

ABSTRACT

BRANDER, BRYAN PATRICK. Principal Leadership Styles and the Academic Achievement of Students with Disabilities: A Mixed Methods Approach. (Under the direction of Bonnie C. Fusarelli and Jessica T. DeCuir-Gunby).

The purpose of this study was to examine the relationship between principal leadership styles and the academic achievement of students with disabilities. Participants were North Carolina elementary and middle school principals and teachers. The researcher examined what leadership styles (transformational, transactional, or passive-avoidant) are employed by principals in schools that have demonstrated high academic growth from their students with disabilities. The Multifactor Leadership Questionnaire (MLQ-5X) was administered to special education teachers to rate their principal's leadership style. In addition, the researcher conducted semi-structured interviews with principals to determine the leadership practices they are implementing to promote student success. Descriptive statistics were implemented to identify the dominant leadership styles and demographic trends. Correlation analysis was conducted to determine the relationship and significance between the principals' leadership style and other independent variables in association with academic achievement for students with disabilities. Lastly, thematic analysis and constant comparison methods were employed to analyze principal interview data. The principals in this study led through a more transformational style, ranking high in inspirational motivation and idealized influence. In addition, they focused on collaboration, communication, and high expectations. A significant relationship was found between student achievement and principals who ranked low in laissez-faire leadership. This study adds to the existing body of leadership and student achievement literature and provides data to the current gap in research in regards to students with disabilities. Additionally, this study supplies policymakers and practitioners with

successful leadership practices that are employed by principals to promote academic achievement for students with disabilities.

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Principal Leadership Styles and the Academic Achievement of Students with Disabilities:
A Mixed Methods Approach

by
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For my dearest Anya Mae and “Baby” Brander. Being a daddy to you has been the most humbling and honorable position I will ever have.

BIOGRAPHY

Bryan Patrick Brander was born on April 2, 1980 and spent the majority of his childhood growing up in Mickleton, New Jersey before moving to Carlisle, Pennsylvania as an older adolescent. He graduated from Elizabethtown College with a Bachelor of Science in Accounting in 2002. After a brief career as an auditor for a public accounting firm, he pursued his true passion – education. Bryan completed a post-baccalaureate certification program and Master of Education in Special Education from Millersville University in 2005. While completing his graduate work in special education, Bryan obtained his first teaching position with the Capital Area Intermediate Unit as a middle and high school emotional support teacher. The following year he accepted an offer from his former high school in Boiling Springs, Pennsylvania as a learning support and life skills teacher. After getting married in 2006, Bryan moved to Durham, North Carolina and started his career at The Hill Center on the middle school faculty, instructing students with learning differences. He followed his interest in administration and earned his Master of School Administration from North Carolina State University in 2009. Upon completion of this program, Bryan entered the doctoral program in Educational Administration and Supervision at North Carolina State University. He currently remains at The Hill Center as Principal and Director of Student Programs. His research interests include educational leadership, school culture, teacher evaluation, instructional technology, and effective interventions for students with disabilities.

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CHAPTER 1

Introduction

Research Area

During the 2009-2010 school year, approximately 6.5 million students, or 13.1% of the total student enrollment nationwide was comprised of students with disabilities (National Center for Education Statistics). These statistics have remained consistent for the past decade, and therefore meeting the needs of this large subgroup is a priority. The Individuals with Disabilities Education Act (IDEA, 2004) and The No Child Left Behind Act (NCLB, 2002) have placed increased accountability on schools to include and demonstrate achievement for students with disabilities. NCLB requires schools to meet Adequate Yearly Progress (AYP), a measurement of how all students are performing according to results on standardized tests. If AYP is not met, then NCLB outlines a continuum of sanctions the school is subject to receiving until they improve test scores. Despite high levels of accountability placed on schools, along with the option to administer alternate high-stakes testing measures for students with disabilities, many schools and districts across the country struggle with achieving growth from this subgroup (Cho & Kingston, 2011).

In North Carolina, students with disabilities accounted for 12.6% of the total enrollment in 2008-2009 (National Center for Education Statistics). AYP is measured in North Carolina by End of Grade (EOG) tests for students in grades three through eight and End of Course (EOC) tests for student in grades nine through twelve. NCLB requires all students, including those with disabilities, be taught according to standards-based instruction

and assessed using a statewide measure (McDaniel, 2007). In turn, more students with disabilities are being instructed in the regular education classroom. This shift in program delivery has placed a burden on regular education teachers and school administrators. School officials are required to make programming decisions for a group of students they were not specifically trained to lead (Garrison-Wade, Sobel, & Fulmer, 2007). Principals feel unprepared to support special education programs, initiatives, and staff, which indirectly affect student achievement (Anderson, 1999; Cooner, Tochtermann, & Garrison-Wade, 2004; Bertrand, Roberts, & Dalton, 2009).

Background of the Study

Student achievement is one of the chief responsibilities of school personnel. Furthermore, principals are being evaluated on the performance of their students on high-stakes tests. Although principals do not have a direct impact on student achievement, various studies have identified a measureable, indirect link to the principals' leadership practices and the academic achievement of students (Cotton, 2003; Hallinger & Heck, 1996; Waters, Marzano, & McNulty, 2003). Principals have a statistically significant relationship on student achievement when they exhibit certain characteristics. Conversely, they were seen to have no significance or a marginal impact on student achievement if they exhibited the wrong behaviors. Extensive research on this connection has framed professional development opportunities for principals and led to Interstate School Leaders Licensure Consortium (ISLLC) Standards for School Leaders (Council of Chief State School Officers, 1996). These

standards have been adopted by leadership preparation programs across the nation and serve as the common benchmark in administrators' evaluation tools.

Although steps have been taken to train school principals to be effective leaders, there remains a lack of focus on serving students with disabilities. The number of students with disabilities in schools has risen over the past decade and it is critical for school leaders to support the connection between general education and special education (Crockett, 2002; Hines, 2008). Unfortunately, this process is difficult for many school leaders who lack formal training in special education. Still, there are schools that have shown significant gains from their students with disabilities. Is the leader responsible for this growth or do the special education teachers possess the greatest impact for these students? In spite of the cohesiveness and strong body of research linking principals and academic achievement of students, a large-scale study related to the academic achievement of students with disabilities has yet to exist. The limited research in the field focuses on inclusive practices and actions taken by principals to improve the outcomes of students with disabilities, but these studies are devoid of a linkage to academic achievement for this subgroup. To fill the gap in research, it is necessary to focus on school leaders that have been successful with students with disabilities through supporting the staff, making strategic programming decisions, and providing timely and relevant professional development.

Purpose Statement

Numerous studies, as evident from the meta-analysis performed by Waters, Marzano, and McNulty (2003), indicate a substantial relationship between leadership and student

achievement. This same analysis, however, is lacking in the literature regarding the nexus between leadership and achievement of students with disabilities. This study examined the leadership styles of North Carolina elementary and middle school principals who have demonstrated high levels of academic growth in reading and math scores from their students with disabilities.

An explanatory concurrent mixed methods design was used through collecting and analyzing quantitative data through the use of surveys and also explaining the data further through in-depth qualitative data. The quantitative phase included the use of the Multifactor Leadership Questionnaire (MLQ-5X), by Bass and Avolio (1990), to collect the perceptions of special education teachers in regards to their principal's leadership style. The qualitative phase involved semi-structured interviews with principals to determine how the principals' specific leadership styles facilitate academic achievement for students with disabilities. This study contributed to the existing literature on the impact of principals and student achievement, and identified strategies and practices these principals implement within their buildings to aid in the growth of students with disabilities.

Significance of the Study

This study provides significance to researchers and practitioners through adding to the existing body of research on leadership and student achievement. Previous research has identified a connection between school leaders and student achievement (Cotton, 2003; Hallinger & Heck, 1998). Researchers have often identified specific leadership practices or responsibilities that are important to breed successful schools (Waters, Marzano, & McNulty,

2003). The current study sought to go beyond contributing to the general literature and provide information on the nexus between school leadership and improving academic achievement of students with disabilities. The limited research regarding students with disabilities is focused on student outcomes and programming. There is a gap in the literature regarding student achievement as measured by standardized test scores.

The quantitative and qualitative data collected and analyzed from this study can impact school leaders and principal preparation programs. First, school leaders can be armed with trends and data on the most successful elementary and middle school principals in North Carolina, as measured by growth on EOG tests scores from their students with disabilities subgroup. Schools are often persecuted for their failure to meet the needs and improve performance of students with disabilities. This study uncovered common practices from successful leaders, who could in turn serve as professional development leaders across the state.

Next, this study identifies the leadership styles of successful principals along with the significant factors that contribute to student learning. This information is invaluable to principal preparation programs that are charged with training future leaders. Principal preparation programs tend to provide a minimal overview of special education law, policies, regulations, and best practices (Cooner et al., 2004). The data collected and analyzed for this study could shed light on the importance of leadership styles and practices for impacting academic achievement for students with disabilities.

Definition of Terms

For the purpose of this study, the following key terms are defined to provide a shared context:

Academic achievement. The level of proficiency one has achieved in an academic area, as defined by a summative cumulative high-stakes test. (This term is used interchangeably with student achievement).

End-of-grade test (EOG). North Carolina's state-developed standardized tests in reading and math designed to assess the competencies defined by the North Carolina Standard Course of Study in grades three through eight (North Carolina Department of Public Instruction).

Leadership. Observable activities that occur in a group or organization, involving leaders and followers who willingly subscribe to common purposes and work together to achieve them (Clark & Clark, 1996).

Leadership style. The traits, behavioral tendencies, characteristics, and approach of providing direction and motivating others (Leadership Style, 2006).

Passive-Avoidant leadership. Leadership that avoids: responding to issues, supporting staff, building culture, defining clear expectations or goals (Bass, 1994).

Student achievement. The level of proficiency one has achieved in an academic area, as defined by a summative cumulative high-stakes test. (This term is used interchangeably with academic achievement).

Student with disabilities. A student with “mental retardation, hearing impairments (including deafness), speech or language impairments, visual impairments (including blindness), serious emotional disturbance, orthopedic impairments, autism, traumatic brain injury, other health impairments, or specific learning disabilities; and who, by reason thereof, needs special education and related services" (IDEA, 2004).

Transactional leadership. Leadership based on defining needs, assigning clear tasks, rewarding congruent behavior, and exchange between leaders and followers (Burns, 1978).

Transformational leadership. Leadership based on leading the followers, building capacity, facilitating and supporting employees, and proactively responding to organizational challenges (Burns, 1978).

Summary

This study addresses gaps in the research related to leadership and student achievement for students with disabilities. The results should be useful to researchers and practitioners alike. Practitioners in higher education who prepare leaders should benefit from learning the specific leadership styles that impact student achievement. Principals in the field should benefit from the specific leadership practices utilized by those who are successful with this growing subgroup of students. Through the data provided in this study, they should be able to learn more about and emulate specific leadership tasks principals implement to be successful with students with disabilities. Chapter 2 addresses the relevant leadership literature and specific studies that have examined the impact of leadership for students with

disabilities. The methodology proposed to investigate this topic, along with the instruments, participants, reliability and validity is described in chapter 3.

CHAPTER 2

Literature Review

Historic Leadership Theories

Leadership theories have evolved significantly over the past century. There has been a transition from focusing on the specific traits of a leader to examining how leaders transform organizations into successful communities with shared values and high standards. The following section provides a historical perspective of the evolution of leadership and the related leadership studies in education, which serves as a contextual background of the school leadership styles emphasized later in this study. Table 1 below provides a brief summary of the theories examined in this section along with the characteristics they possess.

Table 1

Historic Leadership Theories

Theory	Time Period	Characteristics
Great Man	Late 1800s – early 1900s	Inherited leadership qualities; upper class; men
Group	1930s	In-groups and out-groups; behavior of follower impacts behavior of leader
Trait	1940s	Leaders possess traits that can be developed over time
Behavior	1940s – 1960s	Focus on behaviors of leaders over the traits they possess; these behaviors are developed over time
Contingency/ Situational	1960s – 1970s	Focus on situation or context; leadership styles can constantly adjust given the situation
Excellence	1980s +	Doing the right thing; moral and cultural leadership; transforming followers to want to do well
Assessment and Accountability	2000s+	Focus on results, data, and change; measureable outcomes

Great Man Theory. Early leadership theorists throughout the late 1800s and early 1900s agreed on the “great man” leadership theory. According to this theory, great men, particularly from the upper class, inherited leadership qualities. These abilities were believed to have been born in such leaders, not made (Kirkpatrick & Locke, 1991). These superior qualities, traits, and abilities separate them from their followers. In times of need, the “great man” would arise, almost by magic to diffuse or control the situation with their superior

powers. Leaders often attributed to this theory include Abraham Lincoln, Mahatma Gandhi, and Alexander the Great.

Hook (1943) concluded there were two types of great men: (a) the eventful man and (b) the event making man. The eventful man happened to be in the right place at the right time, while the event making man created great events. Jennings (1960) described three different types of great men: (a) supermen, (b) heroes, and (c) princes. He defined supermen as rule breakers and value creators; heroes as leaders of great and noble causes; and princes as men who played the game by manipulating their followers.

The great man approach, although one of the first dominant leadership approaches, has not been empirically tested or analyzed. Instead, the great man theory has been limited to examination of historical figures and has not been applied to recent leadership theories. Several limitations reveal why this approach to leadership is not a currently accepted theory, especially in education. First, no two people are alike; therefore it is impossible to emulate someone's life and experiences. Second, the great man approach is sexist in nature and disregards the importance of women in leadership roles. Third, focusing on behaviors of previous leaders, one would not have the ability to be dynamic in thinking about modern challenges and solutions (Daresh, 2002).

Group Theory. By the 1930s, researchers were interested in how leadership emerges and develops in small groups. A more egalitarian view of leadership emerged and focused on how small groups of individuals operate together. More specifically the relationship between the leader and follower was analyzed, concluding that leaders have the ability to lead

followers differently. Many scholars claimed that “in-groups” and “out-groups” tend to establish within organizations based on how the subordinates react to the leaders’ leadership style (House & Aditya, 1997).

The study of group theories allowed researchers to discover how environments and group dynamics impact a leader’s style. More importantly, it was concluded that a leader can possess multiple leadership styles given the specific situation. It is believed that the leaders’ behavior changes with the behaviors of the followers. If followers are lacking in performance, then the leader will emphasize on the weaknesses to improve performance. Conversely, when followers are performing at a high level, the leader will exhibit praise (Graen & Uhl-Bien, 1995).

Trait Theory. The great man theory research was extended through the late 1940s by trait theorists, who identified additional leadership characteristics. Trait theory focused on the common, innate characteristics that existed within successful leaders. This perspective focused on the attributes of leaders that separate them from their followers, such as personality traits, values, skills, beliefs, and abilities (Yukl, 2002). The goal under trait theory was to identify common traits of great leaders to determine the qualities of leadership. Researchers have attempted to determine the specific qualities true leaders possess. Bird (1940) summarized 20 studies in which 79 traits were related to leadership. The most frequent characteristics included accuracy in work, knowledge of human nature, and moral habits.

Stogdill's (1948) work determined that decisiveness in judgment, speech fluency, interpersonal skills, and administrative abilities were the key qualities of a leader. Through an analysis of 25 studies, he identified the variables with the highest correlation to leadership as popularity, originality, sociability, judgment, aggressiveness, desire to excel, humor, cooperativeness, liveliness, and athletic ability, with some evidence on the importance of former leadership experience. Over a decade later, McGrath and Altman (1966) discovered five leadership characteristics related to leadership based on their examination of 25 studies. The characteristics include personality, educational, intelligence, high group status, and leadership training. For the first time, training in leadership is identified as a significant variable.

Similar to the "great man era," the focus of trait theory was not to teach skills and to develop leaders (Spillane, Halverson, & Diamond, 2004). However, unlike the previous leadership era, researchers believed that leaders' attributes can be developed and refined over time. Lewin (1939) claimed that leadership attributes are comprised of a set of skills that can be obtained in an educational environment. Through today, trait theorists believe that some leadership attributes can be acquired over time through the maturation processes, experience, and training (Zaccaro, 2007). Such training can occur through formal education channels and on-site while performing the job.

Behavior Theory. Behavioral research was developed to address perceived deficiencies with the great man and trait theories. This theory, which was popular in the late 1940s through the 1960s, assumed that leadership can be strategically learned, rather than

only inherently possessed. The premise of behavior research was that the behaviors of leaders are more important than the traits they possess. Behavioral theory research has created a multitude of styles and characteristics displayed by successful leaders. Through an analysis of the research of this time period, Spillane, Halverson, and Diamond (2004) determined the styles include autocratic, democratic, directive, laissez-faire, task-oriented, and relationship-oriented (Spillane, Halverson, & Diamond, 2004).

The two most significant behavior studies took place at Ohio State University and the University of Michigan. The Ohio State studies revealed two aspects of leadership, consideration and initiating structure, that describe how leaders across various settings carry out their role (Schriesheim & Bird, 1979). The studies at the University of Michigan focused on determining the principles and methods of leadership that were related to productivity and job satisfaction. Results indicated that leaders who take an employee orientation and have a general concern for interpersonal relations yield better results than those who take a production orientation with close supervision (Likert, 1967).

Despite the vast studies surrounding behavior theory in leaders, the debate to find the single best leadership styles or behaviors exists among researchers. Bolman and Deal (2003) reviewed the leadership literature and concluded that successful leaders possess a myriad of behaviors, including the ability to communicate an organizational vision, take risks, set performance standards, maintain focus, chart direction, display commitment and passion, develop trusting relationships, exhibit honesty and courage, be visible, and display flexibility.

Leaders maintain dynamic positions that require a breadth in ability and an understanding of various behaviors to be successful.

Contingency/Situational Theories. During the 1960s and 1970s researchers focused less on specific behavior patterns, and instead on the behaviors that worked best in a given context or situation. The goal of many researchers in this era was to prove that traits do not account for leadership emergence across all situations. This approach assumes there is an unlimited array of leadership practices that could be appropriate given the specific context (Leithwood & Duke, 1999). Fielder (1967) acknowledged that effectiveness of leaders is dependent on the given situation. Fiedler noted that when the situation is very favorable or unfavorable, an authoritarian style of leadership yielded better results. Conversely, when the situation was moderately favorable or unfavorable, a democratic, humanistic leadership style was more effective. The contingent perspective incorporates a cognitive approach, such as problem solving, reflective practice, and the inclusion of values and principles (Leithwood & Duke, 1999).

Fielder (1967) developed the cognitive resource theory (CRT) that claimed intelligent leaders develop better plans, decisions, and action strategies. Furthermore, they contribute to group performance and are often respected and supported by followers. Over a 15 year research program, including 35 studies and 1600 groups, Fielder (1968) concluded: (a) group effectiveness is contingent on the leader's style, (b) the leader's style is contingent on the group situation allowing the leader to exert influence, and (c) leadership styles are difficult to change and therefore it is better to change the working situation variables.

Contingency and situational theories conclude that there is not one best approach to leadership. Instead, they believe an array of factors from time, task specificity, and dynamics of the situation are critical indicators as to how the leader will lead. Hersey, Blanchard, and Johnson (1996) note that leaders are required to constantly adjust their leadership style to adapt to the given situation. They supported this finding through the development of a leadership model that guides leaders in the appropriate behavior within a given context, based on the subordinates' readiness. This model suggests the importance of determining individuals' readiness and situation before determining the most appropriate response.

