The Effects of a Summer Reading Program on Reading Achievement and Reading Motivation

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THE EFFECTS OF A SUMMER READING PROGRAM ON READING ACHIEVEMENT AND READING MOTIVATION

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ABSTRACT

Research shows that children who read books often, both in and out of school, are likely to develop better reading skills than children who have fewer opportunities to read (Allington, 2012). While many school districts are successfully implementing various opportunities to support students’ reading development during the academic year, problems arise when students are away from school during the summer months. Studies also show that students who read below grade level at the end of third grade are six times more likely to eventually leave school without a high school diploma (National Research Council, 1998). The purpose of this combined methods study was to determine the impact of the summer reading program, Hot Summer, Cool Books (HSCB) implemented over the summer of 2015 on third grade children in a rural, high-poverty school district in South Carolina. For this study, the impact on students’ reading achievement and their motivation to read were the focus.

The survey portion of the Motivation to Read Profile Survey (Gambrell et al., 1996) examined the impact of the HSCB Program on students’ reading motivation. The Northwest Evaluation Association (NWEA) Measures of Academic Progress (MAP) reading scores were used to examine the impact of the HSCB’s impact on these students’ reading achievement. Purposeful sampling was used to select the sample for the study. Results of the study show how the HSCB affected students’ motivation to read and their achievement scores.
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CHAPTER ONE

READING ACHIEVEMENT: INTRODUCTION TO THE STUDY

The ability to read English is highly valued and critically essential to educational and economic success in today’s society in the United States. School districts throughout the country are integrating programs to improve reading achievement for students, especially for students who demonstrate low reading achievement. Some of the approaches to address students’ reading achievement include after-school reading programs in addition to interventions during the school day. Studies show that students who read below grade level at the end of third grade are six times more likely to eventually leave school without a high school diploma (National Research Council, 1998).

Chapter 1 provides the background of reading achievement and the impact of the Hot Summer, Cool Books summer reading program hosted by a high poverty rural school district in South Carolina. The topics of summer reading loss, access to books, and motivation to read and their impact on reading achievement is discussed relevant to the combined methods study. This chapter presents the problem, the basis for the study, the statement of purpose, the significance of the study, guiding research questions, and an overview of the theoretical framework for the study. The chapter concludes with a presentation of relevant terms, limitations, and delimitations of the study.
South Carolina Read to Succeed Act

To combat the trend of poor reading achievement, the South Carolina House signed into law Bill Act 284, also known as Read to Succeed, which focuses on improving literacy achievement for all students (SC Department of Education Read to Succeed, 2015). According to Read to Succeed (2015), a student must be retained in the third grade if s/he does not demonstrate reading proficiency as measured by the State’s reading assessment at the end of the school year (SC Department of Education Read to Succeed Act, 2015). The reading proficiency level is determined by scoring at the lowest achievement on the State’s summative reading assessment known as the Palmetto Assessment of State Standards (PASS) (SC Department of Education Read to Succeed, 2015). If third grade students score at the lowest proficiency level on the state assessment, which equates to “Not Met,” they must be offered appropriate interventions and an opportunity to attend a summer reading camp to address their deficiencies (Read to Succeed, 2015). According the Read to Succeed Act (2015) the summer reading camp must be offered four days per week for at least six weeks. Each day, the student must receive four hours of instruction or “the equivalent minimum hours of instruction in the summer” (SC Department of Education Read to Succeed, 2015).

Summer Reading Loss Research

Research shows that children who read often, both in and out of school are likely to develop better reading skills than children who have fewer opportunities to read (Allington, 2012). While many school districts are successfully implementing various opportunities to support students’ reading development during the normal school year, problems arise when students are away from school during the summer months.
Alexander, Entwisle, and Olson (2001) found that while students are in school, all children gain skills at the same rate, and each school year, children make gains in classrooms. However, the decline in children’s reading skills that can occur during summer vacation is known as summer reading loss (Allington & McGill-Franzen, 2003). Consequentially, students impacted by summer reading loss continue to lose ground each summer. The further behind the student is in the fall, the less likely they will be to succeed throughout the regular school year. Researchers sought to determine whether summer achievement loss is more pronounced among some groups of students (Allington & McGill-Franzen, 2013). Research indicates that achievement disparities may have a stronger relationship with students’ socioeconomic status (SES) putting some children at greater risk of decline in reading skills than others (Alexander, Entwisle, & Olson, 2001). Economically disadvantaged students in this study are rural students who experience the greatest loss in reading achievement during the summer months. When school is out, low SES students do not have the resources of their wealthier urban and suburban peers who increase their reading level over the summer (Allington & McGill-Franzen, 2003).

Entwisle and Alexander (1992) hypothesized that the differential impact of the summer period on students from different socioeconomic backgrounds is the result of “fewer learning opportunities, and/or less support” for lower income students (p. 72). More specifically, Burkham, Ready, Lee, and LoGerfro (2004) found that high-SES students participated in more summer activities including: books read to them by their parents/guardians, more visits to bookstores and libraries story hours, less television, more summer trips, more dance and music activities, and more team sports, swimming
lessons, and scouting. In addition, higher SES students were also more likely to have a
computer at home. Condron’s (2009) research found that students, from poor working
class backgrounds, were disadvantaged when compared with upper and middle class
students on almost all non-school related environmental factors that were measured in the
study. Those factors included: lower birth weight, higher disabilities, higher food
insecurity, poorer health, greater absence from school, fewer students living with
biological parents, more students living in a single-parent home, fewer extracurricular
activities, fewer books in the home, and less parental involvement at school.

**Access to Books and Varied Reading Materials**

Not only does research point to a lack of summer reading activity as one source of
summer reading setback, another problem that impacts students’ reading development is
students’ lack of access to books (Allington & McGill-Franzen, 2010). The more access
children have to books, the better readers they become; without access to books, a child is
less likely to read and become a proficient reader. Anderson, Wilson, and Fielding (1988)
found that “reading books was the out–of–school activity that proved to have the
strongest association to reading proficiency” (p. 297). Additionally, evidence suggests
that the only behavior measure that correlates significantly with reading scores is the
number of books in the home (Evans, Kelley, Sikorac, & Tremand, 2010). When children
have access to books in their homes, they are led to read more often and for longer
periods of time (McGill Franzen & Allington, 2009). Similarly, access to a wide variety
of reading material communicates the message that reading is a valued activity and
spending time reading varied material such as, newspapers, magazines, or books at home
is a critical variable affecting reading acquisition (McQuillian, 1998). As the available
reading material is frequently used, the practice becomes a natural part of the home and everyday lives.

According to McQuillan (1998), sixty-one percent of low-income families have no children’s books at all in their homes, while children of middle class families have access to an abundance of books. Often, the only book in low SES homes is a Bible. Furthermore, in some low-income neighborhoods, there is only one book available for every 300 children (McQuillian, 1998). Another issue facing children of low SES families is the lack of transportation to visit and check out books from a local library for reading at home.

Not only is it a hindrance for low-income families to access books at home, but children living in some low-income, rural areas are at an even greater disadvantage (Evans et al., 2010). Unlimited access to electronic books are available online (Evans et al., 2010). However, in some low income and rural areas, internet access is sometimes unavailable (Horrigan, 2015). The Pew Research Center found that while many homes in the U.S. with school-age children do have broadband internet access, of approximately 29 million households with children between the ages of 6 and 17, almost 5 million live in homes that do not have high-speed internet service (Horrigan, 2015). Low-income households are included in that 5 million. A Pew Research report also suggested that the lowest-income households have the lowest rates of home broadband subscriptions (Horrigan, 2015). Therefore, children living in low-income homes are four times more likely to be without internet access than their middle or upper-income peers are. Without internet access, children cannot take advantage of free electronic books to read at home.
Neuman and Celano (2012) found that when the same library resources were available in both a high socio-economic and low socio-economic area, the support the children received from their caregivers differed and significantly affected the children’s access to print. Early literacy research conducted by Durkin (1966), Bus, van Ijzendoorn, and Pellegrini (1995), and Neuman and Celano (2006), provides evidence that younger children’s experiences with their caregivers such as being read aloud to and engaging in conversations about reading have a significant impact on the children’s academic success as well as other areas of their lives. They also found that children who are read aloud to at home develop a stronger vocabulary, more background knowledge, better expressive and receptive language abilities, stronger phonological awareness and early literacy skills. Research shows that oftentimes, low-income children do not experience the stimulating adult-child interactions with books and stories, in particular, the read-aloud experience (Neuman & Celano, 2006). Without reading experiences such as the read-aloud, children will not be exposed to the opportunity of acquiring higher levels of vocabulary beyond their everyday language (Neuman & Celano, 2006). Likewise, they will not have an opportunity to understand how to decontextualize language, which is the beginning of abstracting information from print. Low SES children are more likely to be reading below their grade level, while students in a high SES neighborhood are more likely to be reading at or above their third-grade level. Similarly, students from low-income households are less likely to have a range of books at their reading level in their home, and were therefore more likely to suffer even greater loss of ability during the summer break. Not only do poor children have fewer books in their homes, but they also live in communities that have few books in the classroom,
school, and public library. If their neighborhood even has a public library, they are likely to encounter reduced hours and limited funding for replenishing and updating the collection (Krashen, 2012; Neuman & Celano, 2001). With school budget cuts and more rigorous academic standards, schools must find even more effective, inexpensive ways to address the problem of summer reading loss which is exacerbated by a lack of access to print, that influences the widening achievement gap.

