ABSTRACT

PETERSON, RODNEY L. Teacher Perceptions of the Importance of Effective Schools Correlates to Improving Student Achievement. (Under the direction of Dr. Lance Fusarelli and Dr. Tamara Young, co-chairs.)

Ronald Edmonds' (1979) review of effective schools identified five correlates that make schools successful in educating all students: strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, student acquisition of basic skills, and frequent monitoring of student progress. Other researchers reaffirmed Edmonds' conclusions and identified an additional correlate successful parent and community involvement programs were present in effective schools as well (Lezotte, 1991; Marzano, 2003; Meier, 2002; Reyes et. al., 1999; Scheurich & Skrla, 2003; Schlechty, (2002); Waggstaff & Fusarelli, 1999). This study assessed teachers' teachers' perceptions of the effective school correlates.

The *Effective School Survey* from the System and Reporting Section of Hawaii's Department of Education was used to measure teacher perceptions of the effective school correlates,

The findings indicate that teachers perceptions' of these correlates vary based on certain school and teacher characteristics. Because teachers' perceptions may be influencing teaching practices, school leaders may wish to shape teachers' perceptions by explaining the important of all correlates to student achievement. In doing so, leaders can ensure that certain practices are being carried out by all teachers to maximize student achievement.

Teacher Perceptions of the Importance of Effective Schools Correlates to Improving Student Achievement

by
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DEDICATION

This research is dedicated to my wonderful wife, Tonya, and beautiful children James, Eva Cate, and Emma for given me the motivation and fortitude to complete this study.

BIOGRAPHY

Rodney Peterson is currently the principal at Meadow Elementary School in Benson, North Carolina. Rodney was fortunate to grow up in a small rural community with loving parents and extended family members. After graduating from South Johnston High School in Four Oaks, North Carolina, Rodney attended the University of North Carolina at Chapel Hill where he double majored in History and Political Science.

Upon graduating from UNC-CH, Rodney moved to Charlotte and worked for a small subsidiary firm for DuPont. It was during his employment with this company that he gained an interest in becoming a teacher. Leaving his job in Charlotte, he moved back to Benson, North Carolina to earn a Masters in Elementary Education from Campbell University. While in graduate school at Campbell University, Rodney procured a teacher assistant position with Benson Elementary in the Johnston County Schools and later served as a teacher in third and fourth grades. His teaching philosophy centered on the sole foundation that all students can master basic skills given the right school environment and supportive teacher. It was during his tenure as a teacher that his local school principal recommended Rodney for enrollment in a cohort Educational Leadership program through North Carolina State University.

Upon completion of his Masters Degree in School Administration from North Carolina State University, Rodney continued his employment with the Johnston County Schools as an Assistant Principal with South Smithfield Elementary School in Smithfield, North Carolina. It was during this tenure that Rodney had the desire to begin a doctorate in Educational Leadership at North Carolina State University. Rodney left South Smithfield Elementary to become a Federal Grants Coordinator for Johnston County Schools only to return to South Smithfield Elementary as principal a year later after realizing his strong desire to work with students and staff members alike. Shortly thereafter, Rodney had an opportunity to return to Benson Elementary as the school's principal. The ability to serve his hometown in this capacity was a great honor. Recently, Rodney was asked to serve as principal of Meadow Elementary School. In all of his tenures, he has had the wonderful opportunity to work with excellent staff and fabulous students. It is the ones that he serves that lead him to become a better leader each day. Rodney is married to a fabulous mother and administrator in her own right, Tonya Peterson, and they are proud parents of James, Eva Cate, and Emma. He plans, one day, to be a school superintendent.

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CHAPTER I

INTRODUCTION

As parents, community leaders, and legislators question whether public schools can effectively educate all students, federal and state governments place more accountability on local education agencies to ensure that all learners receive a fair and equitable education. Under federal programs such as No Child Left Behind and state accountability systems, schools failing to meet established benchmark standards for student achievement face the possibility of sanctions or loss of important supplemental funding. As a result, local education agencies must ensure all learners meet the expected grade level growth and proficiency from one academic year to the next.

Due to this accountability, school leaders must become resourceful in how they appropriate allocations to meet student needs. These school leaders place more emphasis on using proven research-based programs and services to address the needs of all learners. When combined with supplemental funding from local, state, and federal resources, research-based programs offer schools a way to provide instruction that meets the expected outcomes of these accountability measures.

Another factor to ensure schools meet or exceed outcome-based standards and accountability policies is the local school improvement teams, which develop strategic action plans to identify goals and expectations for school improvement. Many factors influence the strategies of school improvement plans including the schools' need to increase student achievement and provide a safe and orderly school. Internal and external stakeholders pressure school-based teams to identify performance measures in these reform plans, describe how student achievement will be assessed, identify how safe and orderly environment goals will be measured, and to ultimately define what is considered academic success. As such, the development of strategic plans indicate to the community and local school boards as to how the local school staff will offer programs and initiatives to promote student growth and development.

In light of these external pressures, local administrators and school improvement teams diligently try to determine what pedagogical approaches to implement within improvement plans to raise student achievement while also meeting state and federal legislation requirements. To create plans that improve student achievement, school leaders and leadership teams need to be knowledgeable of current trends and research in education and be willing to take risks.

However, implementing new academic programs require a substantial amount of planning and collaboration with a representative body of a program's students, parents, and faculty. Pressman and Wildavsky (1984) go further to suggest that it is a difficult task even to accomplish. They write:

> Our normal expectations should be that new programs would fail to get off the ground and that, at best they will take a considerable amount of time to get started. The cards in this world are stacked against things happening, as so much effort is required to make them work. The remarkable thing is that new programs work at all. (p. 109)

Although a challenging task, Rist (1994) indicates that qualitative research data analysis through case studies provides applicable information for the implementation of new initiatives.

The Effects of Accountability Models on Strategic School Improvement Planning

As states implement accountability models to meet federal standards, local school administrators encounter external and internal pressures to meet accountability benchmarks. Such demands create both positive and negative impacts on the school's stakeholders, thereby making the implementation and success of a school improvement plan all the more demanding.

Scholars argue that teachers teaching in high-stakes accountability systems limit their willingness to take risks in their pedagogy for concern of meeting the accountability model standards (Kohn, 2001; Miller, 1995). As a result, accountability models can potentially limit the creativeness in school reform plans (Ladd, 2001). For instance, Kohn's (2001) research indicates that when implementing accountability models, test scores garner more emphasis than the students' needs. The result is, Kohn adds, teachers narrowing their curriculum focus by targeting specific objectives assessed on these high-stakes tests to ensure appropriate student scores.

Miller's (1995) study supports Kohn's assessment that when teaching in an accountability model, teachers more heavily focus on target objectives commonly assessed on high-stakes tests. Miller's findings on teacher responses to test-driven accountability pressures confirm teachers were uncomfortable in changing their pedagogical approaches within an accountability system for fear that the students may not score as well on the system’s standardized test. Although Miller’s study found a positive correlation with increased student achievement as the result of student activities designed to target higher order thinking skills, teachers maintained a higher comfort level with worksheet type activities. Teacher interviews attributed this comfort level to time restraints coupled with accountability pressures to cover all tested objectives.

An audit of Georgia’s school curriculum by Phi Delta Kappa International supports the notion that accountability models are forcing teachers to narrow their curriculum focus ("Audit rips Georgia schools' curriculum.," March 11, 2002 2002). As indicated in an article in the *Atlanta Journal-Constitution* ("Audit rips Georgia schools' curriculum.," March 11, 2002 2002) the auditors found that students were doing nothing more than memorizing facts and that worksheets, textbooks, and lectures were the norm while “hands-on exercises and group discussions were unusual.” The article further explains that what you have as the result of the state’s accountability policy are “frazzled teachers trying to keep up with coverage of the objectives because that’s what they are graded on.” As in Miller’s (1995) study, the teachers felt more comfortable teaching rote memorization so they could cover a greater number of state-tested objectives.

Additionally, the possibility of sanctions under accountability systems influences school improvement planning. For instance, Ladd (2001) fears that accountability systems will place greater strains on failing schools through the fear of sanctions rather than through researched interventions designed to support and aid such schools. Ladd adds, “even if the motivation were to increase student achievement in the short run, it would be hard to sustain over time given that good teachers and school principals have options other than to teach in such schools" (p. 386).

As such, school systems should use accountability models to force schools to create improvement plans that identify areas of needs within schools. Moreover, in identifying these needs, the school improvement teams should have the opportunity to create reform plans that identify researched, constructive, and viable solutions to raise academic achievement in the absence of fear from the federal government reducing supplemental funds or the state increasing its control over the school.

Other researchers feel accountability models can have a more positive influence on school improvement planning. Unlike the previous authors, Watson and Supovitz (2001) indicate that internal accountability can be both destructive and constructive.

> On the one hand, teachers are forced to come out of isolation and are held increasingly accountable by their peers for their role in contributing to instructional improvement. On the other hand, as Cohen (1976) and Hargreaves (1980) have pointed out, expanding local responsibility is often accompanied by increased conflict. (p. 16)

The authors add that conflict arising from local accountability could be helpful if it has productive outcomes. For instance, a positive outcome would be a teacher confronting issues that discourage instructional coherence. However, Watson and Supovitz note it is when conflict is left unsettled that feelings of abandonment and mistrust arise.

Like Watson and Supovitz, Louis Gerstner's (2002) *New York Times* article, "The Tests We Know We Need", points out that accountability is not always negative toward its stakeholders. Gerstner referenced a survey by *Public Agenda* where parents, teachers, and college professors were questioned about standardized testing. This study revealed that "by huge margins, all said students work harder if they have to pass tests for promotion or graduation… and that only 2 percent of parents and 1 percent of teachers said schools should go back to the way things were before the introduction of new testing programs" (p. 21). As former chairperson of IBM and co-chairman of Achieve Inc., a nonprofit school reform group created by governors and business leaders, Gerstner believes the best way to reform schools is to move forward with accountability systems that raise the expectations of its stakeholders, invest in teachers and students, and measure how much students know.

Similarly, in Kentucky the accountability program and positive school improvement coexist in harmony. The Kentucky Education Reform Act (KERA) has promoted collaboration among administration, teachers, and students. As Whitford, Gaus, and Ruscoe (1993) explain:

> There is evidence that many teachers are working differently as the result of KERA. As their work changes, their roles and relationships are also altered. They are less isolated from each other as they plan curriculum and instruction with colleagues, work with students in new ways, and become centrally involved in running their schools through school councils and committee. (p. 42)

The researchers also note that teachers are now required to develop their own curriculum with performance assessments linked to KERA's goals and outcomes. Likewise, KERA encourages teachers to use student-centered thematic units and hands-on learning activities that promote higher order thinking skills.

In addition to Kentucky, two different reports by Davis Grissmer and his colleagues at RAND reported that the Texas and North Carolina accountability systems have improved students' performance on the National Assessment of Education Progress (NAEP) in those two states, especially for children of color (Grissmer & Flanagan, 1988; Grissmer, Flanagan, Kawata, & Williamson, 2000). Skrla et al. (2001) indicate accountability and standardized tests reveal inequities within the traditional models and pedagogy of schooling, thereby requiring educators to meet the needs of all learners.

As expressed in the preceding pages, accountability programs can have both positive and negative effects on its stakeholders. Nevertheless, as Hanushek and Raymond (2001) write, civic and school leaders ultimately design accountability models to deal with aggregate shortcomings.

One requirement of these accountability models is for schools leaders to work with parents, teachers, and students to develop a plan that addresses the shortcomings revealed in their schools' achievement data. Lezotte (1994) has found in his efforts "to train school teams to plan and implement change at improving student learning and performance, we have had our best success when we ask them to focus on two or three high-yield strategies that will likely result in significant increases in student achievement" (p. 19). For this reason, administrators and schools systems search for proven systematic changes to meet the academic needs of every child. Edmonds' (1979) research identified schools that were successful in making systematic changes to meet the needs of learners. In his research of effective schools, he defined the common characteristics of these effective schools as effective school correlates.

Statement of the Problem

As federal and state legislation stipulate for schools their expected levels of student achievement, there is greater pressure and focus on school-based initiatives. As Lezotte (2004) describes in his mission for learning for all, a quality education for all learners will not be easy. He writes, "If we accept the new aim, then the implication for teachers and administrators and their work will be truly awesome. We are now talking about compulsory learning and will no longer settle for compulsory schooling" (p. 3). As such, principals and local school improvement teams are responsible for developing improvement goals and strategies that provide disadvantaged children with education comparable to that received by middle-class children (Rothstein, 2000, p. 18). As indicated earlier in this chapter, making changes in a school process requires a substantial amount of planning and collaboration with a representative body of the program's intended stakeholders. The issue that school leaders face is to identify the shortcomings of their school and then target these deficiencies with the best strategies that will yield maximum results.

To aid in their search for these strategies, school leaders can rely on the research that has identified several school-level factors that positively affect student achievement. Edmonds (1979) concluded from his study of the effective schools research that there are similar, identifiable correlates that make schools successful in educating all students. Edmonds identified these correlates as strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, pupil acquisition of basic skills, and frequent monitoring of student progress. The research on parent and community involvement also suggests that this correlate is important to student success as well (Lezotte, 1991; Marzano, 2003; Meier, 2002; Reyes et al., 1999; Scheurich & Skrla, 2003; Schlechty, 2002; Wagstaff & Fusarelli, 1999).

Over the last thirty-five years effective schools research supports Edmonds' findings and maintains that these school-level factors are evident in schools that successfully meet the needs of all of their students. Researchers have even gone as far as ranking these correlates by their importance (Marzano, 2003; Scheerens & Bosker, 1997). As Marzano (2003) indicates, the Scheerens and Bosker's "ranking was the first of its kind and significantly increased our understanding of the school-level factors associated with enhanced academic achievement" (p. 17). However, the effective schools' research is limited in describing the teachers' perceptions of which effective schools correlates can improve student learning in schools.

Purpose of the Study

The school improvement research supports Edmonds' research of the effective schools correlates. As such, the design of this study is not to document what we know about the effective schools correlates but rather to expand upon this knowledge.

In the preceding discussion of the accountability research, it is evident that systematic school change is not easy and can be cumbersome. Nevertheless, current school reform laws such as No Child Left Behind make it clear to school leaders of failing schools that changes must be forthcoming or the school will incur the loss of important supplemental federal dollars. As such, school leaders are looking for systematic reform strategies to incorporate in their school improvement plans. These plans should include the effective school correlates.

Marzano (2003) and Scheerens and Bosker (1997) have ranked these correlates on the value of their importance to improve student achievement. However, a school that has not met federal or state standards lacks the time to incorporate each correlate separately. Additionally, accountability research does not suggest a systematic overhaul of a school to simultaneously to include all six correlates. Rather, school improvement plans should focus on two to three high yield strategies. It is clear that principal leadership and the views of change among staff members play an important role in school improvement success. As such, the purpose of this study is to assess the beliefs of teachers about which effective school correlates they perceive have the greatest impact on improving student achievement.

Significance of the Study

Along with federal and state policies, performance reporting assists school leaders in defining their paths of school improvement. Fusarelli and Fusarelli's (2004) discussion of the New Public Management in education supports this notion. They write,

> The institutional environment of education is changing, with greater emphasis on monitoring organizational performance in an effort to craft more coherent education policy. School systems throughout the United States are experiencing much stronger demands for technical performance and are under increasing pressure to improve student achievement. (p. 121)

This demand for school data management requires school improvement teams to monitor student test scores frequently, locate areas of improvement, and investigate what strategies will aid them in their efforts to meet state and federal guidelines. This study is significant because it serves as a point of measure of how effective school correlates can associate with the school improvement process. Likewise, this study provides school leaders with a better insight as to which effective schools correlates teachers perceive as important to influence student achievement. As school leaders better understand these perceptions, this knowledge will assist them in building a capacity for change within the school improvement process using these effective schools correlates.

Although twenty-first century politicians and school leaders have questioned if significant changes to the educational system are possible at the school level, the effective schools research of the 1970's and 1980's proves that school level changes can be effective in increasing student achievement. There is an abundance of school-level research supporting the presence of effective correlates in school improvement planning. What is also clear is that change is not easily attainable or receptive in schools. Unfortunately, schools facing sanctions do not have an abundant amount of time to make the needed systematic changes to incorporate all of these correlates at once. As such, it is important for school leaders to have a measure of how teachers perceive the effective school correlates to assist them in building a capacity for change in there schools. Therefore, schools leaders need to know which effective schools correlates are perceived by teachers as most significant in raising student achievement. This study will identify these correlates.

Research Design and Analysis

This study examines the perceptions of teachers regarding the effective schools correlates identified in the literature review. Specifically, the data to be collected from the survey of the schools' teachers will allow the researcher to explore relationships among the effective schools correlates. Another goal of this study is to measure the association of the correlates to identify which correlates have the greatest relationship on student achievement as viewed by teachers.

Assumptions of the Study

Upon review of the effective schools literature and research design for this study, the researcher makes an assumption about the potential findings of the study. Due to the nature of this study, the findings of this study center on the supposition that what the survey participants report is actually occurring in their schools.

Summary

This study will examine which effective schools correlates are perceived by teachers as most significant in raising student achievement. In addition, this study will measure the association of the correlates to identify which correlates have the greatest relationship of student achievement as viewed by teachers. Chapter 1 discusses the significance and purpose for the study. Chapter 2 presents findings from the review of relevant literature, and Chapter 3 explains the methodology for the study. The findings are discussed in Chapter 4, and Chapter 5 discusses the findings in relation to extant research, arrives at some preliminary conclusions based on these findings, and offers recommendations for future research and practice and reflections on lessons learned in this study.

CHAPTER 2

REVIEW OF THE LITERATURE

Introduction

This literature review begins with an examination of the effective schools movement and then explores the effective schools research. Specifically, this portion of the review cites research findings that conclude schools' institutional characteristics can make a significant difference in meeting the needs of all students. The referenced studies document how this conclusion is in stark contrast to earlier twentieth century studies, which implied that school characteristics had little effect on educational outcomes and indicated there is a strong correlation between the academic success of a student and their socio-economic background. The literature review identifies the common institutional correlates present in effective schools and provides a brief review of the research literature on each correlate.

Secondly, this literature review cites recent research on high-performing schools. In particular, this section notes that in the past two decades there has been a systematic reform and district-wide change effort underway to meet students' academic needs. In addition, the research reveals there also has been a shift back to various school level initiatives targeted towards reducing the achievement gap.

Effective Schools Movement

Since the genesis of the U.S. public education system, skeptics have been critical of its value and effectiveness, and the pinnacle of the criticism arose in 1964. A provision under Title IV of the Civil Rights Act authorized a study to assess segregated education and its impact on students. The results, published as *Equality of Educational Opportunity*

(Coleman et al., 1966), best known as the Coleman Report, indicated that significant gaps existed between white and minority social classes, and these gaps appeared to widen as these same students entered high school. More profoundly, the report stated "one implication stands above all: that schools bring little to bear on a child's achievement that is independent of his background and general social context" (p. 325). As such, the researchers' findings concluded that schools do very little to affect students' achievement. The policy implication drawn from the study was that schools do not matter.