Excellence Theories. Since the 1980s many researchers have strayed from the earlier compartmentalized theories and shifted to trying to explain that excellent leadership is best achieved by doing the right thing. The shift over the past few decades includes trying to integrate previous theories in a more elitist context, or excellence theory (Rost, 1991). One of the most popular attempts was completed by Peters and Waterman. In their book *In Search for Excellence* (1982) eight attributes of successful leaders were identified. They stressed that successful leadership requires attending to organization tasks and the people.

A shift from focusing on the leaders in the organization to the entire entity as a whole stemmed from the excellence theories. Kouzes and Posner (2002) stressed the importance of training everyone in leadership to build a culture and community of leaders. Moral and cultural leadership are examples of significant theories that grew from this approach. Leaders are expected to lead by example and serve as a figurehead for others to emulate. However, building a community of leaders can significantly affect the trajectory of the organization.

This transformational leadership style, which includes investing in employees and building a community of leaders, is addressed later in the literature review.

Other leadership models stemming from this era include Total Quality Management (TQM) and School-Based Management (SBM). TQM focuses on quality, satisfaction, efficiency, innovation, and continuous improvement. Deming (1993) who was responsible for the creation of TQM stresses the importance of teamwork and collaboration among managers and workers. Leaders are responsible for providing consistency, core values, training, resources, and support while the employees are responsible for improving themselves, which in turn assists the organization. Other principles of TQM include eliminating micromanagement, reducing numerical goals, and building a culture of communication and trust (Cunningham & Cordeiro, 2006). The focus of each employee and leader is excellence and quality improvement.

School-Based Management (SBM) shares many principles of TQM, including the facilitation of innovation, improvement, and professional growth. SBM is directly applicable to school settings and includes specific roles for leaders and teachers. In fact, the traditional top-down leadership structure is challenged with a distributed leadership premise to disperse among a greater breadth of stakeholders. Cunningham and Gresso (1993) note that SBM is most successful when leaders provide staff with direction, support, and time to collaborate and reflect on their practices. This environment is often evident in schools today in the form of Professional Learning Communities (PLCs) where staff comes together on a frequent basis to facilitate common planning and shared practices.

Assessment and Accountability. The most recent model of leadership, focusing on assessment and accountability, came to fruition at the turn of the 21st century. Over the past decade, school officials have been faced with an increased level of accountability and scrutiny in regards to fiscal management, student achievement, and meeting community expectations. This level of accountability was formalized with the passage of legislation such as NCLB and IDEA, which have altered the profile of school leadership. The principal must be an effective leader, but more importantly needs to develop teacher leaders and robust support systems to promote student learning.

In 2011, the Department of Education developed a set of criteria to grant states flexibility within the NCLB guidelines. North Carolina submitted an application for approval in February 2012. This voluntary process provides flexibility in the areas of: (a) determining AYP, (b) implementation of school and local education agency (LEA) improvement requirements, (c) funding restrictions for rural LEAs, (d) schoolwide programs, (e) support for school improvement, (f) reward schools, (g) highly qualified teacher improvement plans, (h) transfer of certain funds, and (i) use of school improvement grant funds to support priority schools. To receive flexibility in any of all of the areas mentioned, the state must submit a request that addresses the following four principles: (a) college- and career-ready expectations for all students, (b) state-development differentiated recognition, accountability, and support, (c) supporting effective instruction and leadership, and (d) reducing duplication and unnecessary burden from school officials in terms of reporting and evaluation (ED). The accountability measures for addressing the needs of students with disabilities are not

removed under the flexibility process. As indicated in the principles, states must demonstrate a plan to assure all students, regardless of their disability, become college and career ready. In addition, states must specifically indicate the measures that will be taken to close the achievement gap and improve instruction for students with disabilities. Despite the flexibility language in the waiver process, high-stakes testing measures are still included and proficiency must be obtained under the waiver process as well.

O'Day (2002) identified three inherent problems that school accountability mechanisms have on systems. First, she highlighted that schools are often a unit of intervention, but individual performances are a unit of action. School accountability by definition focuses on a large group or unit, but ultimately change must happen at an individual level for schoolwide change to occur. Second, she noted that the influence on internal operations is driven by external control. Accountability measures and policies are driven from national and state legislation that affect the day-to-day operations within schools. School leaders and internal norms are often restricted by large external policies. Third, she argued that information is problematic in schools and essential to school improvement. Schools are mandated to report information to key stakeholders both internally and externally. However, it cannot be assumed that all data is easily interpreted and that stakeholders can and will always do everything possible to improve outcomes.

Increased turnover during this age of accountability has placed school leaders under the spotlight, encouraging them to find a quick solution to raise test scores and retain their positions. This era has teachers, administrators, parents, and students questioning the

educational system. In addition, the added pressure has led some educators to participate in unethical practices to increase student test scores. Ongoing assessments, both formative and high-stakes testing, have left less time for instruction in schools and has taken creativity and innovation out of some classrooms. Both teachers and administrators are now being evaluated by one major factor – student academic achievement. Teachers and principal evaluations have adjusted to reflect this change, with the intent of ultimately changing behavior and persuading educators to find the quick fix.

Leadership Styles in Schools

The body of leadership research is exhaustive, but over recent decades certain leadership perspectives have been the focus of principal leadership research. These include: (a) instructional leadership, (b) moral leadership, (c) passive-avoidant leadership, (d) transactional leadership, and (e) transformational leadership, which are displayed in Table 2. The demanding role and complex nature of the principalship necessitate a strong leader that is able to provide dynamic leadership focused on school improvement. The leadership styles and their impact in schools is described in the following section.

Table 2

Leadership Styles in Schools

Leadership Style	Characteristics
Instructional	Focus on the instructional program; close interaction between principal and staff
Moral	Focus on culture, values, norms; view of school in regards to its importance in society
Passive-Avoidant	Lack of clear expectations and vision; hands-off approach to leading staff
Transactional	Rigid and structured; leader-follower relationship based on exchange of valued items
Transformational	Clear vision and purpose; investment in staff; empower followers to improve; collaborative

Instructional Leadership. Although in existence since the late 1980s, the increased focus on accountability and standards in the recent decade has spurred an increased focus on instructional leadership. Instructional leadership involves a close interaction between leaders and teachers focused on increasing teacher practices to improve student learning (Chrispeels, 2002). Hallinger and Murphy (1987) further broadened the definition of instructional leadership to include: (a) defining the school mission, (b) managing the instructional program, and (c) promoting a positive climate.

Liu (1984) developed two categories to describe instructional leadership tasks: (a) direct leadership and (b) indirect leadership. Direct leadership tasks include professional development and supervision and evaluation procedures. Indirect leadership involves resource acquisition, instructional facilitation, and student problem resolution. Patterson (1993) examined principals who were identified as instructional leaders and noted the following themes demonstrated: (a) clear vision, (b) participative management, (c) instructional support, (d) monitoring of instruction, and (e) resourcefulness.

Critics of instructional leadership note the lack of empirical research relating this model to improved student performance. Furthermore, Marks and Printy (2003) noted the lack of shared decision-making and distributed leadership among stakeholders. Regardless of the flaws involved with this approach to leadership, school leaders are experiencing increased pressure to improve student achievement, compelling them to become more involved with instructional decisions.

Moral Leadership. Moral leadership, coined around the same time as instructional leadership, claimed that schools have a moral obligation to educate society's youth (Etzioni, 1993; Fullan, 2001; Hodgkinson, 1996; Sergiovanni, 1992). Leaders exhibit moral leadership through articulating and upholding important school values and norms, which can potentially create stronger students and teachers (Wong, 1998). Today's standards-based accountability era is heavily focused on student performance and outcomes, which has urged leaders to assure their students make growth, often with the future of their jobs hinging on student success.

School leaders often have difficulty connecting managerial roles and moral responsibilities. This dilemma is examined by Fullan (2001), which he calls the moral imperative. Fullan (2001) states that the role of leadership is to establish a culture of moral purpose where people strive to improve their performance and believe their job is a critical part of society. The moral purpose of leaders and the sustained performance of organizations are mutually dependent. School leaders need to be willing to invest the time and energy, along with the construction of a strategic plan to successfully lead through a moral leadership lens.

Passive-Avoidant Leadership. An opposing leadership style, which often does not connect individuals to understanding their moral purpose within schools, is passive-avoidant leadership. Characteristics of this approach to leadership encompass avoiding specific agreements, clarifying expectations, or providing goals and standards. These leaders are often reactive to problems and do not respond to situations systematically. Passive leaders avoid involving themselves in situations until the problems become significant and obvious. They often follow the adage: “if it ain’t broke, then don’t fix it.”

Avoidant leadership, or laissez-faire leadership, also involves a “hands-off” approach, resulting in an absence of support to the follower (Northouse, 2004). Laissez-faire leaders go one step further than the passive leader by avoiding accepting responsibility, failing to follow-up on initiatives, and resisting expressing their opinions or views on important topics. This approach to leadership assumes that followers are intrinsically motivated and should be

left alone to accomplish goals and make decisions. Bass (1994) identified two components of passive-avoidant leadership:

1. Management by Exception (Passive): This component refers to waiting until problems become serious, chronic, and significant before intervening (Bass, 1994).
2. Laissez-Faire: This component refers to the absence of leadership. Expectations and agreements are not set, and goals and standards are often avoided.

Passive and avoidant leaders offer minimal guidance or support to their staff.

Therefore, this style can be most effective in situations where employees are highly qualified in their discipline (Lewin, Lippitt, & White, 1939). However, this scenario is rare in schools that suffered from high staff and program turnover and decreased funding. Principals may revert to this style of leadership where their area of expertise is limited, such as special education.

Transactional Leadership. Transactional leadership focuses on the interaction for the purpose of exchange between the leaders and followers (Bass, 1985). The leader-follower relationship is based on an exchange of valued items, which may be political, economic, or psychological (Burns, 1978). Transactional leadership is most effective when organizational situations are clear and technical in nature.

Transactional leaders are ineffective at creating change, and therefore accept the goals, structure, and culture of the existing organization. Bass (1994) identified two components of transactional leadership:

1. **Contingent Reward:** This component includes influencing others' behavior by clearly defining the goals and expectations. Rewards or incentives are often utilized when expectations have been met (Bass, 1994).
2. **Management by Exception (Active):** This component involves influencing others' behavior through actively monitoring the work and using corrective methods, as necessary, to assure the task is completed properly (Bass, 1994).

Transactional leadership does not easily deviate from the current operating systems. Therefore, organizations led by transactional leaders are less able to change or adapt to internal and external demands. At times, the rigidity and structural qualities of transactional leadership serve school officials well. Smith and Bell (2011) noted that transactional leadership was utilized by leaders when they respond to accountability measures. Such instances may occur when responding to political pressures, student achievement, or teacher performance. Successful transactional leaders ensure that followers obtain the necessary confidence to achieve their goals (Webb, Neuman, & Jones, 2004). Transactional leadership has been framed as short-term practice to achieve results. Leaders who are focused on extended effectiveness and success within their organization typically exhibit transformational leadership behaviors.

Transformational Leadership. Transformational leadership involves focusing on the ability of individuals to bring about organizational improvement through embodying a sense of ownership in the organization (Leithwood, 1994). More specifically, transformational leaders inspire others to follow them and to achieve extraordinary outcomes,

while developing their own leadership capacity (Bass & Riggio, 2006). Empowerment is a critical quality of transformational leaders and this is accomplished through aligning the goals and objectives of individuals with those of the greater organization. A set of rules and expectations do not formally exist, but instead a culture of connectedness, inspiration, and support is present. Transformation is about influence relationships based on persuasion with people intending real changes to happen (Rost, 1993).

The concept of transformational leadership was first introduced by James MacGregor Burns in his book *Leadership* (1978). He described this leadership style as a process in which leaders and followers raise each other to higher levels of morality and motivation. Burns was pioneering in believing that effective leadership not only promotes positive change, but also permanently impacts individuals as well. This is evident through his inclusion of an ethical/moral component of transformational leadership (Burns, 1978).

The concept of transformational leadership was further development by Bass (1994), who identified four components of transformational leadership:

1. Idealized influence: This component refers to the degree in which the leader behaves in admirable ways that influence others to identify with the leader. The leader also serves as a role model to followers through maintaining a clear set of values that are consistently demonstrated across various settings. Trust is a critical aspect of this component, which is established through a moral and ethical foundation (Bass, 1994).

2. Inspirational motivation: This component involves inspiring others through a clearly articulated vision. Leaders motivate others through establishing high standards, communicating optimism, and providing meaning for specific tasks (Bass, 1994).
3. Intellectual stimulation: This component refers to the leaders' ability to challenge ideas and take risks. Leaders stimulate and encourage others to think critically and creatively. Through a well crafted and clearly communicated vision, leaders allow followers to see their connection to the organization and each other (Bass, 1994).
4. Individualized consideration: This component involves giving others individualized coaching and mentoring to further their achievement and growth. Through this approach, leaders support and educate followers to develop leadership qualities (Bass, 1994).

Heck and Hallinger (1999) indicated that transformational leadership has become one of the most studied models in school leadership. Transformational leaders in schools focus on making changes and restructuring the school by improving the school conditions. These leaders are described by others as more popular, admired, respected, and trusted (Bass, 1998). Transformational leaders reach individuals by investing a considerable amount of time mentoring and coaching them (Bass, 1998). This investment in others ensures that leadership skills and practices are spread throughout the organization to increase its overall effectiveness and success (Kouzes & Posner, 2003).

Leithwood (1992; 1999), Leithwood and Duke (1994), and Leithwood, Steinbach, and Raun (1993) noted that transformational leaders in schools build capacity in individuals through constantly focusing on three fundamental goals: (a) helping staff members develop and maintain a collaborative, professional school culture, (b) fostering teacher development, and (c) helping teachers solve problems together more effectively. Transformational school leaders inspire others to make commitment to continuously focus on student learning and school improvement. These leaders participate in a myriad of activities such as collaborative goal setting, teamwork, periodic reflection, monitored progress, and experimentation and risk taking (Cunningham & Cordeiro, 2006). Due to the focus on transformational leadership in modern schools, this leadership style is closely examined throughout this study, utilizing the Multifactor Leadership Questionnaire (MLQ-5X). The following section examines the leadership practices that have been most successful in impacting student achievement and promoting strong schools.

Impact of Successful School Leaders

The previous section provided an overview of the traditional leadership theories and styles that have persisted over the past century. Education is a complex field that is affected by politics, finances, and bureaucracy. Schools, like many organizations, are dependent on the leaders they employ and the actions they exhibit. Substantial research has been conducted seeking to describe the relationship between leadership and student achievement and identifying the most essential school practices (Cotton, 2000). The most significant factor in school effectiveness research over the past several decades includes strong administrative

leadership (Cotton, 2000; Samy & Cook, 2009). Fullan (2001) suggests that effective leaders have (a) a strong sense of moral purpose, (b) an understanding of the dynamics of change, (c) emotional intelligence in relationship building, (d) a commitment to developing and sharing new knowledge, and (e) a capacity for coherence making.

McCollum and Kajs (2007) utilized the School Administrator Efficacy Scale (SAES) to determine self-efficacy of school administrators, which resulted in the development of an eight dimension theoretical model. The eight dimensions identified for school leaders include (a) instructional leadership and staff development, (b) school climate development, (c) community collaboration, (d) data-based decision-making aligned with ethical and moral principles, (e) resource and facility management, (f) use of community resources, (g) communication in a diverse environment, and (h) development of a school vision. Furthermore, it was suggested that school leaders that hold a mastery approach towards each goal orientation are most effective (McCollum & Kajs, 2007).

In Reassessing the Principal's Role in School Effectiveness: A Review of Empirical Research 1980-1995, Hallinger and Heck (1996) suggested the principal is “part of a web of environmental, personal, and in-school relationships that combine to influence organizational outcomes” (p. 6). This meta-analysis was comprised of 40 non-experimental studies reported in journal articles, dissertations, and papers from peer-referred conferences. Hallinger and Heck (1998) noted that the general pattern of results indicate that principals have a measureable effect on school effectiveness and student achievement. Even though this effect is relatively small and indirect, it is statistically significant and meaningful.

In *Balanced Leadership: What 30 years of research tells us about the effect of leadership on student achievement*, Waters, Marzano, and McNulty (2003) examined 70 studies with the following criteria: quantitative student data, standardized measurement of student achievement, student achievement as the dependent variable, and teacher perceptions of leadership as the independent variable. The analysis concluded there was a significant relationship between leadership and student achievement with an average effect size of .25. Waters, Marzano, and McNulty (2003) identified 21 leadership responsibilities and 66 associated practices that have a statistically significant relationship with student achievement. The 21 leadership practices are displayed in Table 3. Eleven of the leadership responsibilities fall under the traits of second-order change, and more specifically seven of these were positively correlated with change: (a) knowledge of curriculum, instruction, and assessment, (b) change agent, (c) optimizer, (d) ideals/beliefs, (e) monitors/evaluates, (f) flexibility, and (g) intellectual stimulation. They also noted that leaders can have a marginal or negative impact on student achievement if they focus on the wrong responsibilities or practices.

Table 3

21 Leadership Responsibilities (Waters, Marzano, & McNulty, 2005)

1. Culture	11. Outreach
2. Order	12. Input
3. Discipline	13. Affirmation
4. Resources	14. Relationship
5. Curriculum, instruction, assessment	15. Change agent
6. Focus	16. Optimizer
7. Knowledge of curriculum, instruction, assessment	17. Ideals/beliefs
8. Visibility	18. Monitors/evaluates
9. Contingent rewards	19. Flexibility
10. Communication	20. Situational awareness
	21. Intellectual stimulation

Cotton's (2003) *Principals and Student Achievement: What the Research Says* consists of a meta-analysis of 81 studies conducted from 1979-2000. The literature analysis identified 25 characteristics and leadership practices demonstrated by principals in high performing schools, and found to be with higher student achievement. The 25 characteristics and leadership practices are displayed in Table 4.

Table 4

25 Characteristics and Leadership Practices (Cotton, 2003)

-
- | | |
|---|---|
| <ol style="list-style-type: none"> 1. Safe and orderly school environment 2. Vision and goals focused on high levels of student learning 3. High expectations for student achievement 4. Self-confidence, responsibility, and perseverance 5. Visibility and accessibility 6. Positive and supportive school climate 7. Communication and interaction 8. Emotional-interpersonal support 9. Collaboration 10. Parent/community outreach and involvement 11. High levels of student learning 12. Shared leadership/decision making and staff empowerment | <ol style="list-style-type: none"> 13. The importance of instructional leadership 14. Rituals, ceremonies, and other symbolic actions 15. Norm of continuous improvement 16. Discussion of instructional issues 17. Teacher autonomy 18. Classroom observation and feedback to teachers 19. Support of risk taking 20. Professional development opportunities and resources 21. Protecting instructional time 22. Monitoring student progress and sharing findings 23. Use student data for program improvement 24. Recognition of student and staff achievement 25. Role modeling |
|---|---|
-

Other findings included gender differences among principals, with female administrators focusing more on instruction and creating a positive culture, than their male counterparts. Cotton (2003) also noted that elementary school principals and leaders in schools with a higher percentage of students representing the low socioeconomic status focus more on instructional leadership. In regards to student achievement, Cotton (2003) indicated that the principal has a nominal direct influence on student achievement. However, it is noted

that the indirect impact is more substantive, as they create a norm of student centeredness within the school (Cotton, 2003).