This relationship between books at home and proficient reading holds true for the lives of children living in middle-class, and upper-class suburban and urban homes. Middle class families usually have access to a variety of resources, which supports their well-being. These children have access to quality childcare, stimulating toys, and a variety of books in their homes. Likewise, they have necessary resources for learning, participate in summer activities that enhance their learning, and have various experiences that allow them to gain new learning. As a result of being exposed to ongoing learning opportunities and having access to resources such books at home, middle-class and upper-class children are usually proficient readers; evidence shows that their home environments support and value reading (McQuillan, 1998). For example, bookshelves with numerous books, newspapers, magazines, encyclopedias, and a variety of other reading materials are present in their home. Likewise, other evidence that shows the value of reading in many middle-class and upper-class families include: areas in the home designated for family reading, reserved times in the daily schedule for reading, shared reading opportunities among the family members, and activities that demonstrates reading is significant to the family. A child from a family rich in books is more likely to
successfully obtain a college degree than a comparable child growing up without a home library (Evans et al., 2010).

**Motivation and Reading Achievement**

The presence of books in a home is an indicator of a scholarly culture, which is described as a “way of life in homes where books are numerous, esteemed, read and enjoyed” (Evans et al., 2010, p. 171). However, just the presence of books in a home is not the only factor that makes the difference in a child’s reading achievement. Along with having access to books at home, other important factors that foster good reading habits include: motivating students to be interested in reading, providing them with materials of interest to them, creating opportunities for them to read, and having role models who are readers (Evans et al., 2010).

There is a significant research base supporting the connection between motivations and reading achievement. For example, children are motivated to read when they see other people reading and talking about what they have read (Cambria & Guthrie, 2010). Furthermore, parents serve as teachers and role models for their children and children are motivated to read if they witness their parents reading (National Research Council, 1998). Along with limited access to books, having role models at home who avoid reading leads to missed interactions with books. Rasinski and Fredericks (1991) emphasize that it is crucial that children see their parents/guardians use reading for a variety of purposes, from entertainment to maintaining a job or building a career. When children witness their family members taking time to read different types of reading material for various reasons, they perceive reading as being an important activity other than just for school. Furthermore, research shows that children who have family members
reading to them at least three times a week are almost twice as likely to score in the top twenty-five percent in reading as to children who were read to less than three times a week (Denton, Kristen, & West, 2002).

Although having reading role models at home is important to a child’s reading success, some children do not have them. Many children of low SES homes do not see parents/guardians or other family members and friends spending time reading, purchasing books, subscribing to magazines, or visiting libraries to check out books. Thus, they often do not have role models of good reading practices that lead to success in school.

Scholars have identified lack of motivation as being the greatest challenge of many reading and learning difficulties that children experience (Asher, Hymel, & Wigfield, 1978; Coley & Hoffman, 1990; Covington, 1984; Csikszentmihalyi, 1990; Zimmerman, Bandura, & Martinez-Pons, 1992). Evidence from theory and research support the idea that high motivation to read is associated with positive self-concept and high value assignment, while low motivation to read is associated with poor self-concept as a reader and low value assignment (Eccles, 1983; Henk & Melnick, 1995). Therefore, the link between motivational constructs and achievement indicates a need to increase our understanding of how children acquire motivation in order to help them develop into more active readers (Gambrell, Palmer, Codling, & Mazzoni, 1996).

Research has shown that motivation for reading predicts reading achievement on standardized tests (Gottfried, 1985) and academic performance (Sweet, Guthrie, & Ng, 1998). Generally, when children have positive attitudes towards reading they enjoy reading thus, they are motivated to read. Motivation to read is described as “the likelihood of engaging in reading or choosing to read” (Gambrell, 2009, 2011). Wigfield
and Guthrie (1997) argue that motivation is the link between reading and reading
achievement. Motivation to read or developing positive attitudes towards reading play a
significant role in teaching young children to read. Increasing motivation leads to
motivated readers who will engage more in reading (Oldfather & Wigfield, 1996). In the
same way, increasing motivation will help students develop positive attitudes toward
reading (Greaney & Hegarty, 1987; Mathewson, 1994; McKenna, Kear, & Ellsworth,
successful they will be in the future with reading and whether or not their attitudes
toward reading determine if they will read. In the same vein, it is argued that reading
attitudes are established early in the life of an individual (McKenna et al., 1995).
Research suggests that attitudes are a ‘stable construct’ among children, emphasizing the
importance of developing positive reading attitudes early in the life of a child (Smith,
1990).

It is further argued that reading attitudes are more positive for students in lower
grades than in the higher grades (McKenna et al., 1995). Helping a reader develop a
positive attitude towards reading is important for increasing reading habits thus
improving reading development. A child who has low motivation for reading spends less
time reading, exerts lower cognitive effort, and is less dedicated to full comprehension
than a reader who has higher motivation for reading. Additionally, children who like to
read and believe they are good readers read more often and have higher reading
achievement than their peers who are less positive (Guthrie et al., 2006; Wang & Guthrie,
read consistently for their own interest are often proficient readers. They concluded that
children who are intrinsically motivated spend more time reading than students who are not as intrinsically motivated to read (Wigfield & Guthrie, 1997). Likewise, they found that intrinsic motivation for reading was most highly associated with whether or not students read extensively and frequently for their own purposes (Wigfield & Guthrie, 1997). Guthrie et al. (1997) concluded that reading motivation is a strong predictor for reading volume and reading comprehension. Findings further suggested that reading attitudes are affected by factors such as SES, home environment, amount of time not engaged in educational activities, amount of time spent watching television, quality of kindergarten instruction, quality of library facilities, and availability of reading material at home (Walberg & Tsai, 1985). The validity of this relationship is supported by research studies that documented the link between motivation and achievement (Elley, 1992; Gambrell & Morrow, 1996; Guthrie, Schafer, Wang, & Afflerbach, 1993; Walberg & Tsai, 1985; Wixson & Lipson, 1991). Students’ value of reading is an important predictor of their engagement in reading activities. A longitudinal study (Healy, 1965) on the effects of changing children’s attitudes toward reading revealed that favorable attitudes produce significant achievement and more reading.

**Statement of the Problem**

Summer reading loss is well documented and negatively influences the success of low SES students (Cooper et al., 1996; Entwisle & Alexander, 1992; Heyns, 1978). Based on reading achievement data, elementary students in rural high-poverty school districts continuously demonstrate low levels of reading proficiency on reading achievement assessments. Students in grades one through four in a rural high-poverty school district in South Carolina experience reading regression due to a lack of academic stimulus over the summer months. Many of these southern, rural students struggle with
reading, especially during the extended summer months. Because they live in poverty, they are vulnerable to circumstances such as lack of exposure to structured educational activities, lack of access to books in their homes, lack of transportation to access books and educational resources, and other factors that hinder their reading development over the summer. The long-term impact of low reading achievement in early grades is often associated with low middle-school and high-school achievement (Mraz & Rasinski, 2007).