Marzano (2003) revealed that Coleman's et al. (1966) findings were supported with the publishing of *Inequality: A Reassessment of the Effects of Family and Schooling in America* (Jencks et al., 1972). Jencks' findings concurred with Coleman's, suggesting "student achievement is primarily a function of one factor—the background of the student [and] little evidence exists that education reform can improve a school's influence on student achievement" (cited in Marzano, p. 2). In their qualitative review of the 127 northern high schools and their feeder schools in the *Equality of Educational Opportunity Survey*, Jencks et al. (1972) found very little educational effects of students who attended "effective" schools and those students who did not. As they explained, "attending an elementary school that ranks in the top rather than the bottom fifth in terms of its effect on test scores will not increase the average student's eventual educational attainment more than 0.8 years, and our best guess is that the effect is far smaller" (p. 148). Therefore, Jencks et al. (1972) added, "living in the 'right' school districts seems to make relatively little difference to an individual's educational attainment" (p. 148). As such, they summarized, "the average effect on any given school is therefore small" (p. 148).

In contrast to Coleman and Jencks' reports, a number of other school reform studies found that schools actually account for more variance in student achievement than the meager 10% identified in the Coleman report. Within these findings, similar variables existed in these effective schools. In Ronald Edmonds' (1979) seminal review of the effective schools research, he identified five correlates of effective schools, which all contributed to a school's success in meeting all students' needs. Since its publication in 1979, researchers of the effective schools movement have referenced these correlates (Marzano, 2003). As a result, Marzano (2003) explained, "[*Ronald*] Edmonds is the figurehead of the school effectiveness movement" (p. 16).

The method by which these specific correlates were identified is discussed in Edmonds' (1979) journal article, "Effective Schools for the Urban Poor." In this publication, Edmonds suggested that the inequity of the American education system resulted from the schools' inability to teach the poor children basic school skills. In his explanation of an effective school, Edmonds (1979) notes, "I require that an effective school bring the children of the poor to those minimal masteries of basic school skills that now describe minimal successful pupil performance for the children of the middle class" (p. 16). Edmonds defines minimal mastery skills as the basic skills that enable a student to successfully access the next level of schooling.

One research study noted in Edmonds' (1979) review of literature was Weber's (1971) quantitative research, which focused on four instructionally effective inner-city schools. These schools successfully met the reading needs of poor students when compared to national norms. Weber (1971) identified several common characteristics found in each of these schools: strong leadership, high expectations for all students, an orderly and pleasant school environment, and frequent monitoring of student progress. Edmonds (1979) insisted that Weber intended this study to “be explicitly alternative to Coleman (1966)… and other researchers who had satisfied themselves that low achievement by poor children derived principally from inherent disabilities characterizing the poor” (p. 16).

Additionally, Edmonds (1979) confirmed Weber’s findings by citing a 1974 study published by New York’s Office of Education Performance Review. This study focused on two New York inner city public schools, one high achieving and the other low achieving. As noted by Edmonds (1979), the findings from this study indicated, “the difference in these two schools seemed to be attributed to factors under the schools’ control” (p. 16). Also, the findings credited the school’s success to administrative instructional and management support, as well as a preliminary plan for identifying strategies to improve students’ reading achievement (Edmonds, 1979).

Another study used in Edmonds’ (1979) research review in identifying correlates among effective schools included the findings from Madden, Lawson, and Sweet (1976). This study compared 21 high performing and 21 low performing elementary schools in California. As Edmonds notes, the researchers’ goal was to pinpoint the institutional characteristics that were most responsible for achievement differences between the pairs of schools. The characteristics of the high-performing schools from this study included strong administrative support, very high task-oriented teachers, frequent monitoring of student progress, more teaching time spent in the social sciences, use of paraprofessionals in classroom instruction, ability grouping of students for specific skills instruction, and teachers being more satisfied with their work (Edmonds, 1979). Low performing schools lacked these essential characteristics.

Similarly, Brookover and Lezotte (1977) were asked by the Michigan Department of Education to study and define the differences between the improving and declining schools in their system based on Michigan’s annual criterion-referenced test given in grades four and seven. The researchers interviewed and provided questionnaires to personnel from eight schools. The study described six of the eight schools as improving the basic school skills among its pupils, whereas two were failing. The study revealed similar characteristics of the improving schools as found in the Madden, Lawson, and Sweet study (1976). For instance, Brookover and Lezotte determined improving schools placed a greater emphasis on reading and math instruction. In addition, the staff members shared the belief that all students could master the basic objectives and they held high expectations for all of their students. Likewise, the principal emphasized being the instructional leader and held high behavioral standards for students. Finally, these schools accepted a higher degree of accountability for student learning and had higher levels of parent-initiated involvement (Edmonds, 1979). The findings from the Madden, Lawson, and Sweet (1976) and the Brookover and Lezotte (1977) studies assisted Edmonds in defining the correlates of effective schools to be discussed in detail later in this chapter.

As part of a 1978 study, Edmonds and Frederiksen (1978) asked an important question, “Are there any schools that are instructionally effective for poor children?” (cited in Edmonds, 1979, p. 20). Based on the previously described studies, Edmonds (1979) suggested that “all children are eminently educable and that the behavior of the school is critical in determining the quality of that education" (p. 20). As Edmonds and Frederiksen (1978) explained in their reevaluation of the 1966 Equal Education Opportunity Survey (EEOS), "we found that schools that were instructionally effective for poor and black children were indistinguishable from less effective schools on measures of pupil social background" (cited in Edmonds, 1979, p. 21). These findings, Edmonds (1979) added, stand "in striking contrast to that of other analyses of the EEOS, which have generally concluded that variability in performance levels from school to school is only minimally related to institutional characteristics" (p. 20).

Edmonds (1979) concluded from these research analyses that there are similar, identifiable correlates that make schools successful in educating all students. Subsequently, Edmonds identified these correlates as strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, pupil acquisition of basic skills, and frequently monitoring of student progress. These five correlates are the basis for measuring school effectiveness in this study. In the next section, research on each correlate is examined in greater detail.

Effective Schools Correlates

Strong Administrative Leadership

Edmonds (1979) proclaimed that without strong school leadership the "elements of good schooling can neither be brought together nor kept together" (p. 22). Weber's (1971) survey of four effective inner-city schools identified the importance of school leadership as well, noting the principal was the person responsible for setting the tone for the school and making decisions on instructional strategies (cited in Edmonds 1979). Hallinger and Murphy

(1986) analyzed all of the elementary schools that contained both third and sixth grades in California and supported the same conclusions. In this specific study, the researchers were interested in "analyzing the differences between high and low-SES effective schools in the operation of seven school effectiveness variables" (p. 334). To identify effective and typical schools, the researchers used three years of test data from the California Assessment Program (CAP) from the 1978-1979, 1979-1980 and 1980-1981 school years. Out of the 3,100 elementary schools in California, 16 schools met the criteria of being above the comparison band for three consecutive years and with all scores above the fifteenth percentile. Only eight of the sixteen schools were chosen for the study and these selected schools represented communities from low SES to upper SES. The researchers concluded that although instructional leadership should not be the sole responsibility of the principal, the principal is the "key actor in promoting school-wide instructional improvements" in these schools (p. 333).

Further, Waters, Marzano, and McNulty's (2004) study noted that school leadership is critical to a school's success. The authors reviewed the meta-analysis of the Mid-continent Research for Education and Learning (McREL) study, "School Leadership that Works", and found a positive correlation between effective school leadership and student achievement. Waters, et al. (2004) documented the findings from the McREL researchers. They concluded that "effective leaders understand which school changes are most likely to improve student achievement, what these changes imply for both staff and community, and how to tailor their leadership practices accordingly" (p. 49). Of the 21 key areas of effective leadership Waters et al. (2004) define, they determined two key variables, the focus of change and the order of change. Both of these two variables determined whether school leadership had a positive or negative impact on student achievement. As the authors assert, “leaders can act like effective leaders, but if they fail to guide their schools toward making the correct changes, these changes are likely to have a diminished or negative impact on student achievement” (p. 50). Correct changes for school level leadership include creation of a safe and orderly school, parent and community involvement, professionalism and collegiality, goal setting and proper feedback, and a viable and guaranteed curriculum. Waters et al. (2004) surmised that such alternatives have less to do with the actual change itself but more with how the stakeholders view this change. The authors suggest these second-order changes, alternatives that focus on changes to current routines or values, must involve all stakeholders working together for the change to be effective. Therefore, Waters et al. explain, effective leadership is required to implement these types of changes successfully:

> Before principals can be strong educational leaders, three conditions must be present (Hallinger & Murphy, 1982, 1985; Murphy, Hallinger, & Peterson, 1985). First, district decision makers must reduce the barriers that keep principals from performing their instructional leadership role. Second, instructional leadership must be defined in terms of observable practices and behaviors that principals can implement. Third, assessment methods must generate reliable, valid data on instructional leadership behavior and provide information principals can use in their professional development. (p. 55)

In their 1990 study, Heck, Larsen, and Marcoulides document how researchers can measure principals’ effectiveness. Their theoretical model explains how the principal governs the internal and external political environments of their school. This governance directly affects instructional implementation behaviors, the school climate, and instructional organization. Heck, Larsen, and Marcoulides (1990) indicated, “the principal’s role in establishing a strong climate and instructional organization is precisely the area that strongly predicts school achievement in our model” (pp. 117-118). Waters, Marzano, and McNulty’s (2004) study further explained the impact an effective leader can have on student achievement. Their analysis “found that the average effect size (expressed in correlation) between leadership and student achievement is .25, which means that as leadership improves, so does student achievement” (p. 49).

Wagstaff and Fusarelli’s (1999) qualitative study of school leadership among eight high-performing Hispanic schools in Texas further emphasized the importance of school leadership in effective schools. These case studies revealed that effective leadership has unique styles. For instance, some principals viewed themselves as facilitators, “whose job was to get teachers, parents, and students the resources they needed to achieve success” (p. 21). In addition, effective school leaders were highly visible in their schools and had a high degree of dedication to ensure student success. Wagstaff and Fusarelli (1999) found that effective leaders built trust among the school’s stakeholders and understood the learning styles of both the students and staff. Finally, the researchers discovered that school administrators recognized and respected the professional judgment of teachers through which they understood the “teacher staffs were the key to school effectiveness” and provided them with the “autonomy necessary to do their jobs effectively” (p. 22).

High Expectations for Student Achievement

In addition to a strong instructional leader, Edmonds (1979) suggested that effective school staffs believed and demonstrated that all students could attain mastery of essential skills. While it may seem obvious that teachers and staff should believe that all students can learn, a large body of research suggests that this paradigm is not widely shared, particularly with respect to students of color (Valencia, 1997; Valenzuela, 1999).

However, Scheurich and Skrla's (2003) qualitative review of effective schools research suggested that effective schools can provide all students with an equitable and excellent education. They suggested that in the schools where equitable and excellent education is evident, certain qualities exist. For instance, the staff members of these schools believe an equitable and excellent education for all students is possible. Moreover, these school staffs have academic standards within an aligned curriculum. Similarly, the instructional climate within these schools exemplifies the need for high expectations and the respect for cultural differences. The authors found that these schools use data to make informed decisions about creating a more equitable learning environment and use accountability measures to assess whether students are learning the school's standards and curriculums.

Scheurich and Skrla (2003) observed that in all the schools they visited, the staff members reportedly had high expectations for their students. However, the student test results from some schools suggest otherwise. As Scheurich and Skrla suggested, there are discernable differences among schools that believe in high expectations and the schools that actually hold students accountable for meeting expectations. For instance, Scheurich and

Skrla described these schools as places where all students are experiencing "high and equitable success" and where school staffs "truly have a climate of high expectations and respect for their students that permeates all aspects of school life" (p. 47). The researchers explained further that such expectations are translated from the school's mission statement and serves as the central focus of the teacher's classroom.

Additionally, Scheurich and Skrla's (2003) research indicated that this climate of high expectations and respect does not mean "lowered academic expectations or avoidance of content areas in which children may need the most work" (p. 47). Rather, it means teachers who have high expectations for their students see all children "from an assets-based viewpoint and expect them to learn challenging academic content" (p. 47). Scheurich and Skrla's findings also indicated that quality teachers who successfully meet the needs of their diverse populations are "persistent and relentless in finding a way" for children to succeed (p. 48).

Levine's (1990) summary of the study, *Unusually effective schools* (Levine & Lezotte, 1990), supports the findings of Scheurich and Skrla (2003). Levine's conclusions from this comprehensive overview of the research conducted since 1985 on unusually effective schools insists the key prerequisites of effective schools include an "insistence that faculty, students, and other parties take responsibility for improvement, persistence in doing what must be done to attain high standards, and resiliency in moving forward despite discouraging obstacles and developments" (p. 584). Reynolds and Teddlie (2000) found consistent themes in their review of the effective schools literature as well. They concluded that "virtually every review of the topic mentions the importance of this factor [high expectations for low SES students], whether British …Dutch … or American (cited in Marzano, 2003, p. 36). Reynolds and Teddlie (2000) add that goals for students are much clearer when the teachers effectively communicate high expectations (Marzano, 2003).

Furthermore, Wagstaff and Fusarelli's (1999) findings also support the view of holding all stakeholders, parents, students and staff to high expectations. Their findings revealed that "each school held itself accountable to its campus improvement plan and was willing to take whatever steps necessary to achieve the goals set by the committee" (p. 28). As noted by one principal in Wagstaff and Fusarelli's study, "we have to make them [the students] believe in themselves because we believe in them. These kids are just as smart. All children can learn but at a different pace" (p. 27).

Safe and Orderly Environment

In Edmonds' (1979) review of the effective schools literature, he noted effective school environments were "orderly without being rigid, quiet without being repressive, and generally conducive to instructional business at hand" (p. 22). From his analysis of this research, Edmonds (1979) suggested that a safe and orderly school moves beyond creating an environment that is free from the threat or existence of physical harm. Edmonds (1979) insisted that a safe and orderly school environment also includes an environment that is conducive to meeting student needs as well. Such an environment includes both teachers and students being intellectually safe (respected for the gifts they possess), emotionally safe (feeling of belonging and emphasis on positive relationships), and socially safe (providing socialization experiences for both students and teachers) (Connors, 2000).

A significant body of research conducted after Edmonds' study tends to agree with this assessment (e.g., Lezotte, 1991). For instance, the research not only identified the importance of a safe environment for students to learn, but for teachers to teach as well. As Lezotte (1991) explained in his review of the safe orderly schools correlate, the second generation of this correlate focuses on desired behaviors for students, such as cooperative learning groups. The intent of these behaviors, as Lezotte (1991) described, is for students to help one another. However, in order for the students to work together, the teachers must first model this collaborative working relationship (Lawerence Lezotte, 1991). This requires a significant change in traditional teacher behavior away from working in isolation to working in groups, as teachers, as teams, both within and across grade levels.

Wagstaff and Fusarelli (1999) noted the presence of collaborative working relationships among staffs in their study of effective schools. The researchers explained there was a high degree of "coordinated planning and communication among teachers and staff" in the effective schools (p. 20). Such collaboration, Wagstaff and Fusarelli (1999) found, extended to peer reviews to promote "effective teaching strategies and techniques among the staff" (p. 20).

Similarly, Scheurich and Skrla (2003) found the same evidence in their review of effective schools. They argued that the way effective schools go about achieving results is through "shared responsibility, democratic decision making, and collaborative planning and instruction" (p. 55). Deborah Meier (2002) recalled similar characteristics of teacher collaboration in her school experiences at Central Park East and Mission Hill. Meier (2002) wrote, "taking responsibility for oneself and one's ideas is not a bad shorthand definition of being educated. So becoming skillful at getting the relationship right for learning among the faculty and learning how to be both critical and appreciative of each other is not a distraction but the core of what kids can learn from keeping company with us" (p. 76).

Louis and Marks (1998) questioned what effects the professional community would have on classroom organization and on student achievement. Their quantitative findings from eight elementary, eight middle, and eight high schools suggested that when organizations of teachers work in ways that promote professional community, there is a positive correlation between the "positive relationship with the organization of classrooms for learning and the academic performance of students" (p. 558)

Teacher Efficacy in the Safe and Orderly Environment.

As research by Louis and Marks (1998) suggest, teachers working as teams set examples for students to model in their learning. Such collaboration can also be an effective mechanism by which school leadership can promote effective change in a school's structure. One such way is through school leadership teams. Marzano, Walters, and McNulty (2005) suggest that strong leadership teams can promote a collaborative from an individual to a team of individuals, a purposeful community is developed within the school. The researchers add that this purposeful community is "one with the collective efficacy and capability to develop and use assets to accomplish goals that matter to all community members through agreed upon processes. In simple terms, collective efficacy is the shared belief that "we can make a difference'" (p. 99).

Flecknoe (2005) concludes that moving toward this change in teacher behaviors can be a method of school improvement. However, she argues that before schools make organizational working environment. They note that as school leadership shifts changes, more "building the capacity that exposed teachers to such forces for change" is needed first (p. 440). Flecknoe insists that such changes must come from the desire of the teacher to improve. Ross and Gray (June 2006) argue that this transformational leadership style which encourages teachers to deepen their dedication to grow and elevate their goals results in a positive impact on collective efficacy and overall school improvement. Ross and Gray (2006) conclude that "the leadership-efficacy relationship matters because of the well-established connection between collective teacher efficacy and student achievement" (p. 192).

York-Barr, et. al.(2006) agree that reflective practices among collaborative teachers can build a higher sense of individual and collective efficacy. From their research on effective practice for continuous learning they suggest that as teachers see their actions making positive change, individual efficacy builds. York-Barr et. al. (2006) reveal that "as the internal capacities of teachers to learn and make a positive difference are recognized and harnessed, a collective sense of efficacy and empowerment emerges" (p. 14). Such empowerment results in school reform aimed at changing classroom pedagogy that focuses on student and teacher learning.

Goodard, Hoy, and Hoy (2004) analysis of the collective efficacy research revealed there is also a correlation between teacher efficacy and productive teaching practices. Their findings indicate that the "connection between collective efficacy beliefs and student outcomes depend in part on the reciprocal relationships among these collective efficacy beliefs, teachers' personal sense of efficacy, teachers' professional practice, and teachers' influence over instructionally relevant school decisions" (p. 3). Moreover, the authors note that teachers with high perceptions of self capability tend "to employ classroom strategies that are more organized and better planned, student centered, and humanistic" (p. 4). The results of these finding prove further the link between positive teacher efficacy and higher student achievement.