Robinson, Lloyd, and Rowe (2008) conducted a two part meta-analysis of 27 published studies investigating the relationship between leadership and student outcomes. The findings indicated that the average effect size of instructional leadership on student outcomes was greater than that of transformational leadership. In addition, five sets of significant leadership practices were developed: (a) establishing goals and expectations, (b) resourcing strategically, (c) planning, coordinating, and evaluating teaching and the curriculum, (d) promoting and participating in teacher learning and development, and (e) ensuring an orderly and supportive environment.

Aside from the major meta-analyses on leadership and student achievement, several other significant studies have been completed. The effects of principals' leadership on reading achievement in 87 elementary schools were examined by Hallinger, Bickman, and Davis (1996). Student test scores and teacher surveys were analyzed to determine if there is an indirect link between the principal's leadership style and student achievement. One variable, school climate, was proven to be the area in which principals were most effective at impacting, which in turn affected student achievement.

The Multifactor Leadership Questionnaire (MLQ-5X) was utilized by Verona (2001) to determine the relationship between transformational leadership and student achievement of high school students. The results from the study indicated significant effects on student competency rates on the New Jersey High School Proficiency Test. However, it was noted

that evidence of transformational leadership was higher in the traditional comprehensive schools, as opposed to the vocational schools examined in the study.

Marks and Printy (2003) examined the level of collaboration between principals and teachers around instructional topics and the impact on student performance. They established their study through two leadership frames – instructional and transformational leadership. Through an analysis of 24 schools (eight elementary, eight middle, and eight high schools) and using hierarchical linear modeling, they concluded that a combination of transformational and instructional leadership led to the greatest influence on student performance. It was also noted that instructional leadership can itself be transformational.

Leithwood and Jantzi (2008) studied the relationship between school leader efficacy and student learning through an examination of leaders across 180 schools, 45 districts, and 9 states, including 2,764 teacher respondents and three years of reading and math data. No specific leadership style was referenced, but in terms of student learning, weak but significant effects were found regarding school leaders' collective efficacy and the proportion of students in schools reaching or exceeding the state's proficiency level. In addition, it was noted that school size rarely is a significant factor and that elementary schools were most sensitive to leadership influence.

Valentine and Prater (2011) examined principal leadership through 313 Missouri high schools using the Principal Leadership Questionnaire (PLQ) and concluded four major findings. First, the principal's level of education is related to perceived effectiveness, in that with increased education the perceived effectiveness also increases. Second, principals with

the highest level of reported competence maintained student achievement scores higher than those with less perceived competence. Third, principal and school demographics are linked to student achievement. The level of principal education explained the positive variance in student scores on the language arts, science, and social studies subtests, while the principal's gender also explained the positive variance on social studies subtest. School socio-economic status (SES) explained the negative variance in test scores on the mathematics, science, and social studies subtest. Fourth, the positive relationship between the nine leadership factors in the questionnaire proved greater than that of the demographic variables and student achievement.

The body of research surrounding the impact of principal leadership and student achievement is extensive. However, the directness or indirectness of this link is consistent, mainly due to the number of variables that are present in schools. One common theme that is present throughout the research involves the significance of the principal and the complexity of the position. The demands are constantly changing in the standards-based reform era and how these leaders respond will often distance their level of success and future within an organization. One area of heightened attention over the past decade has involved serving and achieving students with disabilities. The next section analyzes the research surrounding leadership and special education.

Leadership and Special Education

The previous section focused on the connection between principals and general student achievement. The studies examined did not specifically address the impact on

students with disabilities. Therefore, the following portion of the literature review investigates the research on leadership and special education.

Principal Preparation. Prior to reviewing the relationship principals have on the achievement of students with disabilities, it is critical to analyze the principal's role and responsibilities within the school in relation to special education. Principals are required to oversee all aspects of the school from finances and discipline to facilities and education. Furthermore, under NCLB and IDEA, principals must assure that students with disabilities are receiving a free and appropriate education (FAPE) in the least restrictive environment (LRE). They are also held accountable for the performance of all their students, including those receiving special education services.

Are principals adequately prepared to properly support special education teachers and ultimately their students with disabilities? According to Witt (2003), a survey of 387 university principal leadership preparation programs across the United States yielded that half required a general knowledge of special education. However, less than 30% required coursework in special education. Similar results were identified by Nelson (2002) who surveyed university educational leadership faculty members in the state of Louisiana. Over 85% of the faculty members spent 10% or less of their coursework and discussion on special education topics. In addition, 58% reported coursework in special education was not mandatory for their program. Stevenson (2002) studied 24 universities across the state of Illinois that provided educational leadership programs. Only three reported coursework in special education as a component of their program.

Garrison-Wade, Sobel, and Fulmer (2007) examined 124 administrators to determine how well they are prepared to lead inclusive school practices and what the most critical skills leaders need for inclusive leadership. The quantitative results of the study revealed 40% of the participants identified a lack of understanding regarding the legal issues related to special education; 28% reported a lack of skills in their ability to provide support and mentoring for special educators; and 28% noted a lack in their ability to effectively support and lead in the area of resource management. Principals reported the following skills to be crucial to effectively lead and support special education programs: (a) a deep knowledge about differentiated instruction, (b) encourage and support teacher professional development, (c) provide ongoing mentoring and coaching, (d) encourage peer to peer observations, and (e) address parent questions and concerns related to special education.

The consistency in the research regarding principal preparation programs is alarming in regards to the credence given to training principals in the field of special education. The accountability placed on schools and principals in regards to their students with disabilities population is higher than it has even been. However, there appears to be a disconnect between the rise in accountability and the training principals are receiving in the traditional administration preparation programs across the United States.

Leadership and Special Education Studies. Early research on the role of the educational leader on students with disabilities examined the concept of least restrictive environment (LRE) and leadership practices in terms of programming placement for students with disabilities (Stetson, 1979). A grounded theory methodology was used to interview 140

administrators across eight states to determine the administrative strategies used to place students with severe disabilities into the LRE. A parallel study was conducted by Talley and Burnette (1982) in 33 schools across five states to include students with mild disabilities. Combined, these studies identified seven practices shared by administrators to promote inclusive practices for their students with disabilities in the LRE. These include: (a) organizational support for the LRE concept, (b) school personnel acceptance of LRE, (c) community acceptance of LRE, (d) parental acceptance of LRE, (e) selection of appropriate service delivery patterns, (f) assignment of personnel, and (g) a responsive staff development program. This study was not analyzing the impact of these leadership practices on student achievement, but instead the practices exhibited by administrators who address and support the needs of students with disabilities.

Heumann and Hehir (1998) advanced this body of research and measured the leadership practices of principals in relationship to student outcomes. They identified five key areas linked to the improvement of outcomes for students with disabilities, based on their findings on the National Longitudinal Transition Study and the Individuals with Disabilities Education Act (IDEA) 1997. The five areas that principals should consider, which are most aligned to the styles represented by a transformational leader, include:

1. Involvement and progress of students with disabilities in the full range of curricula and programs available to nondisabled children and the supports, services, and modifications that they need to learn effectively in those curricula and programs, as determined through the development of an Individualized

Education Plan (IEP), including general curricula and vocational education and work experience;

2. The participation of children with disabilities in state and district-wide assessments of student achievement;
3. The provision of transition services to enable students with disabilities to move effectively from school to post-school independence and achievement;
4. Educating children with disabilities with nondisabled children to the maximum extent appropriate;
5. Encouraging parent, student, and regular education personnel participation in the development and implementation of educational programs for children with disabilities (p. 1).

Murray and Pianta (2007) recommend that principals must focus close attention on school-wide structures and resources to support students with disabilities. Such practices include (a) hiring qualified teachers, (b) maintaining positive student-teacher relationships, (c) reducing class size to allow closer student-teacher interaction, and (d) increasing class time to allow more time for teachers and students to interface. Rea, McLaughlin, and Walther-Thomas (2002) further stress the importance of providing students with disabilities increased attention and individualized instruction, to allow them to access the targeted grade level curriculum. The principal plays a critical role in creating an ethos of inclusiveness and support for students with disabilities. This culture must be distributed to all facets of the organization.

Bateman and Bateman (2001) recognize the importance of the principal as the chief advocate for the special education program. Their attitude and actions have the power to enhance or crush the potential of the program and in turn the success of the students with disabilities in the program. Suggested actions include (a) developing a mission, vision, and belief statements with the staff, (b) stressing the importance of targeted professional development, (c) organizing school-wide activities that celebrate acceptance, belonging, and diversity, (d) creating collaborate planning time for staff, (e) remaining involved in meetings regarding students with disabilities and their families, (f) becoming comfortable with special education law and IEP procedures, and (g) ensuring that the IEP promotes inclusion and focuses on the needs of the child.

Numerous special education researchers (Bateman & Bateman, 2001; Burrello, Lashley & Beatty, 2000; Havelock & Hamilton, 2004; Friend & Cook, 2003; Villa & Thousand, 2003) recognize the impacts of leadership and student outcomes. However, few studies have attempted to link the impact of principals and outcome of students with disabilities. The small body of research has noted that principals who focus on instructional concerns and logistics, support their special education staff, and provide professional development have improved student outcomes for students with disabilities (Benz, Lindstrom, & Yovanoff, 2000; Gersten, Keating, Yovanoff, & Harniss, 2001; Kearns, Kleinert, & Clayton, 1998; Klinger, Argulles, Hughes, & Vaughn, 2011). It should be noted that the term “student outcomes” should not be directly linked to academic achievement, but instead utilized in a broader sense of student efficacy. Despite the increase in identification of

students with disabilities, which currently includes 13.1% of the nation's student population (National Center of Education Statistics), a significant study linking principals' practices and academic achievement of students with disabilities has yet to be completed. Therefore, this study examines the role elementary and middle school principals play in improving the academic achievement of this growing subgroup of students.

Summary

This chapter examined the existing literature related to leadership perspectives. Historical leadership theories evolved over the past century from a focus on the innate characteristics leaders possess to focusing on the principles of teaching leaders how to best lead in various contexts. These theories, which are seen in schools today in the form of leadership styles, currently imply that leadership characteristics and practices can be taught and leaders should adapt based on the specific situation or environment.

Numerous studies, describing the range of leadership characteristics necessary to positively impact student outcomes, were examined towards the end of the chapter. Even though there are major meta-analyses outlining critical leadership practices related to improved student outcomes, this body of research is limited in regards to impacting the outcomes of students with disabilities. Consequently, this study explores this context through gathering data from special educators and principals in successful schools. The methods of this study are outlined in the following chapter.

CHAPTER 3

Research Questions

This study examined the leadership styles (transformational, transactional, and passive-avoidant) of North Carolina elementary and middle school principals in traditional schools that have demonstrated significant growth from their students with disabilities on reading and mathematics EOG tests. The following research questions guided this study:

1. What leadership style describes North Carolina elementary and middle school principals in schools whose students with disabilities have demonstrated significant growth in academic achievement?
2. What is the relationship between leadership styles of principals (in the identified schools) and academic achievement of students with disabilities?
3. What are the perceptions of principals (in the identified schools) regarding the factors that influence and facilitate academic success for students with disabilities?

Methods

Research Design

This study employed a mixed methods design to more fully determine the leadership styles and practices elementary and middle school principals employ to increase academic achievement of their students with disabilities. The definition of mixed methods research used in this study was adopted from the researchers Tashakkori and Creswell (2007). They refer to mixed methods research as an approach in which the researcher engages in the research process using both quantitative and qualitative data in a single study. Tashakkori

and Creswell also note that mixed method research provides the hard numbers, but also provides the researcher the opportunity to interact with the participants and experience the culture.

This research study employed an explanatory concurrent mixed methods design (QUAN + qual), as displayed in Appendix A (Morse, 2003). The quantitative and qualitative data was collected simultaneously over a four month span. The quantitative phase included the collection of quantitative survey data from principals and special education teachers to determine the leadership behaviors utilized by principals. The qualitative phase of the study involved interviews with the principals to determine what practices are implemented to positively affect the academic achievement of students with disabilities.

Quantitative Phase

The quantitative phase involved the administration of a demographic questionnaire to the principal and the MLQ-5X rater form to the teachers. This information was analyzed to determine the leadership behaviors exhibited by the principals. In addition, further analysis was completed to investigate the impact of demographic data and leadership behaviors. The demographic data collected included the principal's years of experience, gender, race/ethnicity, level of education, special education training, and size of school. Descriptive statistics were employed to determine trends, while multiple regression was utilized to determine the relationship between leadership styles and other variables in regards to student achievement. The variables analyzed include: (a) school size, (b) urbanicity, (c) percentage of minority students, (d) percentage of students with limited English proficiency, (e)

percentage of economically disadvantaged students, and (f) students with disability achievement data. This information was gathered from reported data, available at the North Carolina Department of Public Instruction.

Sample/Participants. North Carolina elementary and middle school principals and teachers were the participants in this study. Elementary and middle schools were selected for two main reasons. First, elementary and middle school principals tend to lead in smaller schools with fewer students and administrators. It is not uncommon for secondary principals to have multiple assistant principals, curriculum coordinators, and special education administrators. The goal of this study was to directly analyze the principals' impact on student achievement for students with disabilities; therefore the focus was elementary and middle school principals who serve as the primary instructional leaders in the buildings (Cunningham & Cordeiro, 2006). Second, student achievement is consistently measured through the North Carolina End of Grade (EOG) test, which is administered in grades three through eight. Student achievement is measured through other assessments at the secondary level. Purposeful sampling was conducted to select principals and teachers who work in schools that have demonstrated high academic positive change in reading and math from their students with disabilities. School selection was determined through an analysis of 2007-2011 data and utilizing the following selection criteria.

First, the schools selected demonstrated high achievement growth over the four years in reading and math from their students with disabilities subgroup. More specifically, the schools selected fell in the top 25% statewide in terms of aggregate growth, as determined by

EOG test scores in reading and math. All of the elementary and middle schools in North Carolina were sorted in terms of their aggregate growth in reading and math over the four years. Those that remained in the top 25% were selected as meeting the first criterion. The schools do not necessarily represent the top performing schools in the state, but instead schools that have demonstrated significant growth from this subgroup from 2007-2011. The EOG reading test was renormed in 2006, so the date range for analysis was 2007-2011. Selecting schools on growth criteria, as opposed to only those who consistently perform at a high level was purposeful. The goal was to select a representative group that is diverse in size, location, and socioeconomic status.

The next criterion included schools that are at or above the state average percentage (12.6%) for students with disabilities. This was an important factor to assure the percentage of students with disabilities was significant and properly represented. Furthermore, schools with fewer than five students were not included. The Family Educational Rights and Privacy Act (FERPA) guidelines do not allow the reporting of small groups less than five students. This policy is in place to protect the privacy and identification of students.

Fourth, the schools selected were traditional public schools. Alternative settings, charter schools, specialized schools, and private schools were not included. The goal was to analyze schools that are representative of the larger population of public schools in North Carolina.

The final criterion included the selection of schools that have had the same principal in place for all four years, in addition to the current 2011-2012 school year. This was a

significant factor since the principals' leadership styles was the focus of the study. Turnover with the position would not yield an accurate representation of the leadership in the school.

Thirty-six elementary and middle schools of a possible 1,836 (North Carolina State Board of Education) across the entire state of North Carolina met the criteria listed above. All principals and teachers were invited to participate in the study, with 12 schools agreeing to participate, yielding a sample of 12 principals and 216 teachers. A brief summary of the 12 principals are listed in Table 5.

Table 5

Principal Selection

Gender	
Male	4
Female	8
Years as Principal	
5-9 years	6
10-14 years	6
Level of Education	
Masters	8
Doctorate	4
Special Education Training	
Coursework	3
Professional Development	6
Certification	2
Degree	1
Schools	
Elementary	7
Middle	5

Data Collection. Quantitative data was captured through a demographic questionnaire given to the principals and the MLQ-5X rater form administered to the teachers. The following section describes the instruments and data collection procedures.

Instrumentation. A brief demographic questionnaire, displayed in Appendix B, was created to capture specific information from the principal. These questions included: (a) numbers of years as a principal, (b) gender, (c) race/ethnicity, (d) number of years at the

current school, (e) level of education, (f) level of special education training, and (g) size of school.

The Multifactor Leadership Questionnaire (MLQ-5X), displayed in Appendix C, was selected as the instrument to measure the principals' leadership style due to its established usage in the field and wide range of effectiveness. The validity of the MLQ-5X was previously established through an extensive confirmative factor analysis (CFA) including 3,786 respondents. The reliability of each of the six leadership factor scales on the instrument ranges between .63 to .92 (Avolio & Bass, 2004). The MLQ-5X has been used extensively, in over 200 research studies and dissertations (Avolio, Bass, & Jung, 1999).

Transformational leadership, according to many premier leadership researchers, is an imperative leadership style due to its focus on organizational dynamics (Avolio, Bass, & Jung, 1999). The MLQ-5X, developed by Bass and Avolio (1995), was developed to measure three leadership behaviors: (a) transformational leadership, (b) transactional leadership, and (c) passive-avoidant leadership.

The MLQ-5X is available in two forms: the Leader Form and the Rater Form. The Leader Form is a self rating scale in which the leader rates him or herself. The Rater Form is utilized by others who rate the leader's behaviors. Each form includes a 45 item questionnaire that utilizes a five-point Likert scale. The scale includes: 1 = *not at all*, 2 = *once in a while*, 3 = *sometimes*, 4 = *fairly often*, and 5 = *frequent*, if not always.

The three leadership styles measured by the MLQ-5X (transformational, transactional, and passive-avoidant) are comprised of specific factors. Transformational

leadership involves building effective relationships and leading individuals in a dynamic, inspirational way. Therefore, the MLQ-5X measures the following factors: (a) Idealized Influence: Attributed (IA), (b) Idealized Influence: Behavior (IB), (c) Inspirational Motivation (IM), (d) Intellectual Stimulation (IS), and (e) Individualized Consideration (IC). Idealized influences (IA and IB) are represented by leaders who are admired, respected, and trusted by their followers. In addition, the leader also focuses on the importance of values, beliefs and ethical decision-making. Transformational leaders inspire and motivate (IM) others by maintaining confidence, focusing on the vision of the organization, and expressing enthusiasm and optimism. Intellectual stimulation (IS) is displayed by leaders through stimulating followers to be creative and innovative. Lastly, transformational leaders exhibit individual consideration (IC) through focusing on individuals' differences and developing their strengths.

Transactional leadership behavior is represented by two factors: (a) Contingent Reward (CR) and (b) Management by Exception: Active (MBEA). Contingent reward (CR) refers to leaders who achieve agreement through negotiated exchange and use positive reinforcement to encourage followers to achieve outcomes. Management by Exception: Active (MBEA) is achieved by defining the standards for compliance and punishing those who fall out of compliance.

Passive-avoidant leadership behavior is demonstrated by two factors: (a) Management by Exception: Passive (MBEP) and (b) Laissez-Faire (LF). Management by Exception: Passive (MBEP) includes passive and reactive leadership qualities. These leaders

often avoid clarifying expectations, wait for things to go wrong before taking action, and fail to be proactive. Laissez-Faire (LF) qualities include leaders that avoid taking leadership actions, such as making decisions and responding to questions.