**Purpose of the Study**

The purpose of the study was to examine the effects of a summer reading program on third grade students’ reading achievement and reading motivation after one year of participation. Third grade students over the summer of 2015 were specifically targeted due to efforts made to ensure that those students were able to read on grade level by the end of third grade.

This combined methods study was designed to combine quantitative and qualitative research in order to determine the impact of a voluntary summer reading intervention program on students’ reading achievement and reading motivation. Furthermore, the study adds to the body of evidence that providing students’ with access to books matched to their independent reading level and reading interest combats summer reading loss, especially those children living in lower socio-economic conditions.

In an effort to mitigate summer reading loss and increase summer voluntary reading and reading motivation over the summer, students self-selected eight new books that were matched to their independent reading level and reading interest for the voluntary summer reading intervention program, *Hot Summer, Cool Books*. The summer
reading program was designed to randomly assign students to three different groups. Students selected for this study were randomly assigned to one of three groups. The following describes the two groups: one group received eight self-selected books on their independent reading level and interest while the other group received eight books on independent their reading level and interest and periodic encouragement phone calls. Data were collected from three third grade teachers, a literacy coach, and a district administrator/instructional leader in the school district who were willing to be interviewed for the study. Interviews requesting information about the impact of the summer reading program were conducted for this combined methods study. Through interviews with teachers, literacy coach, and district administrator, analysis of pre- and post-reading achievement scores and post- motivation to read profile survey scores, this study aimed to determine the impact of the summer reading program, *Hot Summer, Cool Books* (HSCB) implemented over the summer of 2015 on third grade students in a rural, high-poverty school district. The goal of the study was to examine how students’ reading achievement and reading motivation were impacted by participating in the summer reading intervention program as well as how teachers and instructional leaders viewed the summer reading program’s impact on students’ reading achievement and reading motivation.

**Significance of the Study**

Alexander, Entwisle, and Olson (2007) showed that the declines in academic achievement during summer vacation is more prevalent and consistent for students from low socioeconomic backgrounds compared to students from middle and higher socioeconomic classes. During the school year, all students likely improve their learning
at about the same rate. However, students from low SES homes tend to fall further behind their peers each summer. Over time, the gap widens and leads to an achievement gap among students from different socioeconomic backgrounds. As a result, low SES students will have difficulty with gaining the same opportunities as their peers who are from middle and higher socioeconomic backgrounds.

Furthermore, investigating the predictors of success in reading can lead to improving academic achievement in schools. Research shows that reading motivation has a significant impact on reading achievement (Cunningham & Stanovich, 1997; Gottfried, 1990; Guthrie, Schafer, & Huang, 2001). These findings suggest that if a child is not motivated to read, his or her reading achievement is negatively affected. Results from a national survey (Gambrell, 1996) revealed that teachers would benefit from additional research on reading motivation in order to effectively support students. Applegate and Applegate (2010) contended motivation is a key factor in the overall success that a student experiences in reading. Similarly, the value placed on literacy in the home, time spent reading with children, and the availability and use of reading materials have been identified as key elements in children’s reading success (Snow, Burns, & Griffin, 1998).

A desired outcome for the study was to understand the impact that the HSCB summer reading intervention program had on students’ reading achievement and reading motivation. Increased awareness of the significance that summer reading intervention programs had on reading motivation and reading achievement provided the impetus for implementation of other summer reading programs in the high poverty rural school district. The study reinforces theories and contributes to existing bodies of literature
addressing reading achievement and summer reading loss with rural, southern students who are from low SES backgrounds.

**Research Questions**

According to Merriam (2009), research questions reflect the researcher’s thinking about the most significant factors to study. They guide the inquiry and determine the methodology for data collection and analysis. The research questions that follow, guided this study. The first four questions provided the overall foundation for the research; the additional question further refines the focus.

RQ1. What is the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students in a rural school district?

RQ2. What is the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district?

RQ3. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district?

RQ4. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation of third grade students in a rural school district?
Theoretical Frameworks

In order to better understand third grade students’ reading motivation and reading achievement after participating in a summer reading intervention program, the faucet theory and self-efficacy theory were used as a framework for the research.

The Faucet Theory

Entwisle, Alexander, and Olson (2001) developed the “faucet theory” to explain the phenomenon of summer learning loss. The “faucet theory” (Entwisle, Alexander, & Olson, 2001) suggest that opportunities to learn and access educational resources are “turned on” during the school year for all students. As a result, learning gains are made for students (Kim, 2004). However, when school is not in session, during the extended summer recess, the school resource faucet is “turned off,” which creates inequalities in educational opportunities and outcomes (Kim, 2004).

Furthermore, from the point of view of Entwisle, Alexander, and Olson (2001), when the school faucet is turned on, which is the time when school is in session, students of every economic background benefit almost equally. On the other hand, when the school faucet is considered to be “turned off” during summer vacations, reading proficiency among children from more economically advantaged families, continues to develop, while similar growth is not observed in economically disadvantaged children (Entwisle, Alexander, & Olson, 2001). This framework is more thoroughly articulated in Chapter 2, the review of the literature

Self-Efficacy Theory

Self-efficacy affects learners’ beliefs about their capabilities to participate in and succeed in learning situations (Cole, 2002). Moreover, the way students perceive their
abilities influence their behaviors, thought patterns, and emotional reactions to difficult situations (Bandura, 1984). In the same way, students’ self-efficacy influences their choice of activities and shapes their learning experiences. When students have a strong sense of self-efficacy, they are more likely to work toward completing a task or goal, regardless of the level of difficulty. When students have low self-efficacy, they do not believe they can be successful and put forth little to no effort towards the task.

The theoretical standpoint of Albert Bandura (1986) provides a way to examine students’ motivation to read. Self-efficacy is described as one of the most significant parts of the social cognitive model (Bandura, 1986, 1997). Bandura (1997) posited that self-efficacy is a construct that varies in strength, generality, and level of difficulty. Pajares (1997) noted that self-efficacy could influence choices made, efforts expended, and perseverance executed when confronted with obstacles, stress, and anxiety.

Because self-efficacy is a construct that affects motivation, it promotes or inhibits learning (Evans, 1989). Bandura’s (1982) self-efficacy theory states that efficacy is the major determinant of effort, persistence, and goal setting. In addition, research supports this idea, suggesting that individuals with higher self-efficacy are likely to be more motivated and successful when given task (Pintrich & DeGroot, 1990). Bandura (1993) argued, “Hence, a person with the same knowledge and skills may perform poorly, adequately, or extraordinarily depending on fluctuations in self-efficacy thinking” (p. 119). Bandura (1997) continuously demonstrated the impact of how, when students have high self-efficacy for a certain learning task, they will put forth more effort to accomplish the task. Similarly, Schunk (2000) asserted that when individuals have high self-efficacy
and positive beliefs about their ability to complete a task, they usually perform in a successful way on the task.

When a student believes he or she can control success in school, performance is improved (Skinner, Wellborn, & Connell, 1990). As students experience success, self-efficacy increases and students feel empowered. While motivation continues to increase, students repeat the cycle again, each time feeling even more in control of their learning.

Bandura’s (2000) Self-Efficacy Model is commonly used to demonstrate how an individual’s achievement related choices and performance is determined by two sets of beliefs: the individual’s expectations for success and the value they place on that choice (see Figure 1.1). This framework is thoroughly articulated in Chapter 2, the review of the literature.

![Figure 1.1. Model of Achievement Behavior Highlighting the Role of Self-Efficacy.](image)

**Definition of Terms**

This section lists and defines key terms used in the study.

**Faucet theory.** The faucet theory explains the summer slide phenomenon and is the premise that when the school faucet is “turned on,” that is when schools are in session and instruction and resources are readily available for all students, children of all
economic backgrounds benefit equally (Entwisle et al., 1997, 2001). However, when school is not in session, the school faucet is “tuned off” as during summer vacation (Entwisle et al., 1997, 2001).

**Summer learning loss.** Summer learning loss refers to the decline in student performance levels in identified subject areas that occur over the summer break that is part of the traditional school calendar. Students experience summer learning loss when they do not engage in educational activities while they are away from school during the summer vacation (Cooper, 1996; Downey et al., 2004; Entwisle & Alexander 1992; Heyns, 1978; White, 1906).