Research by Marks and Louis (1997) on teacher empowerment and school reform also links the connection of teacher empowerment to the affects of pedagogical quality and student academic performance. They conclude that "the school level analyses support the theory that faculty empowerment, especially in the intermediate domains of students' school experiences and teacher work life and overall global influence result in greater school-wide attention to instruction and student learning" (p. 259). Such analysis infers that a school's organization can influence instruction. Dembo and Gibson (1985) on teacher efficacy corroborates the findings of Marks and Louis. Their review of the research concluded by saying teachers with higher levels of self efficacy maintained higher academic standards for their students, had clearer expectations, and had a greater focus on their instruction. These collective efficacy beliefs, Goddard, Hoy, and Hoy (2004) explain, "in turn, foster commitment to school goals and gains in student achievement" (p. 10). As such, as school leaders seek to build a capacity for change, their primary focus should be on teacher efficacy as this element of the school improvement process has an impact on both student achievement and organization structure.

Students and the Safe and Orderly Environment.

Not only do teachers need a safe environment to grow professionally and be effective practitioners, students must also have a similar environment for learning. Cheng's (1994) quantitative cross-sectional survey of 678 sixth grade classrooms in 190 primary schools in Hong Kong suggested that a good classroom environment is highly correlated with student performance. As Cheng (1994) explained in his findings, effective classroom environments consist of teachers that "care for students, pay attention to teaching, do not use force or punishment, but do create a good classroom climate with their professional knowledge, personal morality, and personality" (p. 8). Further, Cheng's (1994) findings supported the notion that "teachers can shape the social and physical environment in the classroom and so improve student educational performance" (p. 8).

In addition, student engagement is a key ingredient to creating a classroom environment conducive to learning. As Finn and Voelkl (1993) suggested in their study of 6,488 eighth graders from 758 public schools, engagement is a key to improved learning outcomes. The researchers revealed that not only do the characteristics of the structural environment (school size, racial/ethnic population) play an important role in student engagement, but the regulatory environment (rigidity in school procedures) also contributes to student engagement. Such engagement is an essential antecedent to student outcomes (Finn & Voelkl, 1993).

Schlechty (2002), founder and CEO of the Center for Leadership in School Reform, agreed with the importance of student engagement. He emphasized that real improvements can only occur as authentic engagement increases. Schlechty (2002) emphasized that for students to be authentically engaged in a task, the assignment must have a clear meaning and immediate value to the student. Similarly, Reyes, Scribner, and Scribner's (1999) study of effective schools along the Texas border region supported the need for teachers to incorporate student interests in their teaching of the curriculum. Their findings show that a culturally responsive pedagogy is one of four major dimensions of a learning community used as an effective strategy to meet their students' needs. As Alicia Scribner (1999) notes in the introduction, "perhaps the most powerful finding pertaining directly to classroom learning was the incorporation of students' interests and experiences, the 'funds of knowledge' they bring with them into the learning situation, whether it is reading, writing, mathematics, or other subject areas" (p. 14). Such research confirms that teacher pedagogy centered on student interest can equate to higher academic outcomes.

Acquisition of Basic Skills

As stated earlier, Edmonds viewed the acquisition of basic skills as a necessary component needed to provide equitable educational opportunities for all students. Readers who have educational experience may deduce the term "basic skills" as meaning the proficiency needed by students to meet minimal mastery in a specific grade or subject. However, Edmonds defines such skills as those needed to enable a student to access successfully the next level of schooling.

In order for schools to be equitable, there needs to be a similar focus on the specific skills needed to make the next level of schooling accessible for all students. Scheurich and Skrla (2003) argued that implementation of these curriculum standards helps obtain equitable and excellent schools. They concluded, "the idea is to create a whole educational system in which all educators explicitly know specifically what they need to accomplish to be successful with all their students" (p. 31). Edmonds (1986) believes reliance on curriculum standards will ensure all students are acquiring the basic skills necessary for success. Edmonds stated that "teachers in effective schools …make it clear that they are working with a minimum academic prerequisite and that they expect everybody to achieve it. They may expect variability in pupil performance, but they do not expect any significant number of children of any race or social class will fail to demonstrate minimum mastery" (p. 99, cited in Scheurich & Skrla [2003], p. 31). Such standards, Scheurich and Skrla (2003) argued, have enabled effective schools to be highly successful with all students.

In Haycock, Craig, and Huang's (2001) review of the national data for high poverty schools, they described how clear and public standards serve as important tools for raising expectations for ineffective schools. These researchers noted such standards will serve as a "guide-for teachers, administrators, parents, and students themselves-to what knowledge and skills are critical for students to master" (p. 2).

However, standards alone are not the only factor that enables students to acquire basic skills. As Marzano (2003) suggested, a guaranteed and viable curriculum also has an impact on student achievement. Marzano (2003) explained, "schools must identify essential versus supplemental content and ensure that the essential content is sequenced appropriately and can be adequately addressed in the instructional time available" (p. 34). Lezotte's (1991) findings concurred those of Marzano (2003). Lezotte (1991) indicates one important characteristic of effective schools is their willingness to "declare that some things are more important than others; they are willing to abandon some less important content so as to be able to have enough time dedicated to those areas that are valued the most" (p. 4). Such focus allows for maximization of time spent on valued curriculum and meeting the specific needs of diverse learners.

Frequent Monitoring of Student Progress

In Edmonds' (1978, 1979, 1986) review of the effective schools research, he noted that all effective schools implemented some form of measurement of pupil progress towards instructional objectives, and this data was readily available to administrators, teachers, and staff that allowed them to be constantly aware of pupil progress on the instructional objectives. Wagstaff and Fusarelli's (1999) study of Texas border schools found monitoring of student test scores to be an effective approach to raising student achievement. The staff members used student data from the Texas Assessment of Academic Skills to provide feedback on student performance and to develop a specific plan of strategies to aid in student improvement. Furthermore, Scheurich and Skrla (2003) discussed the advantages of a school staff disaggregating student performance data through equity audits. They noted, "you analyze where the inequities are, devise interventions, implement these, evaluate the intervention results, and repeat the process if steady progress is not evident" (p. 95).

As Marzano (2003) suggested, student monitoring should be ongoing rather than relying solely on summative feedback. Marzano (2003) cited Black and William's (1998) review of the research on assessment. As stated by Marzano, Black and William concluded that formative, on-going assessment improves learning as noted through the gains in achievement. However, Marzano (2003) warned, "Unless a school employs assessments that are specific to the curriculum actually taught, it cannot accurately determine how well its students are learning" (p. 38). Therefore, administrators and teachers must assess those skills actually taught within the curriculum.

Schmoker and Wilson (1995) wrote that "if you can measure the impact of a process, or some aspect of it, you can improve it" (p. 62). These authors studied several schools across the country that applied W. Edwards Deming's Total Quality Management principles. Their findings suggested that schools using these principles to improve every aspect of their system to achieve better results led to significant increases in student achievement. As Schmoker and Wilson suggested, ordinary schools can expect the same results if they follow two principles: "regular collaboration on well-defined, measurable student performance goals and frequent monitoring of progress that enables teams to share concrete insights and adjust processes toward better results" (p. 63). As these authors indicated, the teamwork identified in the schools that were making significant progress remained focused and results-oriented.

Charlene Cobb's (2004) research indicated there has been a change in the approach to instruction in effective teachers and schools in her school district and other districts that she serves. She noted that "four strategies are consistently found in classrooms and schools that have a commitment to change and increased achievement for all students: differentiating, interacting, monitoring, and extended time for learning" (Cobb, 2004). As Cobb indicated, monitoring allows teachers and schools to maximize student learning. She explained that in effective schools formal and informal monitoring provides teachers and administrators with information that will enable them to modify and enhance instructional delivery and selection of instructional programs. The key, as Cobb wrote, is sharing this information with the students so they can take a more responsible role in their learning.

Lee and Gavine (2003) concurred that students should be a part of the monitoring process. Their quantitative study of 56 seven year olds in a large inner city primary school allowed them to assess whether goal-setting and self-evaluative practices brought about any educational improvements in their spelling and punctuation. Lee and Gavine's (2004) findings revealed "the project was successful in raising pupils' attainment on spelling and punctuation scores" (p. 56). As these researchers noted, the "spelling success rate was raised by 60-80% and for punctuation by 70-75%" (p. 57). These findings suggested that "consulting with pupils about their learning goals, strategies, and progress can have significant benefits" (p. 57). As such, not only does frequent monitoring of student achievement assist teachers and administrators in making informed instructional decisions, but involving the students in this process also encourages them to take a more responsible role in their learning as well, thereby, resulting in greater academic success.

Parent/Community Involvement

Throughout the current research on effective schools, several researchers have labeled school level factors with headings differing from those of Edmonds (Levine, 1990; Lezotte, 1991; Marzano, 2003; Scheerens & Bosker, 1997). For instance, Levine (1990) and Lezotte (1991) equated Edmond's emphasis of basic skills with a focus on central learning skills. Marzano (2003) called this correlate "opportunity to learn and time" (p.19). Despite the name differences, the main school level correlates identified as improving academic achievement in effective schools relate back to those defined by Edmonds. The one exception is parent and community involvement.

Much of the research cited in this review praises the efforts of effective schools in forging a collaborative relationship with parents (Lezotte, 1991; Marzano, 2003; Meier, 2002; Reyes et al., 1999; Scheurich & Skrla, 2003; Schlechty, 2002; Wagstaff & Fusarelli, 1999). In Edmonds' (1979) review of the Brookover and Lezotte (1979) study, he indicated there was no clear difference in the level of parent involvement between the improving and declining schools. However, Edmonds (1979) did cite one difference in these schools: the level of parent-initiated involvement was greater in the improving schools.

Lezotte (1991) emphasized that in effective schools parents understand and support the mission and vision of the school. Likewise, parents are welcomed to play important roles to ensure the school achieves its goals. However, Lezotte (1991) pointed out from his literature review that effective schools can adequately meet the needs of students without extraordinary efforts from parents. Although he admits, parent support facilitates the school's success. Lezotte (1991) indicated an authentic relationship between the parents and the schools must exist in the future. Finally, Lezotte explained that in order to create a successful relationship, both schools and parents must trust and communicate, "[they] have the same goal-an effective school and home for all children" (p. 4).

Similarly, Scheurich and Skrla (2003) argued that schools must forge a deep collaboration with parents and the community. In order to foster such collaboration, schools need to shed the stereotypical view of partnerships as schools taking the primary role in the educational process while the parents provide the secondary support. As these researchers suggested, collaboration in effective schools includes the parents and community members getting involved in all aspects of schooling, “from teaching and curriculum to discipline and organizational structure” (p. 120).

Comer and Haynes’ (1991) findings concurred with Scheurich and Skrla’s (2003) assessment of parent and school relationships. They asserted that effective schools have successful parent involvement programs because they are part of the overall school improvement process. Their study of two elementary schools in New Haven, Connecticut, each with poor school climate, demonstrated how an effective parent program could play an integral part in increasing student achievement. The researchers clearly stated that an effective parent program changes the overall ecology in these schools. For instance, the researchers explained the parent program in their study was designed “to enable the parents and staffs to work together to aid the social development of students and to motivate them to achieve well both socially and academically” (p. 272). Their observations from their study supported the findings that parent programs work best not only when based on child development concerns, but also when parents are involved in the overall school improvement process. If well constructed and implemented, the researchers add, “parent programs… [can] provide the linkage between home, community, and school that is essential to the healthy growth and development of children” (p. 277).

Griffith’s (1996) quantitative study supported Comer and Haynes’ findings that parent programs work best when parents are a part of the overall school improvement process. Griffith surveyed parents in 42 elementary schools representing a large suburban school district to assess the relationship between their perception of parent involvement and empowerment and student academic performance. The findings from Griffith’s survey indicated “schools having higher levels of parental involvement and empowerment also had higher student CRT scores” (p. 38).

Stephen Sheldon (2003) studied how the relationship between the quality of school, family, and community relationship can affect student performance on Maryland’s state achievement test. The quantitative findings from the 82 elementary schools reveal “an important link between schools’ efforts to meet challenges to improve family and community involvement and higher levels of student performance on state achievement tests” (p. 160). As he explained, the analysis of the data asserts that such collaboration is even more important with younger students. Sheldon’s findings concluded, “schools’ efforts to involve parents are more strongly related to student achievement in the lower elementary grades” (p. 161). As such, this study provides evidence that school programs designed to involve parents in schools could be a useful reform strategy to assist in raising student achievement.

Similarly, William Jeynes’ (2003) meta-analysis of 21 studies revealed parent involvement also has a greater impact on academic achievement among minority students. In his study, Jeynes identified the specifics components of parent involvement. Jeynes writes:

> These specific components include the extent to which parents communicated with their children about school, whether parents checked their children’s homework, parental expectations for the academic success of their children, whether parents encouraged their children to do outside reading, whether parents attended or participated in school functions, the extent to which there were household rules regarding school and/or leisure activities, parenting styles and warmth, and other specific measures of parental involvement. (p. 206)

Several patterns emerged from Jeynes' analysis of nearly 12,000 subjects. First, the effect of parent involvement was consistent across all races. As Jeynes explains, “the effect sizes for parent involvement were more than four tenths of a standard deviation for studies that had either most or all African American participants” (p. 213). The same held true for Asian Americans and Latinos as well. As Jeynes reports, “although the effects of parental involvement were apparent for all the racial groups under the study, it is also clear that the effects of parental involvement were greater for some groups more than for others” (p. 214). As Jeynes explained, African American students benefited from all types of parent involvement. This parent involvement included parent involvement in various grade levels, teacher rating of parental support, student tests, and effect on student academic behaviors and attitudes. Interestingly, Latino Americans students benefited more from parent involvement than did Asian Americans.

Comer and Haynes (1991) concluded parent involvement will become an increasingly important component in raising student achievement. As suggested in their study, parent involvement is now “widely accepted as desirable and even essential to effective schooling” (p. 272). The role for schools is to define the type of parent involvement needed to meet the needs of all students. As Jeynes (2003) suggested, “further research is needed to examine why it is that particular kinds of parental involvement are especially beneficial for certain racial groups” (p. 215). The more social scientists know about the impact parent involvement has on student achievement, the more schools and parents can benefit (Jeynes, 2003).

Summary of the Literature Review

This literature review covers the effective schools movement and the correlates of effective schools that arose from the research. The major conclusions of this literature review are that schools do matter, school effects are evident in student achievement, and the five correlates of effective schools identified by Edmonds (1979) and others have remained remarkably consistent over time.

As a result of the punitive consequences of the No Child Left Behind legislation, school administrators whose schools are failing to meet the standards of this law are looking for systematic reform strategies to incorporate in their school improvement plans. The strategies included in these plans should be high yielding and research-based. According to the research on effective schools presented in this literature review, these plans should include the effective school correlates.

The research presented also notes that implementing new academic programs requires a substantial amount of planning and collaboration among the school's students, parents, and faculty. However, the accountability research does not suggest for a systematic overhaul of a school to include all six effective school correlates identified in this review. Rather, the best success in improving academic achievement has occurred when these stakeholders only focused on two or three high-yield strategies (Lezotte, 1991). The research does conclude that principal leadership and the views of change among staff members play an important role in school improvement success (e.g., Edmonds, 1979). As such, the purpose of this study is to assess the beliefs of teachers about which effective school correlates they feel have the greatest impact on improving student achievement. The research questions to be explored along with the researcher’s hypotheses will be discussed in the next chapter describing the study design.

CHAPTER 3

METHODOLOGY

Introduction

Meeting the academic needs of all students has become paramount since the enactment of No Child Left Behind legislation. Schools that fail to meet this legislation's benchmark standards continuously search for systematic changes to meet this complex challenge. Over the last three decades, the effective schools research clearly identifies six distinct school-level factors that have a direct impact on student achievement: strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, pupil acquisition of basic skills, frequently monitoring of student progress, and parent and community involvement. The purpose of this study is to assess the beliefs of teachers about which effective school correlates they feel have the greatest impact on improving student achievement. This chapter describes the research procedures utilized for this study. A description of the research design, sample, survey instrument, data collection, and data analysis are included.

Research Questions

As shown in Table 3.1, this study proposes several hypotheses to answer three research questions related to teachers' perceptions of the importance of correlates.

Table 3.1

Hypotheses

Research Questions	Hypotheses
RQ1: Which effective schools correlates do teachers perceive as most important to improving student achievement?	Hypothesis 1: The ranking of the means of each effective schools correlate as perceived by teachers to have an impact on student achievement will correspond to the ranking as identified by Marzano's (2003) comparison of school-level factors across researchers.
RQ2: What teacher characteristics will be related to how teachers perceive the importance of the effective schools correlates?	Hypothesis 2a: Teachers in schools with a low percentage of economically disadvantaged students will perceive safe and orderly schools to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.
	Hypothesis 2b: Teachers in schools with a low percentage of economically disadvantaged students will perceive parental involvement to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.
	Hypothesis 2c: Teachers who have more than 5 years of teaching experience will perceive that a strong emphasis on academics are less important to improving student achievement than teachers who have less than 5 years of teaching experience.
	Hypothesis 2d: Teachers who have more than 5 years of teaching experience will perceive that high expectations for student achievement are less important to improving student achievement than teachers who have less than 5 years of teaching experience.

Table 3.1 Continued

RQ3: What school characteristics will be related to how teachers perceive the importance of the effective schools correlates?	Hypothesis 3a: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectations for student achievement on student achievement than their middle school counterparts. Hypothesis 3b: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectation on student achievement than their high school counterparts. Hypothesis 3c: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of strong emphasis on student achievement than their middle school counterparts.

Research Question 1. A number of school reform studies have found that schools account for more variance in student achievement than credited in early studies on school improvement reform. Over the last thirty-five years effective schools research supports Edmonds' findings and maintains that these school-level factors are evident in schools that successfully meet the needs of all of their students. Researchers have even gone as far as ranking these correlates by their importance (Marzano, 2003; Scheerens & Bosker, 1997). As Marzano (2003) indicates, the Scheerens and Bosker's "ranking was the first of its kind and significantly increased our understanding of the school-level factors associated with enhanced academic achievement" (p. 17). The meta-analysis by Marzano (2003) has compared all school-level correlates across researchers and have ranked them by order of impact on student achievement. The ranking of the correlates are identified in Table 3.2. The meta-analysis of the research would suggest that the ranking of the impact of school-level factors would be consistent from school to school. However, Marzano (2003) concluded if the correlates have a "nonlinear relationship with achievement, it could mean that it is highly important to achievement up to a point where the relationship tapers off" (p. 20). As such, school leaders should not view the factors that fall at the bottom of the ranking as not critical in raising student achievement. Rather, it should be noted that the correlates only affects student achievement to a certain point. The first research question of this study involves understanding teachers' perceptions of the importance of these correlates.

Table 3.2

Ranking of Effective School Correlates by Order of Impact on Student Achievement.