The MLQ-5X also measures three leadership outcomes. These include: (a) Extra Effort (EE), (b) Effectiveness (EFF), and (c) Satisfaction with the Leadership (SAT). Extra Effort (EE) refers to the level that followers exceed expectations and desire to work hard. Effectiveness (EFF) refers to the leader's ability to meet organizational requirements and lead others. Satisfaction (SAT) with leadership refers to how pleased others in the organization are with the leaders' leadership. The three leadership styles, not outcomes, were the focus of this study. Table 6 displays the different subscales of the instrument the specific questions that correlate to each factor measured.

Table 6

MLQ-5X Subscales (Avolio & Bass, 2004)

Characteristic/Scale Name	Items
Transformational Leadership	
Idealized Influence: Attributed (IA)	10, 18, 21, 25
Idealized Influence: Behavior (IB)	6, 14, 23, 24
Inspirational Motivation (IM)	9, 13, 26, 34
Intellectual Stimulation (IS)	2, 8, 30, 32
Individualized Consideration (IC)	15, 19, 29, 31
Transactional Leadership	
Contingent Reward (CR)	1, 11, 16, 35
Management by Exception: Active (MBEA)	4, 22, 24, 27
Passive-Avoidant Leadership	
Management by Exception: Passive (MBEP)	3, 12, 17, 20
Laissez-Faire	5, 7, 28, 33
Outcomes of Leadership Factors	
Extra Effort (EE)	39, 42, 44
Effectiveness (EFF)	37, 40, 43, 45
Satisfaction (SAT)	38, 41

Procedures. In the summer of 2012, an email, displayed in Appendix D, was sent to the 36 qualified principals explaining the purpose of the study and why their school was selected. The email was followed up by a phone call within two weeks. The email included the following documents: (a) informed consent outlining the principal's rights, displayed in Appendix E, (b) a link to the Principal Demographic Survey, (c) a copy of the principal interview questions, displayed in Appendix F, and (d) a copy of the MLQ-5X rater form the

teachers complete. The principals were asked to complete the demographic questionnaire electronically within two weeks. This questionnaire was administered using Qualtrics, a survey software program. Follow-up reminder emails were sent to increase the response rate. No names were placed on the demographic questionnaire to ensure anonymity. Instead, the questionnaire was coded by school name so the researcher could match the demographic information with the appropriate MLQ-5X forms the teachers completed. To ensure data encryption and provide data protection, the researcher disabled the collection of IP addresses in an effort to protect the identity of the principals.

Once principals returned the questionnaire, the MLQ-5X rater form was sent to the teachers through the principal. The principals were sent an email containing the following documents: (a) a letter explaining the purpose of the study, displayed in Appendix F, (b) a copy of the consent letter, displayed in Appendix G, and (c) a link to the MLQ-5X rater form, which they forwarded to the teachers in their school. The teachers were urged to complete the survey electronically within two weeks. The researcher followed up with the principals periodically, via reminder emails, to increase the response rate. To ensure anonymity, no names or grade levels were placed on the form. Instead, only the school name was included to match each questionnaire to the correct principal.

Data Analysis. Descriptive statistics and correlation analyses were conducted. Descriptive statistics were used to address the leadership styles utilized by the principals. Descriptive research involves making careful descriptions of educational phenomena through the use of quantitative measures (Gall, Gall, & Borg, 2003). Correlations were calculated

between the principals' leadership styles and the demographic data collected in the principal survey. The variables included gender, race/ethnicity, years as principal, years of service at respective school, highest level of education, level of special education training, grades served at school, and student enrollment. Further correlation analyses were performed between the principals' leadership styles and student achievement. The three leadership styles (transformational, transactional, and passive-avoidant) derived from the survey instrument, along with the nine leadership characteristics which are subsets of these styles were analyzed in relationship to their impact on student achievement. The following section describes the procedures performed on the data collected, along with the reliability and validity of the measures.

Procedures. The quantitative data was analyzed using the Statistical Package for the Social Science (SPSS) software and JMP from SAS. Descriptive statistics were used to identify patterns and trends and to address the first research question. Descriptive statistics included a measure of central tendency (e.g. mean) and measures of variability (e.g. standard deviation) for each of the three leadership styles (transformational, transactional, and passive-avoidant) and the nine subscales (idealized influence: attributed, idealized influence: behavior, inspirational influence, intellectual stimulation, individualized consideration, contingent reward, management by exception: active, management by exception: passive, and laissez-faire) that make up the three leadership behaviors. The teachers' responses on the MLQ-5X were totaled and averaged for each subscale item, in accordance with the instrument scoring guide. The principals received a total score for each subscale item once all

the teachers' responses within the given school were averaged. Frequency tables were also reported to analyze trends in responses, in addition to mean scores. The same analysis was also calculated for the principals' gender, race/ethnicity, number of years as a principal, number of years at the current school, highest level of education, level of special education, type of school, and student enrollment.

The second research question, regarding the relationship between principal leadership styles and student achievement, was addressed through correlation analyses. The analyses determined the relationship and significance between leadership styles and student achievement for students with disabilities. Correlation analyses were also performed to determine the relationship between the principals' leadership styles and the data they reported in the demographic survey. The demographic areas included (a) gender, (b) race/ethnicity, (c) years as principal, (d) years at current school, (e) highest level of education, (f) special education training, (g) grades served at the school, and (h) student enrollment.

Reliability. The MLQ-5X has emerged as the leading instrument and the most reliable and valid in measuring leadership styles within educational organizations (Whitelaw, 2001). Reliability and validity for the MLQ-5X has previously been established through previous research (Avolio & Bass, 2004). Reliability refers to the extent in which an instrument consistently yields the same results. Reliability for the total items and each leadership factor scale ranges from .63 to .92 (Avolio & Bass, 2004). Internal consistency values were above .70 for all scales except for management by exception: active. A reliability analysis was

conducted with the responses in this study and yielded a Cronbach's alpha of .73. All scales yielded internal consistency values between .64 and .86, except management by exception: active, which was consistent with the research literature.

Validity. Validity refers to the extent to which an instrument measures what it is intended to evaluate. The MLQ-5X has undergone multiple revisions over the last 25 years through the work of research studies in both private and public organizations. Avolio and Bass (2004) established internal validity of the MLQ-5X through a Confirmatory Factor Analysis (CFA) after analyzing the data from a sample of 3,788 participants who rated their leaders.

Qualitative Phase

The qualitative phase of this study involved semi-structured interviews of principals. Interview questions were designed to elicit the specific practices the principals and their staff are implementing to promote academic achievement for students with disabilities. All principals that consented to participation in the study were contacted via phone or email to share information about their leadership style and the practices they implement to improve instructional outcomes for students with disabilities.

Data Collection. Semi-structured interviews, displayed in Appendix H, were utilized to provide reliable, comparable, yet rich qualitative data (Bernard, 1988). The interviews were conducted during the summer and early fall of 2012, prior to any analysis of the teacher survey responses, and took approximately 10-15 minutes each. The researcher recorded the

principals' responses and summarized their answers at the conclusion of the interview to assure accurate data.

Data Analysis. The interviews were analyzed using open coding, thematic analysis (Fereday & Muir-Cochrane, 2006), and constant comparative methods (Dye, Schatz, Rosenberg, & Coleman, 2000). Member checks were also conducted to endure credibility and consistency.

Procedures. Beginning with open coding, the interviews were ultimately coded using thematic analysis. Thematic analysis involves identifying themes and patterns that emerge from the careful, repeated review of data (Fereday & Muir-Cochrane, 2006). Interviews were recorded by the researcher and the data was shared with the principal to ensure accuracy. The coding entailed grouping responses into distinct categories, with the focus on particular practices by the principals. The themes were developed as the data was analyzed and the frequency of each response was recorded (Fereday & Muir-Cochrane, 2006). As each new theme was determined, constant comparison was utilized to compare the previously recorded data to discover new relationships or themes (Goetz & LeCompte, 1981).

The interview questions attempted to seek out what practices are being implemented by each principal to increase student achievement for students with disabilities. These practices were also referenced in regards to their dominant leadership style, as determined in the quantitative phase of the study.

Credibility/Consistency. Credibility and consistency was addressed through member checks and a statement of the researcher's biases and assumptions. Member checks involve

sharing the researcher's interpretation of the data with the participants to assure credibility (Merriam, 1998). Upon the conclusion of each interview, the researcher summarized the principal's responses to verify the accuracy of the data and to allow them to provide additional description, if needed.

CHAPTER 4

Introduction

The purpose of this study was to examine the leadership styles (transformational, transactional, or passive-avoidant) and practices of principals in schools that have demonstrated significant academic growth from their students with disabilities. The leadership styles of the principals were determined through analysis of teacher responses on the MLQ-5X. Leadership practices and perceptions were identified through interviews with the principals. This chapter includes an analysis of the data collected in response to the three research questions formulated for the research study. The research questions addressed in this section include:

1. What leadership style describes North Carolina elementary and middle school principals in schools whose students with disabilities have demonstrated significant growth in academic achievement?
2. What is the relationship between leadership styles of principals (in the identified schools) and academic achievement of students with disabilities?
3. What are the perceptions of principals (in the identified schools) regarding the factors that influence and facilitate academic success for students with disabilities?

Quantitative Data

Descriptive Statistics

As discussed in the previous chapter, 36 schools out of a possible 1,836 elementary and middle schools in North Carolina met the sample criteria. Out of the 36 selected schools,

12 agreed to participate in the study. Fifteen of the schools never responded to invitations to participate and nine elected not to participate. The data collected from the participating schools included 12 principal interviews, a short demographic principal survey, and 216 teacher-completed MLQ-5X forms.

The participating schools were representative of six of the eight regions in North Carolina, comprising of seven elementary schools and five middle schools. Table 7 categorizes the schools that participated by region and type of school.

Table 7

School Sample Size

School Region	# of Schools	# of Elementary Schools	# of Middle Schools
1: Northeast	1	1	0
2: Southeast	4	1	3
3: North Central	1	1	0
4: Sandhills/South Central	2	2	0
5: Piedmont-Triad/Central	0	0	0
6: Southwest	3	1	2
7: Northwest	1	1	0
8: Western	0	0	0
Total	12	7	5

The 12 principals who participated in this study led a diverse sampling of schools and possess varying demographic characteristics. School enrollment in the participating schools

ranged from just under 200 students to slightly over 800 students. The majority, eight, of the principals interviewed were female and all of the respondents were White. The principals all maintained at least five years of principal experience and have been at their representative school for at least five years. Only one principal has been at his school for more than 14 years. One-third of the principals held a doctorate degree and the majority of them have received training in special education through coursework and professional development. Table 8 displays the principal and school demographic data.

Table 8

Principal/School Demographic Data

Principal	Gender	Years Experience as Principal	Years at Current School	Level of Education	Level of Special Ed Training	Type of School	Student Enrollment
1	Male	5-9	5-9	Masters	Professional Development	Middle	700-899
2	Female	10-14	10-14	Doctorate	Certification	Elementary	300-499
3	Female	10-14	5-9	Masters	Bachelors	Elementary	100-299
4	Male	5-9	5-9	Masters	Professional Development	Middle	700-899
5	Female	10-14	10-14	Masters	Certification	Middle	700-899
6	Female	5-9	5-9	Masters	Professional Development	Elementary	300-499
7	Female	10-14	5-9	Doctorate	Professional Development	Elementary	300-499
8	Female	10-14	10-14	Masters	Professional Development	Elementary	300-499
9	Male	5-9	20+	Doctorate	Coursework	Middle	700-899
10	Female	5-9	5-9	Masters	Coursework	Elementary	300-499
11	Female	5-9	5-9	Masters	Professional Development	Middle	500-699
12	Male	10-14	15-19	Doctorate	Coursework	Elementary	500-699

All of the schools displayed significant growth from their students with disabilities over the four year period of study. The 12 schools ranged from 18.2% to 42.2% growth on the Reading EOG Test and 21.2% to 44.2% growth on the Math EOG Test. The average reading and math growth from students with disabilities in North Carolina elementary and middle schools between 2007 and 2011 was 9.1% and 7.4%, respectively.

On average, the 12 schools also exceeded the state average in growth from the general education population on the EOG Tests. However, their scores were not consistently above the state average. The schools ranged from -0.3% to 15.7% growth on the Reading EOG Test and -1.4% to 18.6% on the Math EOG Test. The North Carolina average reading and math growth for elementary and middle schools between 2007 and 2011 was 6.6% and 4.9%, respectively. Table 9 displays the North Carolina EOG growth means and the growth percentages at the 12 schools. The sample schools, on average, performed higher than the state mean on all categories and significantly higher with students with disabilities. They performed 33.4% and 79.0% higher from their general education population on the Reading and Math EOG Tests, and 189.5% and 315.5% higher on the Reading and Math EOG Tests from their students with disabilities.

Table 9

EOG Growth Percentages

	EOG Reading Growth	EOG Math Growth	SWD EOG Reading Growth	SWD EOG Math Growth
School 1	9.6%	11.2%	21.2%	25.5%
School 2	11.7%	10.6%	22.9%	22.9%
School 3	9.2%	14.5%	35.7%	32.1%
School 4	15.1%	3.5%	37.5%	33.0%
School 5	7.5%	4.0%	31.6%	32.2%
School 6	15.7%	18.6%	43.3%	44.2%
School 7	2.8%	-1.4%	22.1%	27.1%
School 8	10.2%	5.9%	18.2%	30.0%
School 9	12.0%	18.6%	24.5%	36.8%
School 10	9.1%	9.7%	21.5%	31.5%
School 11	3.1%	7.9%	19.6%	21.2%
School 12	-0.3%	2.2%	18.2%	32.2%
School Mean	8.8%	8.8%	26.3%	30.7%
NC Mean	6.6%	4.9%	9.1%	7.4%

After the demographic data from the principal surveys was tabulated, means and standard deviations were calculated from the teacher responses on the MLQ-5X to determine the leadership styles that best describe the 12 principals in this study. All teachers were recruited to complete the MLQ-5X Rater Form to rank their principal's leadership style across three different domains: transformational, transactional, passive-avoidant. The rater form consisted of 45 questions presented in a five-point Likert scale: 1 = *not at all*, 2 = *once in a while*, 3 = *sometimes*, 4 = *fairly often*, and 5 = *frequent*, if not always. 216 teacher-

completed forms were collected across 12 different schools. The number of completed surveys per school ranged from five to 52. The leadership styles of the principals as reported from the MLQ-5X are displayed in Table 10. The principals as a cohort were ranked heavily as more transformational leaders, with a mean of 3.97 out of a possible 5.0. The data from the MLQ-5X was frequently reported in aggregate terms due to the high consistency of leadership styles. All 12 principals were seen as more transformational than transactional or passive-avoidant leaders.

Table 10

Means and Standard Deviations of Principal Leadership Styles

Leadership Style	M	SD
Transformational	3.97	.84
Transactional	3.27	.90
Passive-Avoidant	1.84	.76

Table 11 displays the means and standard deviations of the leadership styles by principal. When analyzed separately, all principals were ranked by their teachers as more transformational than other leadership styles. In addition, all principals were ranked highest in transformational leadership, next highest in transactional leadership characteristics, and last in passive-avoidant characteristics. Principals ranged from receiving a mean ranking of 3.58 to 4.68 out of 5.0 in transformational leadership. Principals 4 and 7 received the two

lowest transformational means, but also had two of the largest standard deviations at .82 and 1.08, respectively. Principals 8, 10, and 11 had the highest transformational means and the three lowest standard deviations at .25, .53, and .53. The low variance in responses is directly correlated with the lowest teacher-completed MLQ-5X forms, which were 5, 6, and 11, respectively.

Table 11

Means and Standard Deviations of Principal Leadership Styles by Principal

Principal	# of Raters	Transformational		Transactional		Passive-Avoidant	
		M	SD	M	SD	M	SD
1	52	4.01	.75	3.21	.77	1.97	.79
2	20	4.10	.80	3.29	.91	1.77	.73
3	14	4.27	.58	3.71	.64	2.23	.67
4	20	3.58	.82	3.25	.84	2.22	.76
5	13	3.97	1.19	3.32	1.12	1.95	.92
6	11	3.86	.87	3.28	.97	1.61	.55
7	15	3.69	1.08	3.30	1.16	2.12	1.01
8	5	4.68	.25	3.25	.35	1.31	.09
9	34	3.99	.83	3.28	.81	1.47	.51
10	6	4.28	.53	3.23	.47	1.54	.64
11	11	4.30	.53	3.56	.64	1.73	.65
12	15	3.91	.91	2.89	1.08	1.54	.58

Principals were best described through the teacher MLQ-5X rater form as transformational. Further analysis was completed to examine the five leadership characteristics that comprise transformational leadership. These include idealized influence:

attributed, idealized influence: behavior, inspirational motivation, intellectual stimulation, and individualized consideration. Inspirational motivation (4.34), idealized influence: behavior (4.13), and idealized influence: attributed (4.00) yielded the highest means among the transformational characteristics, while intellectual stimulation (3.77) and individualized consideration (3.64) ranked the lowest. The highest ranked characteristic, inspirational motivation, describes leaders who are focused on the vision of the organization, express enthusiasm and optimism. The lowest ranked transformational characteristic, individual consideration describes the leader that focuses on individuals' differences to develop their strengths. Table 12 represents the means and standard deviations of these transformational components.

Table 12

Means and Standard Deviations of Transformational Characteristics

Transformational Characteristic	M	SD
Idealized Influence: Attributed	4.00	.86
Idealized Influence: Behavior	4.13	.78
Inspirational Motivation	4.34	.78
Intellectual Stimulation	3.77	.86
Individualized Consideration	3.64	.90

In addition to means, frequency tables were calculated to further interpret the teacher responses and to identify trends or patterns that may have been hidden through calculating

the mean. Appendix I displays the teachers' responses on the transformational leadership characteristics, along with the percentage of responses. Each of the 5 transformational leadership characteristics rated in the MLQ-5X had four questions that were answered via the Likert scale of one to five. Therefore, the total responses for each leadership characteristic were 864. This is computed by multiplying the 216 teacher raters times the 4 questions per characteristic. The means were confirmed by a representational distribution of responses by the teachers on the MLQ-5X.

Transactional leadership is comprised of two leadership characteristics – contingent reward and management by exception: active. Although the mean of these scores fell significantly below the mean for transformational leadership, the two characteristics contained variance. The contingent reward characteristic had a mean of 4.04 while the management by exception: active had a mean of 2.51. The teachers ranked their principals high in contingent reward, which is using positive reinforcement to encourage followers to achieve outcomes. Conversely, the teachers ranked the principals much lower in management by exception: active, which is described as defining standards and expectations and providing consequences for those who fall out of compliance. Table 13 displays the means and standard deviations for the transactional components.

Table 13

Means and Standard Deviations of Transactional Characteristics

Transactional Characteristic	M	SD
Contingent Reward	4.04	.88
Management by Exception: Active	2.51	.92

Frequency tables were calculated for transactional leadership characteristics, displayed in Appendix J, to provide more insight to the data from the mean calculations. The disparity in the means of the two characteristics were represented through the teachers responses on the MLQ-5X.