**Summer reading loss.** Summer reading loss is the decline in students’ reading achievement that typically occurs throughout the summer when children are away from their organized educational environment and are not participating in literacy based activities (Allington & McGill-Franzen, 2003).

**Summer learning programs.** Summer learning programs refer to a set of organized activities designed to provide enrichment, remediation, or other learning opportunities for students during the summer vacation between regular school years or meet a specific need (Terzian & Moore, 2009).

**Socio-economic status (SES).** SES is measured as a combination of education, income, and occupation. It is referred to as the social standing or class of an individual or group (American Psychological Association, Retrieved from http://www.apa.org/pi/ses/resources/publications/factsheet-education.aspx). SES is also described as the combination of social and economic factors including: family income, levels of parental education, types of parental employment, and whether social networks
and resources are available and to what extent. SES is defined within the educational organization, as well as for this study, by students’ eligibility for programs providing free or reduced-price lunches based upon state and federal regulations and guidelines (American Psychological Association, Retrieved from http://www.apa.org/pi/ses/resources/publications/factsheet-education.aspx).

Limitations

This study had limitations. First, the sample limited the ability to generalize the results of this study. This study relied on a limited purposeful population sample (third grade) within a single school district in a rural area. Due to the small population sample, this study may not be generalizable to a larger student population or one with different demographics and socioeconomic make up. Similarly, the summer reading intervention program that was implemented included the following three groups: 1) received books only, 2) received books and periodic encouragement postcards mailed home, or 3) books, periodic encouragement postcards mailed home, and lessons. There was a relatively small sample of participants from the summer reading involved in the study. Although there were participants from three groups involved in the summer reading intervention program, two of the three groups for the summer reading intervention program are represented in this study.

Second, the interview data for this study was not gained from multiple sources such as interviews with students and parents. Therefore, insight into students and parents perceptions of the impact of the program was not included. Future studies that include participants from multiple locations and sources of data would reveal whether or not findings remained the same. An additional data limitation of this study was available data
on how teachers prepared students for reading over the summer and participation in the summer reading intervention program. Finally, the study did not attempt to gather data that measured the quality and effectiveness the summer reading program’s components that were implemented as well as how they were monitored and evaluated. This study relied on data collected on the growth of reading skills and reading motivation from a single group of students where the assessments were administered during specific time periods (spring and fall of the year), the instrumentation used in the study. Utilizing a single instrument to measure student reading achievement limited the ability to gather a comprehensive measure of students reading skills and abilities. Another limitation of this study was the reliability of the student self-reported responses due to the age of the students whose understanding of the questions about their motivation to read may have been less than that of older students. A threat to the internal validity of the study included the instrumentation. The pre- and post- surveys were administered using different procedures. The pre Motivation to Read survey was administered using paper and pencil while the post Motivation to Read survey was administered electronically using Chromebooks.

**Delimitations**

The scope of the study fall within delimitations determined largely by the curricular and programming model that had been established by the district. The delimitations that characterize this study include the following: (a) exclusive focus on students between their third and fourth grade years of school, (b) timeframe of the summer reading intervention program, (c) reliance on a single measure of reading achievement and reading motivation, and (d) emphasis on examining the impact that a
single summer reading intervention program makes on reading achievement and reading motivation.

Summary

Chapter One presented information on the implementation of summer reading intervention programs to supporting students’ reading achievement and reading motivation. In addition, descriptive information pertaining to the study was provided. Included in this information were the statement of the problem, purpose of the study, significance of the study, and definitions of pertinent terms. Chapter Two will provide a review of literature related to the support of reading skills and literacy, as well as the application of relevant theories supporting learning outcomes in this area. The relationship between reading achievement and reading motivation is explored, and strategies that support students’ reading achievement and reading motivation in elementary grades are discussed. Chapter Three details the methods used to examine the impact of a summer reading intervention program on third grade students’ reading achievement and reading motivation in a high poverty rural school district. The Measures of Academic Progress (MAP) Assessment and Motivation to Read Profile Survey, which will provide the instrumentation for the study, will be also discussed. A detailed overview of the procedures for both data collection and analysis will be provided. Chapter Four discusses the results of the study focusing on the research questions. Chapter Five presents an analysis and discussion of the findings and implications of the study. Conclusions and recommendations for future studies and for practical improvements are also described.
Chapter Two

Review of the Literature

Chapter Two reviews existing research on motivation to read, summer reading loss, reasons for summer reading programs, access to books, and the effects each have on mitigating summer reading loss, and improving students’ reading achievement. The literature selected for review deals with reasons for a summer reading programs such mitigating summer reading loss and improving students’ reading achievement. Studies in Chapter Two regarding motivation to read, summer reading loss, summer reading programs, and access to books will reveal the impact that each have on students’ reading achievement and attitudes towards reading.

The Faucet Theory

Entwisle, Alexander, and Olson (2001) developed the “faucet theory” to explain the phenomenon of summer learning loss. The “faucet theory” suggests that opportunities to learn and access educational resources are “turned on” during the school year for all students (Entwisle, Alexander, & Olson, 2000). As a result, students make learning gains (Kim, 2004). However, when school is not in session, during the extended June to August summer recess, the school resource faucet is turned off, creating inequalities in educational opportunity and outcomes (Kim, 2004).

Furthermore, according to Entwisle, Alexander, and Olson (2001) when school is in session and the faucet is turned on, students of every economic background usually benefit equally. On the other hand, during summer vacation when the school faucet is
considered to be turned off, reading proficiency among children from more economically advanced families continues to develop, but similar growth is not observed in economically disadvantaged children.

**Self-Efficacy Theory**

Bandura (1995, 1997) suggests that an individuals’ perceived self-efficacy is a crucial component in human functioning. Perceived self-efficacy is determined by four sources: previous performance, vicarious learning, verbal persuasion, and one’s physiological reactions. Likewise, Schunk (2003) believed that perceived self-efficacy or students’ personal beliefs about their capabilities to learn or perform behaviors at designated levels, plays an important role in their motivation and learning. Zimmerman (1997) suggested that how students’ perceive self-efficacy directly and indirectly influences their ability to gain skills and learn. Such impact lie in Bandura’s (1993) argument that perceived self-efficacy plays a key role in self-regulation of motivation. Self-efficacy influences self-regulation in learners (Bong & Skaalvik, 2003; Pintrich & Schunk, 2002). Students with high self-efficacy are more likely to engage in self-regulatory processes including: goal setting, self-monitoring, self-evaluation, and effective strategy use (Zimmerman, 2000). Bandura et al., (1996) concluded that students’ belief in their self-efficacy is a great predictor for engagement and accomplishment in school tasks. Through self-reflection, the way individuals perceive their performance changes their self-beliefs. As a result, their future performance is affected. Through self-efficacy perceptions, one chooses what to do, how much effort to spend, and how to persevere at a particular task (Bandura & Cervone, 1983).
A child’s self-perceptions of efficacy are critical because it determines how a student will approach opportunities, how they will engage, the effort they invest, their degree of perseverance, and the level of anxiety or confidence with which they approach the task (Bandura, 1986). Students who have high self-efficacy beliefs are persistent when faced with challenges and are more successful in academic achievement (Schunk, 1990; Wang Pape, 2007). They work hard and persist longer with any learning task. Students with positive self-efficacies feel in control of their learning and believe they have the ability to succeed. As a result, these students are more likely to be successful than students with lower self-efficacy. Students with low efficacy and outcome expectations are easily discouraged by failure or setbacks and therefore are not motivated to learn (Bandura & Schunk, 1981; Bouffard-Bouchard et al., 1991). They do not believe in their capabilities and often refuse to put forth any effort towards difficult tasks. These students demonstrate low aspirations and little commitment towards their goals. When exposed to difficult or challenging tasks, rather than concentrating on how to perform successfully, they concentrate on their personal weaknesses, possible obstacles, and any possible adverse outcomes. In addition, they put forth little effort and give up easily as they face difficult situations. In the same way, it is more difficult for them to recover their sense of efficacy after they experience failure or setbacks. They fear failure and view inadequate performance as lacking ability. Therefore, any experience of failure causes them to lose hope in their capabilities. Equally, they also tend to give up when faced with such tasks. Such experiences indicate that the higher the sense of efficacy, the greater the effort, persistence, and resilience (Pjares, 1997).
Self-Efficacy Impacts Readers’ Confidence

Students who have high self-efficacy respond to reading differently than students with low self-efficacy. Students who possess high self-efficacy are confident in their reading skills and anticipate successful experiences with reading. Students who have low self-efficacy, lack confidence in their reading skills and see lack of success even before they begin to read. Struggling readers have or will develop low self-efficacy. As a result, they usually end up having poor reading skills. Through personal experiences with students, teachers find that students, who believe they will not be successful with reading, will avoid reading in general (Baker & Wigfield, 1999).