The School-Level Factors	Rank
Guaranteed and Viable Curriculum (Emphasis on Basis Skills)	1
Challenging Goals and Effective Feedback (High Expectations and Frequent Monitoring of Student Progress)	2
Parental and Community Involvement	3
Safe and Orderly Environment	4
Collegiality and Professionalism (Strong Administrative Leadership)	5

Hypothesis 2a. Edmonds (1979) insisted that a safe and orderly school environment also includes an environment that is conducive to meeting student needs as well. As Finn and Voelkl (1993) suggest, characteristics of the structural environment (school size, racial/ethnic population) play an important role in student engagement, but the regulatory

environment (rigidity in school procedures) also contributes to student engagement. Such engagement is an essential antecedent to student outcomes (Finn & Voelkl, 1993). In addition to the rules and regulations of the school, Connors (2000) also indicates that a safe and orderly school environment must include both teachers and students being intellectually safe (respected for the gifts they possess), emotionally safe (feeling of belonging and emphasis on positive relationships), and socially safe (providing socialization experiences for both students and teachers). Other researchers (Meier, 2002; Scheurich & Skrla, 2003; Wagstaff & Fusarelli, 1999) support the notion of positive working relationships. They conclude the presence of collaborative working relationships among staffs in effective schools also results in higher student achievement.

Hypothesis 2a: Teachers in schools with a low percentage of economically disadvantaged students will perceive safe and orderly schools to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.

Hypothesis 2b: The literature review has noted the efforts of effective schools in forging a collaborative relationship with parents (Lezotte, 1991; Marzano, 2003; Meier, 2002; Reyes et al., 1999; Scheurich & Skrla, 2003; Schlechty, 2002; Wagstaff & Fusarelli, 1999). Lezotte (1991) emphasized that in effective schools parents understand and support the mission and vision of the school. Likewise, parents are welcomed to play important roles to ensure the school achieves its goals. While Lezotte (1991) admits that parental support facilitates school success, he is also notes from his literature review that effective schools can adequately meet the needs of students without extraordinary efforts from parents.

Scheurich and Skrla (2003) argued that schools must forge a deep collaboration with parents and the community by shedding the stereotypical view of partnerships as schools taking the primary role in the educational process while the parents provide the secondary support. These researchers found that effective schools successfully collaborated with parents and community members getting involved in all aspects of schooling, “from teaching and curriculum to discipline and organizational structure” (p. 120).

Such collaboration has equated to higher test scores on achievement testing. Stephen Sheldon (2003) studied how the relationship between the quality of school, family, and community relationship can affect student performance on Maryland’s state achievement test. The quantitative findings from the 82 elementary schools Sheldon reviewed reveal “an important link between schools’ efforts to meet challenges to improve family and community involvement and higher levels of student performance on state achievement tests” (p. 160).

In effective schools, not only can parent involvement raise student achievement scores, it also beneficial for all races. Jeynes’ analysis of nearly 12,000 subjects revealed several patterns. For instance, the effect of parent involvement was consistent across all races. As Jeynes explains, “the effect sizes for parent involvement were more than four tenths of a standard deviation for studies that had either most or all African American participants” (p. 213). The same held true for Asian Americans and Latinos as well. As Jeynes reports, “although the effects of parental involvement were apparent for all the racial groups under the study, it is also clear that the effects of parental involvement were greater for some groups more than for others” (p. 214). As Jeynes explained, African American students benefited from all types of parent involvement. This parent involvement included parent involvement in various grade levels, teacher rating of parental support, student tests, and effect on student academic behaviors and attitudes.

Hypothesis 2b: Teachers in schools with a low percentage of economically disadvantaged students will perceive parental involvement in schools to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.

Hypothesis 2c-d. In a collaborative school improvement model, teachers' willingness to implement new pedagogy to improve student achievement is crucial. Ghaith and Yaghi (1997) note in their study that certain variables were identified with teachers' willingness to implement new strategies. They write "variables include teachers' perceptions of the importance and difficulty of implementing innovations and teachers' experience and sense of efficacy" (Ghaith & Yaghi, 1997, p. 451). As such it becomes important to note what influences teachers' attitudes toward new instructional practices.

Brousseau et al.'s (1998) findings of the experimental changes in teachers' beliefs reveal that "experience of working in and being responsible for one's own classroom has a measurable impact on the individual beliefs" (p. 38). They conclude that the more experience a teacher has in the classroom the more likely they are to believe that schools should act as change agents. However, research by Monk (1994), Wolters and Daugherty (2007) and Gahaith and Yaghi (1997) suggests otherwise. Monk concluded that teacher preparation data (which includes experience) provides limited information to those seeking useful information on improving pupil performance. Wolters and Daugherty (2007) further indicate that "development and maturity as a teacher do not appear to include a movement toward instructional practices, policies, or procedures associated with fostering what many consider a more adaptive motivational climate in the classroom" (p. 189). Ghaith and Yaghi (1997) expand upon these findings. They too suggest teacher experience is not correlated with implementation of new programs. Their findings conclude that "teachers' experience was negatively correlated with their sense of general teaching efficacy and to their ratings of the importance of implementing instructional innovation" (p. 454).

Similar studies reveal that teacher experience does not necessarily translate into improved student achievement. Croninger et al.'s (2007) findings from their study of teacher qualifications and early learning indicate that "students taught by veteran teachers with more than five or more years of experience…have no advantage over students taught by teachers with more than two but less than five years of experience" (p. 320). As such, data from the literature suggests that teaching experience may not necessarily correlate with higher student achievement or self-efficacy toward their teaching.

Hypothesis 2c-d: Teachers with more than 5 years of teaching experience will perceive that a strong emphasis on academics and high expectations for student achievement are less important to improving student achievement than teachers who have less than 5 years of teaching experience.

Hypotheses 3a-d. The effective schools correlates discussed in the literature review relate primarily to school level factors. Marzano (2003) indicated that looking at the school-level factors alone as "having a unitary and consistent impact on student achievement" maybe interpreting the literature too broadly (p. 71). Good and Brophy (1986) suggest that these "studies of large samples of schools yield important profiles of more and less successful schools, but these are group averages that may or may not describe how a single effective teacher actually behaves in a particular effective school" (p. 588). Marzano calculated that "schooling accounts for 20 percent of the variance in student achievement. However, in [his] synthesis of the research, [he] also found that about 67 percent of this effect is due to the effect of individual teachers" (pp. 73-74). Teacher level factors affecting student achievement include instructional strategies, classroom management, and classroom curriculum design.

As students move from the elementary setting to the secondary level, issues of student motivation tend to become a variable that affects student achievement. Anderman and Maehr (Anderman & Maehr, Summer 1994) acknowledge that motivation becomes a problem at the middle grades level. They suggest that "while important at all ages and stages, issues of motivation have a degree of uniqueness and certainly a special sense of urgency about them during the middle grades" (p. 287). The variables noted by Anderman and Maehr that affect student motivation include student achievement that establish career paths and consequences and authority over behavior choices. As such, they conclude that "the literature supports the view of decreased investment in academic activities and increased investment in nonacademic activities during the middle school years" (p. 228). As a result, many researchers note that expectancies for academic success are higher in the elementary school setting than the secondary school (Marsh, 1989; Nicholls, 1979; Stipek, 1984).

The developmental changes occurring during the adolescent years can be attributed to school structure changes in the transition from elementary to secondary schools (Anderman & Maehr, 1994). Consequently, Anderman and Maehr note, "a number of motivational researchers suggest that differences in the instructional practices and educational policies between elementary and middle schools often are inappropriate for maintaining the motivation and investment of students after the transition' (p. 289). Midgley, Anderman, and Hicks' (1995) study on student motivation and the goal theory perspective revealed that "middle school teachers feel significantly less efficacious than elementary teachers do" (p. 106). As noted by the authors, this is important because "teacher efficacy has been linked to students' self-perceptions, student achievement, and successful implementation of curriculum motivations" (Midgley et al., 1995).

Marzano's (2003) review of the research reveals that student motivation is linked to the drives of success and fear of failure. Understanding these tendencies, Marzano indicates this could adversely affect instructional practices of teachers. He notes that "students who are failure avoidant are not motivated to engage in new tasks because failure incurs negative affect. This makes classroom motivation quite difficult, particularly where the teacher is trying to establish high standards" (p. 145). The issues with student motivation at the secondary level could lead teachers to not hold students to same standards as their elementary counterparts.

Hypothesis 3a-b: Teachers in the elementary school setting will perceive the correlates of high expectations for student achievement and strong emphasis on student achievement as more important than their middle and high school counterparts.

Research Design

This quasi-experimental study examines how effective schools correlates are perceived by teachers. This study is non-experimental because the researcher "has no experimental control over the subjects" values on the factors that can influence the variable of interest in the study (Agresti & Finlay, 1997). As noted in the literature review, the research is clear in identifying similar characteristics of effective schools. Likewise, the research notes that school leaders should account for stakeholder input when making changes in the school improvement process. Another goal of this study is to measure the association of the correlates to identify which correlates have the greatest relationship on student achievement as viewed by teachers.

The observational data collected from the surveys will allow the researcher to aggregate the distribution of responses for each correlate. Upon collection of this data, the researcher will then compare aggregate scores for each correlate and note the relationships found in the data analysis.

Population and Sample

The sample for this study composed of 2,984 teachers from a rural school district. The researcher selected this school district for this study because of researcher accessibility and because there was sufficient variance in the characteristics of interest to test the hypotheses.

Centrally located within a mid-Atlantic state, the study's school district has experienced significant growth within the last several years. Termed a rural county by the United States Census Bureau, the school district has grown primarily because of its proximity to the capital city and its major highways. While the state's population has increased an estimated 20% over the past ten years, the study's school district has grown by approximately 50%, making it one of the fastest-growing counties in the state. Because of this growth, the school district has added 16 new schools and over 12,000 students in the past ten years. Another attractive characteristic for selecting this district is its focus on student accountability. The sample district has been a leader in its state for promoting progressive accountability model and its improvement on the End-of-Year state assessments. Furthermore, each of the schools in the district, with the exception of one, has been successful in at least one of the past two years in meeting their adequately yearly progress as defined by the federal No Child Left Behind Act.

Site-based decision-making was another characteristic that led to the researcher choosing this district for the research population. Not only are the academic accomplishments similar for each school, but the county leadership also promotes site-based decision making in the school improvement process. Each school has an active school improvement team that meets regularly to evaluate the progress the school is making on its improvement plan. Each school is also responsible for reporting its findings to the board of education and community stakeholders at the end of each academic year.

Curriculum alignment in the study's research population also makes this a good choice for the research. All elementary, middle, and high schools require the teaching of the state's standard course of study. Similarly, the students in grades 3-8 are required to take the state's end of grade tests for reading and math, students in grades 5 and 8 are required to take the state's end of grade test for science, and all high school students are required to take the state's end of course exams when applicable. The district has also developed pacing guides and extended curriculums for all academic areas that all schools follow in delivering the curriculum to their students.

Although there are similarities in the school district, the differences in student populations between the western part of the county and its eastern counterpart make this an attractive site for the study's population as well. Such diversity creates major shifts in challenges for each school and the school district. Many schools along the eastern corridor of the county have free and reduced price lunch percentages above >40%, whereas schools in the western portion of the county have percentages below <40%. Not only are their differences in the percentages of free and reduced price lunch, but there are also differences in student race and demographics. The western portion of the county has a growing white-collar population, whereas the eastern portion of the county is maintaining its blue-collar class while meeting the needs of a growing Hispanic population.

Teachers from each school in the sample's district had an opportunity to respond to the survey. The survey was made accessible through the school system's email delivery system, thereby allowing each teacher to have equal access to the on-line survey. Once the participants responded to the survey, the researcher merged the data collected from the on-line survey with the Statistical Package for Social Sciences (SPSS) to run an appropriate data analysis.

Survey Instrument/Implementation

The *Effective Schools Survey* (Hawaii Department of Education, 1996) was used to ascertain the degree to which teachers believed each effective school correlate was important to their school's improvement process (see Appendix A). The researcher chose the *Effective Schools Survey* as the survey instrument because of its direct correlation with the effective schools correlates identified in the literature review. Additionally, the survey has a high level of reliability (Heck, 2000).

The survey instrument consisted of 59 items measuring the six effective school correlates. Each effective school correlate was identified through a heading and questions relating to the correlate were identified and placed under each heading. Using the Likert scale, 1= strongly disagree, 2 = disagree, 3 = undecided, 4 = agree, 5 = strongly agree, the participants were asked to rate the extent to which they agreed that the item promoted student achievement. In addition to the 59 questions relating to the effective school correlates, there were also six demographic questions related to participants' gender, ethnicity, years of teaching experience, years of teaching experience in their current school, school level, and the economic status of their school.

The researcher initially met with the district's principals to explain the purpose of the study and to request that their staff participate in the study. As part of this meeting, the principals received a copy of the survey; a participant's letter indicating the purpose of the study, how the researcher will use the data, and dates for which the respondents can view and complete the survey. It was important for the researcher to hold the initial meeting to assure the district's principals and participants their responses were confidential. They were told that a web link collector from survey site would be used to allow each respondent to have a unique link and to limit their response to only one login with the inability to transfer the web link to another user. They were also informed that a security feature setting would be utilized so that even the researcher could not link any response to a specific email link.

Mail versus Electronic Surveys

There has been a lot of debate about the effectiveness of on-line surveys. However, as the proportion of people with Internet and e-mail capabilities rise, electronic mail and the Internet can provide a productive medium to conduct surveys (Schaefer & Dillman, 1998). Shannon and Bradshaw (2002) note in their survey sample of southeastern United States faculty that researchers (Bachmann, Elfrink, & Vazzana, 2000; Kiesler & Sproull, 1986; Mavis & Brocato, 1998; Mehta & Sivadas, 1995; Schaefer & Dillman, 1998; Sheehan & Hoy, 1999) are documenting the beneficial aspects of electronic surveys in terms of cost and speed. Shannon and Bradshaw (2002) explain "electronic surveys require time and some technological skill, but not postage" (p. 189).

Shannon et al.'s (2002) study of the perceptions and recommendations of 62 experienced survey researchers from the American Educational Research Association confirm the findings of Shannon and Bradshaw (2002). Their results substantiate there is a reduction in cost in using electronic surveys. Their data indicates that 96.7% of these professionals agree that there is a reduction of phone and postage cost in using electronic surveys. Additionally, over 80% of respondents from the Shannon et al.'s (2002) study also agreed that the electronic surveys would be returned more rapidly than the traditional paper and pencil surveys. These same respondents also agreed that the electronic surveys would reduce the time and labor to prepare the data for analysis.

Andrews, Nonnecke, and Preece (2003) indicate that electronic surveys are becoming increasingly common and the results from these surveys can be the same "as postal survey content results, with the advantages of speedy distribution and response cycles" (p. 186).

Specifically, these authors observe that "web-based surveys allow [for] automatic verification and survey response capture in databases" (p. 186).

Schaefer and Dillman (1998) note that for "e-mail methodology to become feasible, it is necessary to demonstrate that the quality of the data is equivalent to that of other survey methods" (p. 381). One shortcoming of electronic surveys is the sample. Kiesler and Sproull (1986) found that the "sampling frame of the electronic survey is restricted to members of organizations and populations who have access to computers and to people who feel comfortable using them" (p. 403). For this reason, researchers from the American Educational Research Association suggest an appropriate sample for electronic surveys include professional memberships, alumni groups, listservs, "in house" employees, or university professors (D. Shannon et al., 2002).

Shannon and Bradshaw (2002) report that most researchers (Bachmann et al., 2000; Couper, Blair, & Triplett, 1997; Mavis & Brocato, 1998) have found response rates to be low for electronic surveys. Schaefer and Dillman (1998) indicate that a low response rate is due primarily to the lack of identifiable research methods to achieve consistently high response rates similar to traditional mail. To increase electronic survey response rates, a mixed mode (paper and electronic) methodology is an option for researchers.

Andrews, Nonnecke, and Preece (2003) indicate that response rates for e-mail surveys are higher when "a short, prenotification invitation e-mail introduces the coming e-mail survey and provides 'opt-in' or 'opt-out' options to participate… To increase response rates to 70%, more sophisticated approaches integrate online and offline invitations and reminders beginning with an invitation postal letter, then a paper survey and an e-mail survey with a Web-based version URL option, followed with reminder postcards" (p. 192).

Schaefer and Dillman (1998) agree that a mixed mode methodology is necessary when a sample contains members who may not have access to e-mail or the web-based survey. In their findings from a survey of 904 permanent faculty at Washington State University, they reveal, "e-mail surveys with a mix-mode component to reduce coverage error represent an important addition to the arsenal of survey techniques" (p. 393). However, their findings showed no significant difference in the response rates between e-mail and standard mail methodology. Further, their data suggest the "e-mail prenotice was much more effective in increasing response to an upcoming e-mail questionnaire than the regular mail prenotice" (p. 388).

Schaefer and Dillman's (1998) study also found completions rates to be higher among their e-mail participants. Of the participants who responded by e-mail, 69.4% completed 95% of the survey compared to only 56.6% of the paper version. Schaefer and Dillman (1998) also noted in their findings that the e-mail version of the survey had higher completion rates and longer responses to open-ended questions. Kiesler and Sproull (1996) had similar findings to their surveys. The researchers reported fewer item completion mistakes from the electronic survey than from the paper survey. The electronic survey respondents left fewer items blank as well.

The findings from these studies show that in order for a researcher to maximize the benefits from electronic surveys, it is important to utilize sound principles of survey design. In doing so, it is important to know the limitations of your sample and provide all of these potential respondents with the same access to the survey. One way to accomplish this is through a mixed mode methodology. In doing so, Schaefer and Dillman (1998) suggest that "data can be collected from important survey populations at lower costs with no reductions in response rates and improved data quality, compared to traditional mail surveys" (p. 393). To this end, this study used an electronic survey available online because all potential participants have access to the survey and it can be accessed via their in house emails.

Reliability and Validity of the Survey

Reliability and validity are the psychometric characteristics of a research instrument that measure its consistency and interpretable value. Punch (1998) indicates there are two types of aspects of consistency: "consistency over time (or stability) and internal consistency" (pp. 98-99). The consistency over time suggests that if the research instrument were given to the same people, under the same conditions, but at a different time, to what extent would they get the same result is referred to as reliability. Punch (1998) indicates the internal consistency of a measuring instrument refers to "the extent to which the items are consistent with each other, or all working in the same direction" (p. 99).

To measure an instrument's internal consistency and stability, Punch (1998) suggests these measures be assessed using Cronbach's alpha coefficient. This technique was used by Heck (2000) in his assessment of the psychometric properties of the *Effective Schools Survey* that will be used in this study. Heck (2000) reported the alpha coefficients ranged from .73 to .94, "suggesting the reliability of measurement was relatively strong within each group of respondents…[noting] that the reliability of measurement was greater for the set of staff indicators [>.90]" (p. 529).

Heck (2000) also found the correlations between the groups on each indicator to be substantial as well. "These correlations ranged from .5 to greater than .8 (mean correlation = .6, *SD* = .10)" (p. 529). Such strength in the correlations led Heck to aggregate the data across groups to "produce one composite school mean for each [effective school] indicator" (p. 529). According to this data, all composite school indicators were reliable.