Passive-avoidant leadership is comprised of two leadership characteristics – management by exception (passive) and laissez-faire. The mean of these scores fell significantly below the mean for transformational and transactional leadership. The teachers ranked the principals with a mean score of 2.02 for management by exception (passive) and 1.67 for laissez-faire. These scores indicate these principals did not frequently lead in a passive, reactionary manner, or avoid taking leadership actions. In other words, it could be interpreted that the principals led proactively and were involved with many aspects of the school operations. The teachers rated the principals low in passive leadership characteristics, but high in more engaging and active transformational characteristics. Table 14 displays the means and standard deviations for the passive-avoidant components.

Table 14

Means and Standard Deviations of Passive-Avoidant Characteristics

Passive-Avoidant Characteristic	M	SD
Management by Exception: Passive	2.02	.81
Laissez-Faire	1.67	.72

The means for the passive-avoidant characteristics were verified using frequency tables, as displayed in Appendix K. Although the frequency tables were consistent with the low means, it was noted that 529 (61%) of the teacher responses rated the principal's laissez-faire leadership as a one, "not at all." Only 26 (3%) of the responses rated the principal as frequently leading in a laissez-faire leadership manner. The degree of correlation was extremely high for this leadership characteristic.

Correlation Data

To address the second research question regarding the relationship between principal leadership styles and academic achievement of students with disabilities, correlation analyses were completed. First, the variables on the principal demographic survey were analyzed in relationship to student achievement to identify any significance. Next, the teacher responses on the MLQ-5X were examined to identify possible relationships between principal leadership characteristics and styles in relation to student achievement.

The principal demographic variables were compared to the respective schools student achievement growth scores. These included gender, race/ethnicity, years as principal, years of service at respective school, highest level of education, level of special education training, grades served at school, and student enrollment. These same variables were also analyzed in respect to the three principal leadership styles (transformational, transactional, and passive-avoidant). No significance was found between any of the eight variables and growth in student achievement from students with disabilities or with a specific leadership style. Therefore, there did not appear to be a relationship between principal characteristics or variables and the type of leadership style they possess or the success of their students with disabilities. The small sample size, 12 schools, should be noted in these analyses. The correlations of the principal demographic variables and the nine leadership characteristics are displayed in Table 15.

Table 15

Correlations of Principal Demographic Variables and Leadership Characteristics

Variable	SWD Growth	Transform.	Transac.	Passive- Avoidant
Gender	.3336	.3636	.5852	.4627
Years Principal	.3636	.3636	.3505	.4405
Years at School	.3299	.3299	.5028	.5101
Level of Education	.3636	.3636	.3711	.4627
Special Ed Training	.3472	.3472	.1550	.2424
School Type	.3636	.3636	.5457	.2851
School Enrollment	.3299	.3299	.2879	.3769
Leadership Characteristic	SWD Growth			
Idealized Influence: Attributed	.6021			
Idealized Influence: Behavior	.3340			
Inspirational Motivation	.3895			
Intellectual Stimulation	.0987			
Individualized Consideration	.4351			
Contingent Reward	.1875			
Management by Exception: Active	.1781			
Laissez-Faire	.0386*			
Management by Exception: Passive	.4444			

Note. *p < .01

The next step in the analysis involved performing correlation analyses between the nine principal leadership characteristics that make up the three leadership styles and the students with disabilities growth scores. This included an examination of the teacher responses on the 216 MLQ-5X forms, which were represented in tables 11, 13, and 14. No

significant relationship was found within the five transformational leadership characteristics: (a) idealized influence: attributed, (b) idealized influence: behavior, (c) inspirational motivation, (d) intellectual stimulation, and (e) individualized consideration and student achievement. Likewise, the two transactional leadership characteristics: (a) contingent reward and (b) management by exception: active also were devoid of significance.

When analyzing the passive-avoidant leadership characteristics, management by exception (passive) and laissez-faire, no significance relationship was found with management by exception: passive. However, the Pearson's chi-square test revealed a significant relationship between the laissez-faire leadership and student achievement in this study, $\chi^2 (143, N=216) = 174.26, p = .039$. The laissez-faire leadership characteristic was ranked the lowest among the nine characteristics from the majority of the MLQ-5X rater forms. Therefore, leaders with low laissez-faire styles could have a positive impact on the achievement growth for students with disabilities. Again, laissez-faire leaders can be described as absent leaders, those who avoid making decisions and avoid getting involved when important decisions are required. Laissez-faire principals are less inclined to lead proactively or to frequently assess the impact of teachers and student programs. They rarely work collaboratively with teams and often settle on others making decisions.

Multiple correlation analyses between the eight principal demographic variables and the nine leadership characteristics did not yield a significant relationship, with the exception of laissez-faire leadership and student achievement. A low level of laissez-faire leadership was correlated with high student achievement growth. A further analysis of these findings,

along with an explanation of variables related to the instrument used is discussed in chapter 5.

Qualitative Data

The qualitative findings in this study were derived from semi-structured interviews with the 12 principals described in Table 7. The purpose of these interviews was to determine the principals' perceptions on the factors that have led to high growth from the students with disabilities in their respective schools. In addition, the responses were also analyzed to identify leadership characteristics, which were compared to the rankings provided by the teachers on the MLQ-5X. After transcriptions were verified with the principals for accuracy and they had the ability to add additional data, they were read in detail using open coding, thematic analysis, and constant comparative methods. The four interview questions were analyzed separately at first and then as a collection. Table 16 displays the three overarching themes identified along with their respective subcategories.

Table 16

Principal Interview Themes

Collaboration	Communication	High expectations
a) Relationships	a) Culture of acceptance	a) High quality teachers
b) Problem-solving culture	b) Principal accessibility/visibility	b) Distributed leadership

The first question asked the principals to describe their leadership style. Three of the principals used specific leadership terminology. Principals 1 and 9 described themselves as situational leaders, who adapt to the given situation and lead according to the environmental factors available. Principal 1 specifically cited the work of Hersey and Blanchard, who were instrumental in the research of situational/contingent leadership, and explained how he strives to be mindful of the situation before acting. Principal 2 used the phrase “transformational leader” when describing her leadership style. More specifically, she noted the importance of inspiring teachers and setting an example of “compassion, hard work, and professionalism” at all times. The other principals expressed more general characteristics and qualities of their leadership style, including terms such as “collaborative,” “open communication,” “democratic,” “participative,” and “high expectations.”

Through open coding and thematic analysis, two themes were identified from the first question throughout the 12 interviews. All principals identified their leadership style as one that possessed elements of collaboration and communication. These characteristics are not only reflected from the high transformational scores on the MLQ-5X, but they are also evident throughout the transformational leadership literature. Leithwood (1994) stressed the importance of transformational leaders to assist followers to feel a sense of ownership in the organization. Furthermore, Bass and Riggio (2006) noted how empowerment is an essential component of transformational leadership.

Principal 6 stated, “My leadership style is best described as collaborative. Although I often make final decisions, team members are heavily involved in the decision-making

process.” Principal 9 noted that, “Everyone chips in at our school, which builds a community of professionals to serve the students.” A few of the principals specifically mentioned teachers roles in tasks including interviewing new teachers, making budgetary decisions, scheduling, and leading professional learning communities. Principal 11 explained the importance of working directly with teachers on a daily basis, principals perceive to be part of a “family” that supports each other to work harder and “do good for students.”

The value of relationships emerged as a subcategory under the collaboration theme. These relationships included connections between principals, teachers, parents, and students. Principal 3 called her school community a “big family that thrives on close relationships and trust.” Principals 5 and 8 reinforced the need for strong relationships explaining how it is the critical foundation of building success for students.

Communication was the second theme in response to the first interview question as well. Principals 3 and 10 noted the importance of treating staff “as humans” first. Without a solid line of communication and mutual respect with teachers, these principals believed students will not be served as best as possible. Principal 12 stressed that “Teachers need to be well informed if they are expected to be part of the team and feel a sense of connectedness to the school.” Principal 2 explained his “suggestion box,” in which teachers can anonymously make suggestions for school improvement. This same principal also prided herself in having the “tough conversations” when necessary and to not let “politics” or personal differences get in the way of their focus on the children. These tough conversations included letting people know when they are not performing to the expectations of the school community, holding

teachers accountable on policies and procedures, and directly reflecting on student achievement. Principal 4 indicated that classroom observations are a critical part of his job, but the “rubber really hits the road” when communicating explicit feedback to assist the teacher in professional growth. Finally, there was a sense of a “liaison” role for the principals to communicate effectively between staff, parents, and the large community.

The second question inquired about how the principals work with the special education teachers to improve the education of students with disabilities. A common theme that emerged included the importance of the Exceptional Children’s (EC) Team, which typically did not directly involve the principal. All of the principals interviewed, except principal 3, suggested that their role on the EC Team was “consultative” and “less engaged.” Instead, they distributed their leadership role to the special education administrator to lead the team, give instructional feedback to the teachers, and facilitate decisions for students with disabilities. The principals’ lack of direct involvement in the EC process could be viewed as passive-avoidant leadership characteristics, and more specifically laissez-faire characteristics, which was ranked low on the MLQ-5X. However, elements of transformational characteristics could also be related. The principals framed their involvement with the EC teams as supportive and consultative. They trusted their staff’s expertise and provide necessary motivation and empowerment. These characteristics are related to idealized influence and inspirational motivation, which scored high on the MLQ-5X.

The principals also frequently mentioned the importance of planning and their influence on this process. Principal 1 noted, “Co-teaching is a common model in our school,

but this requires planning with the EC Team and grade level chairs to really make sure lessons are delivered well.” Principal 4 mentioned that the “best program in the world cannot be implemented properly without pre-planning between the EC and regular education teachers.”

Principal 3, who also maintained a degree and certification in special education, revealed that she is the lead facilitator of her EC team. She does not have a special education administrator in her school, so she “gladly fills that role.” She meets weekly with the team, analyzes data of her students with disabilities every two weeks, makes instructional recommendations, and observes her special education teachers continuously. Although the majority of principals have a special education administrator in place, the one commonality across all 12 is their support and level of importance they place on assuring the students with disabilities are receiving the highest quality instruction possible. Although not necessarily directly involved in the EC process, they value the EC team and accommodate common planning times to facilitate collaboration.

The third question asked why the principals believe the academic growth of their students with disabilities has increased significantly over the past four years. An overwhelming theme of “high expectations” emerged throughout the interviews. Principal 9 stated that his school maintained, “High expectations for all students – including academic, behavioral, and cultural expectations.” There was a sense of “holding kids accountable” in many interviews, along with the notion of assuring all students “can reach their potential and succeed.” Principal 7 explained how her school utilizes an after-school and tutoring program

to reach all struggling learners beyond the school day. The teachers' roles were expressed often in the response to this question. Principals 1, 2, 5, 8, and 10 revealed the role highly competent teachers play in delivering high expectations and the opportunity for success to all students, including those with disabilities. The principals believed that the importance of high expectations was shared by the entire faculty and eventually internalized in the students they serve.

Secondary themes included a culture of acceptance and a focus on team-based teaching and planning. Inclusion was a common practice noted by most principals, which included classroom practices and overall acceptance in the school culture. Principal 7 noted, "Our regular education and special education teachers plan together and focus on the teaching content." Principal 1 included the success of Professional Learning Communities (PLCs) in his school, which allows special and regular education teachers the opportunity to grow and learn from each other. Many of the schools are including students with disabilities in the regular curriculum to the maximum, appropriate extent possible and equipping regular teachers with differentiation strategies. The special education teachers are supporting students in small group instruction, when they require more intensive interventions. The principals mentioned a culture of acceptance by not only the staff, but through the student-body as well. This culture of acceptance and inclusion is supported throughout the special education research (Bateman & Bateman, 2001; Heumann & Hehir, 1998).

The fourth question asked the principals what they do to promote the academic achievement of students with disabilities. The majority of the principals shifted their

responses to this question to note the importance of the teachers, which was the main theme. Most of them indicated they maintained high expectations for all of their teachers, which ultimately will pass on to the students. They expect teachers to work hard on a daily basis for the benefit of their students. Principal 1 noted that, “It starts with the hiring process and assuring the teacher being recruited is high caliber and capable of exceeding your expectations.” Principal 9 indicated that, “Strong leaders must inspire and motivate teachers to remain positive and student-centered.” Principals 2, 6, and 10 all suggested the importance of having confidence and trust in the staff to maintain high expectations for students with disabilities and to deliver the best programming possible. Maintaining trust and confidence, along with inspiring teachers are all related to transformational leadership characteristics.

Secondary themes included principal accessibility/visibility throughout the day, and maintaining a “problem-solving” mentality. There was an importance placed on being supportive and approachable by the teachers. “The more you are in classrooms, the more authentic, candid feedback you can deliver,” principal 11 stated. This same feedback, according to principal 6 can “appear raw and punitive, if it is not provided on a regular basis.” Being available and visible throughout the day helps create a culture of collaboration and trust. Principal 5 noted she is not an expert in EC practices and pedagogy, but she understands the importance of spending time with EC teachers and students to learn and provide support.

Building a “community of problem-solvers” was noted as another key to reaching students with disabilities. All agreed that education is spontaneous and often unpredictable.

Without a “solution-oriented, problem-solving orientation, staff can easily become disgruntled, burnt-out, and disengaged.” The majority of the principals engaged a culture of problem-solving, while always keeping the students’ best interests as the goal. Principal 12 stated, “Working with children, including struggling learners, can be a challenge, so it is my job to assure a positive culture and solution-oriented mentality is present at all times.” Principal 6 expressed a similar statement, indicating that frustration on the part of the teachers and students is “short-lived, due to our established solution-oriented culture.”

Throughout the 12 semi-structured interviews, themes were present that represented a community of communication, collaboration, and high expectations. These themes were compared to the nine leadership characteristics that make up the three leadership styles in this study. The qualitative findings confirmed the quantitative data, as the themes were largely related to the following transformational characteristics: idealized influence (attributed and behavior) and inspirational motivation. These leadership characteristics were highly rated on the MLQ-5X forms completed by the teachers, as evident in Table 10. In addition to being supported by the quantitative data in this study, the three themes are evident in existing research. Waters, Marzano, and McNulty (2003) identified seven traits that are positively correlated with change, including ideals/beliefs, optimizer, and intellectual stimulation. These characteristics closely resemble the characteristics of idealized influence and inspirational motivation, ranked by teachers in this study.

Summary

This chapter presented quantitative and qualitative findings to address the three research questions of the study. Principal demographic data, along with teacher survey data from the MLQ-5X was used to determine (a) the leadership style that best describes North Carolina elementary and middle school principals who have demonstrated high growth from their students with disabilities, and (b) the relationship between the principals' leadership style and academic achievement of students with disabilities. Principal interview data was analyzed to identify the perceptions of principals regarding the factors that influence and facilitate success for students with disabilities.

As discussed throughout this chapter, the principals in this study maintained a transformational leadership style. More specifically, the transformational characteristics of inspirational motivation and idealized influence were ranked high. Correlation analyses did not reveal a significant relationship between principal leadership and student achievement, with the exception of laissez-faire characteristics. The principal interviews uncovered themes across the responses that are linked to transformational leaders, such as collaboration, communication, and high expectations. The next chapter discusses the findings of the study related to the literature and explains the impact on educational leaders. Implications for future research and recommendations are also discussed.

CHAPTER 5

Introduction

This study explored the relationship between principal leadership styles and high academic achievement growth from their students with disabilities. The purpose was to identify prominent leadership styles and characteristics, add to the current body of school leadership research, and to provide valuable recommendations and conclusions to school administrators. The quantitative and qualitative data gathered in this study was analyzed in the previous chapter. This chapter includes a discussion of the data analyzed, along with a comparison to how it relates to the literature in the field. In addition, limitations and recommendations of the study are described.

Findings and Conclusions

Three research questions guided the methodology and analysis of this study, as listed on page 40. The first two questions were quantitative and inquired about 1) the leadership style that describes North Carolina elementary and middle school principals in schools whose students with disabilities have demonstrated significant growth in academic achievement, and 2) the relationship between leadership styles of principals (in the identified schools) and academic achievement of students with disabilities. The third question was qualitative and sought to understand the perceptions of principals (in the identified schools) regarding the factors that influence and facilitate academic success for students with disabilities. This section discusses the quantitative and qualitative data analyzed.

Quantitative Findings

Research question one examined the leadership style possessed by the principals in this study. All 12 principals were reported by their teachers on the MLQ-5X to lead through more transformational characteristics. Transactional leadership qualities were second, with passive-avoidant characteristics a distant third. When reported aggregately, the principals scored a 3.97 out of a possible 5 for transformational leadership, a 3.27 for transactional, and a 1.84 for passive-avoidant.

The nine leadership characteristics that comprise the three leadership styles (transformational, transactional, and passive-avoidant) were also analyzed separately. The top four included inspirational motivation (4.34); idealized influence: behavior (4.13); contingent reward (4.04); and idealized influence: attributed (4.00). Inspirational motivation and idealized influence (behavior and attributed) are transformational characteristics, while contingent reward is transactional. Inspiration motivation and idealized influence include inspiring others through a clear vision, establishing high standards, assigning clear values, and supporting others. Leading through a contingent reward is related and includes influencing others' behavior through defining goals and expectations (Bass, 1994). All four of these characteristics are supported throughout the literature and represent the necessary skills for principals leading schools in the 21st century. Cotton (2003) stressed the relationship between collaboration, student-centeredness, and vision to increase student achievement. Robinson, Lloyd, and Rowe (2008) also noted practices such as establishing goals and expectations, along with promoting teacher learning and development all influence

student outcomes. Bateman and Bateman (2001) suggested that principals must serve as the chief advocate for students with disabilities through creating a community of acceptance, empowering teachers, creating collaborative opportunities for teachers, and through developing a clear mission and vision.

The second research question examined the relationship between the principals in the study and the student achievement of students with disabilities. All of the schools selected in this study were selected due to their high rate of academic growth from their students with disabilities over the past four years. Therefore, correlation analyses were completed to reveal the factors that may be related to the student success. The demographic data from the principal survey, which included factors such as gender, years of education, and level of education did not reveal any significant relationship to student achievement. The 12 principals maintained diverse backgrounds in terms of gender, years of experience, type of school, and degrees. One maintained a degree in special education and another five have taken coursework in special education. This percentage of 50% is much higher than the average determined by Witt (2003), who identified that less than 30% of the principal preparation programs required coursework in special education.

Correlation analysis was also conducted between principal leadership styles and student achievement. No significant relationship was found between the three leadership styles and student achievement. The lack of relationship could be explained in regards to the school sample or instrument used in this study. All schools selected in this study maintained very high growth from their students with disabilities on their reading and math EOG tests.

Therefore, the student achievement variable was consistently high across the 12 schools. The MLQ-5X, although a widely-used and validated tool, could have been interpreted through various lens by the teachers who rated the principals. Bass and Avolio (1995) describe their tool is not to determine whether a leader is transformational or transactional, but if they are more or less of one style. Teachers may have rated the principals based on a recent experience they have encountered or over their entire relationship with the principal. A brief narrative asking them to describe their principal's leadership style could have revealed a more dominant leadership style.

