more frequently needed/used in particular regions of the brain coordinating with developmental stages. During adolescence, the most important part of the brain to be pruned is the prefrontal cortex, the region of the brain directly behind the forehead, which is most important for sophisticated thought processes and cognitive advances, improving the ability to regulate emotions and coordinate thoughts and feelings (Steinberg, 2011).
Theoretical Framework: Piaget’s Cognitive-Stage Theory, Bandura’s Social Cognitive Theory and Self-Efficacy Beliefs

To examine and explain the effects of a grade nine transitional program on matriculating students, one must consider the biological and intellectual developmental stage of young adolescents and the effect of environment on behavioral, social, and cognitive engagement. This section of the study discusses Piaget’s cognitive-stage theory, focusing on the formal operational period (roughly 11 to 15 years), supported through recent studies on human adolescent brain development. The study also discusses Bandura’s (1986) social cognitive theory, focusing on the triadic reciprocity of cognition, behavior, and environment in social learning and acquisition of self-efficacy beliefs.

**Cognitive-Stage Theory.** Jean Piaget’s background as a biologist, followed by his lifelong fascination with children’s intellectual development founded his cognitive-stage theory (Miller, 2002). This theory is rooted in a constructivist philosophy: people actively participate in building new knowledge through their prior experiences within the current context. By relating biological influences of human development, the genetic epistemology, in a sequentially organized structure of cognitive complexity, Piaget framed four major stages of human children’s cognitive development. Piaget believed each stage was a period of time in which a child’s thinking and behavior reflected a particular underlying mental structure, derived from the previous stage, and transformed into the next stage, after a period of equilibrium (Miller, 2002). As a child progresses through each stage, he or she must maintain a balance between applying previous knowledge (assimilation) and changing behavior to account for new knowledge (accommodation), to move toward equilibration, the final level of achievement within each
period or stage (equilibration): “Equilibration integrates and regulates the other three main factors of development: physical maturation, experience with the physical environment, and the influence of the social environment. All of these factors together propel the child through the stages” (Miller, 2002, p.67).

Following is a brief overview of Piaget’s stages, referred to as periods according to a child’s approximate age:

1. Sensorimotor period (roughly birth to two years). During this stage, the child learns about himself and his environment through motor and reflex actions. Thought derives from sensation and movement. The child learns that he or she is separate from the environment and that elements or people in the environment -- a parent or favorite toy -- continue to exist even though they may be outside the reach of the child’s senses.

2. Preoperational period (roughly two to seven years). Applying new knowledge of language, the child begins to use symbols to represent objects. The child is now better able to think about things and events other than those immediate, although conceptualizing time is difficult. Thinking is influenced by fantasy -- the way the child would like things to be -- and the child assumes that others see situations from his or her viewpoint.

3. Concrete operational period (roughly seven to eleven years). During this stage, accommodation increases. The child develops an ability to think abstractly and to make rational judgments about concrete or observable phenomena, which in the past he or she needed to manipulate physically to understand.
4. Formal operational period (roughly eleven to fifteen years). This person no longer requires concrete objects to make rational judgments. At this point, he is capable of hypothetical and deductive reasoning.

Applying Piaget’s cognitive-stage theory to adolescents in transition from middle to high school, the researcher considered that intellectual development was a by-product of “intertwined influences of innate and experiential factors” (Miller, 2002, p. 70). Students’ intellectual development was dependent on physical maturation, coordinating and interacting with their physical environments and social experiences. At age fourteen, students were advancing toward equilibration of the formal operational stage of development. However, students were within a broad range of this stage, cognitively, emotionally, and socially different in innate and experiential factors. Their individual intellectual capacities influenced their acquisition of prior knowledge, their mastery of skill sets expected at the middle school level. In a traditional high school transition, ninth graders are thrust into a new (often much larger) physical environment, complicated by a demotion from top-rung eighth grader to the bottom social ladder rung as a high school freshman. While experiencing these abrupt environmental and social changes, ninth graders are simultaneously hit by a barrage of course expectations from a number of different content area teachers, all echoing the importance of time management and self-regulation. Progressing through Piaget’s concrete operational period during high school transition, ninth grade students struggle to maintain a balance between applying previous knowledge (assimilation) and changing behavior to account for new knowledge (accommodation), to move toward equilibration, the final level of achievement within each period or stage. With thoughtful and accurate data collection and examination through the lens of Piaget’s cognitive-stage theory,
the researcher gained an understanding of how the freshman academy experiences facilitated or impeded students’ achievement. According to Piaget’s cognitive-stage theory, students cannot benefit from instruction unless cognitively ready to assimilate it to present cognitive structures or accommodate present structures to their experience (Miller, 2002). Through the lens of cognitive-stage theory, the researcher examined program implementation data on ninth grade students’ academic performance, attendance, and discipline, to understand and explain how the freshmen academy experiences impacted student engagement.

**Social Cognitive Theory and Self-Efficacy Beliefs.** To examine the impact of the freshman academy on student engagement, the researcher also examined the literature and data through the theoretical lens of social cognitive theory. In contrast to Piaget, who examined the sequential stage of cognitive development underlying learned behavior through imitation, Bandura’s (1986) social cognitive theory includes exploration of “why a child is motivated to imitate only certain actions of certain models at certain times and places” (Miller, 2002, p. 188). Examining why a child is motivated added the component of self-control through cognition in behavioral determinism, which is explained in further detail below. Although Bandura founded social cognitive theory and continually expands its validity through ongoing research, other theorists should be noted for their contributions as well, including but not limited to Walters, Mischel, Pajares, Zimmermann, and Schunk. Following is a brief overview of the historic development and components of social cognitive theory and self-efficacy beliefs as outlined by Frank Pajares (2006) and Patricia Miller (2002).

Social cognitive theory branched out of work in the area of social learning theory proposed by N.E. Miller and J. Dollard in 1941. Their proposition posited that when motivated to
learn a particular behavior, an individual could learn through observation and imitation of the modeled behavior. In 1963 Albert Bandura and Richard Walters expanded social learning theory with the publication of *Social Learning and Personality Development* by adding the principles of observational learning and vicarious reinforcement. They espoused that people could learn through their own experiences as well as by observing others’ behaviors. An unfamiliar behavior could be learned without undergoing the trial and error process (Pajares, 2006). By the 1970s Bandura became aware of a key element missing to learning theories of the day as well as his own social learning theory. In 1977, he identified self-beliefs as the missing element, thus publishing *Self-Efficacy: Toward a Unifying Theory of Behavioral Change*. Bandura posited therein that one’s beliefs in his or her capabilities factor heavily in one’s motivations toward attainment. In 1986 Bandura published *Social Foundations of Thought and Action: A Social Cognitive Theory*, further advancing “a view of human functioning that accords a central role to cognitive vicarious, self-regulatory, and self-reflective processes in human adaptation and change” (Pajares, 2006, p. 340). Therein, social cognitive theory was founded on the grounds that human cognition, the ability to control one’s reaction to stimuli, not external influences, determines behavior. Bandura emphasized the role of self-beliefs in human functioning. Through this “social cognitive perspective, individuals are viewed as self-organizing, proactive, self-reflecting, and self-regulating rather than as reactive organisms shaped by environmental factors or driven by concealed inner impulses” (Pajares, 2006, p. 340).

The foundation of Bandura’s (1986) social cognitive theory lies in his conception of reciprocal determinism, the view that personal factors in the form of a) cognition, affective, and biological events b) behavior, and c) environmental influences continually interact to create
learning in the individual. Simply put, human beings have the ability to control and regulate their responses to external influences: “From this theoretical perspective, human functioning is viewed as the product of a dynamic interplay of personal, behavioral, and environmental influences” (Pajares, 2006, p. 341). Miller (2002) affirms, “cognition is important in this process: children symbolically represent the relationship among the situation, their behavior, and the outcome: (p. 183).

Bandura viewed the learner as environmentally integrated, wherein cognitive responses, behaviors, and emotions create learning. In a study of human adolescents in environmental transition between middle and high school, the concept of this triadic reciprocal interplay provides an interesting lens through which one can begin to understand students’ adjusting to more rigorous academic demands, social pressures, and different instructional settings. This triadic approach to understanding human response and influence in environmental change is well suited for a study of the academy’s effectiveness in easing transitional tensions and facilitating students’ school engagement.

“Social cognitive theory is rooted in a view of human agency in which individuals are agents proactively engaged in their own development and can make things happen by their actions” (Pajares, 2002, par. 6). According to Bandura’s investigations and development of
social cognitive theory, the ability to self-reflect, is a uniquely human capability, enabled by other uniquely human processes: the ability to draw symbolic meaning from observations, the ability to process forethoughts of actions, and the ability to learn vicariously through observation. The cognitive ability to think abstractly, either in forethought or in reflection, drives the individual to certain levels of motivation. At the very center of social cognitive theory, are self-efficacy beliefs, "people's judgments of their capabilities to organize and execute courses of action required to attain designated types of performances" (Bandura, 1986, p. 391). When people perceive themselves to be capable of certain behaviors, they are likely to readily engage. Conversely, when they perceive themselves inept at a modeled behavior, they are reluctant to attempt attainment. Bandura’s (1997) foundational assertion regarding the role of self-efficacy beliefs in humans is that “people’s level of motivation, affective states, and actions are based more on what they believe rather than on what is objectively true” (p. 2). This explains why some people who think they are talented in certain areas, perform confidently, regardless of their actual talent; while others, who are capable, lack the confidence and or motivation to perform to their ability. The latter of the two scenarios can lead to a vicious cycle of underachievement. A program designed to engage students in their high school transition, should address methods of building self-efficacy beliefs in adolescents. Common planning time among interdisciplinary team members provided opportunity for teachers and staff to discuss observable behaviors and implement interventions within the first few weeks of school. Students’ perceptions of these interventions were of interest to the researcher in determining the efficacy of the program in engaging students and deferring apathy.
Self-efficacy beliefs provide the foundation for human motivation, well being, and personal accomplishment (Pajares, 2002). Self-efficacy beliefs are essential to achievement and are rooted in the core values of any effective transitional experience. As students respond to different personal, behavioral, and environmental factors in transition from middle to high school, their engagement in these experiences is determined by their self-efficacy beliefs. It is imperative, therefore, that this study investigate how the freshman academy fostered healthy development of self-efficacy beliefs in transitioning students.

The purpose of the freshmen academy was not merely to ease transition and accommodate the unique needs of grade nine students, but to equip students with skills and strategies necessary for future transitional experiences in schooling and in life. According to Pajares (2002), self-efficacy has been especially prominent in studies of educational constructs including but not limited to academic achievement, attributions of success and failure, and goal setting; and “researchers have established that self-efficacy beliefs and behavior changes and outcomes are highly correlated” (par. 33). With self-efficacy beliefs at the core of Bandura’s (1986) conception of reciprocal determinism, the lens of social cognition theory provided a clear lens through which to examine the literature, design, and data of this study as the researcher investigated how the freshmen academy experiences impacted student engagement.

Chapter 2: Literature Review

The review of literature for this study is based on the overarching research question: 

*How does the freshman academy experience influence students’ engagement in school?*

To explore current literature on the efficacy of the freshman academies in reducing the “grade nine bulge” through improved student engagement, this review is segmented into three areas.
The first area reviewed the history of studies documenting areas of difficulty facing many adolescents in their schooling transition experiences. Tying this body of research into both Piaget’s cognitive-stage theory and Bandura’s (1986) reciprocal determinism of social cognitive theory, the literature explored responded to the following question: Historically, what does the literature reveal about behavioral, cognitive, and environmental factors that impede grade nine transition of adolescents into high school? The review then examined literature on small learning communities, the purpose and historical context of their implementation. This body of literature responded to the following question: What does the literature reveal about the impact of small learning communities on student engagement? Finally, the last section of the literature review explored research studies of grade nine transition programs, including, but not limited to, a school-within-a school approach, the basis of the freshman academy of this study. This body of literature was aimed at revealing commonalities among grade nine transitional programming and responded to the following: What does the literature reveal about common best practices of freshman academies?

**Historical Background of Grade Nine Transition: Bulges in the Pipeline**

Historically, what does the literature reveal about behavioral, cognitive, and environmental factors that impede grade nine transition of adolescents into high school? Although there appears to be a dearth of research on the efficacy of the freshman academy approach in reducing the “grade nine bulge” in the schooling pipeline, extensive research exits illuminating the myriad of problems inherent in middle to high school transition. Researchers of adolescent psychology have identified and examined common impediments to school transitions that often lead to derailment and dropout.
The transition from middle to high school is particularly challenging for young adolescents; for some students, this challenge is insurmountable, signaling the termination of their formal education. Among researchers to study school transitions in the late 1970s were Blyth, Simmons, and Carlton-Ford (1983) who espoused the transition was difficult for above average performing students as well as those at risk, noting a dramatic decrease in attendance and grade point average among middle to high achieving middle school students upon transition to high school. In light of Piaget’s cognitive-stage theory, one could interpret this underachievement due to students’ inability to achieve a balance between assimilation and accommodation to meet equilibrium. These students may not be fully prepared socially or emotionally, although they are intellectually capable of attaining new knowledge. According to Bandura’s (1986) theory of reciprocal determinism, the interaction among the environment, the students’ behaviors, and personal factors determine the outcome. Underachievement among the more capable students may result from an imbalance in the dynamic interplay among reciprocal factors when students are thrust into a new unfamiliar environment.

The adjustment to a new environment is problematic for many adolescents and is compounded for those students who transition more than once in their middle schooling years. Eccles, Midgley, and Adler (1984) noted that difficulty in adjusting to schooling transitions in students as young as sixth grade significantly influencing their future achievement. Crockett et al. (1989) documented a decrease in GPAs among the 253 students in their study. They concluded that the frequency of students’ transitions in middle years of schooling, changing schools in sixth or seventh grade and again in ninth grade, significantly influenced lower achievement, as measured by GPA and attendance. In addition to their findings on reduced
performance, Crockett et al. (1989) also documented a negative impact of multiple school building transitions among middle school students’ self-perceptions, as measured by the Self-Image Questionnaire for Young Adolescents (SIQYA). As students changed schooling environments, from primary to middle school and again from middle to high school, their self-perceptions decreased more sharply upon each move. This study’s results correlated with Eccles, Midgley, and Alder’s (1984), substantiating environmental shifts as significant impediments to successful grade level transitions. Alspaugh’s (1998) study furthered this research by examining the impact of different school configurations on student achievement. He affirmed that achievement loss occurred when students changed school buildings, regardless of when they transitioned from one grade level school building to the next. He further established that achievement loss was more pronounced in students who had undergone multiple school building transitions; students who entered high school from a middle school had greater achievement loss than those entering high school from a K-8 district configuration. Barone, Aguiree-Deandreis, and Trickett (1991) also found that students transitioning from a junior high model to a traditional high school model experienced a decline in grades and reduced attendance; the decline in performance became progressively worse throughout the ninth grade year. In many large districts, including the one of this study, it is common for students to undergo several school building transitions in their early elementary and middle school years. Some students change schools as many as five times before entering high school as ninth graders.

Eccles and Midgley (1989); Eccles, Lord, and Midgley (1991) proposed stage-environment fit theory as one explanation of the profound achievement loss in adolescents’ schooling transitions. Their theory attests that adolescents’ rapid physiological changes and
psychological developmental stages constitute a specific set of needs that are not met in the traditional schooling environment. This “mismatch between the needs of developing adolescents and the opportunities afforded them by their social environments” (Eccles, Lord & Midgley, 1991, p. 90) is further compounded by the transitional experience, which is tumultuous for most adolescents. As students transition from one grade level to the next in a different building, the academic demands increase, adult support decreases, and student configurations often change as well. According to Eccles et al. (1991) most adolescents need close connections with adults and a supportive, positive peer network for successful transitions in middle and high school, yet, at this time in their lives, parents often provide less support. In addition, when students transition, their social networks are interrupted as the classroom configurations are restructured from heterogeneous to homogeneous ability groupings in many middle schools and in most high schools. Compounding this mismatch of adolescent developmental stage and transitioning environment, the building structures themselves pose a threat to one’s level of comfort and sense of connectedness.

Bandura (1978, 1986, 1989) views the learner as environmentally integrated, wherein cognitive responses, behaviors, and emotions create learning. Also of important consideration here is the ongoing synaptic pruning of the adolescent prefrontal cortex, most important for sophisticated thought processes and cognitive advances, improving the ability to regulate emotions and coordinate thoughts and feelings. Engaging students in active construction of new knowledge is a matter of urgency throughout this developmental stage (Steinberg, 2011). Unfortunately, at the time of high school transition, an abrupt disconnect between student comfort and school environment impedes academic engagement. Traditional high schools are
quite intimidating to entering students; the buildings are most often much larger and departmentally organized, requiring students travel farther distances between classes, increasing their chances of feeling overwhelmed and/or getting lost during their first days of high school. Eccles et al.’s (1991) study revealed a decrease in positive relationships among transitioning high school students, their parents, their teachers, and their peers, at a time when their needs are greatest.

Additional environmental, social, and emotional factors leading to student disengagement are noted in Lounsbury and Johnston’s (1985) study. Commissioned by the National Association of Secondary School Principals, Lounsbury and Johnston (1985) investigated ninth grade classes in forty-eight states and the District of Columbia. They revealed common instructional practices and institutional policies maligned with 14 year-olds’ developmental needs. They noted teacher-centered instruction, ability-group tracking, and 40-50 minute class periods among the practices most commonly in place that left students feeling disinterested in school. They also noted a lack of personalized guidance from adults in the school community as a leading cause of disengagement. Wheelock (1993) noted tedious lessons, overcrowded classrooms, and indifferent teachers as contributing factors to ninth graders’ disconnectedness to school. Students perceived teachers as unwelcoming to incoming freshmen. Despite numerous reform efforts aimed at personalizing the schooling process over the past two decades, the voices of Lounsbury and Johnston’s (1985) study still echo in hallways of many American public high schools. 

In addition to the obvious changes that children experience in relation to such things as school size, the number of teachers and the range of new subjects, the move from primary to secondary school also involves a transition between two radically different cultures of schooling
(Hargreaves, Earl, & Ryan, 1996). On one hand, the primary school culture emphasizes care and nurturance of students and offers a sense of belonging. On the other, the culture of the secondary school is oriented towards teaching academic subjects; it emphasizes differentiation of students according to achievement and produces experiences of fragmentation and isolation rather than cohesion and bonding. Eccles and Midgley (1989) espoused that adolescents’ budding independence and identities were constrained by the rigid, scheduled structure of traditionally organized schools, resulting in loss of achievement. Considering that the transitioning population of fourteen-year-olds will range in the continuum of Piaget’s formal operational period, the cultural adjustment is more severe for some than others, regardless of students’ cognitive readiness for more rigorous academics. This abrupt change in school cultures may lead some students down the path of isolation, exacerbating disinterest in school and disengagement in learning.

Not only do the philosophies of middle school and high school often contrast, the operational procedures of high schools are considerably more rigid than those of middle schools. Roeser et al. (1999) noted that the structure of most American high schools is at the core of transitioning problem, rather than isolating the social or developmental pressures among students. Eccles et al. (1993); Roeser et al. (1999) blame the industrial modeled choppiness of the standard high school schedule for some transition problems; a ringing bell signifying a change in classroom, teacher, and subject matter throughout the day fragments learning experiences and opportunity for interpersonal connections with teachers and peers. In addition, the larger size and more bureaucratic organizational infrastructure of most high school buildings
further amplifies the effects of larger class sizes and less personal contact among students and adults in the school community. Roeser et al. (1999) state:

Peer networks can be disrupted by the size and educational stratification of these institutions; and they can lose status as they go from being the oldest in the middle school to the youngest in the high school setting. For some, these changes can overtax their capacity to cope, thereby compromising academic and emotional functioning. (p. 141)

Simmons, Carlton-Ford, and Blyth (1987) further asserted that school size was linked to the achievement loss experienced at transition points and that larger schools had greater achievement loss than did smaller ones.

Achievement loss is not the only measure of difficulty for adolescents journeying to high school. As Crocket et al. (1989) noted in their study of middle school transition and student self-perceptions, Simmons et al. (1987) and Mac Iver (1990) also found a decrease in students’ self-esteem as they transitioned to high school. These researchers noted students feeling overwhelmed in adjustment to grade level and building changes. The combination of social adjustments in conjunction with academic focus on grade point averages and class ranks, depleted some students’ desire to learn. Their initial negative transitional experiences profoundly impacted their intrinsic motivation to learn and succeed in high school (Mac Iver, 1990). Simmons and Blyth (1987) added that children dealing with life-changing events such as their parents’ divorce or remarriage, older siblings leaving home, or the death of a family member are at a higher risk of experiencing transitional difficulty.

Transitional problems manifest themselves in adolescents in a number of ways, including but not limited to, achievement loss as measured by academic performance and attendance. For
some students transitional difficulties ease through a period of adjustment; however, for many, particularly those with limited adult support systems in place, the transitional experience can be insurmountable, resulting in terminal academic failure.

The most disturbing outcome of high school transition difficulty is the increase in dropout rates, as evinced by the “grade nine bulge” detailed in Haney et al.’s (2004) report entitled “The Educational Pipeline in the United States 1970-2000.” This examination of state-reported enrollment data over a thirty-year period illuminates the problematic ninth grade bulge increase; the number of students who were not promoted to tenth grade from ninth grade tripled between the years of 1970 and 2000. Many students who end up dropping out at some point during their high school career first become disengaged during their troublesome ninth grade transition. Neild, Stoner-Eby, and Furstenberg (2001), in a ten-year longitudinal study of Philadelphia’s public schools, noted that students who repeated ninth grade were at an increased risk of dropping out of school within the next three years; in fact, 57% of retained ninth graders in their study failed to graduate from high school. Even after controlling for pre-existing factors such as demographics and middle school performance, poor ninth grade performance compounded the probability of high school drop out among Philadelphia’s urban youth (Neild et al., 2001). Anderson (1997) found similar problems in Chicago, citing that more than 40% of Chicago freshmen fail at least one major subject, trapping them in the pipeline bulge. Contrary to Alspaugh (2000) and Schiller (1999), who espoused the frequency of middle year grade level building changes as a key determinant to ninth grade transitional difficulties, Anderson (1997) claims the anonymity and complexity of large high schools as most problematic for ninth grade students journeying to high school. Neild et al. (2001) affirmed that there are “specific points
where degree completion hangs in the balance; difficulty in navigating of these treacherous waters, even for individuals who looked similar in other respect at the time of entrance to high school, substantially increases the probability of leaving high school without ever finishing” (p. 29-30).

Donegan (2008) refers to freshmen year of high school as the “linchpin year” and claims “the educational level of a high school freshman is a critical turning point in a student’s educational career” (p. 54). Likewise, Akos and Galassi (2004) and Smith, Akos, Lim, and Wiley (2008) discuss ninth grade core academic requirements as perceived the most difficult of all courses for high school students. Christie (2008) further attests that high school freshmen year is seemingly impossible for students who are ill prepared to meet the academic demands of more rigorous coursework in rigidly structured schedules.

The literature has well established that high school transition for first time ninth graders is problematic, resulting in diminished students’ self-esteem and decreased academic performance, leading to disengagement. Studies have been conclusive in determining factors contributing to problematic transition, indicating that a combination of social, academic, and environmental adjustments cause a triad of stressors as ninth grade signals the journey to a new, often larger, industrial-modeled high school building and schedule (Lounsbury & Johnston, 1985; Eccles et al., 1991; Roeser et al., 1999). For those students who cannot surmount their problematic ninth grade transition, high school drop out looms on the horizon. Adolescents’ social and emotional developmental transitions are complicated by abrupt physical changes in their schooling environments, along with a major increase in the difficulty of academic work (Wigfield, Eccles, & Pintrich, 1996). Zimmerman and Cleary (2006) espoused that students who
fail to meet the demands of high school transition have not acquired self-regulation in setting goals and managing their time. As their academic grades decline, they lose belief in themselves as successful students. This deflated sense of self leads some adolescents in a downward cycle of academic achievement in which they align themselves with peers who have attained unfavorable views on the value of learning and importance of education (Steinberg, Brown, & Dornbusch, 1996). Recently released statistics, cited by President Barak Obama in March of 2010, indicate that the US currently has a 68% high school completion rate; more than 30% of our children drop out of high school. The most alarming drop out rates lie among our urban poor, where less than 50% of ninth graders ever reach graduation day (Neild et al., 2001). Such alarming statistics warrant national attention; however, the problem is not solely indigenous to this demographic, as many suburban high schools have also noted significant disengagement among their students, resulting in notably reduced enrollment between grade nine and grade twelve (Blyth, Simmons, & Carlton-Ford, 1983; Roderick and Camburn, 1999; Reents, 2002; Neild, 2003).

Adolescent psychologists have long established that students need to have a positive view of school and of themselves as connected members of the school community to become fully engaged participants in their education, embracing the school’s mission and culture (Eccles & Midgley, 1989; Eccles et al., 1993; Mac Iver, 1990; Mizelle & Irvin, 2000). Yet, American public high schools have done little to remedy the structural problems at the root of student disengagement, leaving the industrial model schedule and academic tracking practices untouchables in school reform efforts. Although the structural components have been minimally addressed, much has been done to address the anonymity felt by most transitioning ninth graders
and many high school students in attendance at large schooling facilities. This body of literature has illustrated that transitioning from smaller, more personalized middle school settings to larger, impersonal comprehensive high schools, is an experience riddled with impediments for most adolescents. Fortunately, there has been a movement in recent decades to establish small learning communities (SLCs) within larger facilities. Some of these SLCs are in the form of programming for the entire school population, while others include separate schooling facilities, smaller high schools designed especially for ninth grade. The next segment of this literature review explored SLCs, aimed at personalizing students’ high school experiences.

Small Learning Communities Personalize and Engage

What does the literature reveal about the history of small learning communities and their impact on student engagement? Impediments to successful high school transition significantly swell the grade nine-pipeline bulge, a proven indicator to high school dropout. Factors determined prominent in student disengagement or lack of connectedness to one’s school result from feelings of overwhelming academic, social, and institutional pressures during the transitional ninth grade year. As previously stated, little has been done to modify the fundamental structure of the traditional American high school; however, there has been a drive to personalize these large public schooling institutions through implementation of small learning communities. What is the history behind the small learning community movement in public education, and how has the acronym SLC become commonplace edujargon in recent decades? Is the implementation of SLCs within large public high schools effective in initiating and sustaining student engagement, thus reducing dropout rates?
As previously established, school size is one major contributing factor leading to the disengagement and eventual lack of success of many high school students. High schools are traditionally larger structural environments than middle and elementary schools, and they are often farther in distance from a students’ home, removing the neighborly familiarity many students may have experienced in previous schooling experiences. Hoffman (2003) reported the average populations in a US elementary school during 2001-2002 was 441 students, compared to an average of 612 students in middle schools and 753 students in high schools. He also noted that many high schools enrolled more than 1,000 students, and several had populations of more than 3,000. Allen (2002) established that more than 70 % of US high school students were enrolled in schools with populations of more than 1,000 students. Students leaping from smaller classes and smaller school populations into larger, more heavily and often overly populated high schools are likely to feel intimidated and insignificant.

Cotton (1996) attested that American public high schools had been increasing in size and capacity for the past several decades, a drive beginning in the 1950’s and running through the 1990’s, despite proliferating studies evincing benefits of smaller learning environments. Opponents to small schools claimed that larger, more comprehensive high schools host more academic and extracurricular activities for their students. James Conant’s 1959 book titled The American High School Today, acclaimed the “bigger is better” philosophy, the running theory in high school management, as district superintendents considered the larger, comprehensive high school plant a more efficient model for education. In fact, Conant (1959) urged district administrators to consolidate school building facilities as a means of allowing schools to offer wider curricular choices while functioning more cost effectively. Even though the large schools
that Conant advocated for would be those of 400-500 students in the 1950’s, it is commonplace today to consider a large high school one of a 2,000 to 4,000-pupil student body population (Cotton, 1996).

Examining these findings in light of Bandura’s (1986) theory of reciprocal determinism in developing self-efficacy beliefs, it stands to reason that as school sizes increased throughout the past several decades, personalization decreased, and students felt less connected to their schools. The interplay among environment, cognition, and behavior of the adolescent in transition was imbalanced with students feeling emotionally disconnected from their learning environments. Newman (1992) echoed the voices of Lounsbury & Johnston (1985), Mac Iver (1990), and Eccles et al. (1991), stating that lack of personal connectedness to one’s school reduced a student’s academic engagement. Also espousing that student disengagement was due to school size and structure, Vander Ark (2002) iterated:

Our schools are not failing – they are obsolete. They foster anonymity and stifle learning by systematically inhibiting those things that are most important; powerful sustained relationships, students’ ability to address complex problems individually and as members of a team and to communicate in various ways: and the ability of teachers and administrators to take on increasing responsibility. (p. 56)

The large industrial modeled schools with inflexible scheduling of 45-50 minute class periods were not conducive to personalized instruction and project-based learning in the 1990s, nor are they today. Raywid’s (1996) research substantiated that the trend towards larger schools was detrimental to student’s personal agency. She reported that students who attended small high schools generally attained higher achievement, and smaller schools reported higher graduation
and lower dropout rates. Raywid also noted that students, teachers, and parents perceived greater satisfaction in smaller high school settings. McAndrews and Anderson (2002) attested that the average national dropout rate for high schools with more than 1,000 students was 6.3 %, whereas the same rates for schools of fewer than 200 students is 3.4 %, establishing a consistent school size-graduation rate correlation. Smaller schools and smaller learning communities reap many benefits for student involvement through more personal contact with teachers, closer supervision of students by staff, and more opportunities for student involvement in school activities. Smaller high schools also reported fewer disciplinary infractions than their larger counterparts. Raywid’s (1996) findings shed light on importance of self-perception in self-regulatory procedures and the development of self-efficacy beliefs in adolescents. Students perceived greater satisfaction in smaller learning environments; therefore, their performance was greater. Students in smaller settings felt more connected to their teachers and peers, and their sense of belonging contributed to a sense of relevancy in their schooling experiences.