Heck (2000) also used principal components analysis to achieve a school-level factor score. As Heck (2000) explains, each "indicator represents a weighted composite that accounts for the maximum variability observed in the correlations among the three role groups" (p. 529). As a result, Heck (2000) indicated, "larger coefficients indicate stronger perceptions about the quality of school conditions and processes" (p. 529).

To insure further validity of the *Effective Schools Survey* for this study, an item analysis was conducted on the 59 survey items. Cronbach's alpha measure was used to note how closely related each item were as a group. Santos (April, 1999) explains that "alpha coefficient ranges in value from 0 to 1 and may be used to describe the reliability of factors extracted from dichotomous and/or multi-point formatted questionnaires or scales" (p. 2). Santos notes the higher the score, "the more reliable the generated scale is" (p. 2). Nunnaly (1978) indicates that 0.7 on this scale to be an acceptable reliability coefficient. Table 3.3 reveals the item analysis of the effective school correlates and the overall *Effective Schools Survey*. The item analysis reported the coefficient alpha for the *Effective Schools Survey* scale as 0.98. When reviewing the item analysis for each correlate, there was not a coefficient alpha reported lower than 0.91. As such, the *Effective Schools Survey* was deemed reliable for this study.

Table 3.3

Reliability Statistics for Effective Schools Survey

Correlate	Cronbach's Alpha	Cronbach's Alpha based on Standardized Items	N of Items
Strong Administrative Leadership	0.95*	0.95*	10
High Expectations	0.91*	0.91*	10
Safe and Orderly School	0.92*	0.93*	10
Emphasis on Learning	0.92*	0.92*	10
Frequently Monitoring Student Progress	0.91*	0.92*	9
Parent and Community Involvement	0.93*	0.94*	10
Total	0.98*	0.98*	59

Note. * = Cronbach's $\alpha > 0.7$

Data Collection

A mixed mode methodology of email and paper was employed to recruit individuals for this survey. The researcher met with the principals of the local education agency to give them the participant's letter (Appendix B, page 125), identify the personnel qualifying for the study in their building, and answer any questions about the study. Once the principals received this information, the principals were asked to offer to their certified staff access to the participant's letter and to encourage completion of the survey at their next staff meeting. Using the web link collector from surveymonkey.com, a unique link for each respondent was created to limit their response to only one login with the inability to transfer the web link to another user. A security setting was also activated within the web link collector so that no response could be linked back to any respondents' unique link.

An initial email to each qualified participant's included the participant's letter, the URL link to participate in the survey, and the URL link to opt out of the survey. The instructions for the web-based survey appeared once the participant logged onto the site. An instruction line at the bottom of the initial screen was included to assure the participant of the confidentiality and their consent for the researcher's use of the data collected from their responses. The lines read:

> "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. My submission of the survey will be my signature indicating that I agree for my responses to be included in the study."

After contacting the principals, the researcher made an initial participant contact to all certified teachers via e-mail to thank, encourage, and inform them again about their choice to participate in the study (Appendix C, page 126). This email encouraged the participants to participate in the survey but also encouraged them to ask the researcher any questions about the survey. Additionally, the contact also asked the participants to inquire if they have problems with their web links how to contact the researcher. Likewise, the initial contact instructed the participants that the URL was available from their home or school computer through a web browser, but once logged in, they must finish the survey before logging out. Once they log out, the participant was advised that they could not enter the URL site again.

In addition, the participants were made aware that the survey would not time itself out. As such, participants were encouraged to complete the survey in one sitting and from their homes.

Reminder contacts were sent by the researcher to each qualifying participant who had not completed the survey after the initial week the survey was posted. Reminder emails were sent after the third and sixth weeks to encourage as many eligible participants to respond as possible. The researcher also offered to each school principal a time to visit each school in the study's district to discuss the option of a paper survey. At this meeting, questions would be made available, along with, scan able bubble response sheets. Those wishing to take the paper version of the survey would have been given a pre-addressed courier envelope to be used to return the survey and completed scan able bubble sheet to the researcher by courier mail. However, no principal requested the researcher on-site visit option.

Variables of the Study

The survey asked teachers to state their level of agreement concerning the extent to which each item was important to student achievement. Participates were asked to rate their answers on a Likert-type rating scale (1 = strongly disagree, 2 = disagree, 3 = undecided, 4 = agree, 5 = strongly agree). The participants of the survey were also asked to identify the school level which they teach. The school level included elementary (Kindergarten through 5^{th} grade), middle (5^{th} grade through 8^{th} grade), and high school (9^{th} through 12^{th} grade). Participants were also be asked to identify the number of years they have taught at their particular school (i.e., 0-5, 6-10, 11-15, or $\geq$ 16) and the total number of years they have taught (less than five years and more than five years). In addition to rating the teaching experience of their school, the participants in the study were also asked to categorize socio-economic status of their school as either less than 40% of your students receiving free and reduced lunch or if more than 40% of their students received free or reduced lunch. The participants were able to respond to this question because of teachers have knowledge about whether their school was identified as Title I or not. In this school district, schools that receive federal funding through the Title I grant application are those schools that have more than 40% of their students receiving free or reduced lunch.

Data Analysis

The researcher used the Statistical Package for the Social Sciences (SPSS) for the analysis of each research question and hypothesis.

RQ1and Hypothesis 1: The mean and standard deviation of each effective school correlate was computed. The means showed teachers ranking of the relative importance of each correlate. Standard deviations indicated the degree to which participant responses were similar. The ranking of the means were compared to Marzano's (2003) findings.

RQ2 and Hypothesis 2a: An independent t-test was conducted to evaluate the hypothesis that schools with greater than 40% free or reduced lunch students perceive safe and orderly schools to be as more important than schools with less than 40% of students receiving free or reduced lunch.

RQ2 and Hypothesis 2b: An independent t-test was conducted to evaluate the hypothesis that schools with greater than 40% free or reduced lunch students will perceive community involvement to be more important than schools with less than 40% of students receiving free or reduced lunch.

RQ2 and Hypothesis 2c: An independent t-test was conducted to evaluate the hypothesis that teachers who have more than five or more years of teaching experience will perceive that a strong emphasis on academics is less important to improving student achievement than teachers who have less than five years of experience.

RQ2 and Hypothesis 2d: An independent t-test was conducted to evaluate the hypothesis that teachers who have more than five or more years of teaching experience will perceive that high expectations for student achievement are less important to improving student achievement than teachers who have less than five years of experience.

RQ3 and Hypothesis 3a-b: An independent t-test was conducted to evaluate the hypothesis that teachers in the elementary school setting will perceive the correlates of high expectations for student achievement and strong emphasis on student achievement as more important than their high school counterparts.

RQ3 and Hypothesis 3c-d: :An independent t-test was conducted to evaluate the hypothesis that teachers in the elementary school setting will perceive the correlates of high expectations for student achievement and strong emphasis on student achievement as more important than their middle school counterparts.

Limitations of the Study

This study includes faculty surveys from a rural North Carolina county, thus limiting the generalizations from the study's findings. As such, the findings from this study may not be effective for school leaders in urban schools. In addition, the staff members of these schools have been transient as the school system selected is one of the fastest growing systems in the state. As such, some members of the schools' staff may have greater knowledge of the schools' history than others. Finally, much of the analysis from this research design rests on the assumption that what is reported in the correlates survey by the participants is actually what is happening at the study schools.

Summary of Methodology

This chapter described the research procedures utilized for this study. A description of the research design, sample, survey description and implementation, data collection, and data analysis were included. In addition, the advantages and disadvantages of electronic surveys were described. The following chapters will present the findings and conclusions from the study along with a discussion of recommendations for school leaders and reflections on lesson learned from the study.

CHAPTER 4

RESULTS

Introduction

The purpose of this study was to assess teachers' beliefs about which effective schools correlates they perceive as having the greatest influence on improving student achievement. A review of the research identified five correlates in effective schools: strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, pupil acquisition of basic skills, and frequently monitoring of student progress. Several variables were identified as potential variables that affect the strength or direction of teachers' perceptions of the effectiveness of the correlates. These moderating variables included the socio-economic status of schools, the teaching experience of teachers, and the teachers' grade span of employment.

The survey instrument consisted of 59 item questionnaire about the correlates. The participants were asked to specify their level of agreement using the following Likert scale, 1= strongly disagree, 2 = disagree, 3 = undecided, 4 = agree, 5 = strongly agree, to statements. In addition to the 59 questions relating to the effective schools correlates, participants were also asked 6 demographic questions about their gender, ethnicity, years of teaching experience and years of teaching experience in their current school, school level, and economic status of their school.

2,984 participants were emailed the option to participate in the study. The following usable responses were collected from the 1,017 participants who responded to the survey (for a response rate of 34%): demographics *n* = 1016; strong instructional leadership *n* = 978; strong emphasis on academics *n* = 964; high expectations for student achievement *n* = 956; frequent monitoring of student progress *n* = 953; safe and orderly schools *n* = 951; and positive home-school relations *n* = 948.

This chapter provides the results of the analyses. In particular, it specifies the descriptive statistics of the study's population, sample, teacher and school demographics, and teachers' perceptions about the effectiveness of school correlates. Second, the chapter describes the results of a series of independent sample and tests and explains the results, including whether the findings were statistically significant and were the null hypothesis related to the research questions were rejected. The chapter concludes with an overall summary of the findings.

Descriptive Statistics

Using the *Effective School Survey* (Hawaii Department of Education, 1996; Heck, 2000), 2,984 surveys were emailed to qualified participants in the study's selected school district. The demographic statistics from the survey participates are presented in Table 4.1, which gives the frequencies and percentages of the demographic variables for the survey respondents. Not all variables were used in the *t* test of the research questions. Variables such as gender and ethnicity were only for describing respondents to demonstrate that the sample was representative of the population.

Table 4.1

Characteristics of the Survey Sample

Characteristics	N	Survey (%)	Characteristics of District Population (%)
Gender			
Female	868	85.4	82.2
Male	148	14.6	17.8
Ethnic background			
White	932	91.7	91.2
Table 4.1 (continued)			
Black	62	6.1	6.2
Hispanic	9	0.9	“Other” = 2.5
Multi-Racial	10	1.0	
Asian	4	0.4	
Years in teaching			
≤ 5 years	266	26.2	-
5 + years	751	73.9	-
Years teaching in current school			
0-5 years	612	60.2	-
6-10 years	241	23.7	-
11-15 years	88	8.7	-
16+ years	75	7.4	-
School level where you currently work			
K-5	541	53.2	72.9
6-8	230	22.6	
9-12	254	25	27.1
Socio-economic status at current school			
< 40%	421	41.4	62.1
≥ 40%	596	58.7	37.9

Note. A dash (-) indicates no data was available for this characteristic from the district.

The characteristics of Hispanic, Multi-Racial, and Asian under ethnicity were listed as "other" in the district's statistics and K-5 and 6-8 were listed at K-8 in the district's reporting of where teachers currently work.

Of those responding to the survey, 85.4% were female and 14.6% were male. Additionally, 91.7% of the respondents identified their ethnicity as White, 6.1% as Black, 0.9% as Hispanic, 1.0% as Multi-racial, and 0.4% as Asian. In identifying their workplace, 53.2% of the respondents identified the elementary school, while 22.6% indicated middle school, and 25% as high school respectively. In describing their years of experience as a teacher, 26.2% of the survey sample noted that they had taught less than five years and 73.8% have been teaching more than five years.

As Table 4.1 shows, most teachers reported working at their current school less than ten years. Specifically, 60.3% noted they have been working in their current school setting for less than five years, 23.5% between six and ten years, 8.8% between eleven and fifteen years, and 7.4% for over sixteen years. The variance in this data could be attributed district's rate of growth. The result of this growth has led to the addition of new schools and transferring of employees from one school to another. Also, 41.4% of those responding to the survey noted that they worked in a school with less than 40% of their students receiving free or reduced lunch, 58.7% of the respondents were from schools with over 40% of students receiving free and reduced lunch. Thus, teachers working in schools with $\leq$ 40% of students receiving free and reduced lunch are underrepresented in the survey sample, where as, teachers working in schools with $\geq$ 40% students receiving free and reduced lunch are over overrepresented in the survey sample.

The sample statistics were aligned with the respondent data as noted in Table 4.1. The study's district employed 2,216 certified employees in 2009. The statistical profile of the educational unit indicated that of those employed, 91.2% where white, 6.2% were black, and 2.5% were classified as "other" ("North Carolina Public Schools Statistical Profile," 2009). The gender statistics of the population sample were similar as well. Like the respondents, a vast majority of the certified staff were women. The statistical profile revealed that 82.2% of the certified employees in the sample's district were female, while 17.8% were male. Of the certified teachers in this sample's population, 72.9% were employed in the elementary setting and 27.1% were employed at the secondary level. The elementary level defined by the statistical survey included teachers teaching in grades kindergarten through eighth grade, and the secondary level included teachers in grades nine through twelve.

Results from the Survey

Table 4.2 presents the frequency distribution for participants' level of agreement about strong instructional leadership. The average respondent Likert score for the correlate strong instructional leadership M = 3.99, *SD* = 0.83. This finding suggests that many of the participants were either agreed or strongly agreed, with little variability, that strong instructional leadership was an important correlate to raising student achievement. Of the teachers responding, 79.24% either agreed or strongly agreed that strong instructional leadership was a necessary correlate of a successful school. Within this correlate, the teachers responded very favorably to school principals making school achievement priority. The statement, *The principal makes student achievement the school's top goal,* was rated the highest (M = 4.32, SD = 0.87). Although a majority of teachers' responses agreed or strongly agreed that principals should offer feedback from classroom observations, the spread of responses (M = 3.82, SD = 1.06) indicate the responses were not as favorable among this item as others items within this correlate.

Table 4.2

Survey Results for the Correlate Strong Instructional Leader

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
1. The principal makes student achievement the school's top goal.	2.04% (20)	3.37% (33)	4.60% (45)	40.08% (392)	49.89% (488)	4.32	978
2. The principal states the school's mission and goals in clear, concrete terms.	2.35% (23)	4.19% (41)	6.24% (61)	42.33% (414)	44.89% (439)	4.23	978
3. The principal takes the lead to resolve instructional problems.	4.41% (43)	9.73% (95)	12.60% (123)	42.42% (414)	30.84% (301)	3.86	976
4. School administrators work with teachers, students, and parents to develop the school's improvement plan.	3.18% (31)	5.43% (53)	7.99% (78)	43.34% (423)	40.06% (391)	4.12	976
5. There is ongoing two-way communication between the administration and school personnel.	4.40% (43)	8.50% (83)	12.08% (118)	44.22% (432)	30.81% (301)	3.89	977
6. The school administrators regularly observe classroom instruction.	3.59% (35)	11.81% (115)	9.75% (95)	48.87% (476)	25.98% (253)	3.82	974
7. The school administrators regularly provide feedback to teachers with regard to their classroom instruction.	4.71% (46)	11.87% (116)	14.74% (144)	45.95% (448)	22.82% (223)	3.70	977
8. Administrators and staff share in leadership roles, using individual and team strengths.	3.79% (37)	7.91% (78)	9.63% (94)	48.46% (473)	30.12% (294)	3.93	976
9. The principal makes sure there are sufficient resources for effective instruction.	2.25% (22)	5.63% (55)	9.93% (97)	47.95% (468)	34.22% (334)	4.06	976
10. The principal ensures that there is an effective, ongoing system for evaluating the school's progress toward its goals.	2.87% (28)	7.06% (69)	10.85% (106)	47.18% (461)	32.04% (313)	3.98	977
Averages (Totals)	**3.36% (328)**	**7.56% (738)**	**9.84% (961)**	**45.07% (4,401)**	**34.17% (3,337)**	**3.99**	***SD =* 0.83**

Table 4.3 represents the findings from the survey for the effective schools correlate strong emphasis on academic success. The sample as a whole agreed, with very little variability (M = 4.18, SD = 0.61), that the need to have a strong emphasis on academic achievement was important to student achievement. In fact, nearly 80% of the sample either

agreed or strongly agreed that this correlate was important. 92% of the teachers felt that class time was appropriately used for instruction. The statement, *Class time is used for instruction not busy work*, was rated the highest of all the items within this correlate (*M* = 4.35, *SD* = 0.73). The statement, *Students are given enough time to master basic skills*, had a greater spread of responses than the other items within this correlate (*M* = 3.73, *SD* = 1.01). Although a majority of the teachers rated the item as agreed or disagreed, teachers did not perceive as strongly that not enough time was given to their students for them to master content work.

Table 4.3

Survey Results for the Correlate Strong Emphasis on Academics

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
11. Class time is used for instruction, not busy work.	1.04%(10)	1.56% (15)	4.25% (41)	47.51% (458)	45.64% (440)	4.35	964
12. Teachers present academic work in interesting and varied ways.	0.83% (8)	2.50% (24)	5.00% (48)	54.69% (525)	36.98% (355)	4.24	960
13. Instruction is geared to having students actively involved in learning.	0.83% (8)	2.80% (27)	6.43% (62)	51.45% (496)	38.49% (371)	4.24	964
14. Students are given enough time to master the basis skills.	2.93% (23)	13.40% (129)	13.50% (130)	49.95% (481)	20.97% (200)	3.73	963
15. Students who need extra help get it.	1.16% (14)	4.37% (42)	8.01% (77)	51.61% (496)	34.55% (332)	4.13	961
16. Teachers maximize students time-on-task.	1.14% (11)	2.50% (24)	7.93% (71)	58.69% (564)	30.28% (291)	4.14	961
17. Teachers continually assess the effects of instruction to refine their teaching.	1.15% (11)	5.20% (50)	9.06% (87)	50.52% (485)	34.03% (327)	4.11	960
18. Teachers collaborate to develop/refine the academic curriculum.	1.35% (13)	3.74% (36)	6.23% (60)	47.56% (458)	41.12% (396)	4.23	963
19. Teachers use methods such as cooperative learning, peer tutoring, and computer assisted instruction to promote learning success for all students.	1.94% (11)	2.39% (23)	5.39% (52)	51.35% (495)	39.73% (383)	4.26	964
20. Teachers participate in professional development activities to keep up-to-date on instructional practices.	0.94% (9)	2.91% (28)	4.79% (46)	48.28% (464)	43.08 (419)	4.30	961
Averages (Totals)	**1.23% (118)**	**4.14% (398)**	**7.01% (674)**	**51.16% (4,922)**	**36.47% (3,509)**	**4.17**	***SD* = 0.61**

Table 4.4 illustrates the responses for the effective schools correlate high expectations for student achievement. The sample agreed, with little variability, that high expectations for student achievement was an important correlate to successful schools (*M* = 4.00, *SD* = 0.67). Over 80% of the respondents either agreed or strongly agreed with the importance of

having high expectations for their students. In fact, the statement, *All students are expected to learn a full range of skills from basic memorization to complex problem solving*, was rated the highest within this correlate (M = 4.16, SD = 0.80). However, there was some variability as to whether all staff has the same level of expectations for every student. The statements, *All staff have high expectations for student achievement* (M = 3.82, SD = 1.03) and *All staff believe that students can learn regardless of ability* (M = 3.82, SD = 1.03), had more teachers responding as not agreeing with these statements. Although a majority of the respondents agreed or strongly agreed with the items, it was not at the same confidence level as the other items with the correlate.