With regard to reading achievement, self-efficacy is described as “confidence in one’s own capacity as a reader” (Bokhorst-Heng & Pereira, 2008). A reader’s view of self-efficacy directly affects their desire to read and the way they perceive themselves as a reader. Students’ perceptions about themselves as readers effects the motivation students have to participate in literacy activities (Baker & Wigfield, 1999; Sweet & Guthrie, 1994). When students possess positive attitudes towards reading, they are more motivated to read, while students with negative attitudes are less likely to read (Baker & Wigfield, 1999). Readers who have positive beliefs about their capabilities approach difficult reading material with confidence that they will succeed and will not avoid reading it. As a result, they develop intrinsic interest.

Self-efficacy informs students’ goal aspirations. Bandura (1993) argued individuals with high self-efficacy set challenging goals and remain committed to them. When they are confronted with failure or setbacks in working toward their goals, they recover their sense of efficacy. They associate the outcome as lack of effort or
insufficient knowledge and skills. These individuals approach challenging situations with confidence that they have the ability to master them. This perception leads to personal fulfillment.

Baker and Wigfield (1999) defined reading efficacy as the belief or expectation that one can be successful at reading. A reader’s self-efficacy beliefs help foster the outcome he or she expects as a reader. A reader with high self-efficacy will always be ready to read, put forth great effort towards improving reading skills, spend great amounts of time engaged in reading, and rarely experience adverse emotional reactions when encountering difficulties while reading. In contrast, a reader who has poor self-efficacy, escapes reading activities, puts forth little to no efforts to read and have doubts his or her reading capabilities. Guthrie, McRae, and Kluada (2007) and Zimmerman (2000) examined the influence exerted by students’ confidence in their own reading abilities. They found that students who have low self-efficacy try to avoid challenging reading activities and have a tendency to withdraw from tasks they perceive as too difficult. Schunk and Rice (1993) found that providing clear goals for reading tasks, in addition to providing feedback on progress toward success helped to increase self-efficacy and strategies for text comprehension. Schunk and Rice (1993) also found that students who had self-efficacy and strategy-use training improved their reading achievement. Schunk and Zimmerman (1997) reviewed research showing students with high self-efficacy see difficult reading tasks as challenging and work diligently to master them, using their cognitive strategies productively. Research studies show that children’s reading efficacy is closely associated with reading skill (Chapman & Tunmer, 1995, 1997; Logan & Medford, 2011; Retelsdorf, Koller, & Moller, 2011). Furthermore,
research shows that children’s reading efficacy is a predictor for variance in their reading comprehension when controlling for word reading and verbal abilities (Katzir et al., 2009). In addition, studies show that there is a correlation to children’s reading efficacy and their reading skills when controlling for intrinsic motivation (Bouffard et al., 2003). Given the relationship between reading efficacy and reading attainment, there are differences between good and poor readers’ reading efficacy (Butkowsky & Willows, 1980; Lau & Chan, 2003).

**Motivation Affects Reading Achievement**

Motivation and self-efficacy are critical to reading achievement. Motivation theorists suggest that individuals’ competence and efficacy beliefs, intrinsic and extrinsic motivation, and desire for achievement play a vital role in their choice of activities, how long they will do an activity, and the amount of effort they will use towards an activity (Bandura, 1997; Eccles, Wigfield, & Schiefele, 1998; Pintrich & Schunk, 1996; Wigfield, Eccles, & Rodriguez, 1998). As a result, readers who are motivated will engage in more reading (Guthrie, van Mater, et al., 1996; Oldfather & Wigfield, 1996) and have more positive attitudes towards reading (Athey, 1982; Greaney & Hegarty, 1987; Matthewson, 1994; McKenna et al., 1995).

Students’ lack of motivation, leads to decreased efforts to read frequently, which results in low reading development and achievement. Likewise, students who lack motivation to read have low self-efficacy due to their constant patterns of low reading achievement. According to Alexander and Filler (1976), children’s attitudes toward reading are generally defined as their feelings about reading. These feelings about reading should influence how much children involve themselves in reading thus, attitudes
about reading should relate to children’s motivation to read (Alexander & Filler, 1976). Instilling positive attitudes towards reading is just as fundamental as teaching decoding skills and comprehension strategies (Cosgrove, 2003).

**Intrinsic and Extrinsic Motivation Impacts Reading Achievement**

Motivation is considered a multi-dimensional construct and within the field of reading research, a popular distinction used is that of intrinsic and extrinsic reading motivation (Wang & Guthrie, 2004; Wigfield & Guthrie, 1997). These dimensions of motivation provide insight as to why a child would choose to read, or persevere through a difficult reading task. In addition, these dimensions would suggest how to improve a child’s reading motivation.

**Intrinsic Motivation**

Intrinsic motivation refers to engaging in an activity for its own enjoyment or inherent satisfaction, and reflects “the inherent tendency to seek out novelty and challenges” (Ryan & Deci, 2000, p. 70). Deci & Ryan (2000) described intrinsic motivation as the act of engaging in an activity for its own sake, for the pleasure and satisfaction derived from participating in it. Intrinsically motivated individuals engage in activities that interest them. They put forth efforts in a free manner, with a full sense of volition and without the necessity of material rewards or constraints (Deci & Ryan, 1985). Intrinsic motivation is reading purely for the positive enjoyment obtained from reading the material (Becker, McElvany, & Kortenbruck, 2010).

Extrinsic motivation occurs when the motivating factor is found not from within the child, but from an outside reward, meaning that the child completes the task to obtain the reward (Fawson & Moore, 1999).
Intrinsic motivation has been associated with developing proficient readers. Children who choose to read books for pleasure are intrinsically motivated to read (Wigfield & Guthrie, 1997). Students who are intrinsically motivated are more persistent and cognitively involved in their tasks, experience more positive emotions and have better grades (Guay et al., 2008). An intrinsically motivated student will spend more time on cognitive tasks that are slightly above their skill level, showing high levels of intrinsic motivation, and exhibiting joy and pride when they master the tasks (Harter, 1978; McMullin & Steffen, 1982).

When a student is intrinsically motivated, he or she will choose to engage in an activity such as reading because it is interesting or enjoyable to them. Such intrinsically motivated behavior is an example of self-determination because it develops from within the student. Earning a good grade on a reading assignment will lead a student to be intrinsically motivated, particularly if they believe that their actions were by choice. In contrast, if a student studies and prepares for a reading assignment as a result of his or her parents’ expectations of him or her doing well on it, or a reward will be given, he or she will be extrinsically motivated. Characteristics of highly autonomous students include being more engaged in school, achieving higher academic performance, and attending school until graduation (Grolnick et al., 2002; Hardre & Reeve, 2003).

Intrinsic motivation is considered the desired type of motivation in students (Ryan & Deci, 2000) and it has been shown to be associated with deep learning, better performance, and well-being (Deci & Ryan, 2000) in comparison to extrinsic motivation. Furthermore, intrinsic motivation also is more likely to flourish when students feel relatedness (Ryan & Deci, 2000). When students have a sense of security in their
environment and are connected to others, they tend to seek out mastery experiences, which helps them develop a sense of competence. Likewise, they are likely to develop intrinsic motivation for academic tasks and other activities if such behaviors are modeled or valued by others with whom they feel or want to feel connected to (Ryan & Deci, 2000). For example, students may become intrinsically motivated to read if they have made a connection with a teacher who shows them the value of reading.