Smaller schools and smaller learning communities feature more hospitable climates and facilitate better student engagement through personalization than their larger counterparts; however, larger facilities can offer varied programming options more cost effectively than smaller ones. Thus, the momentum to build large, comprehensive facilities continued through the 1990’s. In light of the research on the benefits of smaller schools, and the unlikelihood of the current school building structures to be replaced with smaller ones, the creation of SLCs, proposed to infuse more personalization in large, comprehensive facilities, has surfaced as a viable solution to student disengagement.
The publication Theodore Sizer’s (1984) *Horace’s Compromise* influenced the SLC movement of 1990s and 2000s. Sizer and his team of researchers conducted a thorough investigation of eighty high schools of differing demographics and geographic locations (public, private, parochial, urban, rural) in a five-year *Study of High Schools*. They conducted numerous interviews with teachers, students, parents, and administrators; additionally, they performed routine building and classrooms observations and analyzed the schools’ documents. Their findings concluded that the philosophies and structures of large, bureaucratic schools impaired students’ ability to attain and apply new knowledge. Sizer and his team documented a number of impediments to learning, from the truncated 50-minute class period to the overemphasis on high school athletic programs. However, the most significant conclusion of the study was the team’s continued observation that large, bureaucratic schools were impersonal, and students in these schools failed to develop close relationships with teachers and staff that fostered meaningful learning opportunities. Sizer emphasized the importance of effective teachers working as coaches with their students. He advocated a constructivist approach to learning in which teachers facilitated students’ ability to construct meaningful knowledge, emphasizing depth over breadth in content coverage and open discourse among students and instructors, rather than traditional lecture-based instruction in which the teacher disseminated knowledge.

Essentially, *Horace’s Compromise* launched an assault on the bureaucratic institutionalization and depersonalization of American high schools, using a dual form of narrative in which Sizer detailed factual information from schools he visited along with fictional summaries and archetypal characters. “Horace” is Sizer’s archetype teacher, a creative, committed, caring high school English teacher, who becomes dehumanized by his working
conditions, and eventually compromises his standards, accepting meritocracy in himself, his students, and his school. *Horace’s Compromise* not only illustrated ubiquitous, problematic procedures and practices in American high schools, but offered sound solutions. The final section of *Horace’s Compromise*, subtitled “The Structure,” outlines the following five imperatives for better schools:

1. Give room to teachers and students to work and learn in their own, appropriate ways.

2. Insist that students clearly exhibit mastery of their schoolwork.

3. Get the incentives right, for students and for teachers.

4. Focus the students’ work on the use of their minds.

5. Keep the structure simple and thus flexible. (214)

The publication of *Horace’s Compromise* directed the creation of the Coalition for Essential Schools, a reform organization founded by Sizer, aimed at facilitating close peer-to-peer and student-to-teacher relationships, characterized by personalized learning environments. In 1984 the Coalition included twelve schools and was run out of Brown University. However, as the movement expanded, regional offices were set up around the country. These regional offices have been managed out of Oakland, CA, since 1997.

The coalition was founded on these nine essential principles:

1. Learning to use one’s mind well

2. Less is more, depth over coverage

3. Goals apply to all students

4. Personalization

5. Student-as-worker, teacher-as-coach
6. Demonstration of mastery
7. A tone of decency and trust
8. Commitment to the entire school
9. Resources dedicated to teaching and learning

In 1996, the National Association of Secondary School Principals (NASSP) published *Breaking Ranks: Changing an American Institution*, reporting the need to aggressively reform American high schools. “‘Breaking Ranks’ was the metaphor selected to represent the need to break from the all-too-familiar and often unproductive patterns of the past” (Sizer, 2004, p.xii).

Amid its recommendations, the authors of *Breaking Ranks* highlighted a variety of commonplace practices contributing to the depersonalization of traditional high schools. The report also suggested breaking large schools into smaller units. NASSP further refined its 1996 recommendations for reform, and in 2004 and published *Breaking Ranks II: Strategies for Leading High School Reform* in collaboration with the Education Alliance of Brown University and its Center for Secondary School Redesign. Sizer’s (2004) foreword in *Breaking Ranks II: Strategies for Leading High School Reform*, reverberates the theme of *Horace’s Compromise*: “Personalization is a necessity … student anonymity must end, whatever it takes” (p.xi). The report makes explicit recommendations to redesign American high schools, addressing three interrelated themes: collaborative leadership, personalizing the school environment, and curriculum, instruction and assessment. The following diagram by John Clarke clearly illustrates *Breaking Ranks II*’s overarching spheres of redesign recommendations, with increased student performance at the center:
Figure 1. Overarching Spheres of Redesign illustrates a reciprocal interconnection among three spheres, ideally leading to improved student performance through personalization of fully implemented SLCs.

*Breaking Ranks II* action plan for reform states that institutions must provide more personalized and engaging learning environments for students, restructure curriculum and instruction to ensure that all students have the opportunity to achieve higher standards of performance, and use data to support ongoing student centered and personalized programs, support services and intellectual rigor. In addition to clarifying reform recommendations, *Breaking Ranks II* also elucidated the definition of personalized instruction: “A learning process in which schools help students assess their own talents and aspirations, plan a pathway toward their own purposes, work cooperatively with others on challenging tasks, maintain a record of their explorations, demonstrate their learning against clear standards in a wide variety of media, all with the close support of adult mentors and guides” (Clarke, 2003. p.15).
The US Department of Education’s Smaller Learning Communities (SLC) Grants Program assists large high schools, of more than 1,000 students with funding to implement and enhance SLCs. Although the need for SLCs has been established in the literature, what accurate defines a SLC? Cotton (2001) defines a small learning community as “any separately defined, individualized learning unit within a larger school setting … [wherein] students and teachers are scheduled together and frequently have a common area of the school in which to hold most or all of their classes” (p. 7). SLCs are sometimes referred to schools-within-a school (SWAS), schools-within-a-building (SWAB), clusters, pod, academies, or houses (Cotton, 2001). Raywid (1998) noted ambiguity in identifying specific elements of a SLC, as the organizational structures vary among schools, depending on districts’ configurations. Regardless of terminology, small instructional settings are conducive to fostering a sense of connectedness to school. The U.S. Department of Education has clearly outlined its criteria for schools meeting SLC grant funds, and has contracted with Northwest Regional Educational Laboratory (NWREL) to provide technical assistance to schools in receipt its funding. NWREL works closely with several regional educational laboratories and one comprehensive center, ensuring national capacity in providing services to SLC Grant funded schools. The Education Alliance at Brown University (currently CSSR) is the technical assistance provider in the Northeast, and provided assistance to the school of this study in the design and implementation of its freshman academy. As previously stated, SLC Grant funding was awarded in this freshman academy’s third year of implementation.
Transforming a traditionally structured large high school into a SLC requires more than funding and reallocation of district resources. According to Diana Oxley (2008) of NWREL, the following five domains of practice are essential in transforming high schools into SLCs:

1. Interdisciplinary teaching and learning teams
2. Rigorous, relevant curriculum and instruction
3. Inclusive program and instructional practices
4. SLC-based continuous program improvement
5. Building and district support for SLCs

The literature of SLC movement, from 1984 to present substantiates the validity of SLCs in secondary school redesign. Hundreds of SLCs have been created in urban areas, including Chicago, Denver, Los Angeles, New York, Philadelphia, Seattle, and Ohio. Smaller environments facilitate the opportunities for collegiality among teachers, personalized teacher-student relationships, and curricula redesign (Raywid, 1996; Cotton, 2001). The numerous recommendations and essential components prescribed to effectively transform high schools into SLCs requires ongoing reevaluation of each SLCs problematic areas and best practices, to ensure forward momentum in transforming schools into viable, constructive learning environments that will prepare students for lifelong active participation in an ever-changing global society.

The following body of literature will explore SLCs that have been specifically designed for high school freshmen to shed light on common best practices in easing ninth grade transition, improving achievement, and reducing retention.

**Grade Nine Transitioning Programs: Relief Valves in the Pipeline**
What does the current literature reveal about common best practices of freshman academies? The first year of high school is pivotal, and the transition into high school is often characterized as a time when students experience a decline in grades and attendance (Barone, Aguirre-Deandres, & Trickett, 1991; Isakson & Jarvis, 1999). Many high school freshmen complain of boredom, confusing schedules, overly difficult coursework, and uncaring, disinterested teachers in an inhospitable environment (Mizelle & Irvin, 2000, Wheelock & Miao, 1993). Adolescents, during this critical developmental stage, require a sense of belonging and control over their new environment (Eccles and Midgley, 1989; Eccles et al., 1993; Hertzog & Morgan, 1998; Isakson & Jarvis, 1999; Akos & Galassi, 2004). Although a hospitable environment is an important factor in creating a sense of connectedness to school, students must also be cognitively stimulated in building new knowledge through their prior experiences within current context.

Over the past four decades, the literature on the isolated needs of ninth graders in high school transition has been prolific. National focus on SLCs and their benefits to student engagement has been established. Within the past decade and a half, the implementation of grade nine specific SLCs have surfaced as a solution to easing the “grade nine bulge”. An examination of the literature reveals numerous models of stand alone and school-within-a-school grade nine transitioning programs. While some are dubbed freshman academies, others are not. Some programs limit their participants to at-risk students, while others include all ninth graders in a district’s student body. While the organizational structures of these freshman academies vary, their missions appear unified in theory and address the imperative need to support ninth graders in transition from middle to high school, to ensure their first high school year’s success, and
ultimately reduce high school drop out rates. The following body of literature explores some popular freshman academy models.

Yale University’s Project Transition was the first study of the effect of isolating high school freshmen on academic achievement and is referred to as the predecessor of John Hopkins University’s Talent Development High School reform effort, first initiated in Baltimore, MD and later adopted by several urban districts, including Philadelphia. Herlihy’s (2007) brief discusses The Talent Development High School model in five high schools in Philadelphia and its predecessor, Project Transition, piloted in one Milwaukee and one Kansas City district. The Talent Development model’s strategy for addressing ninth-grade transitional impediments featured the following program components:

1. The separate setting of Ninth Grade Success Academies, a separate floor or wing of the building with its own entrance when possible.
2. Small learning communities led by teams of teachers who shared common planning time.
3. Student supports and incentives for student to attend school regularly.
4. Specialized “catch-up” curriculum and extended block schedule for enrichment in math and English.
5. Coaching and professional development of staff in extended block scheduling and interdisciplinary instructional design.
6. The Twilight Academy, designed for “repeater” ninth graders who needed added support or an alternative environmental setting.
The findings of the Talent Development model showed positive gains in attendance, academic course credits earned, and promotion rates of first time ninth graders. The comprehensive design provides environmental, cognitive, and behavioral support systems. Herlihy (2007) notes that when high schools integrate structural reforms with instructional and curricular reforms “students can only strengthen their academic achievement and long-term success in high school (p. 6). Yale University’s Project Transition, Talent Development’s predecessor, focused primarily on structural reforms: SLCs, student-teacher teams, and common planning time for teachers, but it did not include the specialized curricula, prescribed instructional methods, and the twilight academy, fundamental components of the Talent Development model.

Reents (2002) highlighted the successes of several ninth grade academies in Houston, TX, Rochester, NY, and Cache County, UT. Each of these models was uniquely structured, yet all three yielded successful results by isolating ninth graders from the general grade ten-twelve population for academic classes. While there appears to be a wide variety of structural models of the freshman academy, both stand-alone and school-within-a-school, the ultimate goal of isolating high school freshmen is to aggressively address the clearly identified “mismatch between the needs of developing adolescents and the opportunities afforded them by their social environments” (Midgley et al., 1993). The challenge in implementing effective transition programs is complex and as diverse as the many populations in attendance in America’s public schools. Additionally, issues in urban, suburban, and rural communities, indigenous to specific regions of the country vary in degree of significance as impediments to successful high school transition: “The middle to high school transition issue cannot be approached through a one-size-fits-all mentality. Rather, it demands a variety of adaptable approaches for the greatest positive
effect” (Cohen & Smerdon, 2009, p. 180). Comprehensive, fully implemented transitional programs yield the best results; however, not all districts have ample resources to design and implement a comprehensive program. In fact, smaller schools do not qualify for federal SLC grant monies used by larger, urban communities like those of the Talent Development model.

Clark and Hunley (2007) discuss a small Kentucky district’s freshman academy, which was designed and implemented without the aid of a grant or outside resources. This particular academy model incorporated the middle school model by providing two-semester classes, short periods, and a team-teaching approach. Freshmen were separated from the general population for most of their day, team-taught in a separate wing of the school for core academic courses. Team teachers were given autonomy to flexibly design their schedules, facilitating longer classes for specialized instruction, science labs, video presentation, awards celebrations, etc. In addition to the four core classes, teams scheduled weekly test prep classes, focused on reading comprehension, basic grammar, math computation, and problem solving skills. Upon initial program evaluation, special programs were developed by the district’s Family Resource Center “that encourage, empower, and give a sense of belonging to high-risk students. This approach led to improved attendance and behavior” (p. 45). Since the implementation of its freshman academy, this district consistently reported improved attendance rates, decreased discipline referrals, and increased standardized test scores.

Hall, Holland, Karsh, and Wang (2011) discuss a freshman academy in West Fargo, North Dakota. The Sheyenne Ninth Grade Center is a separate school building, with its own administration, running independently of the high school. The building was initially constructed to alleviate overcrowding in the high school, keeping an option open to convert the freshman
school into a separate high school if the freshman academy implementation proved unsuccessful. In addition to housing ninth graders in separate school building, a number of other procedures were implemented. Students were placed on interdisciplinary teams in minihouses, and class sizes were reduced. Additionally, team meetings of students and staff were held daily, encouraging open discourse among staff and students, building a more personalized sense of belonging for students. Results of the study revealed tremendous gains in students’ GPA’s from 2006-2010. Staff perceived the seclusion of ninth graders conducive to their academic focus, as students were not concerned with acceptance of upperclassmen. The increase in GPA’s among ninth graders indicated that students would matriculate into the high school with more credits earned; thus they are more likely to reach graduation day on time alongside their peers. Although this study’s results were promising, not all participants felt seclusion of ninth grade was a viable solution to easing high school transition. In fact, many opposed the segregation as a handicap, eliminating ninth graders from traditional high school experiences, and only delaying transitional difficulties.

Dudley High School in North Carolina began its freshman academy in 1999, enrolling only 100 of its “high risk” students. The academy’s success in decreasing retention and discipline issues and improving student achievement warranted the expansion of the academy to include all ninth graders. Muhlenberg South High School in Greenville, KY noted similar benefits to many other freshman academies: increased attendance, decreased retention, and fewer discipline referrals. Muhlenberg also noted a dramatic improvement in standardized test scores, improving nineteen percentile points within the academy’s first year of implementation (Clark & Hunley, 2007). Houston County High School in Georgia created its freshman academy, titled
High School 101, when over 60% of the school’s discipline referrals were of ninth graders. Six years into program implementation, the school’s principal reported discipline incidents down 55% and grade retentions reduced 46% (Chmelynski, 2004).

Despite variations in needs among specific school populations and the availability of building and financial resources to establish a freshman academy, there are several components noted more successful than others in easing high school transition, ensuring that freshman earn their course credits and move on to sophomore year. Pairing structural supports with specialized curricula reform will yield the best results in easing transition and engaging students. High achieving middle schoolers often lose interest in high school, as indicated in increased absences and lower scores (Blyth, Simmons, & Carlton-Ford, 1983). Keeping them interested in school by clarifying its relevancy in future aspirations is vitally important. A recommended instructional model of freshmen academies that facilitates more personal interactions and development of self-agency among students is the freshman academy SLC. Early identification of an imbalance among social, cognitive, and environmental factors necessary for healthy development of self-agency provides opportunity for intervention.

On its Breaking Ranks Process Activities webpage, CSSR suggests twelve essential components of a successful ninth grade transitional SLC. The following list is compiled in order of both difficulty of implementation and likelihood of positively impacting student performance:

1. Gather eighth grade data
2. Establish a summer bridge program
3. Provide a freshman orientation program
4. Support extra curricular opportunities
5. Implement an advisor/advisee program
6. Provide tutoring and support
7. Establish a twilight school – for credit and concurrent support
8. Create a Freshman Academy
9. Be sure that teachers of freshmen are united (TOFU)
10. Incorporate a freshman seminar class
11. Team students with a matched set of teamed teachers
12. Appropriately modify staffing and scheduling  (p. 1)

CSSR recognizes that designing and implementing a freshman academy inclusive of all twelve components will take time, and ongoing support of school staff, district administrators, parents, and the school community at large. As a result, the definition of what constitutes a viable freshman academy varies widely among school districts in urban, suburban, and rural communities.

In some districts, the freshman academy is a program designed for at risk middle school students, who enroll in enrichment courses in math and literacy to “catch up”. In other communities, the freshmen are housed in separate school buildings. While this model eliminates the overwhelmed feelings of insignificance a ninth grader often has upon entering high school, it adds another school building transition into a child’s experiences and may just defer the traumatic entry into the “big” high school. As Alspaugh (2000) and Schiller (1999) posit, frequent school building transitions increase the likelihood of students losing interest and becoming disengaged. In some districts, ninth grade academies are set up within the current high school, but housed in a separate wing. Whether students are housed in a separate building or
separate wing of a large school, Reents (2002) reports numerous advantages and cites several studies claiming the benefits of isolating ninth graders. Hertzog (1998) believes it is most crucial to isolate ninth graders, noting the sharp contrast between eighth and ninth grade teaching philosophies and middle and high school cultures as a leading cause of academic derailment of high school freshmen.

As previously established in the literature and theoretical framework, students’ self-perceptions as capable, competent members of a learning community is vital to their high school engagement and overall achievement. Truly effective freshman transition programs provide ongoing personalized support of transitioning students while fostering the development of self-regulation and building self-efficacy beliefs among students. When implemented in accordance to guidelines outlined by NASSP and CSSR, a well run, well-staffed, well-supported freshman academy serves as an effective relief valve of the grade nine pipeline bulge. However, there is no one solution that works best for all communities. Hertzog, in a 2004 interview with Carol Chmelynski, affirms one essential component of a successful transition program is its unique design, meeting the needs of its specific community: “You can’t template a successful transition; what works for one group, might not work for another. Data is out there that shows if we can get kids to the tenth grade they will probably graduate from high school” (p. 50).

Educators implementing freshman academies must consider the specific vulnerabilities of developing adolescents as they design transitional programs that meet the needs of their students, prepare them for more rigorous academics, and support them socially and emotionally in an environment that fosters students’ self-agency. Continued research on the efficacy of freshman academies in initializing and sustaining student engagement is warranted: “There is a lack of
research on the effectiveness of comprehensive transition programs and long-range planning in terms of the actual differences they make in students’ success in and out of school” (Dedmond et al., 2006, p.6-7). The unique design of this study’s freshman academy, in which students are on teams, but not separated from the rest of the school population, adds to the current literature on the efficacy of freshman academies.

Literature Summary

This literature review makes several assertions central to this study of one large southeastern Massachusetts suburban high school’s freshman academy. First, ninth grade is a year fraught with difficulty for most American high school students for a variety of developmental, social, cognitive, and environmental reasons. Second, engagement in schooling is essential for optimal success in high school and beyond. Third, SLCs benefit student engagement by facilitating closer relationships among students, teachers, and peers. SLCs provide more hospitable academic settings and alleviate some of the social and environmental impediments to learning that plague large, industrial modeled high schools, thus providing students with more opportunities to become involved in academics and extra-curricular activities. Finally, a fairly recent movement to implement freshman academies has resulted in a wide variety of academy model designs. Those that have been studied report improved attendance, reduced disciplinary infractions, and fewer course failures among first time high school freshmen, thus decreasing high school dropout rates.

Research Design

Research Questions. Problematic grade nine transition continues to plague US high schools, leading to the nation’s 30 % dropout rate (Bureau of Census DOC, 2011). There are a
number of factors that influence transitional difficulties of adolescents, who at age fourteen, should be advancing toward equilibration of Piaget’s formal operational stage of development, acquiring abstract thought processing and deductive reasoning skills. Students are within a broad range of this stage’s continuum based on their prior experiences, cognitive functioning, and emotional readiness (Miller, 2002). Simultaneously, their adolescent bodies are developing into adulthood at a rapid pace (Eccles & Midgley, 1989; Eccles, Midgley & Adler, 1984; Steinberg, 2010). In the midst of this physical and emotional maelstrom, ninth graders experience the most abrupt environmental change in their schooling. (Blyth, Simmons & Carlton-Ford, 1983; Mac Iver, 1990; Eccles, Lord & Midgley, 1991; Alspaugh, 1998; Wheelock & Miao, 2005). As students respond to different personal, behavioral, and environmental factors in transition from middle to high school, their engagement is influenced by the reciprocal determinism of these factors (Bandura, 1986, 1989, 2006; Schunk & Meece, 2006; Pajares, 2006). An effective freshman academy fosters students’ sense of self-agency by engaging its students emotionally and cognitively in a hospitable environment that is staffed by personable teachers and staff (Felner, Primavera, & Cauce, 1981; Barone et al., 1991; Roeser et al., 1999, Akos & Galassi, 2004; Black, 2004; Zimmerman & Cleary, 2006; Patterson, Beltvukova, Berman & Francis, 2007).

The implementation of freshman academies has risen in popularity over the past decade and a half as a solution to problematic high school transition (NASSP, 2004; Dedmond et al., 2006; Cohen & Smerdon, 2009). The size of a school and specific demographics of a community have resulted in a broad range of academy designs, some eligible and funded by federal SLC grants, others district funded (Raywid, 1996; Cotton, 2001). While there are
hundreds of freshman academies currently operating, the majority of research is on large urban school districts, where ninth graders have been isolated from the upperclassmen population (Reents, 2002). There is a dearth of research on the efficacy of suburban and rural community freshman academy models’ impact on student engagement (Dedmond et al., 2006).

Following Creswell’s (2007) recommendation to reduce one’s research study to one overarching question, followed by several sub questions, the following single question guided this study: *How does the freshman academy experience influence students’ engagement in school?* Addressing this question comprehensively, the study incorporated qualitative and quantitative inquiry, further detailed in the sub questions below. The independent variables were the student participants who had completed a year in the freshman academy. The dependent variables were the students’ affective and cognitive engagement as revealed by students’ students’ self-reported sense of connectedness to school, and students’ and teachers’ perceptions of the academy’s practices. This data was collected through document analysis, Appleton et al.’s (2006) Student Engagement Instrument (SEI), and student and teacher focus group interviews.

**Sub questions:**

a. *What are the students’ self-reported perceptions of their cognitive and affective engagement in high school?*

This quantitative inquiry was calculated through survey results, measuring students’ levels of cognitive engagement (perceived relevance of school) and affective engagement (perceived connection with others at school). Here the students’ self-reported perceptions were the independent variables and the measures of affective and cognitive engagement were the dependant variables.
b. *What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?*

c. *What are the staff’s perceptions of the academy’s practices in facilitating and/or impeding student engagement?*

These qualitative inquiries were measured through data collected during two focus group interviews, one with staff and another with students. Responses to open-ended questions regarding each stakeholder group’s perceptions of students’ freshman academy experiences and staff’s common practices were recorded, transcribed, and coded. Coded dialogue was analyzed for emerging themes. The purpose of this data was to highlight effective student engagement practices of the freshman academy and to hear the voices of those students who had transitioned into and out of the freshman academy. Additionally, this data revealed teachers’ perceptions, allowing ample reflection and discussion on their successful practices, while illuminating areas warranting further attention to ensure the program’s forward momentum.

Investigation of these three sub questions, through the lenses of Piaget’s cognitive-stage theory required consideration of the students’ stage of development, somewhere on the continuum of late adolescence. During this final stage of childhood, humans acquire abstract, deductive reasoning skills. Bandura’s social cognition theory includes the foundation of human agency, of which self-efficacy beliefs are central: “This core belief is the foundation of human motivation, well-being, and accomplishments” (Bandura, 2006, p.3). The reciprocal interplay among environmental, biological, and behavioral factors significantly influences the development of self-efficacy beliefs. Therefore, it was imperative that this study examined how the academy fosters development of human agency in adolescents.
Chapter 3: Methodology

Research Tradition:

A concurrent triangulated mixed-method design was appropriate for probing the overarching research question: How does the freshman academy experience influence students’ engagement in school? In a concurrent triangulation design the “weight is equal between the two methods” (Creswell, 2009, p. 213). Neither the SEI survey results, nor the focus group interviews bear more weight, but rather, both methods were “used to study the same phenomenon to determine if the two converge upon a single understanding of the research problem being investigated” (Fraenkel and Wallen, 2009, p. 561). In this design, qualitative and quantitative approaches were used to “confirm, cross-validate, or corroborate findings within a single study” (Creswell et al., 2003, p. 229). The researcher applied both quantitative and qualitative inquiry “to explore relationships between variables in depth” (Fraenkel and Wallen, 2009, p. 558).

The freshman academy had been in place for several years, with few significant modifications since its third year addition of a housemaster and additional special education staff, afforded by SLC grant funding. This was an appropriate time to study how and to what degree the academy influenced student engagement. Examination of the program goals, school records, and students’ and staff members’ perceptions provided a more valid understanding of what the academy did to engage students in the transitional process and how these practices facilitated and/or impeded sustained student engagement in high school.

Figure 2. is a diagram of a concurrent triangulation design, which illustrates equal weight to both qualitative and quantitative approaches to this study’s research question.
The unique infrastructure of this freshman academy model suggested that more than a survey was needed to measure its influence on student engagement. In addition to the unique design of the academy, seven years into implementation, common practices had become embedded in the program through administrative mandates and minimal staff turnover during the 2009-2011 school years. These factors converged to provide a solid foundation for a study of the academy’s impact on student engagement.

This study reported students’ self-reported perceptions of cognitive and affective engagement in school using Appleton et al.’s (2006) Student Engagement Instrument (SEI). In addition, this study recorded the voices of students who had completed one year in the academy, sharing their freshmen transitional experiences and their perceptions of the freshman academy practices. Additionally, staff members’ voiced perceptions of students’ transitional impediments and academy practices were recorded. The researcher examined the convergence and divergence of students’ self-reported measures of school engagement with the voiced perceptions of the students and staff, providing authentic input and unique insights for robust data analysis. School document analysis included examination of the program’s goals, school policies regarding attendance, and core course retention rates of freshmen since the program’s inception. These data
enhanced a rich description of the research site and its participants. The SEI survey revealed students’ self-measured cognitive and affective/psychological school engagement. These data were numeric and quantitative in nature. Other numeric data included school demographics, participant profiles, attendance rates, and course retentions.

Document analysis of program goals and school policies was used in description of the site and coded for themes. Focus group interviews with students provided personal insight of students in their authentic voices as they discussed freshman experiences that either eased or impeded their ninth and tenth grade transitions and sense of connectedness to school. Likewise, staff members’ focus group interviews revealed their perceptions of the academy’s best practices in engaging students in high school experiences. These data were qualitative in nature and added depth and breadth to this mixed-methods study, which used a variety of data collection instruments and analyses.

**Site and Participants**

The site of this study was a large, comprehensive high school in southeastern Massachusetts with a student population of 1381 students. The school had a technical school within the school, students of which were integrated with non-tech students in all core academic classes. According to the DESE 2011-2012 report card, the student body was 94 % Caucasian, with less than 0.1 % of the students coming from homes where English is not the primary language spoken. At the time of the study, 17 % of the study body was eligible for free and/or reduced breakfast and lunch; 24 % of the student population was considered low income. Of this ethnically homogeneous population, 19 % of the building’s students had individual education plans (IEPs). Parents of students enrolled in this high school were predominantly white,
working-class citizens. There was little ethnic or cultural diversity among students or staff. There were 124 teachers on staff, 96 of whom were highly qualified, according to NCLB evaluation guidelines. Highly qualified teachers instructed 100% of the 431 core academic classes.

In September of 2005 the school implemented a freshman academy as its first SLC, guided by recommendation of The Education Alliance (now CSSR). At the time, the school’s student population was 1569, 718 of whom were enrolled in the technical program; the incoming freshman class embodied 432 first-time ninth graders, 188 of whom were technical studies students. The freshman academy was staffed by teachers who were selected and randomly placed on four-person academic teams by the former principal. The 432 students were divided among the four teams, which shared two full-time special education teachers and one guidance counselor. The teams were separated in four different wings of the building, where students’ English, history, and math classes were held in adjacent classrooms. Science classes remained in the science wing. It should be noted that the researcher joined the staff of this high school as an original member of the freshman academy, having requested transfer from one of the district’s middle schools. At the end of the academy’s first year, a survey was given to students and mailed home to parents, asking for feedback on students’ experiences in the academy model. Survey return from parents was limited; however, student feedback was abundant. Information collected was considered, but each team had designed its own survey, so student feedback was inconclusive. No significant modifications were made; however, an all freshman lunch period was piloted and eliminated after one term.