Table 4.4

Survey Results for the Correlate High Expectations for Student Achievement

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
21. All students are expected to learn a full range of skills form basic memorization to complex problem solving.	0.94% (9)	4.40% (42)	6.39% (61)	54.09% (516)	34.17% (326)	4.16	954
22. Teachers believe that all students can master the basis skills.	1.05% (10)	8.91% (85)	10.06% (96)	53.35% (509)	26.62% (254)	3.96	954
23. Teachers clearly inform students and parents of what students are expected to know and be able to do by the end of the unit or semester.	0.94% (9)	6.09% (58)	8.60% (82)	54.67% (521)	29.70% (283)	4.06	953
24. School standards are both challenging and attainable.	1.05% (10)	6.31% (60)	5.47% (52)	56.78% (540)	30.39% (289)	4.09	951
25. All staff have high expectations for student achievement.	1.69% (16)	10.67% (101)	8.87% (84)	47.62% (451)	31.15% (295)	3.96	947
26. All staff believe that all students can learn regardless of their ability.	2.10% (20)	12.92% (123)	11.87% (113)	46.64% (444)	26.47% (252)	3.82	952
27. Teachers assume responsibility for student learning.	1.15% (11)	7.54% (72)	9.95% (95)	51.94% (496)	29.42% (281)	4.01	955
28. Students are encouraged to set high learning goals for themselves.	1.05% (10)	5.96% (55)	9.63% (92)	53.92% (515)	29.63% (283)	4.05	955
29. Teachers foster the development of independent learning.	1.15% (11)	5.25% (50)	9.65% (92)	58.66% (559)	25.29% (241)	4.02	953
30. Time spent in pull-out programs is expected to be short and effective.	1.47% (14)	6.07% (58)	20.00% (191)	50.79% (485)	21.68% (207)	3.85	955
Average (Total)	**1.26% (120)**	**7.39% (704)**	**10.05% (958)**	**52.85% (5,036)**	**28.45% (2,711)**	**4.00**	***SD* = 0.67**

The data for the effective schools correlate frequently monitoring student progress is represented in Table 4.5. Nearly 85% of the respondents agreed or strongly agreed, with little variance, that frequently monitoring student progress is a necessary component of an effective school (*M* = 4.09, *SD* = 0.59). The highest rated statement, *Teachers use tests and other forms of assessment to evaluate student learning*, suggest a majority of the teachers monitor student progress (*M* = 4.40, *SD* = 0.62). Although a majority of the teachers agreed or strongly agreed with the item, *Students are given an active role in assessing and evaluating their own progress*, the range (*M* = 3.64, *SD* = 0.91) in responses indicate they do not so at the same level as other items within this correlate.

Table 4.5

Survey Results for the Correlate Frequently Monitoring Student Progress

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
31. Teachers often give students feedback on their progress.	0.53% (5)	2.10% (20)	3.68% (35)	56.93% (542)	36.72% (350)	4.27	952
32. Teachers promptly evaluate and return homework.	0.63% (6)	4.32% (41)	12.43% (118)	58.27% (553)	24.34% (231)	4.01	949
33. Teachers diagnose academic progress early.	0.74% (7)	2.85% (27)	9.30 (88)	60.68% 9574)	26.43% (250)	4.09	946
34. Teachers give clear explanations before assigning independent work or homework.	0.63% (6)	1.68% (16)	9.14% (87)	59.45% (566)	29.10% (277)	4.15	952
35. Clear classroom standards for student behavior are used consistently throughout the year.	1.05% (10)	4.11% (39)	6.53% (62)	52.53% (499)	35.79% (340)	4.18	950
36. Students are given an active role in assessing and evaluating their own progress.	0.85% (8)	12.90% (122)	22.20% (210)	49.37% (467)	14.69% (139)	3.64	946
37. Teachers use tests and other forms of assessment to evaluate student learning.	0.53% (5)	0.74% (7)	1.68% (16)	52.74% (501)	44.32% (421)	4.40	950
38. Information from monitoring students' progress is used to adapt instruction to meet individual student needs.	0.63% (60	5.18% (49)	7.40% (70)	55.29% (523)	31.50% (298)	4.12	946
39. Results from students' progress are used to plan weekly instruction.	1.27% (12)	6.67% (63)	13.02% (123)	53.33% (504)	25.71% (243)	3.96	945
Average (Total)	**0.08% (65)**	**4.50% (384)**	**9.48% (809)**	**55.40% (4,729)**	**29.63% (2,529)**	**4.09**	***SD* = 0.59**

The survey data, displayed in Table 4.6, suggest that teachers perceive that safe and orderly schools promote student achievement. Nearly 82% of the respondents agreed or strongly agreed, with little variability, its importance to an effective school (*M* = 4.10, *SD* = 0.68). The teachers care about their students (*M* = 4.46, *SD* = 0.70). This attribute was shown in the variability of the responses from the statement, *Discipline problems are handed with fairness, emphasizing behavior, not personality*, noting that perhaps behavior was not perceived as being handled consistently among students (*M* = 3.76, *SD* = 1.15).

Table 4.6

Survey Results for the Correlate Safe and Orderly Schools

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
40. The school is clean and comfortable.	0.95% (9)	5.36% (51)	4.00% (38)	41.32% (393)	48.37% (480)	4.31	951
41. People feel safe at this school.	1.48% (14)	4.64% (440	5.37% (51)	42.47% (403)	46.05% (437)	4.27	949
42. The school staff really cares about students.	0.95% (9)	1.06% (10)	3.28% (31)	40.68% (384)	54.03% (510)	4.46	944
43. Students in our school want to learn.	2.00% (19)	6.32% (60)	14.42% (137)	55.47% (527)	21.79% (207)	3.89	950
44. There is a sense of pride among staff, students, and parents about our school.	1.79% (17)	7.90% (75)	11.38% (108)	43.73% (415)	35.19% (334)	4.03	949
45. Teacher-student interaction is positive.	1.05% (10)	1.48% (14)	6.53% (62)	56.90% (540)	34.04% (323)	4.21	949
46. Teachers enjoy teaching at this school.	2.64% (25)	5.80% (55)	13.92% (132)	45.15% (428)	32.50% (308)	3.99	948
47. Discipline problems are handled with fairness, emphasizing behavior, not personality.	5.37% (51)	12.21% (116)	12.11% (115)	41.89% (398)	28.42% (270)	3.76	950
48. Classroom environments stimulate learning without undue pressure.	1.26% (12)	3.69% (35)	7.69% (73)	59.22% (562)	28.13% (267)	4.09	949
49. The school staff works cooperatively together.	1.79% (17)	5.68% (54)	10.83% (103)	51.63% (491)	30.07% (286)	4.03	951
Average (Total)	**1.93% (183)**	**5.42% (514)**	**8.96% (850)**	**47.85% (4,541)**	**35.85% (3,402)**	**4.10**	***SD* = 0.68**

The last set of questions on the survey was designed to reflect the survey participants' opinion on the effective schools correlate positive home-school environment. The responses are displayed in Table 4.7. Nearly 86% of the teachers agreed or strongly agreed, with little variance, in the perception that this correlate was present in an effective school (*M* = 4.12, *SD* = 0.65). The general consensus was that teachers welcome parents at their school (*M* = 4.31, *SD* =0.74). However, the teachers indicate limited parent involvement in school based decision making. Such perceptions are indicated from the low rating of the statements, *Parents are involved in major decisions about students* (*M* = 3.89, *SD* = 0.98) and *Parents* *are offered various options for involvement, e.g., tutoring their children at home, helping in classrooms, joining school councils* (M = 3.97, SD = 0.90).

Table 4.7

Survey Results for the Correlate Positive Home-School Environment

Answer Options	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Rating Average	Response Count
50. Regular, frequent home-school communications are maintained.	0.95% (9)	4.02% (38)	7.83% (74)	59.68% (564)	27.51% (260)	4.09	945
51. Parents often receive information about students' progress.	0.84% (8)	1.90% (18)	4.33% (41)	58.50% (554)	64.42% (326)	4.24	947
52. School events are scheduled to encourage parents' attendance.	0.95% (9)	2.96% (28)	6.34% (60)	51.59% (488)	38.16% (361)	4.23	946
53. The staff welcomes parents at this school.	1.17% (11)	1.69% (16)	4.66% (44)	49.79% (470)	42.69% (403)	4.31	944
54. Parents are involved in major decisions about students.	2.11% (20)	9.21% (87)	15.98% (151)	49.46% (439)	26.24% (248)	3.86	945
55. School staff encourages parents to become involved in activities that support the school's instructional program.	1.48% (14)	5.19% (49)	8.25% (78)	52.17% (493)	32.91% (311)	4.10	945
56. Parents are offered various options for involvement; e.g., tutoring their children at home, helping in classrooms, joining school councils.	1.27% (12)	6.98% (66)	13.64% (129)	49.58% (469)	28.54% (270)	3.97	946
57. The school staff is responsive to parent inquiries.	1.06% (10)	1.49% (14)	5.42% (51)	60.15% (566)	31.88% (300)	4.20	941
58. The school staff continually looks for ways to involve parents, students, and community in decision making.	1.06% (10)	5.73% (54)	12.30% (116)	52.92% (499)	27.80% (264)	4.01	943
59. Teachers let parents know that parent involvement makes a difference in a child's school performance.	0.96% (9)	3.19% (30)	8.50% (80)	51.12% (481)	36.24% (341)	4.18	941
Average (Total)	**1.19% (112)**	**4.24% (400)**	**8.3% (824)**	**53.19% (5,023)**	**32.66% (3,084)**	**4.12**	***SD* = 0.65**

Results from Hypothesis Testing

This section will summarize the results from the analysis of each hypothesis associated with research questions. An independent t test was conducted to evaluate the hypothesis of two population means on a given variable as defined by the research question.

The test statistic for $t = \dfrac{(\overline{X} - \overline{Y}) - (\mu_1 - \mu_2)}{\sqrt{\dfrac{S_P^2}{n_1} + \dfrac{S_P^2}{n_2}}}$ and followed a t -distribution with

$n_1 + n_2 - 2$ degrees of freedom. For this study, the null hypothesis (H_0) was rejected if the p-value was not greater than .05.

Levene's Test for Equality of Variances was calculated to assure that the two groups being measured by the *t* test had approximately equal variances on the dependent variable. If the Levene Test value was greater than 0.05, the two variances were deemed as approximately equal. The Levene Test is defined through the following formula: $W = \frac{(N-K)}{(K-1)} \frac{\sum_{i=1}^{K} N_i \left(Z_i - Z_{,,}\right)^2}{\sum_{i=1}^{k} \sum_{i=1}^{N_i} \left(Z_{ij} - Z_{i,}\right)^2}$.

Research Question 1: Most important correlates.

Hypothesis 1: The ranking of the means of each effective schools correlate as perceived by teachers to have an impact on student achievement will correspond to the ranking as identified by Marzano's (2003) comparison of school-level factors across researchers.

Table 4.8 gives an overall summary of means for the effective school correlates from this study and the findings from Marzano's (2003) meta-analysis of the effective schools research. In his research, Marzano combined the correlates *High Expectations* and *Frequently Monitoring of Student Progress* into one correlate labeled; *Challenging Goals and Effective Feedback* (not tabled). For this study, the correlates remained separate. As such, the ranking of the correlates *Monitoring of Student Progress* and *High Expectations for Student Achievement* will hold similar values under Marzano's rank as they are one construct under the *Challenging Goals and Effective Feedback* correlate.

The ranking of the correlates has value to administrators leading schools to improve student achievement because it shows how certain stakeholders (i.e., teachers) value what the research (e.g., Marzano) indicates is valuable—important to effective schooling. As indicated previously, it is necessary for school leaders to include stakeholders when instituting primary change. The teacher perceptions of each survey item offers insight for school leaders on where changes should begin. Although the findings reveal that all correlates and items within the survey were important, there is still much to be taken from an item analysis. For example, emphasis on academic success is an ideal correlate to begin the school improvement process. However, an item analysis of this correlate showed a wider response range in teacher perception of whether or not the principal takes the role in resolving instructional problems. Even though it was agreed upon by the respondents of its importance, the item analysis suggests that there was a subset of respondents that do not agree. It could be suggested that while leaders incorporate this correlate into their improvement plans, the decision to change instructional pedagogy or goals should be shared by all stakeholders in order to ensure its acceptance by all.

Generally, the results show that teachers viewed all of the correlates as important. There was not a large difference in the average ratings. For example, although Principal Leadership (M = 3.99, SD 0.83) ranked the lowest its value did not differ largely from that of the highest ranked correlate, Emphasis on Academic Success (M = 4.18, SD = 0.61). Moreover, the rankings from the perceptions of teachers from this survey agree with Marzano in that the correlate *Emphasis on Academic Success* is perceived as more important than any other correlate. Another similarity between the two studies is the overall ranking of the *Principal Leadership* correlate. The teachers perceived this correlate as important but not as important as other correlates identified in this study. This is not to say the correlate is not an important part of effective schools. Rather, it conveys the perceptions from teachers that the other correlates were valued slightly higher. The ranking of means also showed that teacher perceived *Positive-Home School Environment* as the second most important followed by *Safe and Orderly Schools*. Marzano's rank did not show these correlates as having a higher effect size on student achievement than those of *High Expectations* and *Frequent Monitoring of Student Progress*. As it relates to the first hypothesis, teachers in this study not entirely agree with the Marzano's (2003) order of the importance of the correlates.

Table 4.8

Summary of Means for the Effective School Correlates

Effective Schools Correlate	N	Mean	SD	Rank	Marzano (2003) Rank
Emphasis on Academic Success	964	4.18	0.61	1	1
Positive Home-School Environment	948	4.12	0.65	2	3
Safe and Orderly School	951	4.10	0.68	3	4
Frequently Monitoring of Student Progress	953	4.09	0.59	4	2
High Expectations for Student Achievement	956	4.00	0.67	5	2
Principal Leadership	978	3.99	0.83	6	5

Research Question #2: Teacher Characteristics and Perceptions of Correlate.

Hypothesis 2a – Teachers in schools with a low percentage of economically disadvantaged students will perceive safe and orderly schools to be more important to improving student achievement than teachers in schools with high percentages of economically disadvantages students.

An independent *t* test was conducted to evaluate the hypothesis that teachers in schools with lower than 40% free or reduced lunch students would perceive safe and orderly schools as more important than schools with more than 40% of students receiving free or reduced lunch as shown in Table 4.9. The test was significant $t(949) = 6.72$, $p = .00$, and the results support the research hypothesis. Teachers in schools with less than 40% free and reduced lunch schools ($M = 4.28$, $SD = 0.61$) on average rated safe and orderly schools higher than those in greater than 40% free and reduced lunch schools (*M* = 3.98, *SD* = 0.70). The 95% confidence interval for the difference in means was small, ranging from 0.21 to 0.38.

Table 4.9

Less than and greater than 40% Free and Reduced Lunch Means for Safe and Orderly Schools

	< 40% Free and Reduced Lunch	> 40% Free and Reduced Lunch	*T* [∂]	*Df*	*95% CI* *LL*	*UL*
Safe and Orderly Schools	4.28 (0.61)	3.98 (0.70)	6.72**	949	0.21	0.38

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. [∂] Levene's test showed 0.11. So, equal variance assumed.

Hypothesis 2b – Teachers in schools with a low percentage of economically disadvantaged students will perceive parental involvement to be more important to improving student achievement than teachers in schools with high percentages of economically disadvantages students.

An independent *t* test was conducted to evaluate the hypothesis that teachers in schools with less than 40% free or reduced lunch students would perceive parent-community involvement as more important than schools with greater than 40% of students receiving free or reduced lunch. The test was significant *t*(946) = 4.15, *p* = .00, and the results support the research hypothesis. Table 4.10 shows the data for the two groups. Teachers in schools with less than 40% free and reduced lunch schools (*M* = 4.22, *SD* = 0.63) on average rated positive home school environment higher than those in greater than 40% free and reduced lunch schools (*M* = 4.05, *SD* = 0.66). The 95% confidence interval for the difference in means was quite small, ranging from 0.09 to 0.26.

Table 4.10

Less than and greater than 40% Free and Reduced Lunch Means for Positive Home/School Environment.

	< 40% Free and	> 40% Free and			95% CI	
	Reduced Lunch	Reduced Lunch	t^{∂}	*Df*	LL	UL
Positive Home/						
School	4.22	4.05				
Environment	(0.63)	(0.66)	4.15**	946	0.09	0.26

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. [∂] Levene's test showed 0.50. So, equal variance assumed.

Hypothesis 2c - Teachers who have more than 5 years of teaching experience will perceive that strong emphasis on academics as less important to improving student achievement than teachers who have more than five years of teaching experience.

An independent *t* test was conducted to evaluate the hypothesis that teachers who have more than 5 years of teaching experience will perceive that a strong emphasis on academics is less important to improving student achievement than teachers who have less than five years of teaching experience. The test was not significant, $t(962) = -0.60$, $p = .55$, indicating that the response mean of teachers with more than 5 years of experience was not statistically different than the response mean of teachers with less than five years of experience. Teachers with more than five years of experience ($M = 4.18$, $SD = 0.61$) on average rated emphasis on academic success higher than teachers with less than 5 years of experience ($M = 4.16$, $SD = 0.62$). The 95% confidence interval for the difference in means was minor, ranging from -0.10 to 0.09. Table 4.11 shows the data for the two groups.

Table 4.11

Teaching less than and greater than for 5 Year Means for Emphasis on Academic Success

					95% CI	
	Teaching < 5yrs	Teaching > 5yrs	*t* ∂	*Df*	*LL*	*UL*
Emphasis for Academic Success	4.16 (0.62)	4.18 (0.61)	-.60	962	-0.10	0.09

Note. S.D. is in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. ∂ Levene's test showed 0.098. So, equal variance assumed.

Hypothesis 2d - Teachers who have more than 5 years of teaching experience will perceive high expectations for student achievement are less important to improving student achievement than teachers who have less than five years of teaching experience.

An independent *t* test was conducted to evaluate the hypothesis that teachers who have more than 5 years of teaching experience will perceive high expectations for student achievement as less important to improving student achievement than teachers who have less than five years of teaching experience. As shown in Table 4.12, the test was not significant $t(954) = -0.94$, $p = .93$, demonstrating that the response mean of teachers with more than 5 years of experience was not statistically different than the response mean of teachers with less than five years of experience. Teachers with more than five years of experience (M = 4.00, SD = 0.66) on average rated high expectations for academic achievement the same as teachers with less than 5 years of experience (M = 4.00, SD = 0.67). The 95% confidence interval for the difference in means was small, ranging from -0.10 to 0.09.