Intrinsic motivation, the most self-determined form of motivation, has been found to produce better reading outcomes (Gottfried, 1990; Guthrie et al., 2007; Lau & Chan, 2003; Wang & Guthrie, 2004; Wigfield & Guthrie, 1997). Fostering intrinsic motivation should be a goal of teachers in order to help students find enjoyment and fulfillment through reading (Cambria & Guthrie, 2010). Providing students with ongoing opportunities to be successful with reading in addition to allowing students to choose what they read, when, and where they read are possible ways to foster intrinsic motivation. Such types of experiences positively reinforce students’ beliefs about themselves as readers and increase the likelihood that they will be intrinsically motivated to engage in subsequent reading opportunities. Additionally, self-determination theory suggests that the more self-determined students’ motivations are, the more likely they are to develop and sustain their learning ability (Deci & Ryan, 2000). Students, who are intrinsically motivated, will continue to read long after they are out of school when there are no more grades or rewards (Bokelman, 2005). Likewise, students who are highly intrinsically motivated to read, read frequently and the breadth of their reading is high (Guthrie et al., 1998).
Extrinsic Motivation

In contrast to intrinsic motivation, extrinsic motivation is demonstrated when one engages in an activity to gain a particular benefit or because of pressure from others (Ryan & Deci, 2000). Students, who are extrinsically motivated, carry out a learning task to achieve some instrumental end, such as earning a reward or avoiding a punishment. Extrinsically motivated students read to gain something whether it is good grades, to satisfy the teacher or their parents, or to get an incentive.

Various reading incentive programs are designed to get students motivated to engage in reading (Pavonetti et al., 2002). Participating in reading incentive programs encourages students to read frequently, read more, and engage in reading thus help students improve his or her reading skills. Intrinsically motivated students will participate because they enjoy reading. On the other hand, extrinsically motivated readers will participate in a reading program with the expectation of receiving some type of tangible reward or a program incentive. The students are not motivated enough to engage in reading because they find reading interesting or enjoyable. The value of the act of reading for enjoyment is diminished when extrinsic rewards are provided thus leading to decreased motivation to read (Carter, 1996).

According to the self-determination theory, there are different types of extrinsic motivation that vary in terms of self-determination. The self-determination theory’s ideas explain people’s inherent and innate tendencies and psychological needs. Ryan and Deci’s (1985) theory of self-determination suggested that some types of extrinsic motivations are low and some are high.
**Summer Learning Loss**

Each school year when students return to school from summer break, many educators continuously recognize that some students’ learning from the previous school year declined over the summer months. As the new school year progresses, patterns emerge, indicating that time away from school for summer vacation has impacted students’ academic performance in a negative way. Researchers argue that the summer vacation, time away from school, causes students to forget the material taught to them during the previous school year (Cooper, 2003). Studies have proven that if students are not engaged in educational activities while they are away from school for summer vacation, they experience summer learning loss (Cooper et al., 1996; Downey et al., 2004; Entwisle & Alexander 1992; Heyns, 1978; White, 1906). Research spanning over 100 years has shown that students’ scores typically declined on standardized tests at the end of summer vacation from those on the same tests at the beginning of the summer (Cooper et al., 1996; Downey et al., 2004; Entwisle & Alexander 1992; Heyns, 1978; White, 1906). As a result, teachers have to spend a significant amount of time at the beginning of the school year re-teaching the previously taught curriculum. Such unanticipated needs prevent teachers from moving forward with new expectations and teaching new curriculum for the new school year. At the same time, some students never catch back up to where they left off in the previous school year. Furthermore, these students continue to fall behind academically.

The reality of summer reading loss is severely harmful to students’ academic achievement. Summer reading loss refers to the decline in children’s reading skills that can occur during summer vacation times when children are away from the classroom and
not participating in formal literacy programs or lack adequate reading practice (Allington & McGill-Franzen, 2003). Researchers find evidence to suggest that the impact of summer reading loss on students in general and on at-risk students in particular, is significant (Mraz & Rasinski, 2007). In the same way, summer reading loss is known to be more persistent among students from lower socioeconomic backgrounds. Factors contributing to summer setback can be largely explained by the lack of summer reading activity (Allington & McGill-Franzen, 2008).

Student reading achievements during the school year are somewhat similar for students from different social and economic backgrounds (Kim, 2007). On the other hand, research on summer learning loss provides reliable evidence that the reading achievement of socioeconomically disadvantaged students slide back a few months each summer (Kim, 2007). Evidence suggests that summer vacation has larger negative effects on reading achievement for low-income children and children from minority families, which explains a large portion of the gap in reading skills between low-income and middle-income children by the end of elementary school (Alexander, Entwisle, & Olson, 2001; Cooper et al., 1996). According to a study, data consistently depict summer reading setback as the reason for the widening of the reading achievement gap between rich children and poor children across the span of the elementary years (Allington & McGill-Franzen, 2003). The reading achievement gap between children from more and less economically advantaged families is substantial and has been persistent (Allington, 2007). While children from higher socioeconomic families holds steady or increases in their academic skills modestly over the summer (Allington & McGill-Franzen, 2003), Kim and White (2011) emphasized that low-income children lose ground to middle-
income kids in reading and continue to fall behind academically. The widening gap in reading achievement between low socioeconomic students and their peers is due in large part, to different rates of learning during the summer months (Kim & White, 2011).

**Research Studies on Summer Learning Loss**

Numerous studies document the ongoing issues of summer learning loss (Allington & McGill-Franzen, 2008; Cooper et al., 1996; Entwisle & Alexander, 1992; Heyns, 1978; Kim, 2007). In Heyns’ (1978) foundational study, she concluded in her pioneering work on summer learning in Atlanta, GA, that the number of hours spent on any single activity or a combination of activities is only marginally related to students’ background including socio-economic status; only reading is related to achievement (Kim, 2004).

Heyns (1978) conducted a study of summer learning among a sample of 1,128 sixth and seventh-grade students and found that the number of books read and time spent reading were both positively related to vocabulary scores after controlling for prior achievement and family background characteristics (Kim, 2007). Heyns (1978) first raised this hypothesis when she suggested, “the unique contribution of reading to summer learning suggests that increasing access to books and encouraging reading may well have substantial impact on achievement” (p. 172).

Available research points to summer reading activity, or the lack of it, as one source of summer reading setback. Heyns (1978) found that reading activity was the only factor that was consistently correlated to reading gains during the summer. Findings show the number of books students read, the amount of daily leisure reading students engaged in, and the frequency of students’ visits to library during summer vacation had a greater
impact on a standardized test of word recognition than other recreational and enrichment summer activities (Heyns, 1978). Heyns (1978) argued that students’ reading during summer vacation is the one activity that most strongly and consistently affects summer learning (Allington & McGill-Franzen, 2008).

A research synthesis conducted by Cooper, Nye, Charlton, Lindsay, and Greathouse (1996) contributed to the topic of summer loss. Researchers, Cooper, Nye, Charlton, Lindsay and Greathouse (1996) performed a meta-analysis of 39 existing research studies that measured the effects of summer vacation on school achievement. The results of the meta-analysis showed that all students, regardless of economic group, lost roughly equal amounts of math skills over summer. Furthermore, significant differences were found when examining reading skills. Reading comprehension scores of both income groups declined, but more so for disadvantaged students (Cooper et al., 1996). Thus, income differences are related to differences in opportunities to practice and learn reading skills over summer and more books and reading opportunities are available to middle-class children (Cooper, Charlton, Valentine, & Muhlenbruck, 2000).

Cooper et al. (1996) included a study in their review that was conducted by Entwisle and Alexander (1992) on the effects of summer vacation on student achievement. Rather than reading achievement, they compared the effects of summer vacation on math achievement from different demographic areas. The study concluded that at the beginning of first grade, there was little change in summer regression between African-American and white students (Entwisle & Alexander, 1992). As the students grew older, the achievement gap increased between the groups. However, during the school year there were gains in achievement, which were similar among the groups,
showing that the gap may be associated with varying summer experiences (Entwisle & Alexander, 1992). For children who lived in poverty, there was a loss each summer while there was a gain each summer for children who did not live in poverty (Entwisle & Alexander, 1992).