As earlier stated, in the freshman academy’s third year of implementation, the school was awarded SLC grant funding and hired an administrator for the program. In addition, two special
education teachers were added to the staff, each team then having a designated specialist. Using the school’s instructional technology specialist to introduce and demonstrate technology integration, additional professional development for freshman academy teachers was added in 2009, replacing one common planning period each month. No other significant changes were made to the program.

In its seventh year of implementation, with minimal staff turnover for two consecutive years, many of the academy’s practices had become embedded routines. The convergence of these factors made this an appropriate time to conduct a formal study on the freshman academy’s impact on student engagement. This study provided the school and district with valuable information, while adding to educational research on the efficacy of grade nine programs. This school’s freshmen academy was used as a case to investigate the reciprocal interplay of environment, behavior, and cognition among adolescents in high school transition. Document analysis, students’ self-reported measures on engagement in high school, and focus group interviews of students and staff constituted a robust study of triangulated data.

Participants of this study included a stratified random sampling of all currently enrolled sophomores who were willing to complete the SEI survey and had completed one year in the freshman academy. Students and parents were informed of the purpose of the study and assured that student participation was both voluntary and anonymous. Students who had transferred into the school after freshman year were not asked to complete the survey. Having experienced high school transition into the freshman academy last year and transition into the general Grade 10-12 population this year, these participants were well suited for the study.
The 2011-2012 year’s sophomore class embodied approximately 350 students who were tier tracked in their core academic classes by ability levels. Of the 350 students, approximately 20 had transferred in from another school or district; they did not attend the freshman academy of this study. The researcher had been randomly assigned approximately one fifth of the sophomore class in her English classes: one honors level class, two college preparatory classes (CP1), and one modified college prep class (CP2). This randomly assigned, stratified sampling was adequate for population generalizability. According to Fraenkel and Wallen (2009), “generalization is made more plausible if data are presented to show that the sample is representative of the intended population on at least some relevant variables” (p. 103). Since the students were of various tracking and had come from different freshman academy teams, this population was representative of the whole sophomore class. The researcher obtained parental consent and student assent before administering the SEI to 71 students, a 20% proportionate sampling of the class as a whole among each tiered track.

Participants for the student focus group embodied a strategic sampling of sophomore students of different tracking tiers, as well as athletes and non-athletes, for maximum variation of participant interests and multiple perspectives on the freshmen academy’s impact. This diversity among participants was intended to purposefully inform an understanding of the research problem and central phenomenon of the study (Creswell, 2007).

The researcher obtained signed parental consent and student assent forms for all focus group participants. Students and parents were assured that participation was entirely voluntary, and that students’ identities would remain anonymous. The researcher strategically selected a diverse population of her students who would vocalize their opinions comfortably among peers:
“Focus groups are advantageous when the interaction among interviewees will likely yield the best information, when interviewees are similar and cooperative with each other, when time to collect information is limited” (Dreuger, 1994; Morgan, 1988; Steward & Shamdasani, 1990, as cited by Creswell, 2007, p 133). Care was taken in selecting individuals who would vocalize their opinions but not dominate the discussion. By selecting students of diverse interests who were familiar with one another, the researcher felt the comfort level among peers would generate authentic and abundant discussion. The open-ended questions initiated conversation about students’ transitional experiences into the high school, as freshmen on the academy, and again as sophomores into the general population of the school building. This qualitative inquiry provided a more in depth understanding of the phenomenon being studied.

In addition to student participants, a focus group of teachers and a guidance counselor were recruited to participate in a focus group. All freshmen teachers who also teach a sophomore off-team class were invited to participate. In addition, one guidance counselor who works with three teams of freshmen as well as upperclassmen participated in the focus group. Participation was entirely voluntary. Selection of participants from the volunteer pool included one teacher of each discipline, in addition to a special education teacher and the guidance counselor. This selection was stratified to include representation of each academic discipline and support specialists, representing 25% of the academy staff.

Academy staff includes 20 core teachers, 4 special needs teachers, 1 reading specialist, 4 paraprofessionals, 1 and ¼ guidance counselors, and one administrator. The focus group included 4 core teachers, 1 special education teacher, and 1 counselor. Selection from volunteers was based on seniority of years in the academy, as those who had more experience could provide
more comprehensive insights. Open-ended questions generated discussion of the team teachers’ common practices in easing transition stressors among their students and engaging them in their high school experiences. Document analysis provided rich context of the study, students’ survey responses shed light on sustained student engagement, and student and teacher focus group discussions illuminated effective practices of easing transitional stress and engaging students in high school.

Data Collection and Instruments

Driven by the theoretical framework established through the literature review, an examination of the freshman academy’s program goals, along with data of the school’s policies, absentee rates, demographics, and freshmen academic core course retentions were retrieved and recorded. These data were included in a narrative description of the academy’s implementation goals and context of this study’s site. Additionally, they were integrated in key findings.

The survey questionnaire data, which was collected through electronic administration of Appleton et al.’s (2006) Student Engagement Instrument (SEI), furnished abundant quantitative data. The SEI is a 35-item self-report survey that is typically administered on paper; however, it was converted without modification into electronic format to facilitate ease in administration and expedite data collection. The SEI measured six subtypes of student engagement: Teacher-Student Relationship (STR), Control and Relevance of School Work (CRSW), Peer Support for Learning (PSL), Future Aspirations and Goals (FG), Family Support for Learning (FSL) and Extrinsic Motivation (EM). TSR, PSL, and FSL are related to student affective engagement, and CRSW, FG, and EM are consistent with cognitive engagement. Measuring two constructs, psychological engagement and cognitive engagement, this instrument used a four-point Likert
response scale range from strongly agrees to strongly disagree. Negatively worded items were reverse scored. Summing or averaging individual items calculated scale scores.

The Student Engagement Instrument was developed to go beyond observable indicators of academic and behavioral engagement (time on task, attendance, homework completion) to measure the cognitive and psychological aspects of engagement as reported by students (Appleton et al., 2006). Dr. Appleton has used the instrument in Gwinnett County Public Schools in Georgia to create district, school, and individual student profiles to provide information to advisors that may supplement existing knowledge about students’ achievement. In addition to use by the developer, the SEI has been used in several research studies on student engagement (Reschly et al. 2008; Lewis et al. 2009, Betts et al., 2010). The SEI is one of twenty-one instruments indexed in Research Education Laboratory’s 2011 report of instruments on student engagement. The researcher contacted Dr. James Appleton and Dr. Sandra Christenson, both members of the psychology department of University of Minnesota, requesting permission to use the instrument. In addition to forwarding the instrument, Dr. Christenson forwarded one study of the instrument’s validation and another of its factorial invariance. Appleton, Christenson, Kim and Reschly (2006) report internal consistencies (Cronbach’s alphas) of .88 for teacher-student relationships, .80 for control and relevance of schoolwork, .82 for peer support for learning, .78 for future aspirations and goals, .76 for family support for learning, and .72 for extrinsic motivation. Using a 25-item version of the instrument across five subscales, Reschly et al. (2008) find internal consistencies of .77–.92.

The researcher administered the SEI using the English department’s twenty-four wireless laptops to minimize disruption of computer lab scheduling. Prior to administration of the SEI, the
researcher conducted a pilot test with former students of various reading abilities to accurately assess time needed to comfortably take the survey. All students in the pilot test were able to comfortably complete the survey electronically within 20 minutes. Nonetheless, the researcher scheduled the laptop carts for each of her four sophomore classes, making them available for the entire 45-minute class period, if deemed necessary. Appleton et al. (2006) recommend reading the survey items aloud to students with reading disabilities. The researcher had enlisted a special education teacher to survey her small pullout sophomore class; however, this was not necessary, as the researcher’s survey participants embodied a 20% random sampling of the sophomore class, and no one had difficulty reading survey items.

The qualitative data sets included narratives of focus group participants, who met with the researcher and responded to open-ended interview questions designed to align with the SEIs submeasures. Two focus group interviews were conducted, one with students and another with staff. The purpose of the focus group interview with students was to provide authentic, unfiltered data of students’ perspectives of their freshman academy experiences. The researcher, using open-ended questions, led these focus group interviews. Students’ discussions were audio taped and transcribed. Likewise, faculty focus group questions were open-ended, aiming to generate discussion about students’ transitioning experiences and teachers’ practices in both easing transition stressors and engaging students in learning. Qualitative data was coded for analysis of emerging themes and patterns. Focus group leading questions were specifically written to probe initial evidence: “to invite the interviewee[s] to open up and talk” (Creswell, 2007, p. 133). The use of multiple data-gathering methods adds rigor, breadth, and depth to the body of evidence through triangulation (Denzin & Lincoln, 2005; Eisenhardt, 1989). The researcher feels that this
concurrent triangulated mixed-method design “most readily illuminates the research question” (Fraenkel & Wallen, 2009, p. 559).

Table 1. *Instruments and Sequence of Data Collection* details collection process.

<table>
<thead>
<tr>
<th>Instrument or Document</th>
<th>Purpose</th>
<th>Timeline</th>
<th>Sampling</th>
</tr>
</thead>
<tbody>
<tr>
<td>Parent permission to participate in survey cover letter</td>
<td>To notify parents and students of survey and field for possible objections to survey.</td>
<td>April 13, 2012</td>
<td>100% of 71 eligible students, comprising a stratified random sampling of sophomore class,</td>
</tr>
<tr>
<td>Letter inviting freshman academy staff to participate in focus group.</td>
<td>To field interested participants</td>
<td>April 11, 2012</td>
<td>All 25 staff members invited to participate. Stipulation that they teach one sophomore class limited response.</td>
</tr>
<tr>
<td>Participant/ Consent Letter to freshman academy staff members</td>
<td>To obtain signed informed consent.</td>
<td>April 23, 2012</td>
<td>One staff member of each academic core discipline, one special education teacher, and one freshman guidance counselor.</td>
</tr>
<tr>
<td>Parental Consent Student Assent Forms</td>
<td>Sent home with volunteers and posted on web site.</td>
<td>April 23, 2012</td>
<td>All students interested in participating were invited. Pool narrowed to seven students of various academic abilities and extracurricular interests.</td>
</tr>
<tr>
<td>Document Analysis</td>
<td>To identify program implementation goals To examine school policies regarding attendance and credit accumulation To examine and calculate freshmen core course retention data since program implementation</td>
<td>February 2012 May 2012</td>
<td>Brochure of academy distributed through guidance office. Student handbook and course selection guide. Housemaster’s records</td>
</tr>
<tr>
<td>Appleton et al. (2006)</td>
<td>Instrument consists of six</td>
<td>April 25, 2012</td>
<td>Stratified sampling of</td>
</tr>
</tbody>
</table>
**Student Engagement Instrument (SEI)**

Subscales measuring two constructs: psychological engagement and cognitive engagement.

| sophomore class, aiming for 20% proportionate participation of various tracking tiers. |

**Student Focus Group Interview**

To provide personal voices of students who have attended the freshman academy and gain insight to their perspectives on the academy’s best practices.

**May 1, 2012**

Stratified sampling of 7 students of various academic and social interests.

<table>
<thead>
<tr>
<th>Staff Focus Group Interview</th>
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</thead>
<tbody>
<tr>
<td>To provide personal voices and reflection of staff on their common practices used to engage students.</td>
</tr>
<tr>
<td>May 2, 2012</td>
</tr>
</tbody>
</table>

Stratified sampling of 6 staff members, one of each core academic discipline, one counselor, and one special education teacher.

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**Data Analysis**

In coherence with the overarching research question, *How does the freshmen academy experience influence students’ engagement in school?* the concurrent triangulated mixed methods research design was selected. As illustrated above, in Figure 2., qualitative data and quantitative data were analyzed separately and later merged for discussion of results. The primary qualitative data included narrative statements from two focus group interviews, one set of students’ discussions and another of teachers’ discussions in response to open ended questions probing freshman academy experiences and routine practices. The quantitative data included a number of data sets derived from the SEI instrument, which measured students’ levels of cognitive engagement (sense of connectedness to relevancy in coursework) and their affective engagement (sense of connectedness to others).

The qualitative data were not hypothesized but coded and analyzed for emerging theoretically framed themes in response to the following sub questions of the study:

1) **What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?**
2) What are the staff’s perceptions of the academy’s practices in facilitating and/or impeding student engagement?

The research sub questions aligned with Bandura’s (1986) triadic reciprocal interplay of personal, behavioral, and environmental factors, the core of self-efficacy beliefs: “The reciprocal nature of the causes of human functioning in social cognitive theory makes it possible to direct attention at personal, environmental, or behavioral factors” (Pajares, 2006, p. 340). This study addressed this interplay through analysis of the freshman academy’s environmental factors that influenced students’ development of self-agency, and fostered their adaptability to meet environmental transition challenges. Qualitative data analysis began with a rich description of the site and setting of the study, leading to implementation of the freshman academy and preceded with document analysis of the program’s mission statement. This site description included data of school demographics, participant profiles, and freshman academic course failures, presented numerically and discussed in narrative form.

The researcher facilitated two semi-structured interviews among focus group participants, using pre-composed open-ended questions (see attached Appendixes H & I). Interview protocols were designed and arranged categorically, addressing social, academic, and environmental factors of ninth and tenth grade transition. Additionally, questions aligned with independent variables of the student self-report questionnaire (SEI). Focus group interviews were audio recorded, transcribed and member checked by participants before the researcher utilized inductive analysis coding methods. The process consisted of transcribing interviews, preparing raw data files, close reading of test, creation of categories (in vivo coding), before finally
revising and refining categories. Descriptive coding used “chunking” by theme and then organizing these chunks into clusters to begin drawing conclusions (Miles & Huberman, 1994).

The quantitative data analysis included a number of data sets using the SEI survey results, testing the following hypothesis: *Students will measure significantly higher on affective engagement than cognitive engagement in school.* SEI data was entered into SPSS to run a Paired T tests. The two dependent variables, cognitive and affective engagement, were determined by six independent variables: Teacher-Student Relationship (STR), Control and Relevance of School Work (CRSW), Peer Support for Learning (PSL), Future Aspirations and Goals (FG), Family Support for Learning (FSL) and Extrinsic Motivation (EM). TSR, PSL, and FSL were related to student affective engagement, and CRSW, FG, and EM were consistent with cognitive engagement.

Analysis of the SIE survey was also calculated through electronic administration, using a GoogleDocs survey form. The researcher converted the paper copy of the SEI into a GoogleDocs form survey without modification (see attached Appendix F for link and attached pdf for SEI). Survey results were entered into SPSS. Descriptive statistics were used to generate mean scores of each survey item and overall mean scores of the six sub-measures and two constructs. Further, a Pearson correlation was carried out to quantify the strength of the relationship between survey items. Additionally, a paired samples t-test was conducted to evaluate the scores of psychological engagement and cognitive engagement to investigate which of the two variables was significantly higher than the other, thus testing the hypothesis. Once all quantitative and qualitative data were analyzed separately, “the convergence or divergence of the results would then be discussed” (Fraenkel & Wallen, 2009, p.561). The researcher determined which results
converged, providing depth to the understanding of which factors influencing student engagement are already addressed by the academy and which warranted further attention.

Likewise, the researcher also discussed divergence.

Table 2. *Data Collection and Analyses*

<table>
<thead>
<tr>
<th>Data Collected</th>
<th>Process of Analysis</th>
<th>Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>SEI Survey Questionnaire administered electronically in GoogleDocs</td>
<td>Survey results entered into SPSS Descriptive statistics/mean scores Pearson correlation Paired- samples t-test</td>
<td>QUAN</td>
</tr>
<tr>
<td>Focus Group Interview of Tenth Grade Students</td>
<td>Reduction of data through inductive analysis coding</td>
<td>QUAL</td>
</tr>
<tr>
<td>Focus Group Interview of Freshman Academy Staff</td>
<td>Reduction of data through inductive analysis</td>
<td>QUAL</td>
</tr>
</tbody>
</table>

Validity and Credibility

As a participant researcher who initially came to the high school as a freshman academy staff member, the researcher of this study was invested in the program, and needed to keep her personal insights on the program’s implementation and its evolution at bay while conducting this study. It is impossible to eliminate the researcher’s theories, beliefs, and perceptions (Maxwell, 2005); therefore, it was essential for the researcher to recognize and explicitly identify possible biases to establish credibility through transparency and her integrity. The researcher also had a “prolonged engagement” (Lincoln and Guba, 1985) with the academy that allowed for a rich, accurate site description, adding validity and reliability to the study. To gain perspective on students transitioning from the freshman academy model to the departmentally structured grade ten through twelve population, the researcher left the academy by request and was assigned four tenth grade English classes during the year of this study; therefore, she witnessed students’
transitioning from the interdisciplinary team model of the district’s grades six through nine, into the traditionally modeled high school for their first time. According to Creswell (2007), “extensive time spent in the field, the detailed thick description, and the closeness of the researcher to participants in the study all add to the value or accuracy of a study” (p. 207). The researcher had taught six years in the freshmen academy, from its inception to the year prior to this study, which allowed for an accurately detailed site description, and insightful interpretation of qualitative data.

Several of the researcher’s students were in her previous year’s classes. This looping further personalized their relationships and may have influenced their sense of belonging. This personalization also influenced students’ investment in the researcher’s study, enriching the “trustworthiness of the study” (Lincoln & Guba, 1985). Familiarity with students and staff members also allowed the researcher to accurately interpret their hesitations, enthusiasm, and gestures in response to interview protocols and each other’s responses. The triangulation of data ensured that researcher bias was not influential in data analysis, particularly in the quantitative analysis of the SEI survey: “Triangulation … reduces the risk of chance associations and of systematic biases due to a specific method, and allows a better assessment of the generality of the explanations that one develops” (Maxwell, 2005, p. 112).

Collector bias did not pose a threat, as quantitative data are more objective in nature. Nonetheless, the researcher included her role and interest in the academy in the introduction of the study and again in the discussion, as it was significant, particularly in light of the qualitative components of the study (Creswell, 2007). Additionally, qualitative data was member checked for accuracy in transcription. Lincoln & Guba (1985) claim that member checking is “the most
critical technique for establishing credibility” (p. 314). Prior to data analysis of focus group interview transcripts, the researcher solicited one member of each focus group to read the transcripts for accuracy, resulting in minor adjustments made for clarification and correction of typographical errors/omissions. As a participant researcher, the researcher’s rapport with students and staff is one of trust and professionalism. Assuring that participant responses and identities would remain anonymous should have sufficed in gaining their honest input; yet, she did not make this assumption and formally included this information verbally and in writing on participant assent and parental consent protocols.

Validity of the Student Engagement Instrument (SEI) is well established. Appleton et al. (2006) demonstrated the construct validity of the six subscales of the SEI, using a confirmatory factor analysis. In Appleton et al.’s (2008) Validation of the Student Engagement Instrument study, engagement subscales correlated with measures of academic performance and behavior, demonstrating criterion-related validity through positive relationships with grade point average and reading and math achievement and negative relationships with frequency of suspensions.

Although student participants represented proportionate ratios of each academic ability-grouped tier of the sophomore class, there was a disparity in gender ratios, which is highlighted in the SEI participant profiles. The school’s male: female gender ratio was 53: 47 %, while this study’s survey participants’ gender ratio was 37: 63 %. This disparity does not threaten generalizability. A Study of the Factorial Invariance of the Student Engagement Instrument (SEI): Results From Middle and High School Students, conducted by Betts et al. (2010) determined “equivalent configural structure and metric invariance between boys and girls … evidence supported the assumption of equivalent residuals, indicating a similar level of measurement
reliability” (p. 89). Betts et al. (2010) further extended validation of the SEI, examining score reliability and factorial invariance across grades and gender. Using student samples of two districts, one in the rural Southeast and another in Upper Midwest regions of the United States, results indicated similar factor structure, equal score reliability, and similar latent factor relationships across all grades. Evidence supported the contention that the SEI may be used at the middle and high school levels to measure cognitive and affective subtypes of student engagement.

Location of survey administration was consistent; volunteer participants were surveyed in their English classes, using the English department’s wireless laptop computers. Having previously pilot-tested the survey assured the researcher that there was ample time allotted for all students to accurately respond to the electronic survey. Participant mortality was not affected, since the survey population included a stratified, random sampling of the sophomore class, embodying proportionate ratios of each academic ability-tiered track. Participant maturity was not a threat, as the surveys were administered once, with make up opportunities immediately following the initially scheduled survey date (Fraenkel & Wallen, 2009).

Protection of Human Subjects

This study involved working with children under the age of eighteen in Massachusetts, considered a special subject population; therefore, the researcher took extra measures to ensure their participation in the research posed minimal risk to their physical, emotional, or social well being. Before beginning the collection of any data, the researcher informed students of the purpose of the study, and explained that their participation was voluntary. For the collection of data through the SEI survey, the researcher followed Appleton et al.’s (2006) procedure: “To
avoid singling out individual students while ensuring a continuum of student perspectives, passive rather than active consent was used” (p. 433). The SEI was electronically administered to all assenting sophomore students of the stratified random sampling whose parents allowed their participation. This population had completed one year in the freshman academy and had transitioned into the departmentally structured instructional model of grades ten through twelve. Their input more accurately measured sustained engagement, than surveying current freshmen. With district and building support, collection of SEI data was fairly non disruptive to the building’s learning environment. The researcher had approximately one-fifth the sophomore class on her roster, and was confident that these students accurately responded to the SEI survey questions.

The researcher was confident that there was no risk to the wellbeing of individuals taking the SEI survey, as it is a straightforward, Likert-scaled questionnaire of thirty-five items that can easily be read at an eighth grade level. There are no survey items that pertain to sexual activity or illegal substance use that could potentially cause embarrassment or anxiety. Nonetheless, the researcher ensured that students were comfortable taking the survey and attained their assent before administering it. She also informed students that taking the survey or choosing not to would in no way affect their academic standing in her class or influence their teacher-student relationships. For parental consent of students taking the survey, the researcher drafted and sent a cover letter home, which discussed the purpose of the study and description of the SEI, requesting response from those who wished to eliminate their children from the survey population. The opt-out signature request was bold-faced on the cover letter. The researcher also posted information on the survey and its intended date of administration on her website, which
many parents visited regularly. The researcher informed parents and students that there were no negative consequences for choosing not to participate. Since students took the survey anonymously, and the school is unnamed in the study, participant identity was maximally protected.

For participants in the focus groups, the researcher enlisted seven students in one focus group interview, and six freshman academy staff members in a second focus group. The researcher attained written parental consent and student assent for student focus group participants, and written participant assent from faculty members. The researcher drafted separate letters inviting voluntary participation, again assuring students, parents, and staff that there was no possible harm to this study’s participants (see appendixes). She articulated that participation or non-participation would not affect students academically, nor would it impact their teacher-student relationships. Likewise, faculty participation or non-participation would not affect academy staff adversely in any way, nor impact the researcher’s colleague relationships. Additionally, using pseudonyms in composing data analysis protected participant identity. The school remained unnamed to further ensure anonymity of study participants, as Yin (2003) recommends the researcher “disclose the identities of both the case and the individuals, within the constraints of protecting human subjects” (p.181).

Conclusion

This study examined the impact of one large, suburban high school’s freshman academy on student engagement. Using a variety of data collection procedures and instruments, it probed the overarching research question, *How does the freshman academy experience influence students’ engagement in school?* A concurrent triangulated mixed-method research design was
selected to ensure a comprehensive investigation: “The use of both quantitative and qualitative methods in a single study … provides a more complete understanding of research problems than does the use of either approach alone” (Fraenkel & Wallen, 2009, p. 557). Although the survey instrument provided detailed, validated data, the researcher felt that hearing the voices of study participants was equally important in understanding how academy experiences influenced student engagement in school and fostered or impeded the development of self-efficacy beliefs.

Guided by the theoretical framework of cognitive-stage theory and social cognitive theory, the researcher investigated the reciprocal interplay of environment, behavior, and cognition among adolescents in high school transition into and out of ninth grade. Using both quantitative and qualitative data, “mixed-methods studies can help to confirm or cross-validate relationships discovered between variables, as when quantitative and qualitative methods are compared to see if they converge on a single interpretation of a phenomenon” (Fraenkel & Wallen, 2009, p. 558). For clarity of the study’s results, it was necessary to provide rich textual descriptions of the school’s population, the program’s implementation, and the researcher’s former role as an academy staff member. In addition to providing numeric data in statistical form, this study design included student and staff perspectives that fortified the numbers through their voices, empowering proactive participation.

Social cognitive researchers are concurrent in their findings that students’ self-efficacy beliefs determine their rate of task performance and their perseverance in addressing challenges. If students believe they are adept in skills, they willingly take on challenges and adapt to transitions. Conversely, students who do not consider themselves competent, avoid such challenges and direct their behaviors elsewhere. Contextual examination of school documents
and freshmen core course retentions indicated student engagement and/or disengagement, directly related to their self-efficacy beliefs. The students’ perceptions, as measured on the SEI and as discussed in their focus groups further testified to the academy’s impact on their engagement. Staff focus group interviews provided another set of informed perspectives on how the academy influences student engagement. The convergence or divergence of quantitative and qualitative data provided an understanding of factors influencing student engagement, illuminating those that were effectively addressed by the academy, while drawing attention to those which warranted further attention. In meeting the researcher’s goals, this study yielded valuable information to the district, the school, and the freshman academy, while adding to the body of educational research on the efficacy of ninth grade transition programs.

Chapter 4: Findings

Introduction

The purpose of this chapter is to report and discuss the key findings from the research conducted. The first section provides a brief review of the study’s context and an analysis of the research participants. The next three sections present the research data and discussion of findings based on methods relevant to investigation of the overarching research question: How does the freshman academy experience influence students’ engagement in high school? Equally weighted quantitative and qualitative data were collected concurrently, analyzed separately, and integrated in response to three research sub-questions, “guided by a specific theoretical perspective” (Creswell, 2009, p.215). Analysis, therefore, was guided by social cognitive theory and cognitive-stage theory. The final section of this chapter is a summary of key findings.

Methodology
For the purpose of well-validated and substantiated findings, a concurrent triangulation strategy was applied. To collect data, a mixed research method consisting of both a self-completion survey and two semi-structured focus group interviews were used. For the quantitative data a survey was administered to students electronically, while two focus group interviews, one for students and another for faculty, were used to obtain qualitative data. Throughout this chapter, both the qualitative and quantitative findings are presented together. Quantitative data was qualified, with statistical tables included in discussion.

**Analysis of Study Participants and Profiles**

For the qualitative study, a total of two focus group interviews were conducted. The faculty focus group included three males and three females, representing each core academic discipline area (English, history, math, and science), one special education teacher, and one guidance counselor.

Table 3. *Staff Focus Group Profiles* details information about each participant.

<table>
<thead>
<tr>
<th>Teacher (Pseudonym)</th>
<th>Academic Discipline</th>
<th>Years Experience on the Freshman Academy</th>
<th>Off Team Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sam</td>
<td>Science</td>
<td>4</td>
<td>Biology MCAS Prep</td>
</tr>
<tr>
<td>Ross</td>
<td>Math</td>
<td>4</td>
<td>Algebra 2 Honors</td>
</tr>
<tr>
<td>Elaine</td>
<td>Special Education</td>
<td>7</td>
<td>Pull Out English</td>
</tr>
<tr>
<td>Emma</td>
<td>Guidance</td>
<td>4</td>
<td>N/A</td>
</tr>
<tr>
<td>Rebecca</td>
<td>English</td>
<td>3</td>
<td>CP2 English</td>
</tr>
<tr>
<td>James</td>
<td>World History</td>
<td>5</td>
<td>CP1 US History</td>
</tr>
</tbody>
</table>
The student focus group included three male students and four female students; of various academic and vocational program studies, ability-grouping tracks, and extra-curricular interests.

Table 4. Student Focus Group Profiles details the diversity among student participants.

<table>
<thead>
<tr>
<th>Student (Pseudonym)</th>
<th>Academic or Tech</th>
<th>Academic Tracking Tier (in most classes)</th>
<th>Extracurricular Interests</th>
</tr>
</thead>
<tbody>
<tr>
<td>Philip</td>
<td>tech- CAD (academic tech)</td>
<td>Honors</td>
<td>athletics</td>
</tr>
<tr>
<td>Joe</td>
<td>tech – plumbing</td>
<td>CP1</td>
<td>none/ works doing chores for neighbors</td>
</tr>
<tr>
<td>Daphne</td>
<td>tech – child care</td>
<td>CP2 (student on IEP)</td>
<td>cheerleader but was expelled from team for showing up at game under the influence of drugs and in possession of marijuana</td>
</tr>
<tr>
<td>Emily</td>
<td>academic</td>
<td>CP1/CP2 split (student on IEP)</td>
<td>athletics, but suspended from winter and spring sports for academic failures</td>
</tr>
<tr>
<td>Derrick</td>
<td>tech- marketing (academic tech)</td>
<td>CP1 (student on 504)</td>
<td>none</td>
</tr>
<tr>
<td>Anna</td>
<td>academic</td>
<td>Honors</td>
<td>athletics and interact club</td>
</tr>
<tr>
<td>Ashley</td>
<td>Academic</td>
<td>Honors/CP1 Split</td>
<td>none</td>
</tr>
</tbody>
</table>

For the quantitative study, a response rate of 100 % (n=71) was derived from an electronically administered self-completion survey, which was then analyzed using SPSS.