Table 4.12

Teaching less than and greater than 5 Year Means for High Expectations for Academic Achievement

	Teaching < 5yrs	Teaching > 5yrs	*t* [∂]	*Df*	*95% CI* *LL*	*UL*
High Expectations for Academic Achievement	4.00 (0.66)	4.00 (0.67)	-.09	720	-0.10	0.09

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. [∂] Levene's test showed 0.34. So, equal variance assumed.

Research Question 3: School characteristics and teacher perceptions of effective schools correlates.

Hypothesis 3a - Teachers in the elementary school setting will report higher levels of beliefs for the correlates of high expectations for student achievement than their middle school counterparts.

An independent *t* test was conducted to evaluate the hypothesis that teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectations for student achievement than their middle school counterparts. The test was not significant $t(720) = 1.45$, $p = .15$, indicating that the response mean of teachers in the elementary setting was not statistically different than the response mean of teachers in the middle school setting. Teachers in the elementary setting ($M = 4.10$, $SD = 0.62$) on average rated high expectations for academic achievement slightly higher than teachers in the middle school setting ($M = 4.03$, $SD = 0.70$). The 95% confidence interval for the difference in means was quite small, ranging from -0.03 to 0.18. Table 4.13 shows the data for the two groups.

Table 4.13

Elementary and Middle School Means for High Expectations for Academic Achievement

	Elementary Schools K-5	Middle Schools 6-8	*t*[∂]	*Df*	*95% CI* *LL*	*UL*
High Expectations for Academic Achievement	4.10 (0.62)	4.02 (0.70)	1.45	720	-0.03	0.18

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. [∂] Levene's test showed 0.095. So, equal variance assumed.

Hypothesis 3b- Teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectations for student achievement than their high school counterparts.

As shown in Table 4.14, an independent *t* test was conducted to evaluate the hypothesis that teachers in the elementary school setting will believe that the correlate of high expectations for student achievement is more important to student achievement than their high school counterparts. The test was significant $t(740) = 7.08$, $p = .00$, and support the research hypothesis. Teachers in the elementary setting ($M = 4.10$, $SD = 0.62$) on average rated high expectations for academic achievement higher than teachers in the high school setting ($M = 3.75$, $SD = 0.68$). The 95% confidence interval for the difference in means was quite small, ranging from 0.26 to 0.46.

Table 4.14

Elementary and High Schools Means for High Expectations for Academic Achievement

	Elementary Schools K-5	High Schools 9-12	*T* [∂]	*Df*	*95% CI* *LL*	*UL*
High Expectations for Academic Achievement	4.10 (0.62)	3.75 (0.68)	7.01**	740	0.26	0.46

Note. S.D in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. [∂] Levene's test showed 0.08. So, equal variance assumed.

Hypothesis 3c - Teachers in the elementary school setting will report higher levels of beliefs for the correlate strong emphasis on student achievement than their middle school counterparts.

An independent *t* test was conducted to evaluate the hypothesis that teachers in the elementary school setting will report higher levels of beliefs for the correlate strong emphasis on academic success than their middle school counterparts. The test was not significant $t(726) = 0.62$, $p = .54$, indicating that the response mean of teachers in the elementary setting was, on average, not statistically different than the response mean of teachers in the middle school setting. Teachers in the elementary setting ($M = 4.24$, $SD = 0.58$) on average rated high expectations for academic success slightly higher than teachers in the middle school setting ($M = 4.21$, $SD = 0.62$). The 95% confidence interval for the difference in means was small, ranging from -0.07 to 0.12. Figure 4.15 shows the results for the t-test.

Table 4.15

Elementary and Middle School Means for Emphasis on Academic Success

	Elementary Schools K-5	Middle Schools 6-8	*t* ∂	*Df*	*95% CI* *LL*	*UL*
Emphasis on Academic Success	4.24 (0.58)	4.21 (0.62)	0.62	726	-0.07	0.12

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. ∂ Levene's test showed 0.095. So, equal variance assumed.

Hypothesis 3d - Teachers in the elementary school setting will report higher levels of beliefs for the correlate of strong emphasis on student achievement than their high school counterparts.

An independent *t* test was conducted to evaluate the hypothesis that teachers in the elementary school setting will report higher levels of beliefs for the correlate of emphasis on academic success than their high school counterparts. The test was significant $t(746) = 4.70$, $p = .00$, and support the research hypothesis. Teachers in the elementary setting ($M = 4.24$, $SD = 0.58$) on average rated emphasis for academic success higher than teachers in the high school setting ($M = 4.01$, $SD = 0.64$). The 95% confidence interval for the difference in means was quite small, ranging from 0.13 to 0.32. Table 4.16 shows the data for the two groups.

Table 4.16

Elementary and High Schools Means for Emphasis on Academic Success

	Elementary Schools K-5	High Schools 9-12	T^{∂}	*Df*	*95% CI* *LL*	*UL*
Emphasis on Academic Success	4.24 (0.58)	4.01 (0.64)	4.70**	746	0.13	0.32

Note. S.D. in parenthesis.

* = p < .05, two-tailed. ** = p < .01, two-tailed. $^{\partial}$ Levene's test showed 0.08. So, equal variance assumed.

Summary of Findings

The purpose of this study was to identify which effective school correlates teachers perceive as most important to improving student achievement and if perceptions about the correlates varied by teacher or school characteristics. To test hypotheses about teachers' perceptions of school correlates, several independent *t* test were conducted to determine if the means between two populations differed on given variables. Table 4.17 summarizes findings.

Table 4.17

Summary of Findings

Hypotheses	**Results**
Hypothesis 1: The ranking of the means of each effective schools correlate as perceived by teachers to have an impact on student achievement will correspond to the ranking as identified by Marzano's (2003) comparison of school-level factors across researchers.	The correlates *Emphasis on Academic Success* and *Principal Leadership* shared the only corresponding rankings.

Table 4.7 Continued

Hypothesis 2a: Teachers in schools with a low percentage of economically disadvantaged students will perceive safe and orderly schools to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.	Teachers in schools with less than 40% free and reduced lunch rated safe and orderly schools higher than those in greater than 40% free and reduced lunch schools.
Hypothesis 2b: Teachers in schools with a low percentage of economically disadvantaged students will perceive parental involvement to be more important to improving student achievement than teachers in schools with a high percentage of economically disadvantaged students.	Teachers in schools with less than 40% free and reduced lunch schools rated positive home school environment higher than those in greater than 40% free and reduced lunch schools.
Hypothesis 2c: Teachers who have more than 5 years of teaching experience will perceive that a strong emphasis on academics are less important to improving student achievement than teachers who have less than 5 years of teaching experience.	Teachers with more than five years of experience rated emphasis on academic success higher than teachers with less than 5 years of experience.
Hypothesis 2d: Teachers who have more than 5 years of teaching experience will perceive that high expectations for student achievement are less important to improving student achievement than teachers who have less than 5 years of teaching experience.	Teachers with more than five years of experience rated high expectations for academic achievement the same as teachers with less than 5 years of experience.
Hypothesis 3a: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectations for student achievement on student achievement than their middle school counterparts.	Teachers in the elementary setting rated high expectations for academic achievement slightly higher than teachers in the middle school setting.

Table 4.7 Continued

Hypothesis 3b: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of high expectation on student achievement than their high school counterparts.	Teachers in the elementary setting rated high expectations for academic achievement higher than teachers in the high school setting.
Hypothesis 3c: Teachers in the elementary school setting will report higher levels of beliefs for the correlate of strong emphasis on student achievement than their middle school counterparts.	Teachers in the elementary setting rated strong emphasis on student achievement slightly higher than teachers in the middle school setting.

The first research question focused on ordering effective school correlates by most important to improving student achievement. From the review of the research it was hypothesized that teacher's perceptions of each correlate would be similar to the rankings of Marzano's (2003) comparison of school-level factors across researchers. They agreed on the most and least important correlates. However, teachers in this study ranked *Positive Home School Connections* and *Safe and Orderly Schools* higher than in Marzano (2003).

The second research questions examined to what extent teacher characteristics influenced how teachers perceived the importance of the effective school correlates. The results supported the hypotheses that teachers in schools with greater than 40% free or reduced lunch students would perceive the correlates *Safe and Orderly Schools* and *Positive Home-School Environment* as more important than schools with less than 40% of students receiving free or reduced lunch prove to be statistically significant. However, the results did not indicate that teachers who have more than five years of teaching experience will perceive *Strong Emphasis on Academics* and *High Expectations for Student Achievement* as less important to improving student achievement than teachers who have less than five years of teaching experience.

The third research question sought to explain what school characteristics would be related to how teachers perceived the importance of the effective schools correlates. Two hypotheses were developed around the school level factors of teacher assignment by elementary, middle, and high school. The results indicated that teachers in the elementary school setting did not rate the correlates of *High Expectations for Student Achievement* and *Strong Emphasis on Academic Success* significantly higher than their middle school counterparts. The results also indicated teachers in the elementary school setting did rate the correlates of H*igh Expectations for Student Achievement* and *Strong Emphasis on Academic Success* at a higher level than their high school counterparts.

CHAPTER 5

DISCUSSION

Introduction

Chapter Five discusses the major findings from this study of teacher perceptions about the importance of effective schools correlates to improving student achievement. Potential implications for policy and implementation of the effective schools correlates in the school improvement process are then presented. The study concludes with recommendations for future research and lessons learned about the research process from the perspective of the researcher.

Summary of Findings

There have been skeptics of the U.S. public education system since its evolution. The pinnacle of the criticism arose in 1964 with the publication of the Office of Civil Rights study, *Equality of Education Opportunity* (Coleman et. al., 1966). Known as the Coleman Report, the study brought to light significant achievement gaps between white and minority students and students from high resource and low resource backgrounds. Ronald Edmonds (1979) suggested that the inequities in the education system were due to the schools' inabilities to teach students from low economic background basic skills. In his research of schools that were effective in meeting this basic principle, he noted similar, identifiable correlates that make schools successful in educating all students. The correlates were identified as strong administrative leadership, high expectations for student achievement, a safe and orderly school atmosphere, student acquisition of basic skills, and frequently monitoring student progress. Further research concluded that successful parent and community involvement programs were present in effective schools as well (Lezotte, 1991; Marzano, 2003; Meir, 2002; Reyes et. al., 1999; Scheurich & Skrla, 2003; Schlechty, 2002; Waggstaff & Fusarelli, 1999).

The school improvement research supports Edmonds' findings of the effective schools correlates. As such, the purpose of this quantitative study was not to document what we know about the effective schools correlates but rather to expand upon this knowledge. The literature review noted that systematic school change is not easy and can be cumbersome. Nevertheless, current school reform laws such as No Child Left Behind make it clear to school leaders of failing schools that changes must be forthcoming or the school will incur the loss of important supplemental federal dollars. Additionally, accountability research does not suggest a systematic overhaul of a school to simultaneously include all six correlates. Rather, school improvement plans should focus on two to three high yield strategies. It was clear within the research that principal leadership and the views of change among staff members play an important role in school improvement success (Lezotte, 1991). As such, the purpose of this study was to assess the beliefs of teachers about which effective school correlates they perceive have the greatest impact to improve student achievement.

Research Questions and Summary of the Findings

Research Question 1: Which effective schools correlates do teachers perceive as most important to improving student achievement?

In sum, when observing the response means and standard deviations among each correlate, there was little variance among the teacher responses for each correlate. When comparing the observed mean from the correlates with the teacher responses for each item, the responses clustered closely along the mean point, creating little variability in the responses. Such finding is important to note because generally the correlates and the survey items that comprise the correlates are rated as important (agree or strongly agree). The magnitude in the difference among the survey items and the correlates is quite small, hence very little variability. As a result in the homogenous findings, more trust can be put in the correlates' means as being typical perceptions of the surveyed teachers.

Principal Leadership was the lowest rated correlate among the teachers while *Emphasis on Academic Success* was rated the highest. In reviewing the response means from the study sample, there were differences in the ranking of importance of the correlates from this study than the ranking in Marzano's (2003) meta-analysis. The rankings were consistent with the correlates *Emphasis on Academic Success* and *Principal Leadership*, with *Emphasis on Academic Success* as more important to student success while *Principal Leadership* was rated the lowest. Although *Principal Leadership* ranked the lowest among the correlates, it is still an important part of an effective school; however, teachers' perceptions within this study found other correlates slightly higher in value within their schools.

There were differences in the rankings in this study from Marzano's analysis among the correlates of *Positive-Home School Environment*, *Safe and Orderly Schools*, *Frequent Monitoring of Student Progress*, and *High Expectations for Student Achievement. Positive Home-School Environment* ranked second among teacher perceptions in this study while it was third on Marzano's list. *Safe and Orderly School* was third in this study while Marzano rated it as fourth. *Frequently Monitoring of Student Progress* rated fourth in this study whereas Marzano rated it as second. Marzano also found *High Expectations for Student Achievement* as the second most important within the effective schools research, while teachers perceived it as fifth. When analyzing the differences in the correlates' means from this study, it could be argued that the differences are inconsequential. Likewise, a high number of teachers from low SES schools responded to the survey. The results show these teachers have different views about the important of correlates. As such, due to the sample composition having a large proportion of respondents from Title 1 schools, rankings would be different. Finally, the correlate ordering could be different because of factors not accounted for in this study (e.g., school context, accountability era, overexposure to certain constructs, etc). To fully understand if other factors may be moderating teachers' perceptions of the correlates, future studies should include these factors in their statistical models.

Another notable finding not consistent with the research was all students can master basic skills. The basic attribute of an effective school identified by Edmonds (1979) was whether or not that school can get all students to master the basic skills of schooling in order for them to be successful at the next level. Although it was perceived as most important by Edmond's it was not by the teachers in this sample. The survey item *Teachers believe that all students can master the basic skills* rated forty-fifth (not tabled) most important among the fifty-nine items. More importantly, when asked if *All staff believe that all students can learn regardless of their ability*, teachers perceived this as the lowest item within the *High Expectations for Student Achievement* correlate and fifty-third among the fifty-nine items. In analyzing the responses further, the lower means among these items could be attributed to the idea that teachers feel there is not enough time for students to master these skills. Teachers responding to the item, *Students are given enough time to master the basis skills,* rated as fifty-sixth among the fifty-nine items surveyed in the study. Perhaps this suggests that teachers are neutral in perceiving that students can master basic skills due to the time constraints limiting their ability to concentrate on the essential standards within the curriculums they teach.

Research Question 2: What teacher characteristics will be related to how teachers perceive the importance of the effective schools correlates?

Findings support that teacher characteristics are correlated with how teachers perceive the importance of the effective schools correlates. Teachers who work in non Title I schools responded statistically differently to the correlates *Safe and Orderly Schools* and *Positive Home/School Environment* than their counterparts in high SES schools.

Effective schools research revealed that effective schools successfully collaborate with parents and community members. Regardless of a teacher's employment in a low or high SES school, the response means from both groups showed that this correlate is important to school success. Teachers in low and high SES schools both agreed that a positive home/school relation was necessary for school success.

The effective schools research indicated that a safe and orderly school went beyond the notion of having an orderly environment. Connors (2000) indicated that in addition to rules and regulations, student and teachers must feel intellectually, emotionally, and socially safe. Effective schools with this attribute have higher levels of student engagement. But as Finn and Voelkl (1993) suggested, the characteristics of the structural environment can play a role in this engagement. Findings from this study support Finn and Voelkl findings as schools with lower number of SES students did perceive this correlate to be more important that their higher SES student counterparts.

Years of teaching experience was not significant in determining how teachers perceived the effective schools correlates *Strong Emphasis on Academics* and *High Expectations for Student Achievement*. These finding support the research by Monk (1994), Wolters and Daugherty (2007), and Gahaith and Yaghi (1997) that teacher experience provides limited information to those seeking useful information on improving pupil performance. This study found, that regardless of years of experience, teachers' perceptions on emphasis on academics as important to student success and high expectations were similar. However, Croninger et al.'s (2007) findings would suggest that the results from this survey should be viewed cautiously as they found that students taught by teachers with more than five years experience has no advantage over students taught by teachers with less than five years of experience. In addition, the research on teacher experience also showed that teacher experience was not correlated with implementation of new programs as well. As such, data from the literature and this study suggests that teaching experience does not necessarily correlate positively or negatively with teachers' perceptions on high student achievement or emphasis on academics.

Research Question 3: What school characteristics will be related to how teachers perceive the importance of the effective school correlates?

A *t* test analysis was conducted to determine if there were correlations between the perceptions of teachers from the elementary school setting to those in the middle and high school setting in relation to the effective correlates of *High Expectations for Academic Achievement* and *Emphasis on Academics Success*. The findings revealed there were no significant differences between how elementary teachers perceived *High Expectations for Academic Achievement* than those in the middle school setting. Likewise, there was no significant difference in how elementary teachers perceived the effective school correlate *Emphasis on Academic Success* from their middle school counterparts. However, there was a significant difference in perceptions of these effective school correlates between elementary and high school teachers. Elementary teachers did report higher levels of beliefs for the correlates *High Expectations for Academic Achievement* and *Emphasis on Academic Success* than their high school counterparts.

These results add to the contradictory findings in the literature. Motivational research by Midgley et al. (1995) suggests that there have been links between teacher efficacy and student's self-perception. As students transition from the elementary setting to the middle and high school setting, student motivation influences student achievement. Anderman and Maehr (1994) note in their research on student motivation that as students experience this transition there is a shift in interest from academic to nonacademic activities. As students shift their motivation to the non-academic activities, Midgley, Anderman, and Hicks (1995) suggest that teachers in the middle school level become less efficacious than their elementary counterparts. The result leads teachers to not feel as good about their effects on students' achievement and thus not holding their students to the same high standards as the teachers in the elementary setting.

The findings from this survey do not support this theory for middle school teachers but do for high school teachers. Although high schools teachers perceived Emphasis on Academic Success as important, they did not do so at the same level of importance as their elementary or middle school colleagues. The same perceptional pattern held true for the high school teachers when analyzing their mean response of the effective schools correlate *High Expectations for Academic Achievement* to those of the elementary and middle school teachers.

What these findings do not show is whether or not students begin to show developmental changes during adolescent years that adversely affect their achievement. However, the data from this study would support that these changes do not affect the middle school teachers' efficacy toward student achievement as prescribed in the literature. Such changes would most likely be correlated with the high school teachers' perceptions on student achievement from this study.

Implications for Policy and Practice

The goal of this research was to gain a better understanding of how teachers perceived the importance of the effective schools correlates to improve student achievement. Recommendations for policy and practice can be inferred from the responses of the survey participants.