Specifically, the study concluded that students’ test scores were at least one month lower when they return to school in fall than their scores were when they left in spring (Cooper et al., 1996). Therefore, students lost an average of one month of instruction over summer vacation. Some students, particularly those from disadvantaged households, lost up to three months of learning. The findings showed that effects for the achievement levels were greater for math than for reading. Overall, the effects from the summer vacation were most detrimental to math and spelling. Cooper et al. (1996) found that students from middle-class backgrounds made gains in reading during the summer break while students from low socioeconomic backgrounds decreased in reading achievement (Cooper et al., 1996). Middle-class students appeared to gain on grade-level equivalent reading recognition tests over summer while lower-class students showed losses on them. Specifically, the study concluded that on average, summer vacations showed an annual reading achievement gap of about three months between students from middle and low-income families (Cooper et al., 1996). Overall, the study revealed little evidence to suggest that student intelligence had an impact on the effect of summer break. Again, there were no moderating effects for gender or race in the study. Therefore, neither the student's gender nor ethnicity appeared to have a consistent influence on the summer learning loss (Cooper et al., 1996).
The patterns of learning loss associated with summer vacation are well-documented (Allington & McGill-Franzen, 2003; Bracey, 2002; Heyns, 1987). Cooper et al. (1996) analyzed 39 studies on summer reading loss and conducted a meta-analysis of 13 studies on summer learning loss. Eleven of the studies examined the relationship between gender, ethnicity, socioeconomic status, and summer reading loss for over 40,000 students (Cooper et al., 1996). Based upon the results, gender and ethnicity did not have an impact on students’ summer reading loss. However, family socioeconomic status was a contributing factor. While middle-income students showed gains in reading achievement over the summer, economically disadvantaged students consistently showed losses. Studies that are more recent support these findings (Alexander, Entwisle, & Olson, 2007).

The Impact of Socio-Economic Status on Summer Reading Loss

The effects of socioeconomic status have been deemed a primary cause for the persistence of the reading achievement gap between economically disadvantaged and non-disadvantaged students (Alexander, Entwisle, & Olson, 2007; Cooper et al., 1996; David, 1979). In addition to low socioeconomic status, other related variables have been identified as the possible cause of summer reading loss for disadvantaged students including: less exposure to complex language at home, and fewer materials in the home that stimulate learning (Neuman et al., 2001). Likewise, limited summer reading activity is a contributing factor to declines in summer reading loss (Storch & Whitehurst, 2001; Vernon-Feagans et al., 2001). Multiple studies have further demonstrated that for socioeconomically disadvantaged students limited access to books is a significant cause of summer reading loss (Allington et al., 1995; Anderson & Stokes 1984; Constantino,
The effects of socioeconomic status on reading achievement, limited access to books, and poor reading skills stimulate concerns about the impact of summer reading programs designed as an intervention, particularly for disadvantaged students. Despite existing evidence linking reading books during the summer to improved reading skills, there have been few experimental studies, which have examined whether a well-designed voluntary reading intervention that provides access to books encourages more reading and improves reading achievement among elementary children (Kim, 2007). Drawing from available recommendations, the purpose of this study is to examine the impact that providing free books through a voluntary summer reading program will have on economically disadvantaged students.

**Summer Reading Programs Providing Access to Books**

Existing bodies of research on the implementation of summer reading programs have documented summer reading programs as an intervention to improve reading and mitigate summer reading loss (Allington, 2012). Kim’s (2006) research focused on the effects of a summer reading program using two methods. One method investigated and compared the effects of a voluntary summer reading intervention program and a mandatory summer school program. The other method examined the effectiveness of individual components of a summer reading program including parent or teacher instruction and encouragement activities prior to the summer reading program or throughout the summer, and providing students with books for summer reading. Kim (2007) conducted another study on investigating the effects of changes in teacher
instruction and encouragement activities while maintaining a consistent provision of books for summer reading (Kim 2007; Kim & Guryan 2010; Kim & White, 2008).

Similarly, Allington (2010) conducted a study that focused on a summer reading program, which provided students with books only. Allington’s (2010) study concentrated on the effects of students receiving free books to read over the summer for three consecutive years.

The number of books students read for summer reading programs and the frequency of leisure reading is most consistently and strongly related to improving reading (Kim, 2007). Increasing access to books and reading material over the summer has long been advocated for reducing summer reading loss (Neuman et al., 2001). Kim (2007) supported the notion that reading books will promote improvements in reading skills through correlation evidence. Likewise, evidence shows that summer reading programs may have the potential to raise the reading achievement of economically disadvantaged students over the summer (Allington, 2012).

Research into summer reading programs indicate that providing books to students in the home environment is limited (Allington et al., 2010; Butler, 2010; Crowell & Klein, 1981; Kim, 2006; Kim, 2007; Kim & Guryan, 2010; Kim & White, 2008). Furthermore, studies confirm that there are significant differences in the number of books in the homes of poor and non-poor children (Allington & McGill-Franzen, 2008). Students from low-income families are likely to have more restricted access to reading material at home, than their more advantage peers (Allington & McGill-Franzen, 2008). Increasing low-income students’ access to books during the summer months seems likely to stimulate reading activity and thereby minimize summer reading loss (Allington &
McGill-Franzen, 2008). A study on fifth-grade students’ reading habits beyond school, found that reading books outside of school was an activity that had the greatest influence on reading proficiency (Kim, 2007). Allington (2010) argued that a possible solution to this issue is to provide more books for low-income children. Two randomized field experiments supported the hypotheses that: (a) providing low-income students with easy access to appropriate books would increase the amount of summer reading, and (b) increasing the amount of reading would ameliorate summer reading setback (Allington & McGill-Franzen, 2008). Overall, bodies of research suggest that increasing low-income students’ access to books during the summer months fosters reading activity and thus minimize summer reading loss (Allington & McGill-Franzen, 2008). In contrast, Kim and White (2011) argue that just providing low-income children with books to read over the summer would cost much less than summer school or a targeted summer intervention. Providing students with books to read away from school over summer vacation eliminates the need to have teachers or tutors, provide transportation, and maintain facilities throughout the summer (Kim & White, 2011).

Kim (2006) conducted a study on a single summer intervention that provided 252 randomly selected low-income fourth grade students in ten different schools with books to read during the summer. The students in the study received eight books to read during the summer. The books along with postcards were mailed to the students every other week throughout July and August (Kim, 2006). The postcards served as a source of encouragement to the students and a way to inspire them to practice reading aloud and silently. In addition, during the last two weeks of school, students’ teachers taught them how to use comprehension strategies with their reading. Kim (2006) found small positive
effects on reading achievement, which was measured by a state assessment. The assessment compared the reading achievement of the students who received the books to a control group. The findings from this study showed that there were gains among African American students (Kim, 2006). Following this study, a similar longitudinal study that consisted of a larger sample was conducted from 2001-2004. However, the study consisted of a larger sample of students and a longitudinal design (Allington et al., 2007). The students in this larger study were provided twelve books each summer. The sample included 842 primary-grade students who were randomly selected from 17 high-poverty elementary schools. The students were eligible for free or reduced price meals (Allington et al., 2007). The books were self-selected by the students at book fairs that were organized over three consecutive years (Allington et al., 2007). After three years of participation, the reading achievement levels measured by the state assessment compared scores for the experimental group with a control group of 428 low-income students from the same schools who received no books (Allington et al., 2007). The study concluded that the reading achievement levels for the students who received the summer books for three years was significantly higher than that of the control group students (Allington & McGill-Franzen, 2007).

Allington et al. (2010) conducted a study that consisted of low-income children who were provided with books to read for three consecutive summers. The sample included 1,330 participants who were predominantly Black or Hispanic children (Allington, 2010). At the beginning of the study, the participants were in the first and second grades from 17 high-poverty elementary schools (Allington, 2010). The participants were randomly assigned to a treatment group and a control group (Allington,
While the treatment groups received twelve books during the summer for three years, the control groups did not receive any books. According to the study, the participants selected their books (Allington, 2010). During the spring of each year, the participants of the treatment group attended a book fair in order to choose books from a large selection of books (Allington, 2010). The results of this study showed a small but statistically significant improvement in the students’ reading skills. Low socioeconomic students showed the greatest gains (Allington, 2010). Various studies have well documented that a substantial and persistent reading achievement gap exists between children from more and less economically advantaged families is substantial and persistent (Allington & McGill, 2007).