A majority of the students (63 %) were females, while 37 % were males. Most of the students were in the college preparatory (CP1) academic track (51 %), while 21 % were in the honors track. Of the remaining students, 17 % were an even split of honors and CP1, and a further 13 %
were enrolled in a modified college preparatory (CP2) track. A majority of the students (62%) were in technical studies, which include both traditional technical studies programs (plumbing, electrical, automotive, welding) and more contemporary technical studies, which are considered academic technical studies; for instance, computer assisted drafting (CAD), marketing, computer science, and graphic design/multi media. The remaining 38% were in general academic studies, students filling core high school graduation requirements, many aspiring to attend a two or four-year college.

Figure 3. Survey Respondents Profile details the demographics of survey participants.

These participants represented 20% of the sophomore class, proportionately distributed among the three academic tiers; honors, CP1, and CP2. However, of the seventy-one eligible participants enrolled in the researcher’s classes, there appeared to be a gender imbalance with
approximately 20% more females than males, whereas the school’s overall population was more evenly divided by gender. There was also a slightly larger enrollment of technical studies students than that of the academic track. These disparities may signal the effects of ability-tracking students when offering a variety of vocational programs and/or electives. Certain vocational classes and electives were scheduled at specified times for each grade level, thus limiting students’ academic course options.

**Key Findings Organized by Research Questions:**

**Overarching Research Question:** *How does the freshman academy experience influence students’ engagement in school?*

To address this overarching question, equally weighted quantitative and qualitative data were collected concurrently, analyzed separately, and integrated in response to the research sub-questions. Key findings were guided by Bandura’s (1986) triadic reciprocal interplay of personal, behavioral, and environmental factors, the core of self-efficacy beliefs, essential to student engagement. Piaget’s cognitive-stage theory was another lens through which data was guided. As high school sophomores, student participants ranged in age from fifteen to seventeen and had reached their final stage of childhood cognitive development. Students’ self-reported perceptions of engagement and their conversations about their freshman and sophomore transitioning experiences should have reflected the ability to conduct abstract deductive reasoning.

**Research Sub-Question 1: What are the students’ self-reported perceptions of their cognitive and affective engagement in high school?**

Students completed Appleton et al.’s (2006) Student Engagement Instrument (SEI), a self-report survey of affective and cognitive engagement, using six sub-measures of student
engagement. Teacher-Student Relationship (STR), Control and Relevance of School Work (CRSW), Peer Support for Learning (PSL), Future Aspirations and Goals (FG), Family Support for Learning (FSL) and Extrinsic Motivation (EM). Measuring two constructs, affective/psychological engagement and cognitive engagement, TSR, PSL, and FSL were related to student affective engagement, and CRSW, FG, and EM were consistent with cognitive engagement. Surveys were administered electronically to all eligible participants (n=71), a 20% sampling of the sophomore class (n=358). Survey results were entered into SPSS. Descriptive statistics were used to generate mean scores of each survey item and overall mean scores of the six sub-measures and two constructs. Further, a Pearson correlation was carried out to quantify the strength of the relationship between survey items. Additionally, a paired samples t-test was conducted to evaluate the scores of psychological engagement and cognitive engagement to investigate which of the two variables was significantly higher than the other, thus testing the hypothesis.

**Cognitive Engagement.** Future goals and aspiration (FG) was the highest rated sub-measure among the cognitive construct, with an overall mean score of 3.28, considerably higher than the other two sub-measures, control and relevance of schoolwork (CRSW), scoring 2.53 or extrinsic motivation (EM), scoring 1.94. This indicated that students’ visions of their future, not their coursework motivated them to continue schooling.

A majority of the students agreed that they were hopeful about their future (3.41). They believed that going to school to learn would open many opportunities for them in the future. The variable “My education will create many future opportunities for me” positively correlated with “School is important for achieving my future goals” at 0.888, implying that students felt that
there are future opportunities through education. Another strong correlation among variables of this sub-measure occurred between “Going to school is important” and “My education will create many future opportunities for me” at 0.865. This implies that the students felt a need to continue with high school because it would create future opportunities for them. Students see themselves as successful adults in the future. They believed they will go on to higher education or vocational training and attain financial security, yet they did not acknowledge their current coursework significantly relevant. They appeared to believe that the degree, not the knowledge attained in coursework, would lead to success.

Regarding CRSW variables, a majority of the students agreed that they do well in school when they work hard (3.24), the highest rated variable among this sub-measure. Students clearly understand that working hard will lead to success in school. The strongest correlation among CRSW occurred between “I feel like I have a say about what happens to me at school” and “My teachers are there for me when I need them” at 0.619. This implies that teachers’ attention to student needs enhanced their level of self-confidence. The more the teachers were there for students, the more students felt they had a say about what happened to them at school.

Another positive correlation was in regard to “When I do schoolwork I check to see whether I understand what I’m doing” and “Going to school after high school is important” at 0.610. Students felt that to continue with their high school, the aspect of homework was an important element for the transition. The more they did their schoolwork to check to see whether they understood what they were doing, the more they realized that going to school after high school was important.
The least rated attribute was in regard to having a say to what happens to them in school (2.27). Although an important factor, it was not a strong indicator for CRSW. Students tended to follow a path that is determined for them by others, the adults in their lives. Parents and guidance counselors tell them which classes to take, school administrators tell them which rules to follow, and teachers dictate demands necessary to bring major assignments to fruition. Based on the strong correlation noted above, personalized attention to students’ individual needs would build confidence and facilitate active participation in decision making and development of self-efficacy beliefs.

Extrinsic motivation (EM) was the lowest rated cognitive engagement sub-measure, with an overall mean score of 1.94. Students disagreed that they learn but only if rewarded by their teachers (1.89), or rewarded by a parent/guardian (2.0). Both attributes under EM correlated negatively with others, indicating that extrinsic reward was not a motivator for these students. During the student focus group interview, it became apparent that these students were intrinsically motivated.

Table 5. *Cognitive Engagement* illustrates sum and mean scores of students’ self-measured ratings of cognitive engagement variables.

<table>
<thead>
<tr>
<th>Table 5(a). Future Goals and Aspirations (FG)</th>
<th>Sum</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>I plan to continue my education following high school.</td>
<td>232</td>
<td>3.27</td>
</tr>
<tr>
<td>Going to school after high school is important.</td>
<td>230</td>
<td>3.24</td>
</tr>
<tr>
<td>School is important for achieving my future goals.</td>
<td>232</td>
<td>3.27</td>
</tr>
<tr>
<td>My education will create many future opportunities for me.</td>
<td>228</td>
<td>3.21</td>
</tr>
</tbody>
</table>
I am hopeful about my future.  

<table>
<thead>
<tr>
<th>Overall mean</th>
<th>242</th>
<th>3.41</th>
</tr>
</thead>
</table>

Table 5(b). *Control and Relevance of School Work (CRSW)*  

<table>
<thead>
<tr>
<th>Sum</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>The tests in my classes do a good job of measuring what I’m able to do.</td>
<td>178</td>
</tr>
<tr>
<td>Most of what is important to know you learn in school.</td>
<td>176</td>
</tr>
<tr>
<td>The grades in my classes do a good job of measuring what I’m able to do.</td>
<td>165</td>
</tr>
<tr>
<td>What I’m learning in my classes will be important in my future.</td>
<td>174</td>
</tr>
<tr>
<td>After finishing my schoolwork I check it over to see if it’s correct.</td>
<td>164</td>
</tr>
<tr>
<td>When I do schoolwork I check to see whether I understand what I’m doing.</td>
<td>205</td>
</tr>
<tr>
<td>Learning is fun because I get better at something.</td>
<td>164</td>
</tr>
<tr>
<td>When I do well in school it’s because I work hard.</td>
<td>230</td>
</tr>
<tr>
<td>I feel like I have a say about what happens to me at school.</td>
<td>161</td>
</tr>
<tr>
<td>Overall mean</td>
<td>2.53</td>
</tr>
</tbody>
</table>

Table 5(c). *Extrinsic Motivation (EM)*  

<table>
<thead>
<tr>
<th>Sum</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>I’ll learn but only if the teacher gives me a reward.</td>
<td>134</td>
</tr>
<tr>
<td>I’ll learn but only if my family/guardian(s) give me a reward.</td>
<td>142</td>
</tr>
<tr>
<td>Overall mean</td>
<td>1.94</td>
</tr>
</tbody>
</table>

**Affective/Psychological Engagement.** Family support for learning (FSL) was found to be a very important sub-measure for affective/psychological engagement, with an overall mean score of 3.27. A majority of the students admitted that their family/guardian wanted them to keep trying when things were tough at school (3.49). “My family/guardians are there for me when I need them” had a strong positive relationship with “when I have problems at school my family/guardian(s) are willing to help me” at 0.762. This implied that the students regarded their
family/guardian support to be very important. They also believed that what they were learning in school would be important to their future. So the more they were motivated by their family, the more they felt inspired to face their future.

Peer support for learning (PSL) rated an overall mean score of 3.05. Friends’ support was found to be a motivation for learning. The majority agreed that they had some friends in school (3.46). This implied that the need to be known, to make friends and be in a group was a motivation for learning. At 0.772 “Other students at school care about me” had a very strong positive correlation with “Students at my school are there for me when I need them.” Relationships and acceptance of students within their group and class were very important factors in their self-worth. When students cared for one another’s feelings, they felt supported and confident, which was important for their development of self-agency. Another strong correlation among variables was noted under “I enjoy talking to the students here” and “Students at my school are there for me when I need them” at 0.772. Students felt at ease talking to other students when they knew that in case of any problem, other students were there for them. For adolescents, supportive, caring peers play an important role in creating a learning environment that promotes cohesiveness and sharing of ideas.

Teacher/Student Relationship (TSR) rated the lowest overall mean score (2.73) among affective/psychological engagement sub-measure. The highest variable score was in regard to “I feel safe at school” (3.06). This attribute is positively correlated with “Most of what is important to know you learn in school” at 0.570. Students felt that they could learn what was important in the school but only after being assured of their security. Although this group of students currently felt safe in school, upon initial enrollment as ninth graders, most were intimidated and
insecure, as illustrated later in the focus group discussion. Teachers’ roles in developing students’ sense of security was evident in the positive correlation between “Adults at my school listen to the students” and “At my school teachers care about students” at 0.593. Students perceived student-teacher relationships as very important. The more the adults listened to the students, the more the students felt cared about by their teachers. Knowing that the adults in the building care about the students is important in creating a safe, caring environment in which students will take risks leading to self-discovery.

Table 6. Affective/Psychological Engagement details sum and mean scores of students’ self-measured ratings of affective engagement variables.

<table>
<thead>
<tr>
<th>Table 6(a)</th>
<th>Family Support for Learning (FSL)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Sum</strong></td>
<td><strong>Mean</strong></td>
</tr>
<tr>
<td>My family/guardian(s) are there for me when I need them.</td>
<td>235</td>
</tr>
<tr>
<td>When I have problems at school my family/guardian(s) are willing to help me.</td>
<td>234</td>
</tr>
<tr>
<td>When something good happens at school, my family/guardian(s) want to know about it.</td>
<td>212</td>
</tr>
<tr>
<td>My family/guardian(s) want me to keep trying when things are tough at school.</td>
<td>248</td>
</tr>
<tr>
<td>Overall mean</td>
<td>3.27</td>
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<table>
<thead>
<tr>
<th>Table 6(b)</th>
<th>Peer Support for Learning (PSL)</th>
</tr>
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<tbody>
<tr>
<td><strong>Sum</strong></td>
<td><strong>Mean</strong></td>
</tr>
<tr>
<td>Other students at school care about me.</td>
<td>211</td>
</tr>
<tr>
<td>Students at my school are there for me when I need them.</td>
<td>214</td>
</tr>
<tr>
<td>Other students here like me the way I am.</td>
<td>214</td>
</tr>
<tr>
<td>I enjoy talking to the students here.</td>
<td>216</td>
</tr>
</tbody>
</table>
Students here respect what I have to say. 198 2.79
I have some friends at school 246 3.46
Overall mean 3.05

Table 6(c). Teacher/Student Relationship (TSR)

<table>
<thead>
<tr>
<th>Sum</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall, adults at my school treat students fairly.</td>
<td>195</td>
</tr>
<tr>
<td>Adults at my school listen to the students.</td>
<td>189</td>
</tr>
<tr>
<td>At my school, teachers care about students.</td>
<td>200</td>
</tr>
<tr>
<td>My teachers are there for me when I need them.</td>
<td>201</td>
</tr>
<tr>
<td>The school rules are fair.</td>
<td>183</td>
</tr>
<tr>
<td>Overall, my teachers are open and honest with me.</td>
<td>195</td>
</tr>
<tr>
<td>I enjoy talking to teachers here.</td>
<td>191</td>
</tr>
<tr>
<td>I feel safe at school.</td>
<td>217</td>
</tr>
<tr>
<td>Most teachers at my school are interested in me as a person, not just as a student.</td>
<td>173</td>
</tr>
<tr>
<td>Overall mean</td>
<td></td>
</tr>
</tbody>
</table>

**Measures of Student Engagement**

Overall, Cognitive Engagement rated highest on Future Goals and Aspirations while Psychological Engagement rated highest on Family Support for Learning.
Fig 4. Measures of Student Engagement illustrates participants’ self-reported measures on the six subtypes of student engagement within the two constructs.

**Hypothesis to Measure the Significance of Cognitive versus Affective Engagement.**

A paired samples t-test was conducted to evaluate the scores of affective/psychological engagement and cognitive engagement to investigate which of the two variables was significantly higher than the other. The quantitative data analysis included a number of data sets, which used the SEI survey results to test the following hypothesis: *Students will measure significantly higher on affective engagement than cognitive engagement in school.* SEI data were entered into SPSS to run a paired sample t-test. The two dependent variables, cognitive and affective engagement, were determined by six independent variables. TSR, PSL, and FSL were related to student affective engagement, and CRSW, FG, and EM were consistent with cognitive engagement.
Tables 7-9 represent statistical analyses of the SIE survey results.

<table>
<thead>
<tr>
<th>Table 7</th>
<th>Paired Samples Statistics</th>
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<tbody>
<tr>
<td></td>
<td>Mean</td>
</tr>
<tr>
<td>Pair 1</td>
<td></td>
</tr>
<tr>
<td>Affective Engagement</td>
<td>39.056</td>
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<tr>
<td>Cognitive Engagement</td>
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<th>Paired Samples Correlations</th>
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<tbody>
<tr>
<td></td>
<td>N</td>
</tr>
<tr>
<td>Pair 1</td>
<td>Affective Engagement &amp; Cognitive Engagement</td>
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</table>

<table>
<thead>
<tr>
<th>Table 9</th>
<th>Paired Samples T-Test</th>
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<td>Paired Differences</td>
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<tr>
<td></td>
<td>Mean</td>
</tr>
<tr>
<td>Pair 1</td>
<td></td>
</tr>
<tr>
<td>Affective Engagement - Cognitive Engagement</td>
<td>2.1127</td>
</tr>
</tbody>
</table>

From the findings on the scores of students on affective/psychological engagement and cognitive engagement, students measured statistically significantly higher on affective engagement than cognitive engagement in school. Affective/ Psychological Engagement ($M=39.05$, $SD=9.18$) to Cognitive Engagement [$M=36.94$, $SD=6.80$, $t(70)=2.46$, $p<.016$].

**Coding of Qualitative Data**

Qualitative data attained through focus group interviews were audio recorded, transcribed and member checked by participants before the researcher utilized inductive analysis coding methods. The coding process consisted of close reading of raw data files, creation of categories...
(in vivo coding), before finally revising and refining categories. Descriptive coding used “chunking” by theme and then organizing these chunks into clusters to begin drawing conclusions (Miles & Huberman, 1994).

**Research sub-question 2: What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?**

To give voice to the quantitative findings of the SEI instrument, the above-tabled statistical data was further analyzed and illuminated with student input from a semi structured focus group interview. Seven tenth grade students met for seventy minutes after school on Tuesday afternoon, May 1, 2012. The researcher facilitated an open discussion among participants, in response to interview questions designed to align with the two constructs of student engagement identified on the SEI. Herein, students openly discussed specific transitional challenges of their freshman year and common academy practices they found helpful and/or problematic in facilitating their engagement in high school. Some also noted differences in delivery of instruction and social settings between their freshman and sophomore classes.

Findings were organized thematically, aligning with the triadic interplay of environment, cognition, and emotion that influence students’ development of self-agency, integral to student engagement.

**Environment.** When students were asked about environmental factors that both facilitated and impeded their engagement, all seven were concurrent in naming the size of the building as intimidating. They said they were confused by the physical layout of the building and felt lost for the first several days. One student put it, "Like if you didn’t know where you were going you were kind of like a lost puppy. You really needed someone to lean on." Despite the
intimidating size and overwhelming feelings of confusion, students measured high on the SEI item “I feel safe at school” (mean score of 3.06), indicating that they did not feel physically threatened by the building’s intimidating size. Likewise, as this measure correlated with “Most of what is important you learn in school,” students were comforted by the tips for getting around the building by their teachers and upperclassmen friends in the building.

All seven of the focus group participants attended the freshman academy cookout before school began in late August; they felt that the tours given by upperclassmen student council members and fall athletes were helpful and made them look forward to attending their first days of high school. Another feature of the freshman academy that facilitated their comfort in adjusting to the large building was the close proximity of their team classes: “The classrooms are closer together, on the academy, so it’s easier to get to your class.” Students also noted that their teachers were quick to point out “the back staircase” as a means of avoiding the crowded main hallways and central stairwell. Students were comfortable to learn, once their security was ensured. Relationships with teachers and friends played an important role in their sense of security, thus highlighting the interplay of factors impacting self-efficacy beliefs.

In addition to the intimidating size and confusing building layout, students mentioned that their tightly packed schedules and irregularly timed class periods added stress. In addition to the confusing and stressful schedule, students were not used to the rigidity of the high school attendance policy, which requires a doctor’s note to excuse tardiness and absenteeism. After eighteen unexcused tardy arrivals or absences, a student loses course credit, regardless of his or her academic standing. This is extremely problematic for students with limited parental support or means of transportation. Several of the students emphatically addressed the attendance policy
as unfair: “If you’re still passing the course, then you should still get some credit for it. Because you’re still doing the work, and you’re still keeping up, even though you’re skipping school.”

“That’s what I don’t understand, “ another student piped in, elaborating with this rationale:

If you have like an A+ in that class, like if you get sick or if you miss the bus a lot, you don’t wake up, you don’t have parents, you don’t have a solid foundation when you wake up to. You get a schedule and miss that class eighteen times and you have an A+ in that class, you just suddenly drop it, it’s done. I don’t see why that’s fair.

Students did not mention any practices of the academy that addressed this policy that they perceived as unfair. However, they did affirm communication of the policy early in freshman year of high school, and they were aware of peers being issued warnings when they reached nine absences.

Cognition. Recurrent themes of conversation regarding cognitive engagement included setting and achieving long and short-term goals, adjusting to academic demands, teamwork and communication, academic tracking, and intrinsic motivation. Practices of the freshman academy that students recognized as helpful in cognitively bridging between middle school and high school were goal-setting activities, focus on time management skills, teamwork of teachers and students, and academic support for those on IEPs.

As measured on the SEI, the construct of cognitive engagement included control and relevance for schoolwork, future goals and aspirations, and extrinsic motivation. Future goals and aspiration (FG) was the highest rated sub measure among the cognitive constructs. The majority of the students agreed that they were hopeful about their future (3.41). Among the focus group participants, all seven students had high aspirations; and all included post secondary
education or continued vocational training, regardless of current academic stance. One of the students saw herself in graduate school, while another had mapped his future as a master plumber. Anna, the youngest focus group participant, who would not be sixteen until August, appeared to be following the suggestions of adults. She was unsure of her focus; nonetheless, she willingly accepted recommendations of mentors and enrolled in courses to meet their expectations:

I’m thinking of a split major for undergrad because I’ve been really into art, and my art teacher is like … I’m taking a senior art class next year and she wants me in an AP art class and then I’m also really into science and biochemistry, so I want to do a four year college with a split major and then probably go on to do a graduate program somewhere else.

Joe, a technical studies student, shared his aspirations:

I see myself with a good, successful job, if I set my goals on what I want, because I’m in tech. I want to be a plumber when I grow up and if I have the chance to go on co-op, and if I get the opportunity to go out on co-op, I’ll get my apprenticeship and if I like that and stick with that for five years, I can become my own master plumber…I’ll learn what I need. I can join the Union. I can get my license and I can have the amount of money in my wallet that people have when they’re spending on debts. When they’re like 32 and they [his classmates] owe their college $250,000, I would have spent that on a car or something -- or a house.

Joe’s long-term goal, which he used as motivation to meet course expectations and complete high school, was clearly in focus.
Students believed that going to school to learn would open many opportunities for them in the future; however, most of them did not find relevance in much of their coursework. Some students expressed interest in learning for the sake of attaining information, regardless of its value. Here, Emily had rationalized learning irrelevant coursework for the sake of following expectations that others have outlined for her:

Even if we think some of the stuff is stupid, and we’ll never have to know, it’s better to know than not know, just in case if you’re ever, say, going out to dinner with someone wicked smart, just little things like that in life, you know. It just makes you smart as a person.

Anna, clearly uncertain of her future, appeared to be echoing advice of adults in her life: I’m a sophomore in high school, and I have no idea what I want to do. So I want to learn everything that I possible can so I have something to fall back on. Have Plan A, Plan B, Plan C or Plan D. Especially since college is so expensive now you have to base your college on how much debt you want to be in after college.

Students’ future aspirations motivated them to learn, which explains the 3.27 mean score on the SEI item “School is important to my future goals”. When students were asked if they remembered any particular goal setting activities they learned in ninth grade, they recalled writing SMART goals in their English class: “We did that [wrote SMART goals] in English, we did that after every essay.” Students said they did not understand the practice until they reflected on their development as writers as the year progressed. This reflection indicated social-cognitive maturation and development of self-agency. Students said that writing metacognitive essays was also a practice that helped them improve their goal setting skills by focusing on specific
obstacles and learning to meet those more easily in future assignments. Students were in agreement that they did not understand the value of this exercise last year as freshmen, but now it all made sense: “No one understood why you made us write an essay about an essay… But now it all makes sense of why.” The students also made connections between the SMART goals they wrote in English class with those they wrote in their advisory classes, indicating an ability to transfer skill sets among different disciplines. Two of the students in the focus group also mentioned a career cruising program, a mini-course all freshmen take. They said they had never been instructed about writing goals before high school, and now realized the benefit of goal writing and metacognitive activities:

“My goals made me reach further like classes and stuff.”

“I tried harder.”

Ashley added that having goals helped with sophomore course selection:

I think at the end of the year, with course selection, goals really helped. In freshman year especially you have all these classes you have to take, and it’s kind of the same sophomore year, with like a little bit more wiggle room, and your goals for the future really help you choose what courses you want to take and what electives you want to do.

Another theme that evolved through discussion of goal writing was the sense of maturity that students developed during their freshman year. They said that being held accountable for their time management, keeping both short and long term goals in sight, helped them become more responsible and independent. When asked about specific practices they were taught or acquired on the freshman academy, “time management” was concurrent among the focus group participants. Maintaining an agenda to record their assignments was a practice many had not
learned in middle school. Anna excitedly proclaimed the value of her agenda: “I love my agenda. I write everything in there and cross if off when I’m done.” This comment initiated a discussion about the difficulty of adjusting to coursework demands of ninth grade. Students said they had not kept agendas in middle school because they never had homework. This sentiment was not unanimous among all seven participants. Ashley, who attended a Waldorf School through eighth grade, said that homework was less demanding in ninth grade; and Philip was homeschooled prior to ninth grade; all his work was homework. Of the five who attended the district’s public middle schools, their perceptions were unified. Scheduling time in their day to complete homework was their most significant academic challenge in high school transition: “We never had homework in middle school.” For Ashley and Philip, testing was the biggest challenge for them. Others agreed that testing was significantly different in high school than in middle school. Students also noted a significant difference in teacher expectations: “[Ninth grade] teachers expected you to be on top of your work,” claimed Derrick, inviting nods from the rest.

Anna, the agenda lover, claimed, “I never had to work in middle school- when I came here, it was work or fail.” This sentiment was echoed by Emily, a seventeen year old CP1/CP2-tracked student athlete on an IEP who failed her freshman academic courses, but attended summer school to earn placement in sophomore classes: “Yah, there was like no babying, no help. Like if you missed class, you had to go get your work that you missed. It wasn’t like ‘Did you miss this or that?’ It wasn’t like that at all.”

Students’ perceptions indicated a sharp delineation between the district’s middle school and high school teachers’ practices and philosophies. All seven students initially felt
overwhelmed by the intensity and diversity of teacher expectations when they began high school coursework.

When asked about practices of the freshman academy that may have facilitated their success in meeting course expectations, students had different opinions about which specific strategies were most helpful. Nonetheless, all seven were concurrent in the acclaiming the teaming of teachers and students helpful in communicating expectations and charting their progress. Students felt ease in communicating among themselves if they missed something in class. Seeing the same students in different classes or having the same teachers among teammates provided opportunities to share: “…because everyone had the same teachers so we all had the same work. Going through it made it easier.” Ease of communication among teammates facilitated peer support for learning, an important feature of the freshman academy experience for study participants, and an important measure of student engagement.

Interestingly, students noted their freshman academy teachers’ communication as important as their own. They appreciated that teachers spent time sharing insights, ideas, and planning so students would not be overburdened by dueling demands and due dates:

Having the team is also like made it easier for the teachers to talk to you so we didn’t have a bunch of work all in one day. They talked to each other and helped spread it out so you weren’t overwhelmed.

Others added their perceptions:

That’s the thing with it too. When you’re on a team, all your teachers can get together because they’re all with you and they all work together. They all know each other personally, so one teacher can’t be like, ‘Oh you’re failing’ and then the other teacher
doesn’t know what you’re learning and like makes it harder on you and stuff like that.

Like it’s confusing.

Yah, it’s easier to see if you’re struggling in one subject because if all your teachers get
together and so-an-so is such a good student and two other teachers agree, and one of
them is thinking, ‘What are you talking about? He’s failing.’ It’s easier to pinpoint where
someone is struggling.

Students perceived camaraderie among their team teachers beneficial to their own successful
navigation through freshmen year academic obstacles, acknowledging peer support as an
important factor in their teachers’ performance as well as their own.

Of utmost importance in discussing academic transition and cognitive engagement was
the placement of students in academic tracks by ability grouping. Having never been ability-
grouped before high school, students had strong feelings about tracking, both favorable and
unfavorable. On the positive side, students initially appreciated opportunities for those who faced
academic challenges to meet success at their own level. Joe, a plumbing student who was tracked
in CP1 for all his core classes shared his opinion: “The people who have higher abilities and can
do more, can be in a class where they will do more; and the people who can’t keep up with the
fast pace, are put in slower classes. That way they’re not struggling and failing.”

Daphne, a seventeen-year-old CP2-tracked student in the childcare program, felt more
secure in CP2 classes: “I am on an IEP.” She repeated, “I am on an IEP, and I’m in CP2 classes,
and if you threw me in a CP1 class, I think I could do it, but, personally, I like the extra help.”

The topic of support for those on IEPs was a recurrent theme and is later brought up regarding
scheduling limitations and transitioning as sophomores. Anna, an academically tracked student
earning Cs and Ds in honors classes, was the only focus group member who voiced unfavorable concern regarding tracking. Very timidly, which is not her usual demeanor, she voiced her thoughts:

I think it is okay if we mixed it up between the honors, CP1, and CP2 because the honors kids could help the CP2 kids and CP1 kids grow their intelligence level faster and better, so they’re not all around each other. We could all grow off each other, and we could all combine our different ideas and different techniques and we could all learn; it’s a difference variety and not the same people having all the same ideas.

Once Anna shared this, the others nodded, either in agreement or in respect of her courage to voice a different opinion.

Finally, the researcher asked students what academic skills this group of students had acquired in freshman year that they found most helpful in their sophomore classes. In addition to time management and goal setting, students had mixed preferences. Four of them felt that learning and practicing essay writing was most helpful. Two felt that study skills necessary for testing were most valuable, and they credited their special needs teachers for helping them develop these skills. These two students clearly benefited from additional academic support of their daily study skills class, a class of fewer than ten students, all on IEPs, guided by a special education teacher. This support helps them feel secure and build confidence essential in acquiring self-efficacy beliefs.

The final sub-measure of cognitive engagement on the SEI is extrinsic motivation, the least rated sub measure with a mean score of 1.94. Students disagreed that they learned only if rewarded by their teachers (1.89). This correlated positively with “I’ll learn but only if my
family/guardian(s) give me a reward” at 0.762. However, both these attributes correlate negatively with other attributes, indicating that reward is a not a motivator for learning. For these students, the need to be affiliated with others and feel good about themselves was more important than a reward. Emily, who had just made honor roll for the first time, expressed her opinion about rewards:

I think, for me, it’s a personal reward just to get my report card to be able to look at and go, ‘I made honor roll. I have really good grades. My teachers like me.’ It’s a sense of self-accomplishment. It really doesn’t matter what other people think of it. It’s that I’m proud of myself.