As previously discussed, in the age of accountability school leaders need research-proven strategies that can assist them to define target areas of need in the school improvement process. What is limiting to school leaders is the research also recommends not making numerous systematic changes. Rather the improvement in student achievement in targeted schools should be slow and consistent with the research.

Suggestions for School Leaders

The teachers in this study rated principal leadership the lowest among the correlates. Ironically, many of the schools correlates that were ranked higher than school leadership are greatly influenced by school leaders. These results suggest that district leaders and teacher preparation programs need to do a better job of discussing the roles of school leaders. Perhaps, there is a general perception that leaders are not that important to effective schooling. Why this is and what to do about it are important next steps.

Marks and Louis (1997) research on teacher empowerment and school reform linked the connection of teacher empowerment to the affects of pedagogical quality and student academic performance. Likewise, Water et al. (2004) indicated that successful changes in schools are directly correlated with how these changes are viewed by the stakeholders. As such, the researchers suggested that second order changes involving pre-existing values must involve all the stakeholders for whom the changes will affect for these changes to be successful.

The problem school leaders face today when given the assignment to improve student achievement is the external pressures that come with the placement into the leadership role. Such pressures force school leaders to make systematic changes through fear of sanctions and public perception, rather than on research and effective data analysis of their school. Specifically for teachers, Lezotte (2004) emphasized the importance of getting teachers involved collaboratively within the school. He noted that the second generation of the safe and orderly school correlate included focus on desired behaviors of students and teachers. By asking teachers to voice their perceptions on the effective schools correlates in this study, it was found that such perceptions differ in many areas from the school improvement research. School leaders should learn from this study that perceptions among teachers from various school building characteristics differed as well. As a result of the differences in views (based on school characteristics of the teacher or school) about what was important perhaps school and district leaders need to focus on teacher perceptions. This focus should include explaining to them why the correlates are important. If these differences in perceptions (according to school and teacher characteristics) do exist then it may be influencing their teaching practices. As such, it becomes tantamount to shaping teachers perceptions to ensure that certain practices are being carried out by all teachers to ensure that all students are achieving.

This study suggests it is important for school leaders to ask teachers how they perceive the effective school correlates before changes are made. Likewise, it is important for teachers to have a firm understanding of how these correlates directly relate to student success. This awareness will encourage teachers to more routinely incorporate the correlates within instructional practices. If principals find the absence of knowledge among the staff regarding these correlates, opportunities for professional development to build a greater awareness of the correlates' importance relative to student achievement should be provided.

These awareness building activities will allow the school leader to measure not only which effective schools correlates should be the focus of change, but how teachers view these correlates. Marzano, Walters, and McNulty (2005) emphasized that collective efficacy can be built by involving the members of the school in an agreed upon process to accomplish the goals of the school. Such collective efficacy leads to the belief that “we can make a difference” in the lives of students. However, a teacher’s negative view of a specific correlate will not be evidenced in instructional practices. School leaders need to be aware of which correlates are viewed both positively and negatively by the teachers in their school. Such knowledge will give school leaders insight into a direction for change.

Suggestions for District Leaders

To assist school leaders in determining how their teachers perceive the effective school correlates, district leaders should provide the survey to accomplish this task. Not only is providing a survey tool important, but district leaders should take the additional step by assisting school leaders in disaggregating the data to make the avenues for change clearer for the school leader. Principals can then be more confident in data interpretation that affects instructional decisions at the school level.

The teachers in this study rated principal leadership the lowest among the correlates. Ironically, many of the schools correlates that were ranked higher than school leadership are greatly influenced by school leaders. However, closer examination of the items within this correlate showed statements involving principals observing and giving feedback on teachers’ instructional practices were neutral. This neutrality suggests that principals need to provide strategic feedback to teachers regarding instructional practices. District and principal preparation programs need to improve principal’s knowledge of high quality instructional practices relating to the effective schools correlates and how to clearly communicate their findings to teachers.

These results also suggest that district leaders and teacher preparation programs need to implement appropriate in-service regarding the roles of school leaders and effective schools correlates. Perhaps, there is a general perception that leaders are not that important to effective schooling. Why this is and what to do about it are important next steps.

In general, a survey developed by the district could also assist existing school leaders in determining targeted areas of needs within their school. Instead of these school leaders reviewing the summative item means for each correlate, a detailed item analysis can reveal areas within each correlate a school should focus on in the next school improvement cycle. The summative data from all of the schools could be important for district leaders in determining the areas of focus within the school system as well. Answers to specific items could lead to policy changes or a staff development focus. For instance, the answer to the item *Teachers use tests and other forms of assessments to evaluate student learning* could lead to a district-wide focus on formative assessments and targeted areas of instruction for students.

Direction for Future Research

Further research is needed to deepen our understanding of why teachers perceive the effective schools correlates the way they do. Student motivation researchers suggest that student efficacy affects the way teachers feel they can impact student achievement. If students are focused on academic tasks more so than nonacademic tasks, it is inferred from the research that teachers should have a higher sense of self-efficacy. It would be of interest to see if this correlation would carry over to how teachers perceive the effective school correlates. For instance, would teachers with a higher sense of self efficacy rate the items within the survey higher than a teacher with a lower self efficacy? Moreover, would the same participants perceive the correlates the same a year later with a different set of students in their classes?

The research results also noted that school level factors can have an affect on how teachers' perceived the effective school correlates as well. When this survey was conducted, all schools were deemed by the federal government as meeting adequate yearly progress. If a school was not to meet adequate yearly progress this year and the same staff was surveyed, would the school not meeting this measure change the teachers' perceptions on the effective schools correlates? Likewise, the population within the study's district continues to grow. If the student population within a school were to shift from a low population of SES students to a high concentration of SES students, would the same staff perceive the effective school correlates the same?

As a school leader, it is important to know if your staff has the same level of student expectations as you. A direction for future research could involve the measurement of perceptions of teachers and principals on effective schools correlates to improve student achievement and determine which correlates have similar significance among the two groups. Another direction for future research would see how the perceptions of staff would improve if the findings were shared with the participants. Once the areas of focus were identified from the findings and incorporated into the school improvement process, would the same participants perceive the effective schools correlates differently after the strategic interventions?

The study also shows there are some differences in teachers' perceptions of school correlates. Future studies need to examine if these differential perceptions are related to differential teaching practices and why these differential perceptions exists. A fruitful avenue of investigation would involve conducting more advanced statistical models which control for teacher and school characteristics (e.g., traits of school environment, subjects taught, etc.). In doing so, we could begin to understand why there are different perceptions of the importance of certain school correlates.

The final recommendation is to make what we know about the effective schools research work for our schools. The research is very clear these correlates are found in every effective school that understands the importance of every child mastering the basic skills needed for their next level of schooling. This call for change does not require money, but a change in perception of how schooling works. Perhaps more focus should be placed on "How can we make that work for our school?" Understanding that these correlates are necessary to make schooling successful, more emphasis should be placed on establishing a protocol to make these correlated viable in all schools.

Limitations and Lessons Learned

There are several limitations to this study. This study includes teachers located in a largely exburbs / rural schools. As such, the study results are not intended to be generalized to teachers in schools located in urban areas.

Due to this being a non-random study and teachers could opt out to participate and not participate, there could be some selection bias to this study. Because teachers that did participate in the study are fairly similar to the general population of teachers in the county, it is likely that selection bias is not at play. Nevertheless, some unmeasured factor associated with non-respondents may be functioning.

As a result of the study not identifying teachers by schools, the data had to be aggregated to the county level. Teachers are nested within schools, and as such, the data in this study is non-independent. Non-independence can lead to biased estimate and standard error, increasing a Type 1 error. As a result of external limitations placed on data collection by university's review board, this problem could not be avoided.

In reviewing the survey procedures and findings, the teachers' perceptions of the survey items may influence the findings. Although participants were asked to indicate the extent to which they believed each item in the survey was important to improving student achievement, some participants may have misinterpreted what they were being asked. That is, some teachers may have believed that the survey was asking them about whether the item was present at their school. If interpretation was different than intention, then the validity of the instrument may be undermined. However, this limitation is indicative of many survey questionnaires. Quite simply, a disadvantage of surveys is the possibility that all respondents will not interpret the items in the same way.

In conducting this study there was several lessons learned within the research process. From the perspective of this researcher, it was important to fully understand the process of the quantitative design. Developing a quality research design saves many steps at the end of the process. When developing the design, the researcher learned it is important to know what variables exist in the study and what questions to ask within the survey to assist in answering the research questions. Similarly, it was important to understand what statistical test will aid in answering the research questions.

A second lesson from this study was handling unexpected problems that arose during the course of the study. One major obstacle for the researcher was merging the data from the survey tool with the statistical software package. Not having a class on how to use the software package, it was foreseen that this would pose a challenge. However, having to upload data into the statistical package with identifiable variables created an obstacle of enormous proportions. A mentor served a vital role in assisting the researcher with this task and proved to be priceless in the completion of this study.

Recruiting participants for the study was another obstacle for the researcher. Allowing the researcher to conduct the study in a familiar district did not prove as helpful as first thought. Many questions about how the researcher would be using the findings hampered the researcher to reach participants in certain schools. Some principals were not comfortable with several items being asked on the survey. Specifically, the principals were afraid that the responses would be tied to the school and would not represent what they perceived the perceptions of their teachers would be in regards to the effective schools correlates. The lesson learned for the researcher was to communicate more clearly on how the data will be used and to not assume that friendly confines would result in high participation rates.

The dissertation process, from attending classes to the writing of the findings, can be influenced by many outside obstacles. Change in family and career dynamics can have unexpected impacts on the completion of the process. The lesson learned by the researcher is that when undertaking a task like this in future is to account for natural variables that have no impact on your study but will influence the completion of the study like no other outliers.

Conclusion

The purpose of this quantitative study was not conducted to document what we already know about the effective schools correlates but rather to expand upon this knowledge. More importantly, it was the purpose of this study to note the importance of teachers' perceptions in implementing systematic school change. The limitations of the study included the small sample size and the participants coming from one local school district. Nevertheless, the study did make it clear to leaders of failing schools that school improvement plans should focus on two to three high-yield strategies to address these shortfalls. In addition, it was noted within the research that principal leadership and the views of change among staff members play an important role in school improvement success. As such, the findings from this research were consistent with identifying the importance of the effective schools correlates to student achievement but not necessarily in the same order of effect size.

The personal perspective of the researcher is important to note. As a school principal that has been asked to take on challenging roles to improve various schools, knowledge of the effective schools correlates and their research has proven to be invaluable. It is conceded that the school improvement process has had a profound impact on the researcher. Having worked in a system that believes in total quality education and being trained to respect these principles has lead the researcher to understand the importance of inclusiveness in the decision making process of the school. It is engrained in the researcher that although there are times school leaders are called upon to make tough decisions, systematic school change must come from all of the stakeholders in a school community.

What is reassuring for schools needing vast improvement to ensure all students are successful in every school is the emphasis being placed on this measure at the local, state, and federal level. Although the means to the end can and are debatable, no longer can a school fail to educate groups of students without a public record. What can be agreed upon is a foundation is being laid to no longer accept schools that fail students. For the researcher, that provides comfort but offers a challenge to ensure I bring my best to work each day.

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Appendices

Appendix A

The Effective Schools Survey was selected as the survey instrument because of its correlation with the effective school correlates. Permission for use was granted from the Systems Evaluation and Reporting Section, Systems Accountability Office of the Hawaii Department of Education. This survey has been discontinued by the Hawaii Department of Education and has been replaced by the School Quality Survey.

Strong Instructional Leadership of the Principal

1. The principal makes student achievement the school's top goal.
2. The principal states the school's mission and goals in clear, concrete terms.
3. The principal takes the lead to resolve instructional problems.
4. School administrators work with teachers, students, and parents to develop the school's improvement plan.
5. There is ongoing two-way communication between the administrators and school personnel.
6. The school administrators regularly observe classroom instruction.
7. The school administrators regularly provide feedback to teachers with regard to their classroom instruction.
8. Administrators and staff share in leadership roles, using individual and team strengths.
9. The principal makes sure there are sufficient resources for effective instruction.
10. The principal ensures that there is an effective, ongoing system for evaluating the school's progress toward its goals.

Strong Emphasis on Academics

11. Class time is used for instruction, not busy work.
12. Teachers present academic work in interesting and varied ways.
13. Instruction is geared to having students actively involved in learning.
14. Students are given enough time to master the basic skills.
15. Students who need extra help get it.
16. Teachers maximize student time-on-task.
17. Teachers continually assess the effects of instruction to refine their teaching.
18. Teachers collaborate to develop/refine the academic curriculum.
19. Teachers use methods such as cooperative learning, peer tutoring, and computer-assisted instruction to promote learning success for all students.
20. Teachers participate in professional development activities to keep up-to-date on instructional practices.

High Expectations for Student Achievement

21. All students are expected to learn a full range of skills-from basic memorization to complex problem solving.
22. Teachers believe that all students can master the basic skills.
23. Teachers clearly inform students and parents of what students are expected to know and be able to do by the end of the unit or semester.
24. School standards are both challenging and attainable.
25. All staff have high expectations for student achievement.
26. All staff believe that students can learn regardless of their ability.
27. Teachers assume responsibility for student learning.
28. Students are encouraged to set high learning goals for themselves.
29. Teachers foster the development of independent learning.
30. Time spent in pull-out programs is expected to be short and effective.

Frequent Monitoring of Student Progress

31. Teachers often give students feedback on their progress.
32. Teachers promptly evaluate and return homework.
33. Teachers diagnose academic problems early.
34. Teachers give clear explanations before assigning seatwork or homework.
35. Clear classroom standards for student behavior are used consistently throughout the year.
36. Students are given an active role in assessing and evaluating their own progress.
37. Teachers use tests and other forms of assessment to evaluate student learning.
38. Information from monitoring students' progress is used to adapt instruction to meet individual student needs.
39. Results from students' progress are used to plan weekly instruction.

Safe and Orderly School

40. The school is clean and comfortable.
41. People feel safe at this school.
42. The school staff really cares about students.
43. Students in our school want to learn.
44. There is a sense of pride among staff , students, and parents about the school.
45. Teacher-student interaction is positive.
46. Teachers enjoy teaching at this school.
47. Discipline problems are handled with fairness, emphasizing behavior, not personality.
48. Classroom environments stimulate learning without undue pressure.
49. The school staff works cooperatively together.

Positive Home-School Relations

50. Regular, frequent home-school communications are maintained.
51. Parents often receive information about students' progress.
52. School events are scheduled to encourage parents' attendance.
53. The staff welcomes parents at this school.
54. Parents are involved in major decisions about students.
55. School staff encourages parents to become involved in activities that support the school's instructional program.
56. Parents are offered various options for involvement, e.g., tutoring their children at home, helping in classrooms, joining school councils.
57. The school staff is responsive to parent inquiries.
58. The school staff continually looks for ways to involve parents, students, and community in decision making.
59. Teachers let parents know that parent involvement makes a difference in children's school performance.

APPENDIX B
Initial Participant's Letter

To: [Email]
From: rodneypeterson@johnston.k12.nc.us

Subject: Effective Schools Survey

Dear Johnston County Educator,

My name is Rodney Peterson and I am a doctoral student in the Educational Leadership Program at North Carolina State University. Recently, I met with your principal to discuss a study I am conducting to assess the beliefs of teachers about which effective school correlates they feel have the greatest impact on improving student achievement. I am asking you to take part in this study. At your next staff meeting, you will be offered access to a participant's letter. Upon receipt of this letter, I will be emailing you a secure URL that will make the study available to you. This link will be a unique link for each respondent and will limit your response to only one login with the inability to transfer the web link to another user. A secured setting within the URL will not allow the researcher to link any response to a specific email link. Your participation in this study is strictly voluntary.

I know your time is very valuable and I would appreciate you completing this short, 60 question survey. The information in the study records will be kept confidential in an electronic database that is password protected. Data will be stored securely in the researcher's database accessible by only the researcher and the researcher's dissertation committee. No reference will be made in oral or written reports which could link you to the study. The online site is set up so your responses will be returned to the researcher anonymously, meaning that there is no way to trace your identity to your survey response. This anonymity also insures that no one will know if you choose to decline or participate in this study, including your principal or other school administrators. Study results will be presented in aggregate form, school administrators or other personnel will have access to raw data.

By participating in this study, local school leaders and school improvement teams will have data of what school level correlates teachers perceive are most important to raising student achievement and how school characteristics impact these findings. For instance, are teacher perceptions about certain effective school correlates impacted by their perception of the existence effective school correlates in their schools? In addition, do these perceptions differ in importance and existence by teachers from successful schools verses low performing schools? Answers to these questions can help school leaders and school improvement teams shape their learning plans to meet the needs of students in their buildings.

Thank you in advance for your willingness to participate in this study. If you have questions at any time about the study or the procedures, you may contact the researcher, Rodney Peterson, at 7507 HWY 50 South Benson, North Carolina 27504, or (919) 894-4226. 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).

Thank you and have a wonderful day.

https://www.surveymonkey.com/s.aspx

https://www.surveymonkey.com/optout.aspx

APPENDIX C
Follow-up Participant's Letter

To: [Email]

From: rodneypeterson@johnston.k12.nc.us

Subject: Effective Schools Survey

My name is Rodney Peterson and I am a doctoral student in the Educational Leadership Program at North Carolina State University. Recently, I sent you a link to a survey I am conducting to assess the beliefs of teachers about which effective school correlates they feel have the greatest impact on improving student achievement. I am asking you to take part in this study. The link below is a unique link for each respondent and will limit your response to only one login with the inability to transfer the web link to another user. A secured setting within the URL will not allow the researcher to link any response to a specific email link. Your participation in this study is strictly voluntary.

I know your time is very valuable and I would appreciate you completing this short, 60 question survey. The information in the study records will be kept confidential in an electronic database that is password protected. Data will be stored securely in the researcher's database accessible by only the researcher and the researcher's dissertation committee. No reference will be made in oral or written reports which could link you to the study. The online site is set up so your responses will be returned to the researcher anonymously, meaning that there is no way to trace your identity to your survey response. This anonymity also insures that no one will know if you choose to decline or participate in this study, including your principal or other school administrators. Study results will be presented in aggregate form, school administrators or other personnel will have access to raw data.

By participating in this study, local school leaders and school improvement teams will have data of what school level correlates teachers perceive are most important to raising student achievement and how school characteristics impact these findings. For instance, are teacher perceptions about certain effective school correlates impacted by their perception of the existence effective school correlates in their schools? In addition, do these perceptions differ in importance and existence by teachers from successful schools verses low performing schools? Answers to these questions can help school leaders and school improvement teams shape their learning plans to meet the needs of students in their buildings.

Thank you in advance for your willingness to participate in this study. If you have questions at any time about the study or the procedures, you may contact the researcher, Rodney Peterson, at 7507 HWY 50 South Benson, North Carolina 27504, or (919) 894-4226. 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).

Thank you and have a wonderful day.

https://www.surveymonkey.com/s.aspx

https://www.surveymonkey.com/optout.aspx