When the three leadership styles were broken down into the nine leadership characteristics, a significant relationship was identified between laissez-faire leadership and student achievement. Leading through less laissez-faire leadership was correlated to high student achievement in students with disabilities ($p=.039$). The 12 leaders in this study ranked low in laissez-faire leadership, but very high in transformative leadership characteristics, indicating the principals are highly engaged and inspirational leaders. Laissez-faire principals avoid direct involvement and engagement with staff and students, which could, based on the results of this study, lead to low academic achievement from students with disabilities. A further analysis of the four questions assessing laissez-faire characteristics should be noted. The statements ask the teachers to rate the following principal behaviors: (a) avoids getting involved when important issues arise, (b) is absent when needed, (c) avoids making decisions, and (d) delays responding to urgent questions. One would argue that any leader would struggle to find consistent success if they ranked high

on these items. The 12 principals in this study ranked extremely low, indicating that principals should indeed be involved, present, able and willing to make important decisions.

Waters, Marzano, and McNulty (2005) identified leadership responsibilities and practices that are related to student achievement. These include transformational characteristics requiring leaders to be active, supportive, and engaging – all of which are not representative of a laissez-faire leader. McCollum and Kajs (2007) also supported the importance of school administrators leading in a more engaging, transformative style. Their eight dimension theoretical model identified the leading areas that principals should focus to increase their effectiveness. Again, the practices proposed by McCollum and Kajs maintain transformative characteristics, which are representative of many of the principals in this study. Marks and Printy (2003) reinforce the findings indicating that principals have the largest impact on student achievement when they focus on instructional aspects of school while leading transformationally.

Qualitative Findings

The third research question examined the leadership practices and factors present in the schools that facilitate academic growth from students with disabilities. This data was gathered through 12 semi-structured interviews with the principals. The analysis revealed the following themes were present: (a) collaboration, (b) communication, and (c) high expectations of the staff and students. These transformative characteristics supported the quantitative findings in this study and were supported in the literature. Robinson, Lloyd, and Rowe (2008) identified five leadership practices that are related to increased student

outcomes. These include all three of the themes determined from the 12 principal interviews in addition to resourcing strategically and promoting and participating in teacher learning and development

The themes identified from the interviews are best linked with the recent leadership era of assessment and accountability. Green (2009) noted the important role of the principal in leading schools to reach the needs of all students, indicating that transformational leadership characteristics are necessary components to successfully lead students and staff in the 21st century. Principals are evaluated on the success of all of their students and must incorporate the support and leadership of their staff to fulfill their mission. This can be done through developing relationships with staff and motivating employees through a vision-centered approach (Glickman, 1993; Rost, 1993). The principals interviewed in this study placed high value on collaboration and communication, therefore aligning with the transformative attribute of building relationships.

Students with disabilities have been an underperforming subgroup for years despite increased legislation and funding to support students and schools. Murray and Pianta (2007) recommended four school-wide structures that are necessary to support students with disabilities. These structures included themes of hiring qualified teachers and maintaining positive relationships and high expectations with students and staff. Again, similar principles were noted throughout the 12 interviews. The data collected from the principal interviews and transformational themes developed were not only congruent with the teachers' perceptions on the MLQ-5X, but consistent with the literature.

Discussion

The implications of this study impact the field of leadership and special education, and provide data for principal preparation programs, policymakers, and current school leaders. First, the field of research is very limited in terms of how leadership impacts academic achievement of students with disabilities. The majority of the related research (Bateman & Bateman, 2001; Havelock & Hamilton, 2004; Klinger, Argulles, Hughes, & Vaughn, 2011; Villa & Thousand, 2003) includes the impact leaders have on student outcomes, which focus on self-concept, attendance, and behavior. This study directly targeted high growth schools in terms of student achievement from the students with disabilities and explicitly examined the principals' leadership styles. The results revealed that these principals led in a more transformative way and also identified specific leadership practices and expectations that were present in the school. Additionally, a significant relationship was discovered between principals' low level of laissez-faire leadership practices and high academic growth from students with disabilities.

This study extends the historical framework explained in chapter 2. The era of assessment and accountability still exists today, but an increased focus on transformational leadership is evident throughout the literature. This study confirms these findings and highlights the importance of being directly engaged in the educational process for students and supporting and inspiring staff. Leading through a hands-off approach is not only viewed poorly by teachers, it is proven to be unsuccessful in benefiting academic growth from

students with disabilities. Table 17 displays the previously presented table, with a new leadership era that is evident in the 21st century.

Table 17

Historic Leadership Theories Revisited

Theory	Time Period	Characteristics
Great Man	Late 1800s – early 1900s	Inherited leadership qualities; upper class; men
Group	1930s	In-groups and out-groups; behavior of follower impacts behavior of leader
Trait	1940s	Leaders possess traits that can be developed over time
Behavior	1940s – 1960s	Focus on behaviors of leaders over the traits they possess; these behaviors are developed over time
Contingency/ Situational	1960s – 1970s	Focus on situation or context; leadership styles can constantly adjust given the situation
Excellence	1980s +	Doing the right thing; moral and cultural leadership; transforming followers to want to do well
Assessment and Accountability	2000s+	Focus on results, data, and change; measureable outcomes
Transformational	21 st century	Focus on relationships, collaboration, communication, high expectations, and instruction

The era of accountability and assessment that persists in the 21st century can be stressful and tenuous for school leaders. Often, their tenure is directly correlated with their students' achievement. Students with disabilities are a subgroup that is lacking in performance compared to others. North Carolina EOG data from 2011 indicated that only 37% of students with disabilities in grades 3-8 are scored proficient on the EOG reading test, in comparison to 67.8% of students without disabilities. On the mathematics EOG test 52.1% of students with disabilities were proficient compared to 79.9% of students without disabilities (North Carolina Department of Public Instruction). Despite increased funding and attention on intervention programs and increasing the success of all learners, students with disabilities are not achieving at a high level across the nation and here in North Carolina. Principal preparation programs, policymakers, and school leaders can play a critical role in addressing this epidemic.

Principal preparation programs are providing more opportunities for principals to take special education coursework. However, the limited experiences are still not providing principals with the necessary training. Garrison-Wade, Sobel, and Fulmer (2007) revealed that a majority of school administrators lack the necessary understanding of the skills to support special education teachers and programs. Programs that lack targeted special education coursework should assure that leadership training is available, and more specifically transformational leadership characteristics are taught and practiced. Leadership programs mandate principal internships for licensure. This experience should require evidence of transformational leadership practices and collaboration with the special

education teachers and students. As schools continue to face the reality of limited funds and consolidation of positions, the principals are being asked to fulfill additional roles and responsibilities. A firm knowledge of the special education process is a critical area. Content knowledge is important for school leaders, but through leading in a more transformative manner, the research indicates a positive impact on student achievement.

To facilitate a focus on principal leadership styles, principal evaluation programs should explicitly reflect this component. Evaluations should be comprehensive to encompass leadership feedback from all necessary stakeholders from students and teachers to community and board members. This data is valuable, allowing principals to identify their leadership style and reflect on how it impacts student achievement. Instead of punitively measuring principals solely on student achievement data, incorporating a leadership style component into their evaluation system could provide them an avenue to lead in a more transformative way to positively impact students. Principal evaluation programs should also be tied directly into professional growth plans to increase a principal's leadership potential. In 2011, the North Carolina Department of Public Instruction restructured the Continuing Education Unit (CEU) process for all educators. Principals are now required to acquire continuing education credits in the area of leadership. State and local policymakers should assure that quality professional development programs are available for school leaders, and include necessary topics such as leading transformationally and understanding and supporting the special education process.

Principals are expected to be the chief instructional leader in their schools. Finding the correct programs, methodologies, and solutions for improving the academic achievement of students with disabilities can be very challenging. This study provides another area that should be examined – principal leadership. Principals need to assure they are leading their schools through transformative methods that provide their students the highest possibility of success. The transformational characteristics, leadership themes, and practices identified in this study can be delivered on a very minimal budget. Instead of searching for the “right” program to make the educational impact, leaders should first examine their leadership style and the impact it is having on the staff and students. Most states have support systems in place to aid struggling schools. Such support often comes in form is instructional coaches, increased professional development, and additional funding. Direct leadership support to principals should also be a mandatory step in this process.

This study highlighted the leadership styles and practices of 12 North Carolina elementary and middle school principals that have demonstrated significant academic growth from their students with disabilities. All of the principals interviewed emitted a sense of confidence, humility, and pride. They displayed a tireless dedication to the teachers they led and the students they served. These transformational characteristics were represented from the teacher surveys and well established as important practices in the literature. The 12 principals would be an invaluable asset to their peers across the state. They should share their expertise and be recruited to actively support current principals and train future leaders. If their success could be shared and replicated by all 1,836 elementary and middles school

across North Carolina, then thousands of students with disabilities could ultimately reap the benefits.

Limitations of the Study

This study presents limitations in regards to sampling, the questionnaire, procedures, and data analysis. First, the study was constricted to North Carolina elementary and middle schools. Only 36 schools matched the criteria set forth in the study. The small sample size is problematic in regards to generalizing results to other regions or to high schools. Through purposeful sampling, only elementary and middle, traditional public schools that displayed significant growth from their students with disabilities between 2007 and 2011 were included. This sampling would remove schools that maintained high student achievement over each of the four years and specialized schools for students with disabilities. These schools, which were not included, may be led by impactful leaders, who could provide valuable data to this field of research.

Second, only principals who have achieved high growth from their students with disabilities were sampled. Therefore, no comparison group was interviewed or surveyed to reveal principal leadership styles of schools that displayed negative growth or maintained level growth. A comparison group could have assisted with performing additional statistical tests and developing further conclusions.

Third, the MLQ-5X rater form was administered to the teachers, but the principals did not rate themselves. The principal interview data was compared to the teacher MLQ-5X data to make comparisons and draw themes. However, the inclusion of both evaluations could

provide a fuller picture of the principals' leadership styles. Including a principal self-evaluation would have been helpful in drawing comparisons and including additional statistical analyses.

Fourth, the number of teachers completing the MLQ-5X varied significantly per school. As referenced in Table 11, the number of teacher raters ranged from five to 52. Although a minimum number of raters is not suggested in the MLQ Manual, a higher number of teacher responses could have provided a more representative perception of the leadership style of the principal.

Fifth, the qualitative phase of the study, conducting semi-structured interviews, only involved principals. Interviewing teachers would add additional perspectives and richer data in regards to the leadership practices utilized by the principals to increase academic success for students with disabilities.

Recommendations

Through analysis and interpretation of the data in this study, recommendations were determined for future research and for practicing leaders. First, recommendations are provided to future researchers, followed by recommendations to practicing school leaders.

Recommendations for Future Research

The following recommendations are for future researchers studying leadership styles and student achievement who wish to expand the current study to provide additional findings and conclusions.

1. Future researchers are encouraged to examine data from schools that maintained negative growth from their students with disabilities to use as a comparison with high growth schools. It would be beneficial to determine the leadership style of principals in schools with negative growth. This data could be compared with the data and research on the transformational leaders identified with the high growth schools in this study.
2. Another sample to study would be high performing schools that have maintained strong performance from students with disabilities, and not necessarily an increase in growth. It is important to understand if principals in high performing schools lead differently than those who have been part of a growth model, as in the current sample for this study.
3. A third sample of interest would be schools that have exhibited high growth from the general education students, but minimal or negative growth from students with disabilities. A further analysis examining the leadership impact of various subgroups could be beneficial to compare and find potential similarities or differences.
4. Given the significant growth the 12 schools in this study maintained from their students with disabilities compared to the general education population, further research is encouraged. Site visits and observations within the schools could help provide additional data on the role of the principals versus the impact of the special education staff.

5. Future researchers should explore having the principals complete the MLQ-5X self-rater form. Comparing principal responses and teacher responses could aid in a deeper analysis of the principals' leadership styles.
6. Further analysis could be completed if future researchers include a qualitative aspect involving the teachers. Interviewing a focus-group of teachers could give them a larger voice in terms of their leadership ranking of the principals and provide specific examples of actions performed to assist student learning.

Recommendations for Practice

Additional recommendations are provided for school leaders to facilitate an awareness of their leadership styles and how it can impact student achievement. This can be promoted through the building and district level, as well as in principal preparation programs.

1. Principals should be encouraged to administer the MLQ-5X to their staff to provide critical feedback of how their leadership is perceived. Principals who are more knowledgeable in their leadership style could make strategic efforts to improve, as needed.
2. Principal preparation programs should highlight the importance of transformational leadership in their coursework, allowing future leaders to practice these methods in preparation for future leadership positions.
3. Central office school officials should analyze the schools with low or negative growth from their students with disabilities and examine the principals' leadership styles. The research connecting leadership and student achievement is largely indirect, but

worthy of investigation. District-wide professional development programs could be provided to school leaders, reflecting on their leadership styles and areas of improvement.

Summary

The findings of this study examined the leadership styles of North Carolina elementary and middle school principals who have led in schools with high growth from their students with disabilities. The relationship between leadership styles and student achievement, along with leadership practices evident in these schools was discussed. The leaders examined in this study led in a more transformational style, which was evident through the teacher surveys and principal interviews, and well supported as a positive leadership style in the literature.

To increase generalization to different settings, and to examine this topic further, areas of future research were recommended. However, through the data examined and the analyses conducted, implications to the current field were summarized. The findings of this study can impact schools leaders, principal preparation programs, and researchers. The effect of school leadership on student achievement has been examined through various means, but a strategic focus on students with disabilities is important. Many school leaders lack confidence in terms of providing the proper support to their special education programs, which may be related to their leadership style. This study addresses valuable linkages and raises powerful and important questions for all school leaders. How to impact student achievement will continue to be a top priority in schools. Given the increasing body of

research surrounding the effect of leadership and leading transformationally, an understanding of leadership styles and how it impacts all learners is an invaluable exercise that all school leaders should be encouraged to pursue.

REFERENCES

- Anderson, K. M. (1999). *Examining principals' special education knowledge and the inclusiveness of their schools*. (Doctoral dissertation). Available from ProQuest Dissertation and Theses database. (UMI No. 9958901).
- Avolio, B. J., & Bass, B. M. (2004). *Multifactor leadership questionnaire third edition manual and sampler set* (3rd ed.). Menlo Park, CA: Mind Garden, Inc.
- Avolio, B. J., Bass, B. M., & Jung, D. I. (1999). Re-examining the components of transformational and transactional leadership using the Multifactor Leadership Questionnaire. *Journal of Occupational and Organizational Psychology*, 72(4), 441-462.
- Bass, B. M., & Avolio, B. (1994). Introduction. In B. Bass & B. Avolio (Eds.), *Improving organizational effectiveness through transformational leadership*, 81-89. Thousand Oaks, CA: Sage.
- Bass, B. M., & Riggio, R. E. (2006). *Transformational leadership* (2nd ed.). Mahwah, NJ: Lawrence Erlbaum Associates, Inc.
- Bateman, D., & Bateman, C. (2001). *A principal's guide to special education*. Arlington, VA: Council for Exceptional Children.
- Benz, M. R., Lindstrom, L., & Yovanoff, P. (2000). Improving graduation and employment outcomes of students with disabilities: Predictive factors and student perspectives. *Exceptional Children*, 66, 509-529.

- Bernard, H. R. (1988). *Research methods in cultural anthropology*. Newbury Park, CA: Sage.
- Bertrand, L., Roberts, R. A., & Dalton, M. (2009). Surviving the first years: A principals guide for implementing a quality special education program. *Academic Leadership*, 7(1), 8.
- Bird, C. (1940). *Social psychology*. New York: Appleton-Century.
- Bolman, L. G., & Deal, T. E. (1991). Leadership and management effectiveness: A multi-frame, multi-sector analysis. *Human Resource Management*, 30(4), 509-534.
- Bolman, L. G., & Deal, T. E. (2003). *Reframing organizations: Artistry, choice, and leadership* (3rd ed.). San Francisco: Jossey-Bass.
- Borgatta, E. F., Bales, R. F., & Couch, A. S. (1954). Some findings relevant to the great man theory of leadership. *American Sociological Review*, 19(6), 755-759.
- Burrello, L.C., Lashley, C., & Beatty, E. E. (2000). *Educating all students together*. Thousand Oaks, CA: Corwin Press.
- Burns, J. M. (1978). *Leadership*. New York: Harper and Row.
- Chrispeels, J. H. (2002). The California center for effective schools: The Oxnard school district partnership. *Phi Delta Kappan*, 83(5), 382-287.
- Clark, K. E., & Clark, M. B. (1996). *Choosing to lead*. Greensboro, NC: Center for Creative Leadership.

- Cooner, D., Tochtermann, S., & Garrison-Wade, D. (2004). Preparing principals for leadership in special education: Applying ISLLC standards. *Connections: Journal of Principal Preparation and Development*, 6, 19-24.
- Cote, A. (1999). *Leadership orientation frames of Florida elementary principals in relationship to school context and principal characteristics* (Doctoral dissertation). Available from ProQuest Dissertation and Theses database. (UMI No. 9956561).
- Cotton, K. (2000). *The schooling practices that matter most*. Alexandria, VA: Association for Supervision and Curriculum Development
- Cotton, K. (2003). *Principals and student achievement: What the research says*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Council of Chief State School Officers. (1996). *Interstate School Leaders Licensure Consortium (ISLLC) standards for school leaders*. Washington, DC: Author. Retrieved from [http:// www.ccsso.org/content/pdfs/isllcstd.pdf](http://www.ccsso.org/content/pdfs/isllcstd.pdf)
- Cunningham, W. G., & Cordeiro, P. A. (2006). *Educational leadership: A problem-based approach* (3rd ed.). Boston: Pearson Education, Inc.
- Cunningham, W., & Gresso, D. (1993). *Cultural leadership: the culture of excellence in education*. Boston: Allyn and Bacon.
- David, J. L. (1989). Synthesis of research on school-based management. *Educational Leadership*, 46(8), 45-53.

- Davis, T. (1996). *The ways administrators work: A study of the theoretical frames of leadership used by female and male secondary school principals in Pennsylvania* (Unpublished doctoral dissertation). Temple University, Philadelphia, PA.
- Deal, T. E., & Peterson, K. D. (1998). *Shaping school culture: The heart of leadership*. San Francisco: Jossey-Bass.
- Deming, W. E. (1991). *An introduction to total quality for schools*. Arlington, VA: American Association of School Administrators.
- Deming, W. E. (1993). *The new economics for industry, government and education*. Cambridge, MA: MIT Center for Advanced Engineering Studies.
- DiPaola, M. F., & Walther-Thomas, C. (2003). *Principals and special education: The critical role of school leaders*. Center of Personnel Studies in Education, University of Florida. Retrieved from <http://copsse.org>.
- Dye, J. F., Schatz, I. M., Rosenberg, B. A., & Coleman, S. T. (2000). Constant comparison method: A kaleidoscope of data. *The Qualitative Report*, 4(1/2). Retrieved from www.nova.edu/ssss/QR/QR3-4/dye.html
- Education of the Handicapped Act of 1975, 20 U.S.C. § 1401 (1975).
- Etzioni, A. (1993). *The spirit of community rights, responsibilities and the communitarian agenda*. New York: Crown.
- Fiedler, F. E. (1967). *A theory of leadership effectiveness*. New York: McGraw-Hill.