This comment was met with nods from peers, and two verbally commented on their pride in her recent accomplishment. Students at this level of maturity are intrinsically motivated, having attained abstract reasoning skills, and this student had clearly developed self-agency. The importance to connect with others was evident in the peer support of Emily when she discussed her previous failure and recent success.

Students also discussed practices of the freshman academy, many that they continued to use. They felt it was important to share ideas and work through solutions with peers, and that being part of a team facilitated stronger relationships with students in their classes:

It [the team] helped me meet more people too, because you would see more of the same faces around and it wasn’t so like just yourself in the school. You would be kind of like “Oh, you’re in my class.” You knew more people on your team.

“It [the team] made me feel more connected to the other students. You felt more comfortable because you had more people to bounce ideas off of.” Peer support for learning was
an important social factor in cognitive engagement, indicating a need for more social learning opportunities to actively engage high school students in the learning process.

**Affect/Emotion.** Recurrent themes of conversation regarding affective/psychological engagement included home-school communication, social acceptance among peers and upperclassmen, teenage angst and social immaturity of freshmen. Practices of the freshman academy that students recognized as helpful in bridging between middle school and high school were the use of technology for self-monitoring and home-school communication, developing a sense of belonging – to a team, program of studies, or after school club, and teacher communication.

As measured on the SEI, the construct of affective engagement included family support for learning, peer support for learning, and student-teacher relationships. Family support for learning was the highest sub-measure for Affective/Psychological Engagement with an overall mean score of 3.27. Among the survey items influencing this variable, a mean score of 3.49 for “My family/guardian(s) want me to keep trying when things are tough at school,” implied that for most students, parental/guardian support was very important to them. They also believed that what they were learning in classes would be important to them in the future. So the more they were motivated by their families, the more they felt inspired to achieve success. This clearly explained how parents’ attitudes about school and learning impacted their children’s performance.

Several times during the focus group interview, Joe alluded to his parents’ inability to process what he was doing in school. He expressed feeling that his coursework in high school was far more difficult than what his parents ever learned: “My parents aren’t smart. They don’t
know half the stuff I’m doing in school.” Another time he mentioned that what he does as a sophomore his mother was doing as a senior. Clearly, his parents cared enough to talk to him about his work, but he perceived their lack of understanding as lack of investment in his learning. In fact, when asked about how effective teacher blogs were in communicating upcoming assignments, Joe quickly replied, “That all depends on if you have parents who care … my parents don’t even know what the blogs are.”

These comments by Joe sparked conversation about teacher communication with parents. Most students in the focus group thought it was important for teachers to communicate with parents about them, but they also thought the communication should be selective and teacher-initiated, only when parents needed to help out:

If the teacher was like, “Your kid needs to stay after to get help,” that’s good for your parents to know so maybe they can help you… but my little brother – he can’t even sneeze without the teachers sending an e-mail home.

Contrarily, Anna, thought any communication between parents and teachers was helpful:

I like when my teachers talk to my parents because I know I sometimes say ‘just stuff’ and ‘school’s okay’ and I know my mom wants to know more, and I know my dad wants to know more, so the teachers know exactly how we are doing.

Clearly, parent-teacher communication had different value among different households, and could be perceived as illuminating or intrusive.

The academy teachers all maintained weblogs and an online grading program for ongoing one-way communication. For the most part, students found online home-school communications helpful for themselves, but only one spoke of her parents visiting the blogs regularly to check up
on her assignments. As evinced in the comments below, some students utilized online
communication more effectively than others. Likewise, some teachers were more diligent about
posting assignments regularly and keeping their grades up-to-date than others. Anna, the diligent
agenda-keeper, continued to use her sophomore teachers’ blogs and continually checked her
academic progress using Aspen, the district’s online grading program:

I use my agenda literally like it’s my life and it has all my homework on it and stuff, so if
I forgot to write down my homework and go on the blogs, I can go on and see what was
assigned and stuff.

She also claimed that her parents used the freshmen teacher blogs and referred to sophomore
teacher blogs that are available: “My parents worship the blogs. I worship the blogs.”

Anna’s positive perceptions of the blogs were echoed by Derrick, who was frequently
absent due to medical appointments: “My Bio teacher assigns so much homework, so to be able
to go on Aspen and see exactly what I am missing helps out a lot.”

Emily valued access to online grades as a means of self-monitoring: “You know what to
do to improve your grade.”

Daphne echoed, “Yah, what you’re missing, you can go back and get it.”

Many students and their families were using technological communication strategies
introduced during freshman year to remain informed, and for students to self-monitor, which
facilities their development of self-agency. Nonetheless, not all students were enthusiastic about
the availability of online assignment and grade posting; in fact, Ashley, a self-proclaimed
technophobe, considered the blogs useless:
Like if my parents wanted to know what the homework was, I would be like, “Oh yah, I’ve got to do this for this class and I have this for this class and I have a test in this class tomorrow.” For me the blogs were kind of almost pointless.

Since students had mixed feelings about freshman teacher blogs, and many said their parents never visited them, whether this mode of communication facilitated student achievement and helped them become more independent was contingent upon individual student needs and preferences, as well as parental interest and proficiency with technology.

In addition to family support for learning measuring a high mean score (3.27) for affective engagement on the SEI, peer support for learning, with a mean score of 3.05 on the SEI, indicated that supportive friendships were also important to student motivation. Most students agreed that they had some friends in school (3.46), emphasizing their need to be known, to make friends and be accepted by peers at school. This attribute was positively correlated with “Most of what is important to know you learn in school.” Friends played an important role in creating a learning environment, which promoted cohesiveness and sharing of ideas. Students claimed that making new friends was the most difficult social adjustment to their high school transition. They expressed concern about not knowing kids in their classes who came from different middle schools: “I didn’t know anybody,” stated Ashley, who attended the Waldorf School through eighth grade. Likewise, Philip, who had been home-schooled did not know many of his classmates prior to freshman year. Even those students who attended the district’s two middle schools, perceived themselves as socially isolated. Anna claimed that all her friends were enrolled in the district’s other high school: “I had to build new friendships and start fresh. I had friendships since elementary school, and I had to start over in like a year’s time.”
Similarly, Emily felt the need to establish new friendships: “I had to make all new friends. Thank God I talk, because I would probably have no friends. I talk a lot.”

Daphne felt totally out of place on her first day:

Especially at lunch the first day -- like you’re that freshman, and no one wants you to even be at that lunch because you don’t know your number [id number used to order lunch]. You don’t this. You don’t know that. There’s nowhere to sit. All the seats are taken.

Students effortlessly recalled first days’ anxieties, and felt comfortable reflecting on how their fear of not fitting in interfered with their academic progress:

I was just so concerned about friends and being popular last year, but then this year, I just kind of came to accept that I don’t care and I’m just more focused on doing school. I would just go to class just to go through the hallway to go see someone for four minutes [passing time between classes] and I would be so concerned with everything else, I didn’t pay attention in school… Last year I was so concerned about what people thought. I was not paying attention to what really mattered in school. This year, it’s not like that.

Students’ comments indicated that they had made a successful social transition, although the first months of high school may have been socially/emotionally tumultuous.

When asked what specific practices of the freshman academy helped them adjust socially, they all agreed that being on a team was conducive to forging friendships. Specifically, they all recalled their September team field trips to Camp Clark, a YMCA project-adventure-type day camp, and felt the field trip was a valuable ice-breaker, helping them make new friends and
trust one another while engaged in collaborative problem-solving activities: “We went to Camp Clark. It was building like project adventure things and it helped us meet and trust each other.”

As students discussed Camp Clark and teamwork, the topic of school athletics and extra-curricular activities arose. Students felt that it was easier to fit in if one had a recognizable talent, and being involved with athletics was one way to demonstrate their abilities:

I think a lot of times it’s easier to gain respect from other people if you play a sport because then if you perform well in games and in practices and you’re a team player, your team will gain your respect, and once you have that, it’s easier to get other students to respect you.

“Sports are a huge thing. It helps a lot. If I didn’t play volleyball, I wouldn’t be friends with a lot of people I am now,” added Emily.

The discussion of belonging to a team or club brought up the topic of technical studies rotations that freshmen tech students travel through. With the exception of childcare students, technical studies students rotated through each of the available programs for ten days at a time. Toward the end of the first semester, they made selections and were placed in a program or not accepted to a program, based on their academic teachers’ input, tech teachers’ perceptions of them, and any documented behavior. Since they were in small groups, experiencing different fields and trying to impress their instructors, they developed friendships. As Derrick put it, “Because everyone is doing the same thing, trying to find friends, so everyone is very open … I think that’s why exploratory was a good idea because you got to meet everyone.”

Joe, who was recognized as an outstanding plumbing student, discussed his transition into the school and how being in a tech program had influenced his social acceptance:
I feel that with tech -- I knew no one in my tech class. I knew like three people, and now I know everyone like the back of my hand. They’re my best friends, and I know pretty much everything about them, what they do, what kind of person they truly are.

It was apparent from these conversations and the SEI data, that social acceptance was an integral part of high school engagement. If students are focused on feeling isolated and/or rejected, their academic performance is significantly impeded. Likewise, if they feel acceptance and encouragement, they will actively participate in the construction of meaningful learning. The freshman academy practice of teaming students, the technical studies programs, the Camp Clark field trip, and freshman teachers’ classroom icebreakers helped students establish new relationships and develop a sense of belonging to the school.

Among the student-teacher relationship sub-measure on the SEI, the highest single item mean score was in regard to “I feel safe at school” (3.06), which was positively correlated with “Most of what is important to know you learn in school.” Students felt that they could learn what was important in the school, but learning was contingent upon their sense of security. If a student felt threatened, physically or emotionally, he or she would have difficulty focusing on the construction of new knowledge. A safe and supportive classroom environment was essential to learning. As students recalled their freshman year, many remembered feeling emotionally uncomfortable, but none mentioned threats of physical harm. They recognized that their team teachers’ watchful eyes and frequent communication about students made them feel comfortable. One student stated, “Teachers were willing to help in case of anything,” as she mentioned her history teacher assisting with her locker several times within the first few weeks of school.
Another student noted that since their lockers were right outside the team classrooms, and teachers stood in the hallway between classes, there was always a teacher watching out for them.

Here again, students brought up the theme of communication. Joe noted that the close proximity of classrooms on the academy gave the teachers more opportunity to talk to each other and students between classes. Daphne felt that teacher communication about student performance was helpful: "The teachers knew what your grades were in every class and they were able to communicate and help me do better, but like this year, you are kind of on your own".

Derrick felt that teacher communication about assignments alleviated some of his anxiety about meeting high school expectations:

Having the team is also like made it easier for the teachers to talk to you so we didn’t have a bunch of work all in one day. They talked to each other and helped spread it out so you weren’t overwhelmed.

Joe added, “We didn’t have a whole bunch of work from every single class all at once. They [the teachers] liked coordinating that way. If we had a big project, the teachers wouldn’t give us ton of work.” Joe’s comment illuminated the correlation of students’ perceptions on the SIE between adults listening to students and teachers caring about students.

Students clearly perceived their freshmen teachers as caring about their performance, and expressed that this year as sophomores, they were more independent. When asked what their overall perceptions of the academy were on preparing them to be successful sophomores, these seven focus group participants were unanimously positive in response that it was a “stepping stone to the next level … You don’t go from one extreme to the other, from doing no work in
middle school to doing like three projects and an essay every month, like we do now as sophomores.” Students felt teachers cared about them and made them feel more comfortable in class and on the team in general. They also felt support of family and friends very important factors in their affective engagement in school.

**Research sub-question 3: What are the staff’s perceptions of the academy’s practices in facilitating and/or impeding student engagement?**

To provide another voice to the quantitative findings of the SEI instrument and student input from their focus group interview, additional qualitative data, collected through a faculty focus group interview is included herein. This discussion panel consisted of six freshman academy staff members, who met for eighty minutes after school on Wednesday afternoon, May 2, 2012. The group included one teacher from each core content area: English, math, science, and history, as well as one special education teacher and one guidance counselor. Each participant had been a freshmen academy staff member for a minimum of three years. The researcher facilitated a discussion of open-ended questions, aligned with each of the six sub-measures of student engagement identified on the SEI. Faculty openly discussed common academy practices they perceived helpful and/or problematic in facilitating their students’ engagement in high school. Some also noted differences in delivery of instruction and social settings between their freshman and sophomore classes. Key findings of the staff focus group are organized thematically, aligning with the triadic interplay of environment, cognition, and emotion that influence students’ development of self-agency, integral to student engagement. The researcher has also integrated information from school documents and freshmen retention data in conjunction with teachers’ discussions.
**Environment.** As in the student interview, staff commented on students’ initial reaction to the school size, configuration, and organizational structure. When asked, “What freshman academy activities do you feel best acquaint students with the building’s physical structure and organizational routines?” all six members of the focus group expressed sensitivity to students’ initial discomfort in building transition. They also concurrently noted that tours given at the freshman academy cookout were beneficial to students’ orientation with the building’s physical structure. In addition to the cookout tours, which were conducted a day or two before school began, three of the panel members commented on additional help they offered their students. Elaine, the special education teacher, shared her common orientation practice:

> I do extra tours with my kids. The first few days of school, I walk them around to acclimate them with the building. I show them the back staircase and where guidance is and where all the bathrooms are, how to go from one point to another without using the main stairway.

Emma, the guidance counselor, added her perspective:

> In addition to the cookout tours, the tour the students take as eighth graders … I find that tour at the end of the school year is helpful. The kids from SMS have always come over for the tour. This year we’re including the kids from NMS as well, I believe. I point out all the signs in the building that indicate where the classrooms are, and tell them I use them too, when I’m trying to figure out which hallway to go down.

The “end of the year tour” Emma referred to is a guided tour given to small groups of eighth graders by freshman academy teachers on the last day of school. There are no high school students in the building, as these tours are scheduled during final exam half-days, after 11:00 am
dismissal. The one middle school that shares the same campus as the high school had routinely visited, one eighth grade team at a time. The other middle school, located several miles away, had not visited in the past.

James, the history teacher, pointed out that the close proximity of team classrooms:

Three of the four classes are, on purpose, right next to each other, and this creates a home base. It may create problems as well, as the kids don’t have to explore other parts of the building, but I think the home base feeling is a positive. Also, because we [the teachers] are so close together, the kids see us all the time, and this adds to the home base feeling.

James added that the close proximity of English, math, and history classrooms on his team afforded him the opportunity to communicate continually with his teammates: “I know the communication is always very strong between myself and the math teacher and the English teacher because we all right there, close together.”

Sam, a science teacher, brought up the location of his classroom [like all academy science classrooms], physically separated from his team, downstairs in the science wing. He said that he made an extra effort to communicate with his teammates. He also shared that he took time to show his students the fastest way back to their team after his class, suggesting pathways that avoid the main travel routes. And he was lenient about tardiness the first two weeks of school, understanding that his students may have been overwhelmed. Showing students how to avoid the swarming crowd of upperclassmen was important to teachers helping students develop a sense of security. Academy teachers and staff consciously guided their new students away from unnecessary confusion each fall. Teachers also discussed simple procedures used in acclimating their students to the building and establishing a team home base to facilitate students’ transition
into the building. Conversely, helping freshmen adjust to the organizational practices of high school was not as easily addressed.

Teachers did not mention the attendance policy, which was a focal point of student discussion, but noted the difficulty of students learning that they had to earn credits to pass courses. Prior to high school, students passed or failed the year; inadequate performance in one course did not warrant retention, but may have required summer school. As high school freshmen, students had to earn 27.5 course credits to move forward as a sophomore. Rebecca, a 25-year-old English teacher in her third year on the academy, pointed out:

They [freshmen] don’t understand about credits. I think that goes back to middle school, where we see so many times where kids fail and they just move to the next grade. Failure was acceptable. And then they get here and you tell them, “No, it’s all about the credits. You don’t get the credits, you don’t move on. It’s as simple as that. They [administration] don’t make deals… No grades, no credits. See ya next year.”

Rebecca went on to discuss the number of repeating students she had in her freshman and sophomore CP2 classes, many of whom just didn’t do their work and figured they’d move up since they were passing their other classes.

The concept of earning course credits was routinely addressed repeatedly, early in the year, through oral and written communication. One practice of the freshman academy was scheduling a guidance counselor visit to every history class of each team. This ensured that all first-time freshmen were present at the meeting. Emma, the guidance counselor for three out of the four teams, provided printed handouts, with a schedule of core courses and electives that students completed in order to graduate on time with their peers. She spent an entire class period
going over all the requirements to earn credits, and explained the variances for technical studies
students. When she was done with her presentation, she fielded the students for questions.

Another practice of the academy, to instill in the students the importance of passing each
of their courses to earn credits, was a team practice of early intervention. Halfway through first
term, each team of teachers met to discuss students who they felt were at risk of failing, due to
emerging patterns in underachievement or attendance. Teachers met with individual students and
emphasized the importance of earning credits for courses or experiencing the consequence of
failing, becoming a repeater, as there are always a few on team. In addition to communicating
individually with students, some teams, as James of the Blue Team pointed out, sent written
communication home, notifying parents that their child was at risk of failing one or more
courses. This initial notification was soon followed up with school wide distribution of first term
progress reports.

Considerable time and effort was made to communicate the importance of passing
individual courses, and considerable measures were taken to reduce failure. Nonetheless, there
had not been a considerable reduction in grade-nine retention since implementation of the
freshman academy. The academy housemaster shared the data in Figure 5, which represented
yearly freshmen retention, based on course credit earnings.
Figure 5. *Freshmen Retention* represents annual freshmen retention rates of the program’s first six years of implementation.

The figures in blue represent the percentage of freshmen that did not earn enough course credits to be statistically considered sophomores. The figures in red represent the percentage of freshmen placed back on a freshman team for a second year of ninth grade. The difference reflects students who had been placed in sophomore classes and credit recovery courses simultaneously. They may also have repeated one or two freshmen classes with a team, but no more than two.

A final environmental factor of the freshman academy that both students and teachers brought up was the teaming model, which was beneficial to socialization and building a sense of security for freshmen with its home base feature. However, there were some features of this freshman academy’s four-person team teaching model, contributing to rigidity that was not
conducive to cognitive or affective engagement of students. Team teachers shared a common planning period and a prep period. They were each scheduled one off-team class during the same period. During the four on-team periods, the approximately 90-100 students, who were ability tracked, were placed in one of the four-team teachers’ classes. Based on teacher discussion, this rigidity may have caused the misplacement of some students in an inappropriate track for one or more courses, and it may have caused other classes to be almost identical in population throughout the day.

Table 10

<table>
<thead>
<tr>
<th>Course</th>
<th>Period A</th>
<th>Period B</th>
<th>Period C</th>
<th>Period D</th>
<th>Period E</th>
<th>Period F</th>
<th>Period G</th>
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<td>CPT</td>
<td>Prep</td>
<td>CP1</td>
<td>Honors</td>
<td>CP2</td>
<td>CP1</td>
<td>OT</td>
</tr>
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<td>CPT</td>
<td>Prep</td>
<td>Honors</td>
<td>CP1</td>
<td>CP1</td>
<td>CP2</td>
<td>OT</td>
</tr>
<tr>
<td>Science</td>
<td>CPT</td>
<td>Prep</td>
<td>CP2</td>
<td>CP1</td>
<td>Honors</td>
<td>CP1</td>
<td>OT</td>
</tr>
<tr>
<td>Math</td>
<td>CPT</td>
<td>Prep</td>
<td>CP1</td>
<td>CP2</td>
<td>CP1</td>
<td>CP1</td>
<td>OT</td>
</tr>
</tbody>
</table>

CPT- common planning time for all freshman academy teachers
Prep – team prep period
OT – Off team class – usually a sophomore class or an elective

Table 10. Example of Schedule Limitations illustrates the complications of ability-group tracking in a 4-period, on-team block.

Student could be enrolled in two or four courses of one track, but when a student excelled or needed special attention in one course, placing a student in one high or one low level course and three CP1 courses was difficult to arrange. Likewise, if a student were to be enrolled in honors English, honors history, and honors science, he or she would have to be enrolled in honors geometry for math; however, if that student had not taken algebra in eighth grade or had
not performed proficiently in algebra in eighth grade, he or she could not take honors geometry. This would mandate that another one of the student’s classes not be taken at the honors level.

In the teacher focus group interview, teachers noted several environmental factors impeding freshmen students’ adjustment to high school. They also shared their perceptions of freshman academy practices aimed at addressing students’ challenges. The physical size and layout could be overwhelming, so tours were offered before school began. Additionally, once classes were underway, teachers took time to orient their students and give them helpful advice about avoiding the more congested travel routes. In addition to the physical structure of the high school, operational routines could also be impediments to successful transition. Students had difficulty understanding the concept of earning course credits in each of their courses in order to advance to the next level, meeting a sequential series of graduation requirements. Team teachers and the academy guidance counselor communicated these policies early and frequently, yet teachers claimed that students “just don’t get it.” Students lack of understanding may have been due to their cognitive stage of development, in that some first time freshmen, at the age of fourteen, had not attained the ability to process abstract thoughts, and until they physically experienced retention, they did realize the consequences of failure. Unfortunately, once they were retained, they were at a much higher risk of dropping out of high school.

**Cognition.** Among teacher focus group participants, several themes evolved under the umbrella of cognitive engagement. Communication, development of time-management and organizational skills, setting of long and short-term goals, instilling work ethics, and the consequences of ability-tracking students emerged as thematic topics of discussion.
As measured on the SEI, cognitive engagement included the sub-measures of future goals and aspirations, control and relevance of schoolwork, and extrinsic motivation. Of these three sub-measures, students’ highest survey item mean score (3.41) was on the item “I am hopeful about my future.” Overall, students had aspirations of a bright future, as illuminated in their focus group interview. Students spoke of long and short-term goals, keeping agendas, writing SMART goals, and writing metacognitive essays. Among the teachers in the focus group, only Elaine, the special education teacher, consciously worked with her students on setting and taking ownership of goals by writing them down and later revisiting them:

I know in my small group English [class] I do spend a lot of time in the beginning. I call them baseline writing and usually I will choose subjects where they have to think about what’s different at the high school. [I’ll ask,] “What are you anticipating? What do you think will be the biggest problem?” So while I’m checking out their writing level, I’m also giving them a chance to express some of that [aspirations] and talk about them. Then we actually do some brainstorming how we can handle the expectations. So I think that’s one of the things I get to do.

Elaine’s off team class, the one she referred to here, a pullout English class, was comprised of students with profound literacy-based learning disabilities. They were on-team in their other classes, usually a couple of students from each team, but with Elaine for English.

Although Elaine was the only one who actively worked on long-term goals with her students, all members of the focus group valued the activity of writing SMART goals with their advisory classes, as James mentioned, “I think our advisory program has introduced a lot of things to our curriculum, to our student climate. We have SMART goals [kids set in Advisory
class] and they are similar to what Elaine is talking about.” James also worked on goals with his freshmen, but he approached academic goals verbally, more in lecture style:

> I tend to focus on goals in terms of academic goals with freshmen. [I tell the kids,]

> “Make sure you don’t eliminate choices. Once you start getting F’s and you start failing classes, you really limit yourself.” I’m a little concerned as a sophomore teacher, but they kind of got that message already. Now we are looking a little bit further than just the next progress report.

James and the others were clear that their stance with sophomores was quite different than with freshmen.

> Only Rebecca spoke of the value of metacognitive essays in her English classes, an expected practice of every English teacher in the department, regardless of grade level. Rebecca, voiced more concern over addressing social behaviors with her freshmen classes:

> I spend more time with the freshman on social aspects -- this is what you need to do, this is how you be a good person, and this is respectful. You can’t do this or say this with the teachers -- whereas the sophomores, it’s more of an academic type level trying to get them to succeed.

In addition to James and Rebecca, Sam and Ross shared different approaches to goal setting with freshmen and sophomores, indicating that teachers consciously recognized the difference in social cognitive development of their freshmen and sophomores.

> Emma’s input from a guidance counselor’s perspective was unique and provided insight as to why the students comfortably discussed goals, some more concretely than others:
I know that from a guidance perspective a little bit we try to paint the long-term picture. What credits do you need? What classes do you need? What kinds of things do you need to do to in order to move on beyond high school? We do that individually. We do that in the classroom. We do that goal setting and career cruising in the computer lab so they get that multiple times throughout the freshman year.

Emma was referring to a program, titled *Career Cruising*, which all freshmen completed sometime during second or third term. Two of the student focus group members also mentioned this mini-course. Students went to the computer lab, where they entered information into an online application that then determined some possible career paths. They explored these possibilities on subsequent visits to the lab. For the most part, freshmen were directed to set long-term goals throughout the year, whether in English class, advisory class, or in their Career Cruising program.

More concurrent than perspectives on goal setting, were the findings between both focus group participants regarding the importance of time management. Students and teachers highly valued the freshmen academy’s focus on organizational practices integral to meeting course expectations, most importantly time management through agenda keeping. Highlighting this important skill was the unanimous and concurrent finding that students’ most significant academic challenge in adjusting to high school was completing homework assignments. Almost simultaneously, every teacher in the group responded, “Homework,” to the question, “What is the most significant academic challenge facing your freshmen?” Once the word “homework” stopped echoing, three teachers brought up students’ lack of study skills. Elaine retracted on homework and put testing in top ranking challenge for her students: “Testing would be number
one because even those kids who know how to do their homework, when it comes to preparing for let’s say a chapter test or that unit test, sometimes they’re just lost.”  In the student focus group, preparing for tests was also a topic of concern and a skill most claimed to have acquired in freshmen year.

Ross, a veteran math teacher of twenty-five years, in his third year on the academy, expressed his opinion about organization:

One of the things I would stress with the kids is that -- I stress it all year -- is try to be organized, Number One. Organization as a freshman is big because if they learn that as a freshman, they’ll keep using it.

Teachers, similar to the students, valued the opportunity to communicate the importance of time management skills for their students. Students were issued agendas at the beginning of the school year, and they were expected to fill them out daily. When a student was failing, parents were urged to check the students’ agenda nightly to ensure that assignments were recorded and checked off as completed. This practice encouraged setting and tracking short-term goals. Although a valuable resource, many students were reluctant to use agendas. James reported that he found many left behind in his class with little or nothing written inside.

Teachers tightly laced organization skills and work ethics together. This correlated with the students’ response to the SEI item, “When I do well in school it’s because I work hard,” which rated a mean score of 3.24, the highest among the control and relevance sub-measure of cognitive engagement. Students felt strongly that when they worked hard they met success. Recording homework assignments in an agenda, and completing projects by their due dates required acquiring new skills, setting goals, and remaining on task, which was hard work for
these freshmen. Although students understood that hard work led to success in school, according to teachers, many students failed to complete homework assignments or prepare for tests, indicating a willingness to accept mediocre performance.

Teachers’ efforts to instill the importance of work ethics were evident. Ross stressed that establishing consistent work habits was integral to success in math:

Especially in math, I stress that because in math you have to do daily homework. You can’t put it off for three or four days. If you’re reading something, no offense to the history or English teachers, but if you’re reading something, you can put it off a day or two … whereas in math, if you don’t do this section and then this section and this section, and you put it off, you can’t do it … so I stress to make an effort everyday because if they don’t do the daily homework, they won’t do well with the quizzes.

Rebecca chimed in with due dates and her practices:

At the beginning of the year I explain to them what I mean by a due date. I say, “If it’s due on Friday, that means that Friday is the last day you can give it to me … You can give it to me any day up until Friday, but Friday is the last day.” They don’t understand that. They all wait for the last second and then they don’t turn it in Friday. “Can I give it to you Monday?” That’s not what a due date is all about … I tell them, “When you get into college, when the professor says this is the due day, and you don’t have it, they aren’t going to care.” So I try to get these kids ready for college. They’re only freshman, but still if they learn good study skills and good habits, it should work a little bit you know… I think what they don’t understand is that we’re structuring things for them and slowly releasing things.
Rebecca went on to discuss how she broke down larger writing assignments so different paragraphs and drafts were due on specific days. As the year progressed, her students learned the importance of the process of writing, and that they wouldn’t be graded on a product that did not reflect processed pieces.

When teachers were asked about additional practices of the academy, which they felt facilitated cognitive engagement; they all mentioned the communication opportunities of the team teaching model. Having classes in close proximity to one another (except science) and their common planning and prep periods gave them time to discuss students’ emerging patterns that lead to both successful and problematic performance. James mentioned common planning time:

We meet everyday where we have the common planning time, which the other teachers don’t have, and it gives us a really good chance to talk about, “Well, how’s so-and-so doing in your class? What is he doing? Oh, he’s having a problem with something.”

These discussions often led to early intervention of a student with academic, social, or emotional issues. Weekly meetings with the housemaster and guidance counselor offered additional intervention opportunities. Although common planning time was intended to afford opportunities for teachers to plan cross-curricula support of one another, most of this time was spent on student management rather than instructional planning. Nonetheless, three of the freshman academy teams had implemented at least one research-based interdisciplinary unit.

Rebecca noted the weekly departmental meetings as beneficial:

I think what the Academy does well is I get to meet with my [other freshmen] English teachers once a week. I only see my department once a month, so to share what’s going on my grade level, I get to do that once a week … We can ask about what progress have
we made, what paper have we done, how did they respond … Also, this year, because I have CP2 sophomores and they’re struggling a lot, I can think about who their English teacher was last year. I can go back and kind of talk to that teacher if they’re on the academy.

Weekly departmental freshman academy meetings afforded staff the opportunity to share ideas. Teachers, like students, noted that by talking everyday with their teammates, they learned of each others’ long-term assignments or major unit exams, and would push back their work for a day or two to let the students focus on one major task at a time.

James brought up that sometimes he learned from his students that they had a major paper due or a test in another class, so he would just reschedule his test. Other teachers said they did the same. This practice illuminated the Pearson correlation of 0.593 of students’ perceptions between adults listening and teachers caring that were measured on the SEI results. James felt it was important to help the kids meet their goals:

I think at the beginning of the year it’s good to be cognizant of that stuff, but sophomore year, there’s no communication between teachers, and the students all have different teachers, so assignments aren’t going to be pushed back for a few kids, so it’s important to wean kids off of that expectation before the end of freshman year.

Awareness of students’ cognitive stage of developmental and gradually releasing more responsibility as the year progressed was important to students’ development of self-agency. Practices discussed by teachers in this focus group appeared to be assisting students in the development of self-efficacy beliefs.
Another theme that emerged in this focus group interview, was the freshman academy’s practice of ability-group tracking. Teachers had mixed feelings about this practice. Philosophically, they felt that students of different abilities should be held to different standards of performance, and being grouped as honors, CP1, or CP2 allowed students an opportunity to be challenged and thrive at their own level. However, when considering the tight grid of the four-person team model, as illustrated above in Table 10, many realized that students were not necessarily placed in the appropriate tracks, and the nature of smaller CP2 classes skewed the numbers in other classes. During the academy’s first two years, there were no CP2 level courses, just honors and CP1. James brought up the class size imbalance created by adding the CP2 track: My first year we did not track. We only had honors (or accelerated, as we called it then) and CP1. And now the CP1 is split into CP1 and CP2 … I was all for it on paper and it seemed like a good thing …. I’ve been kind of recording the data; I was looking back, because last year I ended up with nine or ten students in my CP2 class – two passed. That’s a horrible failure rate, a very, very low success rate, and … my conclusion was if those kids were integrated into a CP1 class, worse case scenario, I would have lost two or three more kids over a three year period of time…. I would much rather have smaller CP1 classes -- And how many of those kids [CP1] failed because I had such a large class? Maybe they would have passed with a slightly different [teacher: student] ratio. So for me, I’m kind of against it.

Since many students in CP2 classes were on IEPs that dictated individualized attention to their special needs, the classes were usually very small in size, with fewer than fifteen students, and included support personnel, either a special education teacher who co-taught with the content
teacher or a paraprofessional. Considering there were approximately 90-100 students on a team, when one teacher had only ten students, the remaining ninety were among the three other teachers, one of whom would be teaching an honors class, which generally had fewer students. This overburdened the two CP1 classes being held that period. It was not uncommon to have more than thirty CP1 freshmen in a class, some who were also on IEPs and required individualized attention. Effectively establishing social learning opportunities in classes with such high enrollment is difficult, even for a veteran teacher. The overpopulation of CP1 classes may have contributed to students’ perceptions of lack of control over what happens to them at school, which measured a mean score of 2.27 on the SEI, the lowest rating among the control and relevance of coursework sub-measure of cognitive engagement.

Unlike James, Ross had positive feelings about ability group tracking:

I have a lot of success with my CP2s. I’ve been on the academy for three years and my CP2s do very well for me. One good thing about that is it lets them achieve success and it makes them feel good. You know, ah, he gets some good grades. Whereas, if these kids were in CP1, they wouldn’t be able to handle it … and my kids work. The kids I have, they really work. Most of them work really hard, and I have very few failures in the CP2s, whereas CP1 there’s some drawbacks there. You have kids in CP1 that maybe shouldn’t be there or they should and they’re just lazy and they don’t do the work that they’re supposed to be doing. I like the honors track, but I have some problems with the CP1s.

Ross went on to discuss the problems with students who were misplaced in the wrong track.
Elaine was adamant about the need for CP2 classes, but complained about students being placed in CP2 classes, based on their lack of work ethics rather than their academic needs. These students were usually repeating freshmen, many with behavioral issues, resulting from years of academic failure:

The problem I’m having, those are my kids, is they’re in there because they have a specific need for a certain learning style just like at the other end, the honors kids need to be in a situation where they’re pushed and given more independence, but people are forgetting why we set up that system and now we are getting the kids who just don’t do their homework and they’re behavior issues. Now it’s impeding the learning of those other kids who really need that highly structured, small group CP2 situation.

Elaine also brought up the issue of personality conflicts arising from students placed in the same classes all day, which generally happened with the CP2 kids:

The core of ten to fifteen students in the CP2 class are with each other all day long … they can’t escape bugging each other … and they can’t escape whatever MSN [special needs teacher] may be following them, whatever aide might be following them through their classes.

The tendency for students to become too familiar with one another on the team, influenced their affective engagement in school, which is further discussed below.

Although most of the teachers initially said they were in favor of tracking the students, they all mentioned some negative consequences, many of which were not conducive to fostering productive and equitable learning opportunities for students on the freshman academy. By the end of this discussion many were “on the fence” as Sam put, “not sure on what is best for the
student... Some of those kids [CP2] would be okay in a CP1 class, and others would absolutely flounder and fail.” Overall, teachers were in agreement that tracking students on the four-person teaching team pigeonholed students and caused an imbalance in class size, yet most felt that students benefited from different pacing and depth of instruction.

Similar to students’ perceptions, teachers did not feel that students were motivated by extrinsic rewards in school or at home. The teachers felt the rewards a student got for earning honor roll status or acting compassionately to a classmate, came after the achievement or behavior, rather than serving as enticement for motivation or performance. Teachers noted that their students expressed pride in being recognized for their kindness or hard work, indicating that intrinsic rather than extrinsic factors influenced most children at this stage of cognitive development.

**Affect.** Regarding affective/psychological engagement, emergent themes among freshman academy staff were similar to those of the student focus group; however, the lenses were hewed different shades: adolescent and adult. Opportunities for effective and frequent communication afforded by the team-teaching model were perceived as essential to team dynamics: family support for learning, peer support for learning, and student-teacher relationships, the three sub-measures of affective engagement on the SEI.

On the SEI, students’ highest rating of a sub-measure was family support for learning, with an overall mean score of 3.27. Although academy staff expended considerable time and effort to keep families informed by maintaining teacher blogs and posting online grades, the communication was predominantly one-way. With the exception of the freshmen cookout and open house, which was sparsely attended, parents/guardians were rarely seen on campus, unless
they were attending a sporting event. Teachers expressed some frustration over their efforts to communicate, as Sam stated, “We can identify kids at risk all day and send home progress reports, report cards, letters and notices, but if the parents aren’t responding to them, they’re not communicating with us, then there’s nothing more we can do.” Other teachers in the focus group shared Sam’s perceptions.

Emma, the guidance counselor felt that effective home-school communication should be parent initiated. Rebecca shared Emma’s sentiment:

We’re happy to communicate with home but you have to let us know first that you want that weekly or you have to initiate that email first. We’re happy to communicate with parents all day long, but they need to speak up and initiate for their child.

Rebecca also shared teachers’ frustrations regarding ignored communication:

We give so many venues too. There are progress reports, report cards, self-initiated progress reports; there’s Aspen, there’s email, there’s phone. I know some who have given parents their cell phone numbers so they can call on the way home. There are so many avenues that no parent could ever say I didn’t know, and yet we still get them.

Elaine said that she communicated so frequently with her students’ parents that she had some of them on speed dial.

The topic of home-school communication brought up the effectiveness of the academy in addressing the habits of underachieving students and preventing their failure. James shared his perception:

I think we do a good job of capturing the student that’s a D student … from slipping through the cracks and from failing because the pressure that we exert on them as
teachers is more intense. For my sophomores, I have less contact and fewer connections. We hear a lot from upperclassmen, “I wish I had done it better as a freshman, I wish I had done better. Grades count.” So I think if we capture them [D students] and keep them from failing at that [freshman] level, they kind of mature and … they have a much higher success rate as they go forward.

For the failing freshmen, teachers were concurrent in their perspective on the value of parent-teacher meetings, which Emma further validated:

Whether there are actually positive results or not, I’ll tell you, if there’s no meeting, the chances of success or turnaround is almost zero. With a meeting, we can have ten meetings and we might only have five success stories or improvement after that, but we would have none if those meetings didn’t happen.

Apparent from teachers’ discussion regarding communication with home, they were cognizant of the importance of parental support of students, and they made continual efforts to let parents know when things were not going well at school. Since students rated “My family/guardian(s) want me to keep trying when things are tough at school” with a mean score of 3.49, the highest single item mean score on the SEI, parents were communicating with their children regarding their performance at school; however, based on teacher’s voiced frustrations, parents were not communicating directly with teachers.

Teachers were conscious of students’ need to make new friends, fit in, and belong to a group, which measured an overall mean score of 3.05 on the SEI sub-measure of peer support for learning, thus substantiating teachers’ perceptions. When asked about how the academy affords students the opportunity to make new friends and feel connected, teachers mentioned the Camp
Clark field trip at the beginning of the year as a valuable day of bonding. They also spoke of individual icebreaker activities in their classes.

James said he tried to break up the clicks, as the kids tend to gravitate towards familiar middle school faces:

Any sort of ice breaking activity and we’ve done dozens of them … it’s kind of funny not at the time of course, but if you ask them who’s from NMS, who’s from SMS, who’s from the Charter, they’re almost always sitting next to each other, so anything to break that, break their little clicks … Anything that gets them up and moving around the room and introducing themselves … I think goes a long ways because they realize ‘Oh, I don’t have to be with my click that I was with in middle school. I can actually go and meet other people.

Sam added:

Along that line, choosing their groupings – not letting them choose who they want to work with on group activities. Knowing where they come from when choosing groups helps break the clicks and get the kids used to interacting with everyone in class.

Other teachers shared classroom activities focused on initial icebreaking, but few mentioned social learning opportunities, designed to engage students as active participants in the construction of their knowledge.

Although the team model afforded opportunities for students to bond, teachers also noted some problems resulting from the rigidity of the schedule that limited social interaction among teammates. As Elaine noted before, personality conflict arose, because the same core of students
were together in each of their team classes. Rebecca noted that students perseverated on negative social issues surrounding teenage drama.

James felt they needed to do more to build a sense of team belonging among the students:

I think we’re missing the boat a little bit though to be quite honest … I think we could do more … We have these same students 90 to 100 of them every … and we still hear at this time of the year, “That kid is on our team?” Kids still don’t quite know [each other] … The way the schedule is set up, a lot of them are peg-holed or pigeon-holed in, so they don’t mingle as much as we think they mingle, so we did more activities like Camp Clark. If we had a couple different things throughout the year, I think that would go a long way.

Rebecca added to this that her team tried to set up a team meeting to discuss drug abuse, after a school wide presentation by Chris Herron, a recovering drug addict and former professional athlete, but were told that there was no space or time available for a team meeting. She added that her team had not assembled as a group the entire year. Both James’ and Rebecca’s comments incited conversation regarding limited interactions among students, and the need to mix up their groupings. Elaine noted that, even on the initial Camp Clark field trip, there are always a couple of students who sit off to the side and appear to feel out of place.

As the topic of teenage angst surfaced, it became apparent that some students on the academy spent too much time together, while others never seemed to be accepted into the social scene. This conversation was in alignment with students’ lowest item rating on the peer support for learning sub-measure of affective engagement, “Students here respect what I have to say,” with a mean score of 2.79. Although most students have friends at school and in their classes,
they were not socially secure outside their clicks. The schedule limitations of the freshman academy limited their social leaning interactions to the same core of students throughout the day.

Rebecca brought up the issue of students not being able to “turn it off” when there was tension among some members of a class. Since they were together all day, the “B period fight becomes students’ focus for the day.” This comment related to Elaine’s earlier noted issue of perseveration. Other teachers concurred with Rebecca regarding troublesome behavior arising from students who spent too much time together. Teaming provided ample opportunity for communication among students, which contributed and deterred from classroom community building.

Teachers valued the opportunities the academy model offered in developing strong relationships among themselves and stronger bonds with their freshmen. Teachers felt their relationships with each other and their students were integral to students’ successful matriculation into high school. Likewise, Students valued their teachers’ continual communication and familiarity among team members, as Rebecca stated, “They see the collaboration and the collegiality [among freshmen team teachers] which is modeled for them, which they don’t get to see, I think, in a sophomore classroom.” Rebecca went on to talk about how her teammates were always in each other’s classrooms, often joking with one another, and “they [the students] see that connection of these professional people … that is just one of the little rewards – that they see that modeled for them.”

Additionally, Sam pointed out: “I don’t’ think kids always identify themselves as members of the team, but they see us as a team.” Nonetheless, their teacher-student relationship rated the lowest overall mean score (2.73) among the three sub-measures of affective
engagement on the SEI. Although this was the lowest overall mean score among the affective engagement sub-measures, it was still higher than two of the three sub-measures from the cognitive engagement construct, control and relevance of coursework (2.53) and extrinsic motivation (1.94). This indicated that students’ relationships with their teachers were more significant to them than their coursework.

One notable difference between the student and teacher perspectives was that students’ measurement on the SEI reflected strong family support, while teachers voiced frustration over limited support. This could indicate that parents wanted their children to do well in school, but did not necessarily understand the coursework or support the instructor, as Joe indicated in the student focus group discussion. Both focus groups drew attention to continual social interactions enabled by the teaming model. Teachers perceived their roles as more protective with freshmen than their other students, and they guarded their team’s “home base” by always being around, which made students feel safe. This mutual perception of teachers’ protective stance aligned with the SIE item, “I feel safe at school” with a mean score of 3.06, the highest among the teacher-student relationships sub-measure of affective engagement.

Summary of Findings

Overall, quantitative and qualitative data regarding students’ cognitive and affective engagement converged. Students’ self-reported perceptions as scored on Appleton et al.’s (2006) SEI, measured statistically significantly higher on affective engagement than cognitive engagement in school. Affective Engagement \( (M=39.05, SD=9.18) \) to Cognitive Engagement \( [M=36.94, SD=6.80, t(70)=2.46, p<.016] \). SEI results were illuminated by both focus group discussions, revealing students’ focus on socialization and teachers’ emphasis on personalization,
integral to students’ affective engagement. Similar themes emerged between students’ and teachers’ perceptions of factors influencing students’ cognitive and affective engagement, as well as freshman academy practices that facilitated high school transition. One overarching theme that emerged as most significant was communication as an influential vehicle, enabling the triadic interplay of environment, cognition, and affect at the core of self-efficacy beliefs in social cognitive theory.

Students and teachers were in alignment regarding environmental challenges of transitioning freshmen and effects of academy practices addressing intimidation over the physical size and layout of the building. However, perceptions between teachers and students regarding which operational policy of high school was most challenging differed. Students were unanimously opposed to the attendance policy, which they deemed “unfair,” while teachers perceived the concept of earning credits for courses most difficult for students to grasp. This divergence of data may have been due to the dynamics of the student focus group. Although two members had failed courses as freshmen, they both attended summer school and were enrolled in sophomore classes. Somewhere down the line, they will be short some credits, but that reality may not have materialized, or they may have been intimidated to voice concern, considering that there were a couple of high achievers among the group.

In terms of cognitive engagement, students and teachers had similar measures of importance in learning time management and study skills, which corresponded with the high score on future goals and aspirations. Both groups also perceived similar academic challenges of first-time ninth graders. Students’ perceptions of having little control over their coursework or schedules aligned with a low mean score (2.53) on the control and relevance of schoolwork sub-
measure of cognitive engagement. Teachers on each team felt that common planning time should have afforded them the opportunity to plan cross-curricular instruction, but team time was often occupied with meetings and/or mandated tasks, updating blogs and posting grades. Three out of the four teams had coordinated one interdisciplinary research-based unit, but students did not recall this as meaningful, again emphasizing the low mean score on relevancy of coursework. Based on both student and teacher conversations, it is apparent that students were not offered many choices, in their schedules or in their classes.

Ability-group tracking was an issue that teachers discussed without resolve. Six out of seven students felt that ability tracking was okay, and both groups felt that CP2 classes offered low achievers the opportunity to meet some level of success. However, teachers felt that some students’ misplacement, particularly in the CP2 track, was not conducive to a productive learning environment. Additionally noted by teachers was that small CP2 classes led to disproportionately large CP1 class sizes and pigeonholing students, which incited personality conflicts.

Regarding affective engagement, emerging themes were consistent between students and staff, but perspectives of value were not necessarily in alignment. In contrast to students’ perceptions, teachers felt their support for learning was more significant to student engagement than students measured. Students’ relationships with their teachers measured less influential to their affective engagement in school than their parents’ or their peers’ support. This may be understood in terms of students’ expectation of relationship longevity. Parents are with their children for life, and although some high school friendships are short-lived, most outlast one year of schooling, the duration of most teacher-student relationships.
Students’ discussion was heavily focused on social challenges of high school transition and friendship opportunities of the teaming model, emphasizing the importance of making friends and being connected to peers. The depth and breadth of conversation among the student focus group participants was more focused on peer support for learning, than on family support or teacher-student relationship; thus, the quantitative and qualitative data of this study diverged here. Also diverging from the SIE measures were teachers’ perceptions of their relationships with students. Teachers felt their relationships with each other and students were integral to students’ successful matriculation into high school. Likewise, both groups recognized the amount of time and energy teachers devote to communication in building strong relationships among themselves, among students, and among themselves and students.

Chapter 5: Discussion of Research Findings

Summary of Study

Nationally, research puts the high school graduation rate between 68 and 71%; almost one-third of all public high school students in America fail to graduate (Bridgeland, Dilulio, & Morrison, 2006: Herlihy, 2007). Although a variety of factors contribute to high school drop out rates, of paramount significance is a student’s performance in ninth grade, the “linchpin year” (Donegan, 2008). The First Year of High School: A Quick Stats Fact Sheet reports that a child’s success or failure in his/her first year of high school is an indicator of success throughout high school and beyond, yet more students fail grade nine than any other (Williams & Richman, 2007).

Dropping out of school is a process of disengagement from school and learning that occurs over many years, often beginning early in elementary school (Christenson & Thurlow, 2004). Moving from middle school to high school is the most problematic, often traumatic,
transitional experience for young adolescents. Students, who do not embrace the challenges of transitional impediments inherent in high school transition, fail to develop the confidence necessary to acquire self-agency; thus, beginning a cycle of underachievement (Steinberg et al., 1996). Inadequate performance during high school transition exacerbates the disengagement process and sets many students on the tumultuous track of dropping out (Lounsbury & Johnston, 1985; Wheelock, 1993; Mizelle & Irvin, 2000; Hertzog & Morgan, 1998; Neild et al., 2001). The most important concept in preventing school dropout, or promoting completion is school engagement (Anderson, Christenson, Sinclair, & Lehr, 2004). “The construct of student engagement is increasingly prevalent in the field of education, serving as the foundation of dropout prevention and high school reform initiatives” (Betts et al., 2010, p. 84).

To curb the high school dropout epidemic resulting from this process of disengagement, development and implementation of ninth grade transitional programs have arisen around the country in recent years (Haney, 2003; Haney et al., 2004; Cohen & Smerdon, 2009). The school this study examined is a large suburban high school in Southeastern Massachusetts that implemented one such ninth grade transitional program, a freshman academy, in an effort to initiate its first small learning community (SLC) and address a 6% drop out rate. The inception and initial implementation of the freshman academy in 2005 was minimally funded and randomly staffed by the school’s former principal. In 2008, the school was awarded a federal SLC grant, facilitating the addition of an administrator and additional special needs staffing. No other significant modifications were made to the program over the next few years; however, additional SLCs have been implemented in the building, including an alternative night school,
and an advisory program. The freshman academy, now in its seventh year, has never been formally studied for its effect on student engagement, thus warranting a need for this study.

An effective grade nine transitional program should do more than ease high school transition by buffering impediments. Betts et al. (2010) espoused, “Intervention results suggest the importance of cognitive (e.g., perceived relevance of schoolwork, expected success) and affective/psychological (e.g., perceived adult, peer, and family support for learning) subtypes of engagement … and their influence on important educational outcomes” (p. 85). School engagement is more than participation in and positive association with school, but “students’ psychological investment in and effort directed toward learning, understanding, or mastering the knowledge, skills, or crafts that academic work is intended to promote” (Newmann et al., 1992, p. 12). Behavioral, emotional, and cognitive dimensions of engagement relate to numerous desirable academic and behavioral outcomes (Betts et al.), therefore, an effective grade nine transitional program aims to engage students cognitively and affectively. The goals of this study were to investigate the freshman academy’s effect on student engagement, to inform the school and district with theoretically framed, research-based data on the academy’s practices that facilitated and/or impeded student engagement, and to furnish recommendations for new directions in the program, addressing impediments to engagement that have emerged through investigation.

To meet these objectives, the researcher followed Creswell’s (2007) recommendation to reduce one’s research study to one overarching question, followed by several sub questions. The following single question guided this investigation: How does the freshman academy experience
influence students’ engagement in school? The following three sub questions addressed specific areas of investigation:

\[ d. \text{ What are the students’ self-reported perceptions of their cognitive and affective engagement in high school?} \]

\[ e. \text{ What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?} \]

\[ f. \text{ What are the teachers’ perceptions of the academy’s practices in facilitating and/or impeding student engagement?} \]

Review of Methodology

A concurrent triangulated mixed-method design was appropriate for probing the overarching research question: How does the freshman academy experience influence students’ engagement in school? In a concurrent triangulation design the “weight is equal between the two methods” (Creswell, 2009, p. 213). Addressing specific objectives of the sub questions warranted the need of a mixed methods study. First, a stratified random sampling of 20% of the sophomore class, proportionate ratios of each academic ability-grouped track, embodied the survey participants. This body of participants and survey data constituted the quantitative portion of the study and addressed the first research sub question: What are the students’ self-reported perceptions of their cognitive and affective engagement in high school? Examining this data to determine students’ levels of school engagement yielded valid statistical information, however, one-dimensional. To add voice to the findings and dimension to the study, additional data were collected. A mixed gender focus group of seven sophomores of various academic abilities and extracurricular interests/disinterests participated in a semi-structured interview discussion,
responding to the second research sub question: *What are the students’ perceptions of the freshman academy's practices in facilitating or impeding student engagement?* Finally, six freshman academy staff members, one teacher of each core academic discipline, a special needs teacher, and a guidance counselor, incorporated a focus group panel that responded to the final sub question: *What are the teachers’ perceptions of the freshman academy’s practices in facilitating or impeding student engagement?*

Using a concurrent triangulation strategy, neither the SEI survey results, nor the focus group interviews bear more weight, but rather, both methods were “used to study the same phenomenon to determine if the two converge upon a single understanding of the research problem being investigated” (Fraenkel & Wallen, 2009, p. 561). In this design, qualitative and quantitative approaches were used to “confirm, cross-validate, or corroborate findings within a single study” (Creswell et al., 2003, p. 229). The researcher applied both quantitative and qualitative inquiry “to explore relationships between variables in depth” (Fraenkel & Wallen, 2009, p. 558).

All data were analyzed through the lenses of Piaget’s cognitive-stage theory, and Bandura’s (1986) social cognitive theory, with emphasis on the triadic reciprocal interplay of personal, behavioral, and environmental factors, the core of self-efficacy beliefs.

The rest of this chapter discusses implications of the study’s findings in relation to the theoretical frameworks (Chapter 1) and the literature review (Chapter 2) that directed the investigation. The chapter concludes with a statement of the study’s significance in the field of educational research, includes noted limitations of the study, and closes with recommendations for new directions and/or changes to the freshman academy’s practices, informed by the study.
Summary of Findings in Response to the Research Questions

To address this overarching question, “How does the freshman academy experience influences students’ cognitive and affective engagement in school?” equally weighted quantitative and qualitative data were collected concurrently, analyzed separately, and integrated in response to the research sub-questions.

In response to the first sub question, “What are the students’ self-reported perceptions of their cognitive and affective engagement in high school?” Appleton et al.’s (2006) 35-item student engagement instrument (SEI) was used to measure six subtypes of student engagement of the two constructs, cognitive engagement and affective/psychological engagement. Descriptive analysis of survey data provided a baseline understanding of students’ levels of cognitive and affective engagement in school. A Pearson correlation quantified strengths in relationships between survey items, providing further understanding of these measures. Finally, a paired samples t-test proved that students measured statistically significantly higher on affective engagement than cognitive engagement in school: Affective Engagement \(M=39.05, \ SD=9.18\) to Cognitive Engagement \(M=36.94, \ SD=6.80, \ t(70)=2.46, \ p<.016\).

These findings indicate that students who have completed one year in the freshman academy and have transitioned into their sophomore year of high school, feel more psychologically connected to school than cognitively connected to learning. Interestingly, however, the highest overall mean score of one subtype of student engagement was a 3.28 for future goals and aspirations (FG), of the cognitive construct. This implies that students have aspirations of bright futures. The other two subtypes of the cognitive construct measured significantly lower: control and relevancy of school work (CRSW) scored an overall mean of
2.53, and extrinsic motivation (EM) scored the lowest overall mean score of all six subtypes, with a 1.93. Students feel little control over what happens to them in school, and, overall, they do not find meaningful relevancy in their coursework, yet they do aspire to live comfortably as adults. This implies that students do not connect their current education to their future success. The low scores on EM imply that students are not extrinsically motivated. Their school performance is internally driven, rather than being motivated by external rewards of teachers or parents.

In regards to the affective construct on the SEI, students’ highest overall mean score of 3.27 was measured on the family support for learning (FSL) subtype, implying that students highly value their parents or guardian(s) support. Students’ motivation to learn is significantly influenced by family values toward schooling that are communicated at home. Peer support for learning (PSL) scored an overall mean score of 3.05, indicating that friends’ support is also an important motivating factor in learning. Students value their friendships and peer acceptance at school, implying that students’ values towards learning are influenced by their sense of belonging to their groups of peers. Rating the lowest overall mean score among the affective subtypes of student engagement was teacher/student relationships (TSR), which scored 2.73. Although the lowest among the affective subtypes, TSR still scored higher than CSRW, the second highest score among the cognitive subtypes. This implies that students value their relationships with teachers and feel more highly motivated to learn due to the personalization of instruction rather than acquiring content knowledge or critical thinking skills they will need to meaningfully pursue higher education.
Findings of this portion of the study indicate that students’ engagement in school and learning is motivated by values communicated at home, among peers, and by teachers. Relationships play a more important role in students’ levels of school engagement than coursework. Based on the assumption that their freshman academy experiences have influenced these students’ perceptions of their engagement in school, the program is effective in personalization of the SLC. Conversely, the program’s practices are not affective in cognitively engaging students in coursework, and attention is drawn toward the need to address students’ sense of limited control over or relevancy in their schoolwork.

SEI results were illuminated by both focus group discussions in response to the remaining two sub questions: What are the students’ perceptions of the academy’s practices in facilitating and/or impeding student engagement? and What are the teachers’ perceptions of the academy’s practices in facilitating and/or impeding student engagement? Each of the two focus groups responded to interview protocols designed to align with each of the six subtypes of student engagement measured on the SEI. In convergence with the quantitative data, these data revealed students’ focus on socialization and teachers’ emphasis on personalization, integral to students’ affective engagement. Similar themes emerged between students’ and teachers’ perceptions of factors influencing students’ cognitive and affective engagement, as well as freshman academy practices that facilitate high school transition. One overarching theme that emerged as most significant was communication as an influential vehicle of student engagement in both the cognitive and affective constructs, again emphasizing the important role of personal relationships as motivational factors in learning.
Students and teachers were in alignment regarding environmental challenges of transitioning freshmen and effects of academy practices addressing intimidation over the physical size and layout of the building. This implies that practices of the academy have evolved that address students’ needs regarding the environmental impediments of high school transition. Teachers and staff are sensitive to students’ overwhelmed feelings during their initial transition, and they address students’ anxieties through a variety of orientation activities, some standard practices of the academy, others individual activities of classroom teachers and the guidance counselor.

Students and staff specifically mentioned the freshman academy cookout, which takes place in late August, just before the beginning of school. During this cookout, students learn about their team placement and meet their teachers. In addition, they are offered tours of the building and opportunities to sign up for extra curricular activities. Another academy practice that students and staff mentioned as beneficial was visiting the school during eighth grade. The high school hosts a two-day tech expo, to which eighth graders in attendance at the town’s two middle schools are invited. As the expo showcases the most stellar achievements and unique projects of the technical studies students, this experience positively influences students’ anticipation to attend high school. Another eighth grade visit is offered at the end of the school year. Students from the middle school that shares the same campus as the school of this study, walk over for a tour of the building on the last day of school. Freshman academy teachers direct tours of 10-15 students throughout the vacant high school building (the high school students have been dismissed from school early during final exam days). Students claimed that this visit got them excited about leaving middle school and eager to move up to ninth grade. Unfortunately,
not all students who enroll in ninth grade experience these two visits, as there is a charter school and a couple of small private schools that serve as feeder schools.