- Fielder, F. E. (1968). Personality and situational determinants of leadership effectiveness. In D. Cartwright and B. Zander (Eds.). *Group dynamics: Research and theory* (3rd ed.). New York: Harper and Row.
- Fereday, J., & Muir-Cochrane, E. (2006). Demonstrating rigor using thematic analysis: A hybrid approach of inductive and deductive coding and them development. *International Journal of Qualitative Methods*, 5(1), 1-11.
- Friend, M., & Cook, L. (2003). *Interactions: Collaborative skills for school professionals*. Boston: Allyn and Bacon.
- Fullan, M. (2001). *Leading in a culture of change*. San Francisco: Jossey-Bass.
- Fullan, M. (2005). *Leadership & sustainability: System thinkers in action*. Thousand Oaks, CA: Corwin Press.
- Gall, M. D., Gall, J. P., & Borg, W. R. (2003). *Educational research: An introduction* (7th ed.). White Plains, NY: Longman.
- Garrison-Wade, D., Sobel, D., & Fulmer, C. (2007). Inclusive leadership: Preparing principals for the role that awaits them. *Educational Leadership and Administration: Teaching and Program Development*, 19, 117-132.
- Gersten, R., Keating, T., Yovanoff, P., & Harniss, M. K. (2001). Working in special education: Factors that enhance special educators' intent to stay. *Exceptional Children*, 67, 549-553.
- Glickman, C. D. (1993). *Renewing America's schools: A guide for school-based action*. San Francisco: Jossey-Bass.

- Goetz, J. P., & LeCompte, M. D. (1981). Ethnographic research and the problem of data reduction. *Anthropology and Education Quarterly*, 12(1), 51-70.
- Graen, G. B., & Uhl-Bien, M. (1995). Relationship-based approach to leadership: Development of leader-member exchange (LMX) theory of leadership over 25 years: Applying a multi-level multi-domain perspective. *The Leadership Quarterly*, 6(2), 219-247.
- Green, R. (2009). *Practicing the art of leadership: A problem-based approach to implementing the ISLLC standards*. Boston: Allyn & Bacon.
- Hallinger, P., Bickman, L., & Davis, K. (1996). School context, principal leadership, and student reading achievement. *The Elementary School Journal*, 96, 527-549.
- Hallinger, P., & Heck, R. (1996). Reassessing the principal's role in school effectiveness: A review of empirical research, 1980-1995. *Educational Administration Quarterly*, 32(1), 5-44.
- Hallinger, P., & Heck, R. H. (1998). Exploring the principal's contribution to school effectiveness: 1980-1995. *School Effectiveness and School Improvement*, 9(2), 157-191.
- Hallinger, P., & Heck, R. H. (1999). Next generation methods for the study of leadership and school improvement. In J. Murphy and L. Seashore (Eds.). *Handbook of research on educational administration* (2nd ed., pp. 463-487). San Francisco: Jossey-Bass.
- Hallinger, P., & Murphy, J. F. (1987). Assessing and developing principal instructional leadership. *Educational Leadership*, 45(1), 54-61.

- Havelock, R. G., & Hamilton, J. L. (2004). *Guiding change in special education: How to help schools with new ideas and practices*. Thousand Oaks, CA: Corwin Press.
- Hersey, P., Blanchard, K., & Johnson, D. (1996). *Management of organizational behavior: Utilizing human resources*. Upper Saddle River, NJ: Prentice Hall.
- Heumann, J. E., & Hehir, T. (1998). Helping all students achieve in high standards: A partnership between federal and secondary school administrators. *NASSP Bulletin*, 82(1), 1-4.
- Hodgkinson, C. (1996). *Administrative philosophy: Values and motivations in administrative life*. Elmsford, NY: Pergamon.
- Hook, S. (1943). *The hero in history*. New York: John Day Co.
- House, R. J., & Aditya, R. J. (1997). The social scientific study of leadership: Quo vadis? *Journal of Management*, 23(3), 409-473.
- Individuals With Disabilities Education Act, 20 U.S.C. § 1400 (2004).
- Jennings, E. E. (1960). *An anatomy of leadership*. New York: Harper.
- Johnson, R. B., Onwuegbuzie, A. J., & Turner, L. A. (2007). Toward a definition of mixed methods research. *Journal of Mixed Methods Research*, 1(2), 112-133.
- Kearns, J. F., Kleinert, H. L., & Clayton, J. (1998). Principal supports for inclusive assessment: A Kentucky story. *Teaching Exceptional Children*, 31(2), 16-23.
- Kirkpatrick, S. A., & Locke, E. A. (1991). Leadership: do traits matter? *Academy of Management Executive*, 5(2), 48-60.

- Klingner, J. K., Arguelles, M. E., Hughes, M. T., & Vaughn, S. (2001). Examining the schoolwide spread of research-based practices. *Learning Disability Quarterly, 24*, 221-234.
- Kouzes, J. M., & Posner, B. Z. (2003). Challenge is the opportunity for greatness. *Leader to Leader, 28*, 16-23.
- Leadership Style. (2006). *A Dictionary of Business and Management*. Retrieved from <http://www.encyclopedia.com/doc/1O18-leadershipstyle.html>
- Leithwood, K. (1994). Leadership for school restructuring. *Educational Administration Quarterly, 30*(4), 498-518.
- Leithwood, K. A., & Duke, D. L. (1999). A century's quest to understand school leadership. *Handbook of research on educational administration*. San Francisco: Jossey-Bass.
- Leithwood, K., & Jantzi, D. (2008). Linking leadership to student learning: The contributions of leader efficacy. *Educational Administration Quarterly, 44*, 496-528.
- Leithwood, K., & Riehl, C. (2003, March). *What we already know about successful school leadership?* A paper prepared for the AERA Division: A Task of Developing Research in Educational Research.
- Lewin, K. (1939). Field theory and experiment in social psychology: Concepts and method. *American Journal of Sociology, 44*(6), 868-896.
- Lewin, K. (1951). *Field theory in social science*. New York: Harper and Row.
- Lewin, K., Lippitt, R., & White, R. K. (1939). Patterns of aggressive behavior in experimentally created social climates. *Journal of Social Psychology, 10*, 271-301.

- Likert, R. (1967). *The human organization: Its management and value*. New York: McGraw-Hill.
- Liu, C.J. (1984). *An identification of principals' instructional leadership in effective high schools*. (Doctoral dissertation). Available from ProQuest Dissertation and Theses database. (UMI No. 8512638).
- Marks, H. M., & Printy, S. M. (2003). Principal leadership and school performance: An integration of transformational and instructional leadership. *Educational Administration Quarterly*, 39(3), 370-397.
- McCollum, D. L., & Kajs, L. (2007). Examining the relationship between administrators' efficacy and goal orientations. *Proceedings of the Academy of Educational Leadership*, 12(2), 31-36.
- McDaniel, T. (2007). *School law for South Carolina educators*. Charlotte: Catawba Publishing Company.
- McGrath, J. E., & Altman, I. (1966). *Small group research: A synthesis and critique of the field*. New York: Holt, Rinehart & Winston.
- McGregor, D. (1960). *The human side of enterprise*. New York: McGraw-Hill.
- Merriam, S.B. (1998). *Qualitative research and case study applications in education*. San Francisco: Jossey-Bass.
- Morse, J. (2003). Principles of mixed methods and multimethods research design. In A. Tashakkori and C. Teddlie (Eds.), *Handbook of mixed methods in social and behavioral research* (pp. 189-208). Thousand Oaks, CA: Sage.

- Murray, C., & Pianta, R. (2007). The Importance of teacher-student relationships for adolescents with high incidence disabilities. *Theory Into Practice*, 46(2), 105-112.
- National Center for Education Statistics, United States Department of Education. Retrieved from: <http://nces.ed.gov/fastfacts>
- Nelson, P. (2002). A needs assessment of Louisiana administrator preparation programs: Do they adequately prepare school administrators to effectively lead special education programs? *Dissertation Abstracts International*, 63(06), 1937. (UMI No. 3058216)
- No Child Left Behind (NCLB) Act of 2001, Pub. L. No. 107-110, § 115, Stat. 1425 (2002).
- North Carolina Department of Public Instruction. (NCDPI). Words and terms to know. Retrieved from <http://www.ncpublicschools.org/nclb/glossary>.
- North Carolina Department of Public Instruction. (NCDPI). The North Carolina State Testing Results 2010-11. Retrieved from <http://www.dpi.state.nc.us/docs/accountability/reports/green/achlevelbreakd.pdf>
- North Carolina State Board of Education. North Carolina Public Schools' Fast Facts. Retrieved from <http://legislative.ncpublicschools.gov/20110318-fastfacts.pdf>
- Northouse, P. (2004). *Leadership: Theory and practice*. Thousand Oaks, CA. Sage.
- O'Day, J. (2004). Complexity, accountability, and school improvement. In Fuhrman, S.H. and Elmore, R. (Eds.), *Redesigning accountability systems for education* (pp.14-46). New York: Teachers College Press

- Onwuegbuzie, A.J., & Teddlie, C. (2003). A framework for analyzing data in mixed methods research. In A. Tashakkori & C. Teddlie (Eds.), *Handbook of mixed methods in social & behavioral research* (pp. 351-382). Thousand Oaks, CA: Sage.
- Patterson, J. L. (1993). *Leadership for tomorrow's schools*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Patton, M.Q. (1991). *Qualitative evaluation methods* (2nd ed.). Newbury Park, CA: Sage.
- Riehl, C. (2000). The principal's role in creating inclusive schools for diverse students: A review of normative, empirical, and critical literature on the practice of educational administration. *Review of Educational Research*, 70(1), 55-81.
- Rea, P., McLaughlin, V., & Walther-Thomas, C. (2002). Outcomes for students with learning disabilities in inclusive and pullout programs. *Exceptional Children*, 68(2), 203-222.
- Robinson, V., Lloyd, C., & Rowe, K. (2008). The impact of leadership on student outcomes: An analysis of the different effects of leadership types. *Educational Administration Quarterly*, 44, 635-674
- Rost, J. C. (1993). *Leadership for the twenty-first century*. Westport, CT: Praeger Publishers.
- Ryan, J. (2006). Inclusive leadership and social justice for schools. *Leadership and Policy in Schools*, 5(1), 3-17.
- Samy, M., & Cook, K. (2009). Perceived school effectiveness: Case study of a Liverpool College. *International Journal of Educational Management*, 23(2), 185-198.

- Schriesheim, C. A., & Bird, B. J. (1979). Contributions of the Ohio State studies to the field of leadership. *Journal of Management*, 5(2), 135-145.
- Senge, P.M. (1990). *The fifth discipline: The art and practice of the learning organization*. New York: Doubleday Currency.
- Sergiovanni, T. J. (1992). *Moral leadership*. San Francisco: Jossey-Bass.
- Smith, P., & Bell, L. (2011). Transactional and transformational leadership in schools in challenging circumstances: A policy paradox. *Management in Education*, 25(2), 58-61.
- Spillane, J. P., Halverson, R., & Diamond, J. B. (2004). Towards a theory of leadership: A distributed perspective. *Journal of Curriculum Studies*, 36(1), 3-34.
- Stevenson, R. A. (2002) Principals. Perceptions of competence needed for administration of special education: Implications for principal preparation programs. *Dissertation Abstracts International*, 63(09), 3079. (UMI No. 3064646)
- Stetson, F. E. (1979). *Critical administrative factors which facilitate the successful inclusion of severely handicapped students in the least restrictive environment*. College Park: University of Maryland.
- Stogdill, R. M. (1948). Personal factors associated with leadership: A survey of the literature. *Journal of Psychology*, 25, 35–71.
- Talley, R.C., & Burnette, J. (1982). *Administrators handbook on integrating America's mildly handicapped students*. Reston, VA: The Council for Exceptional Children. Annandale, VA: JWK International.

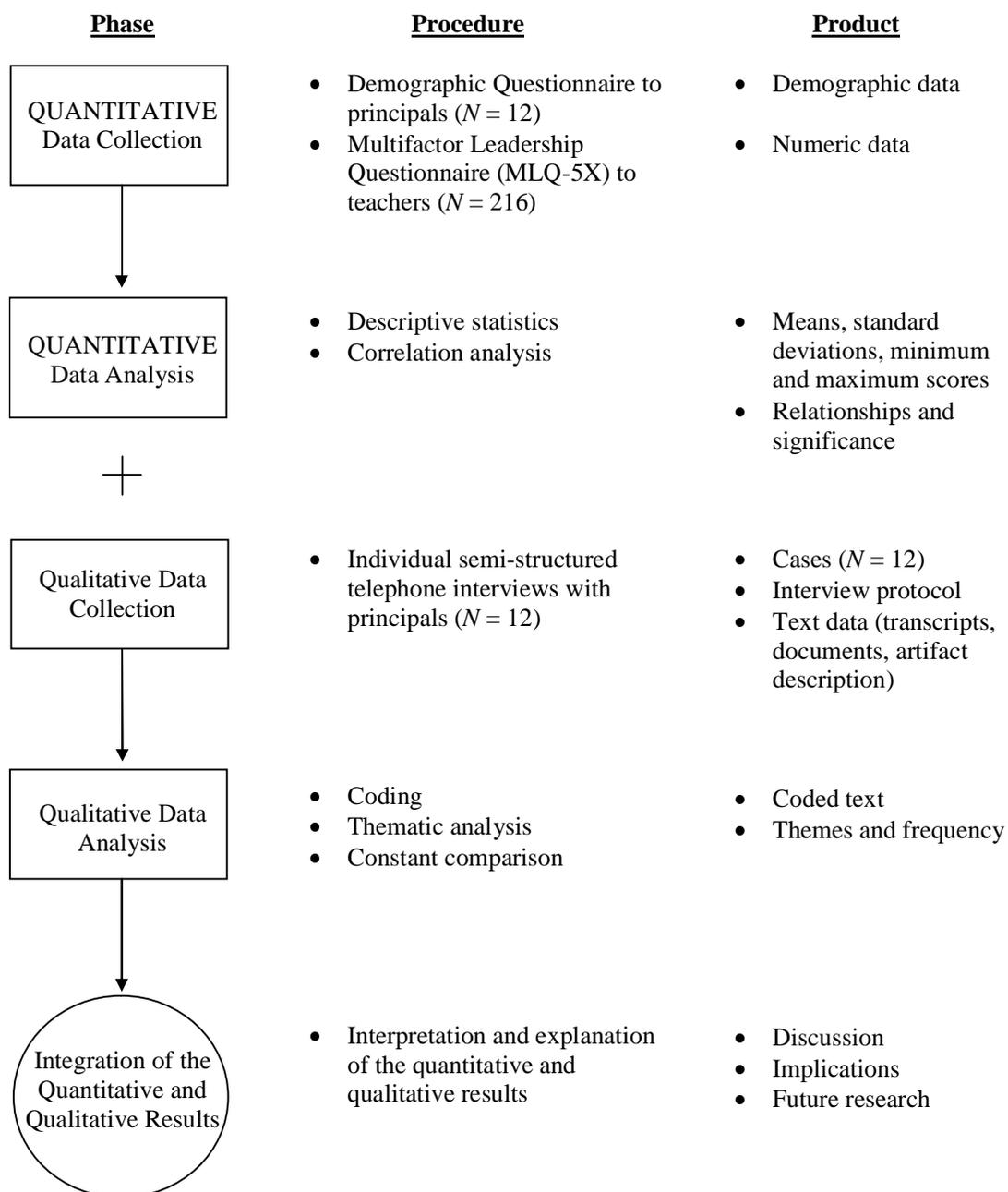
- Tashakkori, A., & Creswell, J. (2007). The new era of mixed methods. *Journal of Mixed Methods Research, 1*(1), 3-8.
- Valentine, J. W., & Prater, M. (2011). Instructional, transformational, and managerial leadership and student achievement: High school principals make a difference. *NASSP Bulletin, 95*(1), 5-30.
- Verona, G.S. (2001). The influence of principal transformational leadership style on high school proficiency test results in New Jersey comprehensive and vocational-technical high schools. *Doctoral dissertation*. Rutgers, the State University of New Jersey.
- Villa, R. A., & Thousand, J. S. (2003). Making inclusive education work. *Education Leadership Association, 10*, 19-23.
- Waters, T., Marzano, R. J., & McNulty, B. (2003). *Balanced leadership: What 30 years of research tells us about the effect of leadership on student achievement*. Aurora, CO: Mid-Continent Research for Education and Learning.
- Webb, T. P., Neuman, M., & Jones, L. C. (2004). Politics, school improvement and social injustice: A triadic model of teacher leadership. *The Educational Forum, 68*(3), 254-262.
- Weiskittel, P. (1999). The concept of leadership. *ANNA Journal, 26*(5), 467-536.
- Whitelaw, P. A. (2001). Reliability and validity: The terrible twins of good research. *MLQ Network Newsletter, 108-110*. Retrieved from <http://www.eprints.ru.ac.za>.
- Wheatley, M. (1992). *Leadership and the new science*. San Francisco: Berrett-Koehler.

- Witt, D.E. (2003). An examination of how educational administration preparation programs prepare principals in special education issues. *Dissertation Abstracts International*, 64(06) 1937. (UMI No. 3093041)
- Wong, K. C. (1998). Culture and moral leadership in education. *Peabody Journal of Education*, 73(2), 106-125.
- Yell, M. L. (2011) *The law and special education* (3rd ed.). Boston: Pearson Education, Inc.
- Yukl, G. (2002). *Leadership in organizations* (5th ed.). Upper Saddle Road, NJ: Prentice Hall.
- Zaccaro, S. J. (2007). Trait-based perspectives of leadership. *American Psychologist*, 62(1), 6-16.

APPENDICES

Appendix A

Methods Diagram



Appendix B

Principal Demographic Questionnaire

Please answer the following questions by choosing the appropriate choice:

1. I have read and understand my rights, as outlined in the Informed Consent Form.
 - a. yes
 - b. no

2. Are you a male or a female?
 - a. Male
 - b. Female

3. What is your race/ethnicity?
 - a. Asian or Pacific Islander
 - b. African American
 - c. Hispanic
 - d. Native American
 - e. White

4. How many years have you been a principal?
 - a. 0-4 years
 - b. 5-9 years
 - c. 10-14 years
 - d. 15-19 years
 - e. 20+ years

5. How many years have you been at the current school?
 - a. 0-4 years
 - b. 5-9 years
 - c. 10-14 years
 - d. 15-19 years
 - e. 20+ years

6. What is your highest level of completed education?
 - a. Bachelors Degree
 - b. Masters Degree
 - c. Doctorate Degree

7. What level of **special education** training do you have? (select all that apply)
- a. Coursework
 - b. Teaching Certification
 - c. Bachelors Degree
 - d. Masters Degree
 - e. Doctorate Degree
 - f. Professional Development
 - g. None
 - h. Other: _____
8. What grades does your school serve?
- a. K-5
 - b. 5-8
 - c. Other: _____
9. What is your total student enrollment?
- a. Under 100 students
 - b. 100-299 students
 - c. 300-499 students
 - d. 500-699 students
 - e. 700-899 students
 - f. 900+ students
10. Please indicate your name and best contact number for a follow-up interview.

Appendix C

Multifactor Leadership Questionnaire Rater Form

Name of Leader: _____ Date: _____

Organization ID #: _____ Leader ID #: _____

This questionnaire is used to describe the leadership style of the above-mentioned individual as you perceive it. Answer all items on this answer sheet. If an item is irrelevant, or if you are unsure or do not know the answer, leave the answer blank. Please answer this questionnaire anonymously.