In terms of adjusting to environmental challenges regarding school policies, students and staff’s perceptions diverged on which policies were most difficult for students. Students were unanimously opposed to the attendance policy, which they deemed “unfair,” while teachers perceived the concept of earning credits for courses most difficult for students to grasp. Although these policies are communicated in writing and verbally repeated by teachers, as well as articulated clearly by an early-year guidance counselor visit, students have difficulty grasping these abstract concepts until they suffer the consequences: being denied course credit due to frequent absences, or being retained as a freshmen due to unearned course credits. Both consequences have grave results and exacerbate disengagement, often leading to high school dropout.

In terms of cognitive engagement, students and teachers had similar perceptions of the importance in learning time management and study skills, which corresponds with the high score on future goals and aspirations on the SEI. Both students and teachers felt that completing homework assignments and preparing for tests were the biggest challenges for freshmen. This indicates a sharp delineation between middle and high school course expectations. Students claimed that the freshman academy practice of using student agendas to track their nightly and long-term assignments facilitated their acquisition of time management skills. Other specific practices of the freshman academy that students mentioned as helpful for them in meeting academic success were the teachers’ weblogs and online grade books, which allowed them to track their progress. However, all student participants did not concur on the benefit of these
practices, and teachers noted that the online information is only helpful when it is up-to-date. This implies that there are inconsistencies among freshman academy teachers’ common practices regarding online postings.

Another specific strategy of the freshman academy that students valued regarding cognitive engagement was writing SMART goals and metacognitive essays. Students expressed an understanding that both of these activities provided a means to take ownership of specific, individual academic challenges and set goals that specifically address these challenges. The researcher had falsely assumed that these practices were in place in all freshman classes, as SMART goals had been introduced at a professional development workshop. However, during the teachers’ interview, it became clear that writing SMART goals was not a consistent freshman academy practice. Also, metacognitive essays were limited to English classes. These issues are readdressed in the recommendations section of this study.

A specific practice of the freshman academy that teachers perceived as helpful in facilitating student engagement was their teams’ daily common planning time. This daily period, although initially intended for cross-curricular instructional planning, has become useful in managing freshman academy tasks inherent to a smoothly run transitional program. Team teachers use the time to hold parent meetings and IEP reviews, update blogs, and post grades. Additionally, three of the four teams have used this time to plan and implement at least one interdisciplinary research based unit. Unfortunately, students did recall their cross-curricular unit as meaningful, which substantiates students’ sense of coursework irrelevancy. This also indicates needed modifications to teachers’ cross-curricular instructional units and/or their practices in executing lessons therein.
Ability-group tracking is a practice of the freshman academy that was discussed among participants of both focus groups. Six out of seven students felt that ability tracking was okay, and both groups felt that CP2 classes offered low achievers the opportunity to meet some level of success. However, teachers felt that some students’ misplacement, particularly in the CP2 track, was not conducive to a productive learning environment. Additionally noted by teachers was that small CP2 classes led to disproportionately large CP1 class sizes and pigeonholing students, which incited personality conflicts. This observation of teachers sheds light on students’ sense of limited control over what happens to them at school. It was apparent that both groups of participants felt that students were offered limited choices in their schedules, and these limitations were significantly influenced by ability-group tracking on the freshman academy teams.

Regarding affective engagement, emerging themes were consistent between students and staff, again focusing on the importance of personal relationships as motivating factors in student achievement, and communication as an important vehicle in facilitating engagement. One meaningful freshman academy team orientation activity that both students and faculty discussed in their focus groups was the Camp Clark field trip. Students and their team teachers, the special education paraprofessional, the guidance counselor, and one freshman gym teacher attend this camp, one team per day, sometime in late September. The day’s activities, run by YMCA camp counselors, focus on trust building and group problem solving strategies. Teachers join the students as participants in the activities. Both students and teachers felt this freshman academy practice aided as an icebreaker, helping students begin new friendships and establish trust among themselves and with teachers.
Other particular practices of the freshman academy that both students and teachers mentioned as helpful in facilitating student engagement were relative to the vast amount of time that teachers and students spend together, on team. Due to the scheduling limitations and complications explained above, students are enrolled in their four core academic classes with the same core of students. This allows ample time to establish meaningful learning communities in which students know and trust one another. Students mentioned that having the same kids in their team classes, and having the same teachers among team members, allowed them opportunities to support one another. Teachers noted that, although this familiarity among classmates can benefit learning, it is also a deterrent, when some relationships intensify and personality conflicts arise. In addition to potential personality conflicts resulting from too much time together, exposure to others’ ideas becomes limited to the central core of vocal class participants, whose opinions and perceptions are shared repeatedly throughout the day. As one of the teachers mentioned, in early May, there were students on his team who did not know one another, even though they have shared the same teachers in the same hallway, and they have been using neighboring lockers since September. This finding signals further investigation into the academy’s scheduling practices.

Teachers expressed appreciation over the length of time they spend together, which provides ample opportunity to discuss students’ academic and social progress. More importantly, the volume of communication among team teachers often signals early intervention in emerging problematic academic and/or behavioral patterns of individual students. This communication is afforded by teachers’ common planning time, as earlier discussed. Also, close proximity of team teachers’ classes, with the exception of the science teachers, provides them additional
opportunities to communicate with each other and their students. Students mentioned that they felt safer because there was always a teacher around between classes, again due to the clustering of team classrooms. Overall, students felt that the teaming model of the freshman academy provided a “stepping stone” into the upperclassmen level of courses, in which they were now enrolled.

Although the emergent themes and values were similar between the two focus groups, the qualitative data slightly diverged from the SEI measures of affective engagement. Teachers felt their support for learning was more significant to student engagement than quantitative data indicated. Likewise, students continually discussed relationships with teachers as helpful to their high school transition. The volume of conversation regarding teachers was higher than that of family influence, again highlighting this divergence. This implies that students recognize their freshman teachers’ efforts to facilitate their academic success, but their experiences with sophomore teachers may be different. Another implication is that students realize that parental influence is continual and lifelong, while teachers’ relationships with students usually expire at the end of a school year.

Students’ discussion was heavily focused on social challenges of high school transition and friendship opportunities of the teaming model. This focus emphasizes the important role of socialization in learning. Interestingly, students recognized the social relationships among their teachers as beneficial to student performance. The depth and breadth of conversation among the student focus group participants was more focused on peer and teacher relationships than on family influence; thus the quantitative and qualitative data diverged here.

**Implications of Findings in Relation to Theoretical Framework:**
Piaget’s Cognitive-Stage Theory. This theory is rooted in a constructivist philosophy: people actively participate in building new knowledge through their prior experiences within the current context. By relating biological influences of human development in a sequentially organized structure of cognitive complexity, Piaget framed four major stages of children’s cognitive development. Piaget believed each stage was a period of time in which a child’s thinking and behavior reflected a particular underlying mental structure, derived from the previous stage, and transformed into the next stage, after a period of equilibrium (Miller, 2002). As a child progresses through each stage, he or she must maintain a balance between applying previous knowledge (assimilation) and changing behavior to account for new knowledge (accommodation), to move toward equilibration, the final level of achievement within each period or stage (equilibration): “Equilibration integrates and regulates the other three main factors of development: physical maturation, experience with the physical environment, and the influence of the social environment. All of these factors together propel the child through the stages” (Miller, 2002, p.67).

Piaget’s cognitive-stage theory relates to the key findings of the study, as the student participants of this study, represent a population in their final stage of childhood development, the formal operational period (roughly eleven to fifteen years). Assuming students have reached this stage, they no longer require concrete objects to make rational judgments. At this stage of cognitive development students are capable of hypothetical and deductive reasoning. Although students of this study were now second semester sophomores, ranging in age between fifteen and seventeen, most transitioning high school freshmen are fourteen. At age fourteen, students should have been advancing toward equilibration of the formal operational stage of development.
However, they would have been within a broad range of this stage, cognitively, emotionally, and socially different in innate and experiential factors. Their individual intellectual capacities would have influenced their acquisition of prior knowledge, their mastery of skill sets expected at the middle school level. Understanding that students’ intellectual development is a by-product of “intertwined influences of innate and experiential factors” (Miller, 2002, p. 70) explains why some freshmen transition smoothly, while others are continually overwhelmed by environmental, social, and academic challenges of their initial high school experience. Understanding that many students may not have reached equilibration of Piaget’s final stage of childhood cognitive development, helps explain why younger students can not grasp the abstract concept of being denied course credit for excessive absences or failing to meet course exceptions. As stated earlier, until they experience the grave consequences of academic failure, which can be overwhelmingly discouraging, exacerbating disengagement from school, students do not conceptualize these policies, although they are communicated in writing and repeatedly articulated in conversations with teachers, administrators, and counselors.

Students’ intellectual development is dependent on physical maturation, coordinating and interacting with their physical environments and social experiences. In light of cognitive-stage theory, teachers recognized that their freshmen students were among a broad range of readiness levels to address more rigorous coursework as they met environmental and social impediments inherent to high school transition. Teachers took extra measures to ensure students transitioned to the environmental and social adjustments of high school. They also recognized the importance in coordinating their large project due dates and tests, so students would not be overburdened by dueling academic demands. James noted that he is more sensitive to this early in the school year,
aiming to facilitate the development of time management skills his students will need as upperclassmen. Rebecca discussed her practices as an academy teacher, designed to model the process of long-term writing assignments. She breaks larger assignments into smaller pieces with sequentially patterned due dates. As the year progresses, she gradually releases responsibilities to students as they gain independence and competence, aiming to assign a complete essay first draft due date.

Ideally, as freshmen become independent learners, they begin to maintain a balance between applying previous knowledge (assimilation) and changing behavior to account for new knowledge (accommodation), to move toward equilibration, the final level of achievement within each period or stage (equilibration). Numerous practices of the freshmen academy facilitated students in reaching equilibration of this final stage of childhood development. Emphasis on time management skills, goal writing, reflective analysis of their work, and guided teacher support within the safety net of the teaming model all provided students the opportunity to gradually accept responsibility over their academic and social behaviors and actively construct their own meaningful knowledge. Students’ recognition of the academy as a “stepping stone to the next level” clearly indicates that practices of the freshman academy address specific needs of students within Piaget’s final stage of childhood cognitive development.

Unfortunately, not all students were successful, despite teachers’ efforts to scaffold and release responsibilities. Many adolescents are reluctant to embrace challenges, particularly those who have previously met failure (Simmons & Blyth, 1987; Hertzog & Morgan, 1999; Roderick & Camburn, 1999). According to Piaget’s cognitive-stage theory, students will not benefit from instruction unless cognitively ready to assimilate it to present cognitive structures or
accommodate present structures to their experience (Miller, 2002). Key findings of this study imply that the academy staff focused on developing a readiness level in their students to successfully matriculate into sophomore classes.

**Bandura’s Social Cognitive Theory and Self-Efficacy Beliefs.** The foundation of Bandura’s (1986) social cognitive theory lies in his conception of reciprocal determinism, the view that personal factors in the form of a) cognition, affective, and biological events b) behavior, and c) environmental influences continually interact to create learning in the individual. Simply put, human beings have the ability to control and regulate their responses to external influences: “From this theoretical perspective, human functioning is viewed as the product of a dynamic interplay of personal, behavioral, and environmental influences” (Pajares, 2006, p. 341).

According to Bandura’s (1977, 1986, 1997) investigations and development of social cognitive theory, the ability to self-reflect, is a uniquely human capability, enabled by other uniquely human processes: the ability draw symbolic meaning from observations, the ability to process forethoughts of actions, and the ability to learn vicariously through observation. The cognitive ability to think abstractly, either in forethought or in reflection, drives the individual to certain levels of motivation. Freshman academy practices that focused on long and short-term goal setting and metacognitive reflections strengthened students’ abstract motivational abilities.

At the very center of social cognitive theory, are self-efficacy beliefs, "people's judgments of their capabilities to organize and execute courses of action required to attain designated types of performances" (Bandura, 1986, p. 391). Freshman academy practices that focused on teaching students time management skills facilitated acquisition of organizational
skills necessary to meet success in school and beyond. These practices helped equip students with self-efficacy beliefs. When people perceive themselves to be capable of certain behaviors, they are likely to readily engage. Conversely, when they perceive themselves inept at a modeled behavior, they are reluctant to attempt attainment. Bandura’s (1997) foundational assertion regarding the role of self-efficacy beliefs in humans is that “people’s level of motivation, affective states, and actions are based more on what they believe rather than on what is objectively true” (p. 2).

Self-efficacy beliefs are essential to achievement and are rooted in the core values of any effective transitional experience. As students respond to different personal, behavioral, and environmental factors in transition from middle to high school, their engagement in these experiences is determined by their self-efficacy beliefs. In light of this theory, key findings regarding academic ability-group tracking of students warrant discussion. The purpose of the freshmen academy is not merely to ease transition and accommodate the unique needs of grade nine students, but to equip students with skills and strategies necessary for future transitional experiences in schooling and in life. Placing students in CP2 classes, although providing lower achieving students an opportunity to meet success in a slower paced course with fewer expectations, will not equip these students will the same skill sets as their peers enrolled in CP1 or honors courses. As Daphne mentioned, she probably could do CP1 work, but she prefers the comfort level of lower demands. Unfortunately, without learning to successfully address challenges, she will not develop self-agency. Ability-group tracking of students by placing them in the least challenging learning environments, so they can comfortably pass classes, is not conducive to building self-efficacy beliefs.
Bandura views the learner as environmentally integrated, wherein cognitive responses, behaviors, and emotions create learning. In a study of human adolescents in environmental transition between middle and high school, the concept of this triadic reciprocal interplay provides an interesting lens through which one can begin to understand students’ adjustment to more rigorous academic demands, social pressures, and different instructional settings. This triadic approach to understanding human response and influence in environmental change is well suited for this study of the academy’s effectiveness in easing transitional tensions and facilitating students’ school engagement.

**Implications of Findings in Relation to Bodies of Literature**

In order to explore current literature on the efficacy of the freshman academies in reducing the “grade nine bulge” through improved student engagement, the literature review of this study was segmented into three areas. The first area reviewed the history of studies documenting areas of difficulty facing many adolescents in their schooling transition experiences. The review then examined literature on small learning communities, the purpose and historical context of their implementation. Finally, the last section of the literature review explored research studies of grade nine transition programs, including, but not limited to, a school-within-a school approach, the basis of the freshman academy of this study.

**Historical Background of Grade Nine Transition: Bulges in the Pipeline.** Tying this body of research into both Piaget’s cognitive-stage theory and Bandura’s (1978, 1986, 1989) theory of reciprocal determinism in developing self-efficacy beliefs, the literature explored following question: *Historically, what does the literature reveal about behavioral, cognitive, and environmental factors that impede grade nine transition of adolescents into high school?*
Findings in response to this literature review question support the assumption that students’ high school transition is historically and continually riddled with common transitional impediments, which exacerbate disengagement and often lead to high school dropout.

The literature established that high school transition for first time ninth graders is problematic; resulting in students’ diminished self-esteem and decreased academic performance, leading to disengagement. Studies were conclusive in determining factors contributing to problematic transition, indicating that a combination of social, academic, and environmental adjustments cause a triad of stressors as ninth grade signals the journey to a new, often larger, industrial-modeled high school building and schedule (Lounsbury & Johnston, 1985; Eccles et al., 1991; Roeser et al., 1999).

For most students who cannot surmount their problematic ninth grade transition, high school dropout looms on the horizon. Transitioning into high school is a time fraught with anxiety for most adolescents, whose social and emotional developmental transitions are complicated by abrupt physical changes in their schooling environments, and a major increase in the difficulty of academic work (Wigfield, Eccles, & Pintrich, 1996). Zimmerman and Cleary (2006) espouse that students who fail to meet the demands of high school transition have not acquired self-regulation in setting goals and managing their time. As their academic grades decline, they lose belief in themselves as successful students. This deflated sense of self leads some adolescents in a downward cycle of academic achievement in which they align themselves with peers who have attained unfavorable views on the value of learning and importance of education (Steinberg et al., 1996). Key findings of this study’s student focus group discussion align with these studies. Students, who had acquired goal setting and time management skills in
their freshmen year, had acquired self-agency and were moving toward high school graduation and beyond.

Simmons, Carlton-Ford, and Blyth (1987) asserted that school size was linked to the achievement loss experienced at transition points and that larger schools had recorded greater achievement loss among their students than did smaller ones. In addition to the obvious environmental changes children experience in their transition to high school, adjusting to a larger, more heavily populated physical plant, there is an abrupt shift in cultures between primary and secondary school (Hargreaves, Earl, & Ryan, 1996). The culture in a traditional American high school emphasizes differentiation of students according to achievement and produces experiences of fragmentation and isolation rather than cohesion and bonding. Eccles et al. (1993); Roeser et al. (1999) blame the industrial modeled choppiness of the standard high school schedule for some transition problems; a ringing bell signifying a change in classroom, teacher, and subject matter throughout the day fragments learning experiences and opportunity for interpersonal connections with teachers and peers. Eccles and Midgley (1989) espouse that adolescents’ budding independence and identities are constrained by the rigid, scheduled structure of traditionally organized schools, resulting in loss of achievement. Considering that the transitioning population of fourteen-year-olds will range in their position within Piaget’s formal operational period, the cultural adjustment is more severe for some than others, regardless of students’ cognitive readiness for more rigorous academics. This abrupt change in school cultures may lead some students down the path of isolation, exacerbating disinterest in school and disengagement in learning.
The findings of this study revealed that students did perceive an abrupt shift in cultural norms between middle and high school; however, the culture shock was buffered by the freshman academy experience. Students expressed that they became better prepared for the demands of the departmentally structured traditional instructional model of Grades 10-12 by the end of their freshman year, “the stepping stone to the next level.” Personalization of the freshman academy experience afforded by teaming teachers and students is effective in bridging students between middle and high school climates.

Findings of this study also align with the triad of environmental, social, and academic stressors repeatedly mentioned in this body of literature. Discussions among participants of both focus groups highlighted environmental, cognitive, and affective/psychological impediments inherent in ninth grade transition. Students of the study expressed initial intimidation by the large, confusing layout of the high school during their first few weeks of freshmen year. They also noted practices of the freshman academy, including the freshman cookout and eighth grade visits helpful in easing their transitional stress. Additionally, teachers expressed sensitivity to their students’ transitional anxieties and facilitated a sense of safety and comfort among their students, by directing them to their next classes and being lenient about tardiness for the first two weeks of school. Teachers continually maintaining a hallway presence between classes further established a sense of safety among students. In addition to the environmental factors of the physical plant, students voiced concern over the rigidity of school policies, including but not limited to attendance and tardiness. Students and staff also noted incoming freshmen’s social anxieties. Routine academy practices as well as individual teacher’s classroom practices addressed these social issues. Finally, students and staff recognized that there was a large gap
between middle and high school course expectations. Participants of both focus groups discussed practices of the academy and individual teachers that facilitated students’ acquisition of time management skills. Additionally, teachers discussed how they routinely model, scaffold, and release responsibility to students, increasing expectations for student independence as freshman year progresses.

This body of literature also discussed the nation’s alarming dropout rate, which is directly related to underachievement during ninth grade transition. Statistics cited by President Barak Obama in March of 2010, indicate that the US currently has a 68% high school completion rate; more than 30 percent of our nation’s children drop out of high school. The most alarming dropout rates lie among our urban poor, where less than 50% of ninth graders ever reach graduation day (Williams & Richman, 2007). Such alarming statistics warrant national attention; however, the problem is not solely indigenous to urban communities, as many suburban high schools have also noted significant disengagement among their students, resulting in notably reduced enrollment between grade nine and grade twelve (Blyth, Simmons, & Carlton-Ford, 1983; Roderick & Camburn, 1999; Reents, 2002; Neild, 2003). Although the school of this study reported a dropout rate of 1.8% in 2011, a significant improvement over its pre-academy implementation rate of 6%, the graduating class was substantially smaller than its initial enrollment as freshmen. On graduation day of 2012, fewer than 290 diplomas were issued to graduates, including several members of the alternative program. However, this cohort of students began freshmen year with an enrollment of approximately 400. Freshmen retention of this graduating class was 6.3%, the highest since the academy’s inception, substantiating that higher freshmen retention rates lead to a significantly smaller graduating class. Although ninth
grade underachievement leads to disengagement and possible termination of one’s formal schooling, as indicated in the literature and supported by this study, failure rates among upperclassmen and practices of the traditionally structured high school model also contributed to the dropout rate and warranted further investigation.

**Small Learning Communities Personalize and Engage.** Exploration of this body of literature responded to the following review question: *What does the literature reveal about the impact of small learning communities on student engagement?* This was an appropriate body of literature to guide this study, as the freshman academy was implemented as the school’s first small learning community (SLC) initiative, and its inception and implementation were instrumental in the district being awarded federal SLC grant funding. This study’s findings of the freshman academy’s influence on student engagement are in alignment with this body of literature, which addresses the industrial modeled, depersonalized climate inherent in large high schools through implementation of SLCs. As stated above, most student participants of this study attained a level of comfort among team teachers and teammates through the personalization of the freshman academy; however, they also noted the abrupt change between the teaming model and the departmentally structured, traditional high school model of Grade 10-12 instruction as they transitioned as sophomores.

As previously established in the literature, school size is one major contributing factor leading to the disengagement and eventual lack of success of many high school students. Cotton (1996) attested that the increasing size of American public high schools from the 1950’s to the 1990’s was a contributing factor in high school dropout. Raywid’s (1996) research substantiated that the trend towards larger schools was detrimental to student’s personal agency. She reported
that students who attended small high schools generally attained higher achievement, and that smaller schools reported higher graduation rates. This study sheds light on the importance of self-perception in self-regulatory procedures and the development of self-efficacy beliefs in adolescents. Students perceived greater satisfaction in smaller learning environments; therefore, their performance was greater. Students in smaller settings felt more connected to their teachers and peers, and their sense of belonging contributed to a sense of relevancy in their schooling experiences.

Despite decades of research affirming the detrimental affect of larger schools on student engagement and numerous well-intended reform efforts, Hoffman’s (2003) study noted that most American high schools enrolled more than 1,000 students, and several had populations of more than 3,000. Allen (2002) established that more than 70% of US high school students were enrolled in schools with populations of more than 1,000 students, whereas middle school populations were considerably smaller. Vander Ark (2000) attested that size was not the sole contingent factor leading to student disengagement in American high schools. He espoused that the industrial model of the traditional American high school provided a hostile learning environment:

Our schools are not failing – they are obsolete. They foster anonymity and stifle learning by systematically inhibiting those things that are most important; powerful sustained relationships, students’ ability to address complex problems individually and as members of a team and to communicate in various ways; and the ability of teachers and administrators to take on increasing responsibility. (p. 56)
Newman (1992), affirming the studies of Lounsbury and Johnston (1985), Mac Iver (1990), and Eccles et al. (1991), espoused that lack of personal connectedness to one’s school reduces a student’s academic engagement. The industrialized model of the traditional high school isolates students rather than inviting them into a social learning community.

Examining these studies in light of Bandura’s (1986) concept of reciprocal determinism in developing self-efficacy beliefs, it stands to reason that as school sizes increased throughout the past several decades, personalization decreased, and students felt less connected to their schools. The interplay among environment, cognition, and behavior of the adolescent in transition was imbalanced, with students feeling emotionally disconnected from their learning environments.

The publication of Theodore Sizer’s (1984) *Horace’s Compromise* led to the creation of the Coalition for Essential Schools, a reform organization founded by Sizer, aimed at facilitating close peer-to-peer and student-to-teacher relationships, characterized by personalized learning environments. The coalition was founded on nine essential principals inherent in constructivist learning in a personalized environment. In 1996, the National Association of Secondary School Principals (NASSP) published *Breaking Ranks: Changing an American Institution*, which highlighted a variety of commonplace practices contributing to the depersonalization of traditional high schools. The report also suggested breaking large schools into smaller units. In 2004, NASSP published *Breaking Ranks II: Strategies for Leading High School Reform* in collaboration with the Education Alliance of Brown University and its Center for Secondary School Redesign. Sizer’s (2004) foreword in *Breaking Ranks II: Strategies for Leading High School Reform*, reverberates the theme of *Horace’s Compromise*: “Personalization is a necessity
… student anonymity must end, whatever it takes” (p.xi). Featured in *Breaking Ranks II*, Clarke’s (2003) definition embodies essential characteristics of personalized learning:

A learning process in which schools help students assess their own talents and aspirations, plan a pathway toward their own purposes, work cooperatively with others on challenging tasks, maintain a record of their explorations, demonstrate their learning against clear standards in a wide variety of media, all with the close support of adult mentors and guides. (p.15)

The U.S. Department of Education has clearly outlined its criteria for schools meeting SLC grant funds, and has contracted with Northwest Regional Educational Laboratory (NWREL) to provide technical assistance to schools in receipt of funding. The findings of this study are conclusive in highlighting the effective practice of communication and personalization among and between students and staff. Additionally, there are some cognitively engaging practices in place, although inconsistent among teams and teachers. According to Diana Oxley (2008) of NWREL, the following five domains of practice are essential in transforming high schools into SLCs:

1. Interdisciplinary teaching and learning teams
2. Rigorous, relevant curriculum and instruction
3. Inclusive program and instructional practices
4. SLC-based continuous program improvement
5. Building and district support for SLCs

Rigorous and relevant curriculum and instruction is one domain to which this study’s key findings direct further investigation. Students who had completed one year in the freshman
academy and had transitioned through most of their sophomore year of high school, perceived lack of control over and limited relevancy in their schoolwork.

CSSR worked directly with the school of this study through the early stages of the freshman academy’s inception and implementation; therefore, this body of literature served as an appropriate guide to investigate freshman academy practices that facilitated or impeded student engagement. Gathering an understanding of the historical context and purposeful implementation of SLCs effectively informed this study’s investigation of one SLC and its impact on student engagement.

**Grade Nine Transitioning Programs: Relief Valves in the Pipeline.** The purpose of exploring this body of literature, in response to, “What are the common best practices among grade nine transitional programs? was to reveal common best practices among grade nine transitional programs and to furnish informed recommendations for future directions of this study’s freshman academy.

The first year of high school is pivotal, and the transition into high school is often characterized as a time when students experience a decline in grades and attendance (Barone, Aguirre-Deandreis, & Trickett, 1991; Isakson & Jarvis, 1999). During this critical developmental stage, adolescents require a sense of belonging and control over their new environment (Eccles & Midgley, 1989; Eccles et al., 1993; Hertzog & Morgan, 1998; Isakson & Jarvis, 1999; Akos & Galassi, 2004). Although a hospitable environment is an important factor in creating a sense of connectedness to school, students must also be cognitively stimulated in constructing new knowledge through their prior experiences within the current context.
Within the past decade and a half, the implementation of grade nine specific SLCs have surfaced as a solution to easing the “grade nine bulge”. This body of literature revealed numerous models of stand alone and school-within-a-school grade nine programs. Some programs limit their participants to at-risk students, while others include all ninth graders in a district’s student body. Impediments to successful high school transition are not limited to at risk students. High achieving middle schoolers often lose interest in high school, as indicated in increased absences and lower scores (Blyth, Simmons, & Carlton-Ford, 1983). Keeping them interested in school by clarifying its relevancy in future aspirations is vitally important. A recommended instructional model of freshmen academies that facilitates more personal interactions and development of self-agency among students is the freshman academy SLC. Early identification of an imbalance among social, cognitive, and environmental factors necessary for healthy development of self-agency provides opportunity for intervention.

While there appears to be a wide variety of structural models of the freshman academy, the ultimate goal of isolating high school freshmen is to aggressively address the clearly identified “mismatch between the needs of developing adolescents and the opportunities afforded them by their social environments” (Midgley et al., 1993). Hertzog (1998) believed it is most crucial to isolate ninth graders, noting the sharp contrast between eighth and ninth grade teaching philosophies and middle and high school cultures as a leading cause of academic derailment of high school freshmen. Reents (2002) highlighted the successes of several ninth grade academies in Houston, TX, Rochester, NY, and Cache County, UT. Each of these models was uniquely structured, yet all three yielded successful results by isolating ninth graders from the general
Grade 10-12 population for academic classes, while comprehensively addressing academic impediments to successful high school transition.

Clark and Hunley (2007) studied a small Kentucky district’s freshman academy, which adopted its middle school model by providing two-semester classes, short periods, and a team-teaching approach. Freshmen were separated from the general population for most of the day, team-taught in a separate wing of the school for core academic courses. Team teachers were given autonomy to flexibly design their schedules, facilitating longer classes for specialized instruction, science labs, video presentation, awards celebrations, etc. In addition to the four core classes, teams scheduled weekly test prep classes, focused on reading comprehension, basic grammar, math computation, and problem solving skills. Upon initial program evaluation, special programs were developed by the district’s Family Resource Center “that encourage, empower, and give a sense of belonging to high-risk students. This approach led to improved attendance and behavior” (p. 45).