Important (necessary for processing): Which best describes you?

- I am at a higher organizational level than the person I am rating.
- The person I am rating is at my organizational level.
- I am at a lower organizational level than the person I am rating.
- Other than the above.

Forty-five descriptive statements are listed on the following pages. Judge how frequently each statement fits the person you are describing. Use the following rating scale:

Not at all	Once in a while	Sometimes	Fairly often	Frequently, if not always
0	1	2	3	4

The Person I Am Rating. . .

- | | | | | | |
|---|---|---|---|---|---|
| 1. Provides me with assistance in exchange for my efforts | 0 | 1 | 2 | 3 | 4 |
| 2. *Re-examines critical assumptions to question whether they are appropriate | 0 | 1 | 2 | 3 | 4 |
| 3. Fails to interfere until problems become serious | 0 | 1 | 2 | 3 | 4 |
| 4. Focuses attention on irregularities, mistakes, exceptions, and deviations from standards | 0 | 1 | 2 | 3 | 4 |
| 5. Avoids getting involved when important issues arise | 0 | 1 | 2 | 3 | 4 |
| 6. *Talks about his/her most important values and beliefs | 0 | 1 | 2 | 3 | 4 |
| 7. Is absent when needed | 0 | 1 | 2 | 3 | 4 |
| 8. *Seeks differing perspectives when solving problems | 0 | 1 | 2 | 3 | 4 |
| 9. *Talks optimistically about the future | 0 | 1 | 2 | 3 | 4 |
| 10. *Instills pride in me for being associated with him/her | 0 | 1 | 2 | 3 | 4 |
| 11. Discusses in specific terms who is responsible for achieving performance targets | 0 | 1 | 2 | 3 | 4 |
| 12. Waits for things to go wrong before taking action | 0 | 1 | 2 | 3 | 4 |
| 13. *Talks enthusiastically about what needs to be accomplished | 0 | 1 | 2 | 3 | 4 |
| 14. *Specifies the importance of having a strong sense of purpose | 0 | 1 | 2 | 3 | 4 |
| 15. *Spends time teaching and coaching | 0 | 1 | 2 | 3 | 4 |

Continued →

Not at all	Once in a while	Sometimes	Fairly often	Frequently, if not always	
0	1	2	3	4	
16. Makes clear what one can expect to receive when performance goals are achieved.....	0	1	2	3	4
17. Shows that he/she is a firm believer in "If it ain't broke, don't fix it.".....	0	1	2	3	4
18. *Goes beyond self-interest for the good of the group.....	0	1	2	3	4
19. *Treats me as an individual rather than just as a member of a group.....	0	1	2	3	4
20. Demonstrates that problems must become chronic before taking action.....	0	1	2	3	4
21. *Acts in ways that builds my respect.....	0	1	2	3	4
22. Concentrates his/her full attention on dealing with mistakes, complaints, and failures.....	0	1	2	3	4
23. *Considers the moral and ethical consequences of decisions.....	0	1	2	3	4
24. Keeps track of all mistakes.....	0	1	2	3	4
25. *Displays a sense of power and confidence.....	0	1	2	3	4
26. *Articulates a compelling vision of the future.....	0	1	2	3	4
27. Directs my attention toward failures to meet standards.....	0	1	2	3	4
28. Avoids making decisions.....	0	1	2	3	4
29. *Considers me as having different needs, abilities, and aspirations from others.....	0	1	2	3	4
30. *Gets me to look at problems from many different angles.....	0	1	2	3	4
31. *Helps me to develop my strengths.....	0	1	2	3	4
32. *Suggests new ways of looking at how to complete assignments.....	0	1	2	3	4
33. Delays responding to urgent questions.....	0	1	2	3	4
34. *Emphasizes the importance of having a collective sense of mission.....	0	1	2	3	4
35. Expresses satisfaction when I meet expectations.....	0	1	2	3	4
36. *Expresses confidence that goals will be achieved.....	0	1	2	3	4
37. Is effective in meeting my job-related needs.....	0	1	2	3	4
38. Uses methods of leadership that are satisfying.....	0	1	2	3	4
39. Gets me to do more than I expected to do.....	0	1	2	3	4
40. Is effective in representing me to higher authority.....	0	1	2	3	4
41. Works with me in a satisfactory way.....	0	1	2	3	4
42. Heightens my desire to succeed.....	0	1	2	3	4
43. Is effective in meeting organizational requirements.....	0	1	2	3	4
44. Increases my willingness to try harder.....	0	1	2	3	4
45. Leads a group that is effective.....	0	1	2	3	4

Appendix D

Principal Email Script

Dear Principal:

My name is Bryan Brander and I am a graduate student at North Carolina State University and fellow North Carolina principal at a small independent school for students with learning differences. I am conducting research for my dissertation under the supervision of Dr. Bonnie Fusarelli and Dr. DeCuir-Gunby. The purpose of my research is to better understand the relationship between principal leadership styles and the academic achievement of students with disabilities.

Your school was selected due to the high growth it has demonstrated over the past four years from the students with disabilities, as measured by End of Grade tests in reading and math. More specifically, your school has fallen within the top 25% of aggregate growth from 2007-2011, among all North Carolina elementary and middle schools. This is impressive data and I am interested in learning more about the factors related to your success, along with your role as the principal!

I am asking for your participation in this study, along with the teachers in your building. In participating, you will be asked to complete a brief, five-minute demographic survey and participate in a short phone interview. The teachers will be asked to complete an electronic survey rating your leadership style. No pencil, paper, or mailings are required. The total time commitment from you and your staff would be less than 15 minutes each. Participation is totally voluntary and you may stop participation at anytime. All of your answers to the questions will be kept confidential to the fullest extent allowed by law.

The goal of this study is to provide to the existing body of research regarding leadership and student achievement and specifically examine growth of students with disabilities. In addition, the data could be valuable for principal preparation programs and principal professional development.

If you choose to participate in this study, please read the attached Informed Consent Form for more details. Upon reading the Informed Consent Form, you can access the survey through the link below. The first question on the survey will confirm that you have read and understand your rights, as outlined in the Informed Consent Form. Upon completion of the survey, I will contact you via email or phone to arrange a time, at your convenience, to conduct the brief phone interview and to discuss dissemination of the teacher survey. I have attached a sample of the teacher survey for your inquiry, along with a copy of the principal interview protocol.

Principal Demographic Survey Link: [*Qualtrics link*]

Thank you very much for your consideration in this study! I look forward to your feedback and possible collaboration! Please contact me with any questions.

Best,

Bryan P. Brander (bpbrande@ncsu.edu)

//Attachments: Informed Consent Form; Principal Interview Protocol; Multifactor Leadership Questionnaire (Teacher Survey)

Appendix E

North Carolina State University
INFORMED CONSENT FORM for RESEARCH – PRINCIPAL
This consent information is valid June 14, 2012 through June 14, 2013

Title of Study

Principal Leadership Styles and the Academic Achievement of Students with Disabilities: A Mixed Methods Approach

Principal Investigator

Bryan P. Brander

Faculty Sponsor (if applicable)

Bonnie Fusarelli, Ph.D.

Jessica DeCuir-Gunby, Ph.D.

What are some general things you should know about research studies?

You are being asked to take part in a research study. Your participation in this study is voluntary. You have the right to be a part of this study, to choose not to participate or to stop participating at any time without penalty. The purpose of research studies is to gain a better understanding of a certain topic or issue. You are not guaranteed any personal benefits from being in a study. Research studies also may pose risks to those that participate. In this consent form you will find specific details about the research in which you are being asked to participate. If you do not understand something in this form it is your right to ask the researcher for clarification or more information. A copy of this consent form will be provided to you. If at any time you have questions about your participation, do not hesitate to contact the researcher(s) named above.

What is the purpose of this study?

The purpose of this study is to 1) determine the principal leadership style that is most evident in North Carolina elementary and middle schools that have demonstrated significant growth in academic achievement from their students with disabilities; 2) determine the relationship between principal leadership styles and academic achievement of students with disabilities; and 3) identify the perceptions of principals regarding the leadership styles that impact student achievement for students with disabilities.

What will happen if you take part in the study?

If you agree to participate in this study, you will be asked to 1) complete a 5-minute electronic demographic survey via Qualtrics; 2) participate in a brief 15-minute phone interview to provide specific leadership practices you exhibit in your school; and 3) help disseminate a 10-minute electronic survey to your teachers regarding their perceptions of your leadership style.

Risks

There are no foreseeable risks involved with your participation in this study. The leadership styles examined in this study can all be linked to positive student academic achievement.

Benefits

This study will identify trends and themes related to impactful leaders and how they help in increasing student achievement for students with disabilities. This information can be valuable to principals who participate in the study, as well as other school leaders.

Confidentiality

The information in the study records will be kept confidential to the full extent allowed by law. Data will be stored securely in and coded by school name so the researcher could match the teacher data to the appropriate principal. To ensure data encryption and provide data protection, the program utilizes a SSL (Secure Sockets Layers) feature. The researcher will also disable the collection of IP addresses in an effort to protect the identity of the principals. No reference will be made in oral or written reports which could link you to the study.

What if you are a NCSU student?

Participation in this study is not a course requirement and your participation or lack thereof, will not affect your class standing or grades at NC State.

What if you have questions about this study?

If you have questions at any time about the study or the procedures, you may contact the researcher, Bryan Brander, at bpbrand@ncsu.edu.

What if you have questions about your rights as a research participant?

If you feel you have not been treated according to the descriptions in this form, or your rights as a participant in research have been violated during the course of this project, you may contact Deb Paxton, Regulatory Compliance Administrator, Box 7514, NCSU Campus (919/515-4514).

Consent To Participate

“I have read and understand the above information. I have received a copy of this form. I agree to participate in this study with the understanding that I may choose not to participate or to stop participating at any time without penalty or loss of benefits to which I am otherwise entitled.”

Appendix F

Principal Interview Questions

1. How would you describe your leadership style?
2. How do you work with your special education teachers to improve the education of students with disabilities?
3. Why do you believe the academic achievement growth from your students with disabilities subgroup has increased significantly over the past four years?
4. How do **you** promote the academic achievement of students with disabilities?

Appendix G
Teacher Email Script

Dear Teacher:

My name is Bryan Brander and I am a graduate student at North Carolina State University and North Carolina principal at a small independent school for students with learning differences. I am conducting research for my dissertation under the supervision of Dr. Bonnie Fusarelli and Dr. DeCuir-Gunby. The purpose of my research is to better understand the relationship between principal leadership styles and the academic achievement of students with disabilities.

Your school was selected due to the high growth it has demonstrated over the past four years from the students with disabilities, as measured by End of Grade tests in reading and math. More specifically, your school has fallen within the top 25% of aggregate growth from 2007-2011, among all North Carolina elementary and middle schools. This is impressive data and I am interested in learning more about the factors related to your success.

I am asking for your participation in this study. In participating, you will be asked to complete an electronic survey rating your principal's leadership style. No pencil, paper, or mailings are required. The total time commitment from you would be less than 10 minutes. Participation is completely voluntary and you may stop participation at anytime. All of your answers to the questions will be kept confidential to the fullest extent allowed by law.

The goal of this study is to provide to the existing body of research regarding leadership and student achievement and specifically examine growth of students with disabilities. The data could be valuable for principal preparation programs and principal professional development.

If you choose to participate in this study, please read the attached Informed Consent Form for more details. Upon reading the Informed Consent Form, you can access the survey through the link below. The first question on the survey will confirm that you have read and understand your rights, as outlined in the Informed Consent Form.

Teacher Questionnaire Link: [*Qualtrics link*]

Thank you very much for your consideration in this study! I look forward to your feedback and possible collaboration! Please contact me with any questions.

Best,
Bryan P. Brander (bpbrande@ncsu.edu)
//Attachments: Informed Consent Form

Appendix H

North Carolina State University
INFORMED CONSENT FORM for RESEARCH – TEACHER
This consent information is valid June 14, 2012 through June 14, 2013

Title of Study

Principal Leadership Styles and the Academic Achievement of Students with Disabilities: A Mixed Methods Approach

Principal Investigator

Bryan P. Brander

Faculty Sponsor (if applicable)

Bonnie Fusarelli, Ph.D.

Jessica DeCuir-Gunby, Ph.D.

What are some general things you should know about research studies?

You are being asked to take part in a research study. Your participation in this study is voluntary. You have the right to be a part of this study, to choose not to participate or to stop participating at any time without penalty. The purpose of research studies is to gain a better understanding of a certain topic or issue. You are not guaranteed any personal benefits from being in a study. Research studies also may pose risks to those that participate. In this consent form you will find specific details about the research in which you are being asked to participate. If you do not understand something in this form it is your right to ask the researcher for clarification or more information. A copy of this consent form will be provided to you. If at any time you have questions about your participation, do not hesitate to contact the researcher(s) named above.

What is the purpose of this study?

The purpose of this study is to 1) determine the principal leadership style that is most evident in North Carolina elementary and middle schools that have demonstrated significant growth in academic achievement from their students with disabilities; 2) determine the relationship between principal leadership styles and academic achievement of students with disabilities; and 3) identify the perceptions of principals regarding the leadership styles that impact student achievement for students with disabilities.

What will happen if you take part in the study?

If you agree to participate in this study, you will be asked to complete 10-minute electronic survey regarding your perceptions of your principal's leadership style.

Risks

There are no foreseeable risks involved with your participation in this study.

Benefits

This study will identify trends and themes related to impactful leaders and how they help in increasing student achievement for students with disabilities. This information can be valuable to principals who participate in the study, as well as other school leaders.

Confidentiality

The information in the study records will be kept confidential to the full extent allowed by law. Data will be stored securely in and coded by school name so the researcher could match the teacher data to the appropriate principal. To ensure data encryption and provide data protection, the program utilizes a SSL (Secure Sockets Layers) feature. The researcher will also disable the collection of IP addresses in an effort to protect the identity of the principals. No reference will be made in oral or written reports which could link you to the study. You will NOT be asked to write your name on any study materials so that no one can match your identity to the answers that you provide.

What if you are a NCSU student?

Participation in this study is not a course requirement and your participation or lack thereof, will not affect your class standing or grades at NC State.

What if you have questions about this study?

If you have questions at any time about the study or the procedures, you may contact the researcher, Bryan Brander, at bpbrand@ncsu.edu.

What if you have questions about your rights as a research participant?

If you feel you have not been treated according to the descriptions in this form, or your rights as a participant in research have been violated during the course of this project, you may contact Deb Paxton, Regulatory Compliance Administrator, Box 7514, NCSU Campus (919/515-4514).

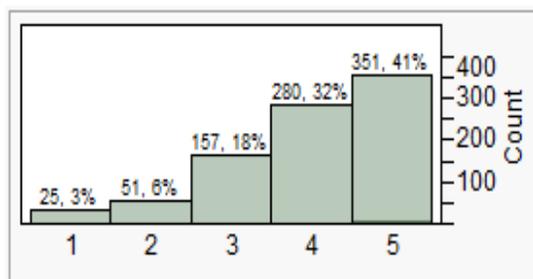
Consent To Participate

“I have read and understand the above information. I have received a copy of this form. I agree to participate in this study with the understanding that I may choose not to participate or to stop participating at any time without penalty or loss of benefits to which I am otherwise entitled.”

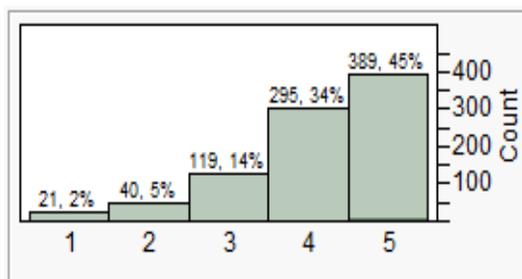
Appendix I

Frequency Tables of Transformational Characteristics

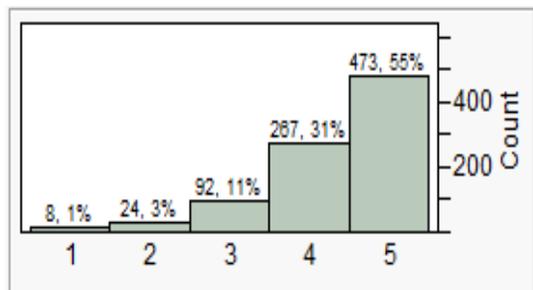
Idealized Influence: Attributed



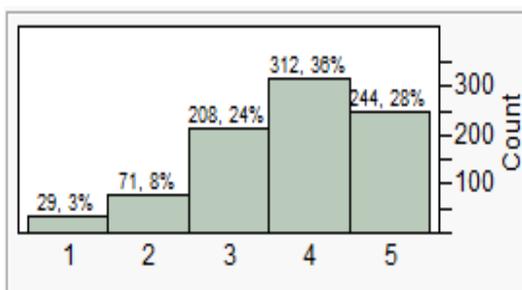
Idealized Influence: Behaviors



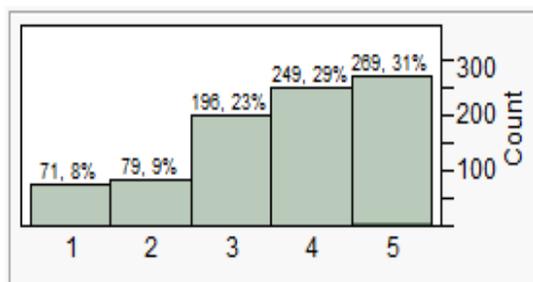
Inspiration Motivation



Intellectual Stimulation



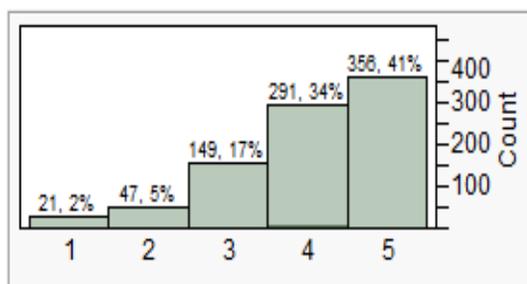
Individualized Consideration



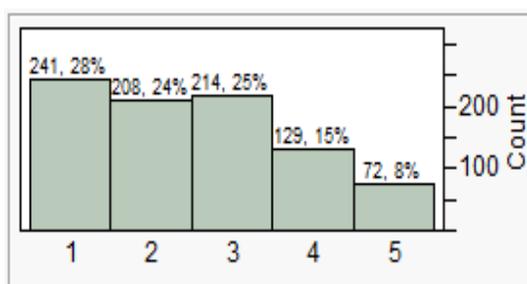
Appendix J

Frequency Tables of Transactional Characteristics

Contingent Reward



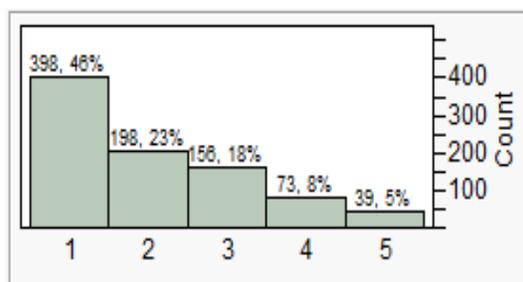
Management by Exception: Active



Appendix K

Frequency Tables of Passive-Avoidant Characteristics

Management by Exception: Passive



Laissez-Faire