Herlihy’s (2007) study of Philadelphia’s Talent Development model’s strategy for addressing ninth-grade transitional impediments featured six key program components deemed essential in constructing a comprehensive, educationally sound program design. Results of the study showed positive gains in attendance, academic course credits earned, and promotion rates of first time ninth graders. These findings revealed the importance of a program design that provides environmental, cognitive, and behavioral support systems. Herlihy (2007) noted that when high schools integrate structural reforms with instructional and curricular reforms “students can only strengthen their academic achievement and long-term success in high school (p. 6).
It is important to note that issues in urban, suburban, and rural communities, indigenous to specific regions of the country vary in degree of significance as impediments to successful high school transition: “The middle to high school transition issue cannot be approached through a one-size-fits-all mentality. Rather, it demands a variety of adaptable approaches for the greatest positive effect” (Cohen & Smerdon, 2009, p. 180). Therefore, this body of literature explored a variety freshman academies implemented in several regions of the country. Each site studied hosted a number of common academy practices, while addressing its unique population needs regarding academics, discipline, and attendance concerns. Despite variations in needs among specific school populations and the availability of building and financial resources to establish freshman academies, there were several components noted more successful than others in easing high school transition, ensuring that freshman earn their course credits and move on to sophomore year. Pairing structural supports with specialized curricula reform yielded the best results in easing transition and engaging students.

On its Breaking Ranks Process Activities webpage, CSSR (2009) suggests twelve essential components of a successful ninth grade transitional SLC. The following list is compiled in order of both difficulty of implementation and likelihood of positively impacting student performance:

1. Gather eighth grade data
2. Establish a summer bridge program
3. Provide a freshman orientation program
4. Support extra curricular opportunities
5. Implement an advisor/advisee program
6. Provide tutoring and support
7. Establish a twilight school – for credit and concurrent support
8. Create a Freshman Academy
9. Be sure that teachers of freshmen are united (TOFU)
10. Incorporate a freshman seminar class
11. Team students with a matched set of teamed teachers
12. Appropriately modify staffing and scheduling (p. 1)

CSSR recognizes that designing and implementing a freshman academy inclusive of all twelve components will take time, and ongoing support of school staff, district administrators, parents, and the school community at large.

Hertzog, in a 2004 interview with Carol Chmelynski, affirms one essential component of a successful transition program is its unique design, meeting the needs of its specific community: “You can’t template a successful transition; what works for one group, might not work for another. Data is out there that shows if we can get kids to the tenth grade they will probably graduate from high school” (p. 50). The design of the freshman academy of this study is uniquely structured. The ninth grade population is not isolated in a separate location of the building. Instead, the four different teams are home-based in four different hallways located in different wings of the building. Ninth grade students are integrated with others, yet remain in the safety-net of their team teachers and team hallway for three periods a day (science is in another location). As previously noted, the academy has been successful in personalizing the freshman experience and buffering the environmental climate shock between middle and high school;
however, additional attention is warranted to practices that will engage students cognitively in rigorous and relevant curriculum and instruction.

This body of literature logically rounded out this study’s review, which first identified common, often insurmountable, impediments of high school transition, established as indicators of high school dropout. The study proceeded with an investigation of the historical context of SLC implementations in response to the depersonalized, stifling environment of the industrial modeled traditional high schools. Finally, this study concluded with examination of common best practices among freshman academies of a variety of unique infrastructures and community configurations.

**Conclusion**

Framed by Piaget’s cognitive-stage theory and Bandura’s (1986) social cognitive theory, this study considered that high school freshmen were somewhere on the continuum of attaining equilibration of their final stage of childhood development, and by their sophomore year, they were capable of abstract deductive reasoning. They should have been capable of reasoning through factors that influence their thoughts and actions. The literature review aligned with key findings of the study, establishing historical context of ninth grade transitional impediments, small learning communities, and grade nine transition programs. Student and staff participants identified similar impediments to high school transition to those mentioned in the literature. Likewise, they noted specific practices of the freshman academy that were effective in engaging students in school, with strong emphases on personalization of staff and socialization among students. Small learning community literature established a solid foundational history of SLCs in response to the disengaging, isolating industrial model of the traditional large American high
school. Key findings of the study indicate that the freshman academy had implemented practices that were effective in personalizing the learning environment through its teaming model. Finally, the literature on common practices among ninth grade transitional programs provided research-based studies that affirmed the effectiveness of the freshman academy model, while providing insight for recommendations for future direction of the program.

**Significance in the Field**

This study is significant in the field of education because it investigated a historically problematic transitional period in American students’ schooling and examined newly implemented remedies for the nation’s high school dropout epidemic, with specific focus on ninth grade transition. The most important concept in preventing high school dropout, or promoting completion is school engagement (Anderson, Christenson, Sinclair, & Lehr, 2004). Dropping out of school is a process of disengagement from school and learning that occurs over many years (Christenson & Thurlow, 2004). Moving from middle school to high school is the most problematic, often traumatic, transitional experience for young adolescents. Inadequate performance during this crucial transition exacerbates the disengagement process and sets many students on the tumultuous track of dropping out (Lounsbury & Johnston, 1985; Wheelock, 1993; Mizelle & Irvin, 2000; Hertzog & Morgan, 1998; Neild et al., 2001).

A recommended instructional model of freshmen academies that facilitates more personal interactions and development of self-agency among students is the freshman academy SLC. Adding to the literature on the efficacy of the freshman academy SLC, this school’s freshmen academy was used as a case to illuminate the impact of one transitional program on student engagement. It investigated the reciprocal interplay of environment, behavior, and cognition
among adolescents in high school transition. Although the results of this study are specific to the school’s unique infrastructures and student body, the study could be replicated to investigate alternative ninth grade transitional programs’ effects on student engagement in different environmental contexts, yielding results specific to those sites and student bodies studied.

**Limitations**

Although participant maturity was not a validity threat due to the one-day SEI survey administration and immediacy of the make up opportunity, some sophomores may not have clearly remembered their freshmen transitional experiences, so the expanse of time between participants’ freshman academy experiences and data collection is a factor to consider as a possible limitation of the study. Although it was important to gather data after students transitioned into the departmentally organized structure of Grade 10-12 classes, it would have been ideal to time this study during second term of sophomore year, rather than second semester. Both freshmen and sophomore transitional experiences would have been more recent memories for participants. A final participant limitation was brought to light in students’ focus group discussion regarding SMART goals and metacognitive essays. All participants of this study were students of the researcher, who routinely employs student reflective instructional practices. The freshman academy staff focus group discussion revealed that most teachers do not employ these strategies in their classrooms; therefore, student discussions regarding the benefit of these freshman academy practices in cognitively engaging them in schoolwork are limited.

Other possible limitations to the study include the demographics of the school’s student body, lacking ethnic diversity, with 94% of its population considered white non-Hispanic; and the school’s unique infrastructure of a technical school within a comprehensive high school, in
which students are integrated in academic classes. According to Maxwell (2005) limitations due to generalization are not validity threats, as “the generalizability of qualitative studies is usually based not on explicit sampling of some defined population to which the results can be extended but on the development of theory that can be extended to other cases” (p. 116). Nonetheless, lack of ethnic and socio-economic diversity among students and the school community at large are limitations to consider in this study.

Data analyses through the lenses of cognitive-stage development and social cognitive theories drew focused attention to adolescent psychology, generalizing high school students’ cognitive and affective behaviors in response to an intervention, this school’s freshman academy. Although these lenses were appropriate through which to focus, this study is limited to the scope of these two lenses.

**Recommendations**

Key findings of this study drew attention to several successfully implemented components and practices of the freshman academy that effectively addressed high school transitional impediments and facilitated student engagement. The teaming model of the freshman academy was effective in easing students’ environmental and social transitions into high school. However, attention was also drawn to students’ limited sense of control over or relevancy in their coursework. Recommendations for new direction in the freshman academy address practices relative to cognitive engagement: interdisciplinary team instruction, academic ability-group tracking, and communication among different grade level curriculum design teams.

Although interdisciplinary teams of teachers were assigned the same students, there was no significant interdisciplinary instruction in place, despite teachers’ earnest intentions and
efforts. Inconsistencies in effectual instructional practices warrant professional development of academy staff in constructivist learning methodologies, differentiated instructional practices, and brain based learning strategies to facilitate more knowledgeable cross-curricula planning and result in more meaningful learning experiences for students. Professional development is effective when teachers have ongoing, guided support as they test and refine new instructional methods (Newmann, Smith, Allensworth, & Brynk, 2001a). A further recommendation is to add an instructional coaching component to this freshman academy SLC. Observing and coaching teachers through implementation of newly learned classroom practices and instructional strategies will offer guided support and assurance of effective and immediate implementation, while ensuring equal learning opportunities for all freshman academy students.

The practice of academic ability-group tracking students in the freshman academy was an unresolved topic of discussion, although agreed upon by staff as a contributing factor to stifling limitations of students’ schedules and disparity among class sizes. Therefore, another recommendation of this study is to investigate the possibility of heterogeneously mixed classes on the freshman academy.

Finally, seven years into the freshman academy’s implementation, students continually struggle with the sharp delineation between middle and high school coursework and teacher expectations. A further recommendation of this study is to establish some communication among curriculum design teams of eighth, ninth, and tenth grade teachers and staff, leading to the development of multiple grade leveled interdisciplinary instruction, aligning with students’ differentiated cognitive and emotional readiness to learn.
Perusing CSSR's list of twelve essential components of a ninth grade transition program highlights a number of practices that have been successfully and fully implemented in this study's freshman academy. Attention is also drawn to components in need of modification to ensure the freshman academy continues its forward momentum, engaging all its students cognitively and affectively in school and learning.
References:


Cotton, K. & Northwest Regional Educational Lab., P.R. (1996). School size, school climate,
and student performance.


Psychologist, 26(3/4), 207.


Appendix A

Permission Letter Superintendent of Schools

Dr. Gary Maestas, Superintendent
Plymouth Public Schools Central Office
253 South Meadow Rd.
Plymouth, MA  02360

February 2, 2012

Dear Dr. Maestas,

As you know from our recent conversation at PSHS during Senior Project Presentations, I am in the final phase of writing my doctoral thesis proposal at Northeastern University. The purpose of this letter is to request consent to conduct a mixed methods study of Plymouth South High School’s Freshman Academy’s impact on student engagement.

The purpose of this study is to examine the influence of the freshman academy on students’ affective and cognitive engagement and to determine which practices in place are most effective in initiating and sustaining student engagement. The study will inform the district, the school, and the academy staff of which common practices facilitate and/or impede student engagement in high school.

I propose to use the following four data sets: school documents, a student survey, and teacher and student focus groups. The documents will include disciplinary, attendance, and academic records of last year’s ninth graders. In addition, I plan to administer the Student Engagement (SEI) Instrument to a stratified sampling of the sophomore class (my classes, which closely represent 20%, proportionately of the tracked tiers). The SEI is a 35-item self-report questionnaire, consisting of six subscales measuring two constructs: psychological engagement and cognitive engagement. For parental consent of this portion of the study I will send a letter home asking for response from those who choose to opt-out. Finally, to gain further insight, I plan to conduct a small focus group interview of selected, willing students whom I feel will openly engage in discussion. The focus group will consist of 5-6 individuals, who will remain anonymous. Parental consent and student assent forms will clearly articulate that participation is voluntary and opting out will in no way impact a student academically. Finally, I plan to include a focus group of freshman academy staff, to gain their insights and perspectives. Prior to beginning data collection, Northeastern University’s IRB will have approved all protocol cover letters, consent and assent forms, and data collection instruments.

If you have any questions regarding this study, please contact me directly at (508) 566-6517 or via e-mail at dhartley@plymouth.k12.ma.us, or my advisor, Dr. Francis Connor at (508) 455-8737 or via e-mail at f.connor@neu.edu. Thank you for forwarding the district’s research approval form, which I have attached.
Sincerely,

Diane Hartley
PSHS English Dept
Appendix B

Initial Participant Recruitment Letter – e-mail

April 11, 2012

Dear Freshmen Academy Teachers and Staff,

As many of you know, I am currently pursuing my doctorate in education from Northeastern University, and, as part of this pursuit, will be conducting a research study on the influence of our freshman academy on student engagement.

I am currently looking for freshman academy teachers who also teach a sophomore off-team class. Ideally, I’d like to include one teacher of each core discipline area as well as one guidance counselor and one special education teacher. Participating in this study will entail engaging in a focus group interview and giving permission to the researcher to audiotape your discussions for later transcription and analysis.

Once I complete my proposal of this study and receive approval from Northeastern University, I will formally request your participation. At this time, I am simply looking for an initial interest response. Please be aware that agreeing or not agreeing to participate in this study will in no way impact your work here in the school or our relationship as colleagues. Also, any participation in the study will be completely confidential; names and other personal information will not be used; likewise the school will not be named.

Please respond via e-mail to dhartley@plymouth.k12.ma.us if you are interested or have any questions. Thank you in advance for your time.

~Diane Hartley
Appendix C

Signed Informed Consent Document of Freshman Academy Staff Participants

Northeastern University, College of Professional Studies
Investigator Name: Diane Hartley, Francis Connor, PhD
Title of Project: One Freshman Academy’s Influence on Student Engagement in High School

Why am I being asked to take part in this research study?
You have been asked to participate in this study because you are a freshman academy teacher who also teaches a sophomore off-team class.

Why is this research study being done?
The purpose of this study is to provide a theoretically framed, research-based analysis of a freshman academy’s influence on students’ cognitive and affective (psychological) engagement in school.

What will I be asked to do?
The researcher will be looking for you to participate in the following ways:
1. Participate in a focus group session that will be audio taped and transcribed
2. Read over transcribed audiotapes to ensure accuracy

Where will this take place and how much time will it take?
The focus group session will last approximately one hour, and will take place at the high school in a convenient location for those participating, and at a convenient time for those participating.

Will there be any risk or discomfort to me?
There are no significant risks involved in being a participant in this study.

Will I benefit by being in this research?
There are no direct benefits to you for participating in this study. It is hoped that the results of the study may illuminate the best practices of an academy in engaging students, while shedding light on components warranting attention to ensure an academy maintains forward momentum.

Who will see the information about me?
Your part in the study will be completely confidential. Pseudonyms will be used for all study participants. Only the researcher will be aware of the participants' identities. No reports or publications will use information that can identify you, the school or any individual in any way. All audiotapes will be destroyed following transcription and analysis.

If I do not want to take part in the study, what choices do I have?
You are not required to take part in this study. If you do not want to participate, you do not sign this form.
Can I stop my participation in this study?
Participation in this study is voluntary, and your participation or non-participation will not in any way affect other relationships (e.g., employer, school, etc.). You can refuse to answer any question and you may discontinue your participation in this research program at any time without penalty or costs of any nature, character, or kind.

Who can I contact if I have questions or problems?
Diane Hartley
Northeastern University
College of Professional Studies
Doctor of Education Program
Work # (508) 224-7512
E-mail: hartley.d@husky.neu.edu

Dr. Francis Connor
Northeastern University
College of Professional Studies
50 Nightingale Hall
Campus # (617) 373-2400
E-mail: f.connor@neu.edu

Who can I contact about my rights as a participant?
If you have any questions about your rights as a participant, you may contact Nan C. Regina, Director, Human Subject Research Protection, 960 Renaissance Park, Northeastern University Boston, MA 02115 tel. 617-373-4588, email: irb@neu.edu. You may call anonymously if you wish.

Will I be paid for my participation?
You will not be paid for your participation in this study.

Will it cost me anything to participate?
There is no cost to participate in this study.

I have read, understood, and had the opportunity to ask questions regarding this consent form. I agree to participate in this study on a voluntary basis.

____________________________________  ____________________________________
Research Participant (Signature)        Date

____________________________________
Research Participant (Printed Name)

____________________________________  ____________________________________
Signature of the researcher, Diane Hartley        Date
Appendix D

Signed Informed Parental Consent and Assent Document of Student Participants

Northeastern University, College of Professional Studies
Investigator Name: Diane Hartley, Francis Connor, PhD
Title of Project: One Freshman Academy’s Influence on Student Engagement in High School

Why has my child been asked to take part in this research study?
Your child has been asked to participate in this study because they are a tenth grade student who has completed one year in a freshman academy.

Why is this research study being done?
The purpose of this study is to examine a freshman academy’s influence on students’ social and academic connectedness to school.

What will my child be asked to do?
The researcher will be looking for your child to participate in a focus group session (discussion among a group of five students about their freshman academy experiences and their transition into sophomore year). This group discussion will be audio taped and later transcribed. Your child will also be asked to read over what he/she has said in discussion to ensure accuracy.

Where will this take place, and how much time will it take?
The focus group session will last approximately one hour, and will take place at the high school in a convenient location and at a convenient after school time for those participating.

Will there be any risk or discomfort to my child?
There are no significant risks involved in being a participant in this study.

Will my child benefit by being in this research?
There are no direct benefits to your child for participating in this study. It is hoped that the results of the study may illuminate the best practices of an academy in engaging students, while shedding light on components warranting attention to ensure an academy addresses the needs of all transitioning students.

Who will see the information about my child?
Your child’s part in the study will be completely confidential. Pseudonyms will be used for all study participants. Only the researcher will be aware of the participants’ identities. No reports or publications will use information that can identify you, your child, the school or any individual in any way. All audiotapes will be destroyed following transcription and analysis.

If I do not want my child to take part in the study, what choices do I have?
If you do not want your child to participate, simply do not sign and return this letter. If, however, you have no objection, please sign and return this letter of consent to me by April 27, 2012.
Can I stop my child’s participation in this study?
Participation in this study is voluntary, and your child’s participation or non-participation will not in any way affect his or her academic standing or our teacher-student relationship. You may discontinue your child’s participation in this research program at any time without penalty or costs of any nature, character, or kind.

Who can I contact if I have questions or problems?
Diane Hartley
Northeastern University
College of Professional Studies
Doctor of Education Program
Work # (508) 224-7512
E-mail: hartley.d@husky.neu.edu

Dr. Francis Connor
Northeastern University
College of Professional Studies
50 Nightingale Hall
Campus # (617) 373-2400
E-mail: f.connor@neu.edu

Who can I contact about my rights as a participant?
If you have any questions about your rights as a participant, you may contact Nan C. Regina, Director, Human Subject Research Protection, 960 Renaissance Park, Northeastern University Boston, MA 02115 tel. 617-373-4588, email: irb@neu.edu. You may call anonymously if you wish.

Will my child be paid for his or her participation?
There is no compensation for participation in this study.

Will it cost me anything to participate?
There is no cost to participate in this study.

I agree to allow my child to participate in this study on a voluntary basis.

____________________________________  ____________________
Parental/Guardian Signature        Date

____________________________________
Parental/Guardian Printed Name

____________________________________  ____________________
Research Participant (Student’s Signature)        Date

____________________________________
Research Participant (Student’s Printed Name)
Appendix E

Request for Informed Parental Consent of Students to Participate in Diane Hartley’s Doctoral Study by Taking SEI Survey

Northeastern University
Northeastern University, College of Professional Studies
Investigator Name: Diane Hartley, Francis Connor PhD
Title of Project: One Freshman Academy’s Influence on Student Engagement in High School

Dear Parents or Guardians,

I am in the process of completing a doctoral thesis at Northeastern University, studying the influence of a school’s freshman academy on student engagement.

For my doctoral thesis research project, I would like permission to survey your child using a 35-item self-report survey of student engagement, titled Student Engagement Instrument. The survey measures students’ perspectives on their connectedness to school, using a four-point scale response to statements. For instance, one item reads: “I enjoy talking to the students here”; to this a student taking the survey would 1. strongly agree, 2. agree, 3. disagree, or 4. strongly disagree. This survey will be administered electronically during English class and will take approximately fifteen minutes to complete.

There are no foreseeable risks or discomforts to your child for taking part in this study.

There are no direct benefits to your child for participating in the study.

No one, including the researcher, will know what your child’s answers are. Scores will be calculated collectively to gather a general sense of students’ perceptions. Any reports or publications based on this research will use only group data and will not identify you, your child, the school or any individual as being of this project.

Participation in this study is voluntary. Choosing to participate or opt-out will in no way impact a student academically, nor will it affect our relationship. If you have any questions regarding this, please don’t hesitate to e-mail me at hartley.d@husky.neu.edu, or call 508-224-7512.

If you have any questions about your rights in this research, you may contact Nan C. Regina, Director, Human Subject Research Protection, 960 Renaissance Park, Northeastern University, Boston, MA 02115. Tel: 617.373.4588, Email: irb@neu.edu. You may call anonymously if you wish.

If you have no objection to your child taking the survey, no further action on your part is necessary. However, if you object please sign below and return this letter to me by April 23, 2012.

Sincerely,
Diane Hartley

I DO NOT WANT MY CHILD TO BE ADMINISTERED THE STUDENT ENGAGEMENT SURVEY

Parent/Guardian’s Signature_______________________________ Date: ___________

Print Child’s Name_____________________________
Appendix F

Link to electronic version of SEI (note: PDF version attached)

https://docs.google.com/spreadsheet/cce?key=0An4xwHPFT7ttDN5eFBYU2ZtMU9zTFJQSiRWR1hHQUE

To view survey data, go to “Form” on the menu bar and drag down to “show summary of responses.”
Script of disclosure for students completing the SEI instrument:

As you all know, I am completing a doctoral study, at Northeastern University. The topic of my research study is a freshman academy’s influence on students’ connectedness to school. Your parents or guardians have given permission to allow you to participate in my study by completing a survey, which I am going to administer electronically. I will guide you to the survey, using the image projected on the whiteboard. If you choose to take the survey, go ahead and bubble in the survey responses as directed.

Your participation is voluntary. Even though your parents or guardians have said it is o.k. to participate you do not have to if you do not want to. That’s o.k.

The survey is online and linked to my blog in a GoogleDoc form. To take the survey you will open Google Chrome and type in the URL: http://www.dihartley.blogspot.com. You DO NOT need to login to your Google account. YOUR IDENTITY IS COMPLETELY CONFIDENTIAL. I will not know your individual responses, only what you record collectively. Please respond as honestly as possible, so the survey results are accurate.

If at any time you feel as though you don’t want to complete the survey, you may stop. Please be assured that choosing to participate in my study or choosing to opt out will not impact your academic standing or our student-teacher relationship in any way.
Appendix H

Freshman Academy’s Influence on Student Engagement in High School
Tenth Grade Students’ Focus Group Questions  - Coordinating with SEI

Section One: Teacher-Student Relationships (Psychological/Affective Engagement)
1. Prior to ninth grade, what, if any, orientation activities made you look forward becoming a high school student?
2. In your first days of ninth grade, what, if anything, did your teachers do to make you feel good about being a member of your team on the freshman academy?
3. How does being on a freshman team influence your student-teacher relationships? Do you feel similarly or differently toward your sophomore teachers?

Section Two: Control and Relevance of School Work (Cognitive Engagement)
1. As an incoming freshman, what, if any, were your biggest challenges in meeting academic course expectations?
2. Was ninth grade the first time you were tracked (honors, CP1, CP2) by your academic ability?
3. What are your opinions about tracking students?
4. How do you feel about your placement in different freshman classes? Were you appropriately challenged to meet course expectations?
5. What assignments did your freshmen team teachers coordinate (i.e. the research paper, scheduling of tests on different days) to help students meet success?
6. How does hard work (meeting challenges) make you feel about your coursework?
7. What specific skills you learned as a freshman, have proven most helpful to you as a sophomore?
8. Overall, what is your impression of the freshman academy experience in preparing students for the academic demands of tenth grade?

Section Three: Peer Support for Learning (Psychological/Affective Engagement)
1. What was the most difficult social adjustment when you transitioned from eighth grade to freshmen year?
2. How difficult or easy was it for you to make new friends in on and off team classes?
3. What classroom activities did your teachers plan to make you work with different groups or different students?
4. When new kids showed up in your freshmen classes, how were they greeted? Is this the same or different when kids show up in sophomore classes?
5. How easy or difficult is it for a student here to earn the respect of others?
6. How, if at all, did being on a freshman academy team influence your friendships?
7. What did you miss, if anything, about being on a team when you became a sophomore?

Section Four: Future Aspirations and Goals (Cognitive Engagement)
1. What goal setting activities did you practice in your ninth grade classes? Had you ever written SMART goals or metacognitive essays before?
2. In your opinion, how did reflection and goal setting influence you? Did any of these activities make you more aware of how you could improve your skills?
1. What routines or practices you learned in school will be useful in your future (keeping an agenda, setting goals, homework habits etc.)?
2. How important is what you learn in high school to your future?
3. What does your future look like?

Section Five: Family Support for Learning (Psychological/Affective Engagement)
6. How important is it to you for your teachers and parents to communicate about you?
7. How effective were teacher blogs in keeping you or your parents informed of upcoming assignments and/or important dates (progress reports, report cards, vacations etc).
8. What do you think is the best way for teachers to communicate with parents?
9. How did you and react to your first high school progress report? Were you surprised, or was it as you expected?
10. Were your parents aware of your academic standing before your first progress report?
11. What did you think of having your grades available online? How often did you or your parents check your progress?
12. What differences, if any, do you see in communication between teachers and parents now that you are a sophomore?

Section Six: Extrinsic Motivation (Cognitive Engagement)
1. What rewards, if any, are offered to you at home that may influence you to work harder at school? (Do you earn money for grades? Are you awarded special privileges?)
2. What rewards/awards, if any, are offered to you at school that may influence you to work harder or behave differently than you would otherwise?
Appendix I

Freshman Academy’s Influence on Student Engagement in High School
Academy Staff Members’ Focus Group Questions- Parallel with Students’ Questions

Section One: Teacher-Student Relationships (Psychological/Affective Engagement)
1. What freshman academy orientation activities/events help students feel acquainted with the building’s physical structure and/or organizational routines?
2. What activities, if any, did you or your team design and implement to make students feel good about being a member of your team on the freshman academy?
3. What opportunities do you have to get to know your freshmen that you do not have with your sophomores?

Section Two: Control and Relevance of School Work (Cognitive Engagement)
1. What do you perceive as the most significant academic challenge for incoming freshmen?
2. What are your opinions about ability-tracking students?
3. What assignments did your freshmen teaching team coordinate (i.e. the research paper, scheduling of tests on different days) to help students manage their time and workloads?
4. How important is a student’s level of effort in meeting academic success?
5. What routines have you established to encourage students to check their work for mistakes before handing it in?
6. What specific skills do your freshmen acquire that are most important to their success as sophomores?
7. Overall, what is your impression of the freshman academy experience in preparing students for the academic demands of tenth grade?

Section Three: Peer Support for Learning (Psychological/Affective Engagement)
1. What do you perceive as the most difficult social adjustment for incoming freshmen?
2. What classroom activities do you find most effective in getting students to work with different groups/and or individuals? Are these the same or different with freshman and sophomores?
3. When new kids show up on your rosters, what do you and your students do to help them fit in? How, if at all, does this differ among freshmen and sophomores?
4. How easy or difficult is it for a student here to earn the respect of others?
5. How important is it for freshmen to have a sense of belonging to their academic team?

Section Four: Future Aspirations and Goals (Cognitive Engagement)
1. What goal setting activities do you practice in your ninth grade classes (SMART goals, metacognitive essays, reflections)? Are these similar or different than what you do with sophomores?
2. In your opinion, how do reflection and goal setting activities influence your students’ performance on successive assignments?
3. In your opinion, what routines or practices of your freshmen classes will be most useful in their future (keeping an agenda, setting goals, homework habits, etc.)?
4. How important is what you teach in high school to your students’ future?

**Section Five: Family Support for Learning (Psychological/Affective Engagement)**
1. What is most important to you in home-to-school communication?
2. How important and/or beneficial is it to maintain a teacher blog or web page?
3. What do you think is the best way for teachers to communicate with parents regarding specific student academic and/or social behaviors?
4. Was there a noticeable increase in parent communication after the first freshman year progress report? How is this alike or different than other progress reports/report card distributions?
5. How effective is posting grades online in maintaining open communication with parents?
6. How effective are parent-team meetings when addressing academic and/or behavioral issues of a student?
7. Specifically, what team meeting practices maximize the potential outcome?
8. What differences, if any, are there in communication patterns between you and parents of your freshmen and sophomore students?

**Section Six: Extrinsic Motivation (Cognitive Engagement)**
1. In your opinion, how effective are home-based extrinsic rewards in motivating a student to work harder or behave differently at school?
2. What school or academy initiatives, if any, influence your students to work harder or behave differently than they would otherwise?
Appendix J

Cover Letter to Parents of Students Expressing Interest in Focus Group Participation

Dear Parents or Guardians,

As you know, my name is Diane Hartley, and I am your child’s tenth grade English teacher. You may also know that I am in the process of conducting a doctoral study at Northeastern University for completion of my doctoral degree. The purpose of my research study is to examine the influence of a freshman academy on students’ sense of connectedness to school. It is hoped that the results of the study may illuminate the best practices of an academy in engaging students, while shedding light on components warranting attention to ensure an academy addresses the needs of all transitioning students.

Your child has expressed interest in participating in a focus group interview with a handful of his/her peers, and I would like to answer any questions you may have regarding your child’s participation in my study, before you sign and return the attached consent form.

Please be informed that your child’s participation and your consent are entirely voluntary. Although I would appreciate your child’s participation and your support, the decision to participate or not to participate will in no way impact your child’s academic standing in my class nor will it interfere with our teacher-student relationship.

Attached you will find two copies of an informed parental consent form, one for you to sign and return to me by ______________________, the other for you to keep. For your convenience, I have also posted this informed parental consent form on my classroom blog, the web address of which is dihartley.blogspot.com.

If you should have any questions whatsoever, please call me at (508) 224-7512 x. 2012, and I will be happy to answer any questions. You can always reach me via e-mail at hartley.d@husky.neu.edu.

Sincerely,

Diane Hartley