The presence of books in the home has a greater influence on a child’s level of education than does the parents income, nationality, or level of education (Evans et al., 2010). Evans’ (2010) 20-year study shows how an investment in books for children makes a significant difference in the lives of children. The study reveals that the presence of books in the home is the largest predictor of a child’s academic success (Evans et al., 2010). Evans (2010) argues that regardless of nationality, level of education, or parents’ economic status, children who grew up with books in their homes reached a higher level of education than those who did not. According to the study (Evans et al., 2010), having at least 20 books in a home has an influence on a child’s path to higher levels of education. Evans (2010) argued that the more books in the house, the greater the benefit for children. The study’s comparison of a bookless home to a home with books found that there was a significant difference between being raised in a bookless home compared to being raised in a home with a 500-book library (Evans et al., 2010). Both factors, having
a 500-book library or having university-educated parents, propel a child 3.2 years further in education, on average (Evans et al., 2010).

Matching Books

Although research emphasizes that a critical component of summer reading programs is providing access to books, the methods for determining which books to provide varies (Fountas & Pinnell, 1996, 2001). According to Fountas & Pinnell, (1996) books should be matched to students based on two dimensions: book reading level and student interest. Numerous studies have examined effects of summer reading programs that supply students with books matched on reading level, interest area, or both, on student reading achievement (Allington et al., 2010; Kim, 2006; Kim, 2007; Kim & Guryan, 2010; Kim & White, 2008). The method to match participants with books varied across all studies. Some studies matched students and books based on both reading level and interest, while others matched students and books only on one of these dimensions. In contrast, the studies focused on different student populations that were examined as well as the additional components provided to students. In What Really Matters for Struggling Readers: Designing Research-based Programs, Allington (2000) recommended that to learn to read well students need books that are matched to their reading levels so they can practice reading independently. Students who read below grade level, however, often have progressively fewer opportunities to read because they are exposed only to grade-level materials, which they do not have the ability to read. This scenario is described as the Mathew Effect; good readers become even better readers because they are able to read and have access to many more books they can read while
poorer readers get farther and farther behind, often due to limited access to books they are able to read (Stanovich, 1984).

**Matching Books by Reading Levels**

Crowell and Klein (1981) evaluated a summer reading program that matched students to books on reading level rather than interest. The sample consisted of fifty first and second grade students (Crowell & Klein, 1981). Teachers and a periodic criterion-referenced test (Crowell & Klein, 1981) determined the students’ reading levels. Students were randomly assigned into a treatment or comparison group (Crowell & Klein, 1981). The treatment and comparison groups included the same number students (Crowell & Klein, 1981). Students in the treatment groups were sent ten books on their reading levels (Crowell & Klein, 1981). The parents of students in the treatment group were instructed to encourage their children to read over the summer (Crowell & Klein, 1981). The two outcomes that were examined included vocabulary and reading comprehension scores (Crowell & Klein, 1981). The study also examined first and second grade students of treatment groups separately, and combined (Crowell & Klein, 1981). The results showed improvements in vocabulary for students who received books for both the combined treatment and the treatment group (Crowell & Klein, 1981). On the other hand, the treatment and comparison students in the second grade sample showed no gains (Crowell & Klein, 1981). No impact on reading comprehension was observed for any group (Crowell & Klein, 1981).

**Matching Books by Student Interest**

Allington et al. (2010) conducted a summer reading program that matched students to books on interest but not reading level. The time frame for the study was three
years (Allington et al., 2010). The sample consisted of 1,330 first and second grade students. By the end of the study, students were in the fourth or fifth grades. Due to retention and promotion, small populations of the students were in third or sixth grade (Allington et al., 2010). Students in the treatment group were sent twelve self-selected books per summer. An effect was identified for the treatment students at the end of the third year (Allington et al., 2010). There was also a positive and statistically significant effect for the students’ reading achievement (Allington et al., 2010).

**Matching Books by Reading Level and Student Interest**

Researchers have examined summer reading programs that provided students with books matched on both independent reading level and interest (Butler, 2010; Kim, 2006, 2007; Kim & Guryan, 2010; Kim & White, 2008).

Butler’s (2010), study examined the effects of three summer programs on the reading achievement of disadvantaged English language learners (ELLs) and disadvantaged students who speak English as a first language (EL1s). The groups consisted of one control group and two treatment groups (Butler, 2010). Students in one treatment group received ten books on their reading levels and interest (Butler, 2010). In addition, these students had teachers visit them throughout the summer (Butler, 2010). All other students were randomly assigned to the control group or the second treatment group, which received ten books based upon their reading levels and interest (Butler, 2010). The control group received no books (Butler, 2010). Students in all three groups received reading logs to record the dates they read and amount of time they spent reading (Butler, 2010). Students in the two treatment groups were provided with books matched to their reading levels and interest (Butler, 2010). For students who were in guided
reading groups, books were matched to their reading level using Fountas and Pinnell’s (1996) guided reading levels. Students who were not in guided groups were matched based upon teacher input and books that the students were currently reading in the classroom (Butler, 2010). Students self-selected books from a collection of books on their reading level and interest area (Butler, 2010). At the end of the school year, students in the one treatment group were given their chosen ten books (Butler, 2010). Students in the second treatment group were visited by a school staff member once a week and chose one or two books from a selection matched on reading level during the visit (Butler, 2010). Teachers also reviewed these students reading logs during these visits (Butler, 2010).

Butler’s (2010) study presented findings on six comparisons. Four of the six students who received books were compared with those who did not. The four comparisons showed that the students who were matched to books based on both reading level and interest shared the following characteristics: (a) they were each conducted in a single district, (b) used the same method to match students and books on reading level as indicated by Lexile measures, (c) postcards were mailed to students and letters to parents explaining the program, and (d) teacher provided support to encourage reading over the summer (Butler, 2010). Reading achievement was measured using DIBELS Oral Reading Fluency and Oral Retelling subtests (Butler, 2010). Results showed that both treatment groups made statistically greater gains over the control group in both Oral Reading Fluency and Oral Retelling (Butler, 2010). According to Butler (2010), there were no significant differences found between disadvantaged English language learners (ELLs) and disadvantaged students who speak English as a first language (EL1s) when controlling for first language. The results suggested that first language was not a factor in
the success of the program (Butler, 2010). The study’s findings concluded that access to books lessened summer reading loss, but increased reading achievement for disadvantaged English language learners (ELLs) and disadvantaged students who speak English as their first language (EL1s) (Butler, 2010).

**Summary**

The review of literature in this chapter presented several themes related to the research questions in this study. First, various theories, and components exist attempting to describe an individual’s motivation to complete a task. Self-efficacy theory in particular (Atkinson, 1957; Eccles, 1983) states that in order for students to be motivated and succeed, they must believe in their capabilities to complete a task. Past research utilized this theory to examine student’s level of motivation to read. Results confirm that a student’s motivation to read is somewhat concerning during later elementary years; research discovered low levels of reading motivations in students of this age. The next theme explored the research question on summer reading loss and its impact on reading motivation. Research shows that during summer months, students lose ground in reading skills. In addition, studies confirm that economically disadvantaged students experience the greatest loss in reading achievement during the summer months. The next theme in relation to reading achievement was summer reading programs and providing access to books. The last theme concerns the research question that combines reading motivation and achievement to determine if a relationship exists between the two. Findings show that a positive correlation between reading motivation and achievement is present (Baker & Wigfield, 1999; De Naeghel et al., 2012; Guthrie et al., 2006; Guthrie et al., 2007; Logan et al., 2011; Wang & Guthrie, 2004). However, few studies have examined summer
reading programs and motivation to read. Therefore, further research was needed to investigate the differences summer reading programs have on motivation to read and reading achievement for specific grade levels. In order to meet the need for further investigations into motivations to read, reading achievement, and summer reading programs, quantitative measures were used in this study. The following chapter outlines the research design, participant selection, sources of data, procedures, and data analysis procedures that were used in this study.
CHAPTER THREE

METHODOLOGY

Chapter Three discusses in detail the survey research design and specific methodology used in this study. This chapter presents the following: discussion of the methodology used in the study and the rationale for its use, a description of the participants in the study and the selection criteria used, an overview of the data collection process, a discussion of how the data was analyzed, and a discussion of the ethical considerations of the research and its potential problems and limitations.

Methodology and Research Design

Combined methodology was used to determine the impact of the *Hot Summer, Cool Books* (HSCB) Reading program on third-grade students’ motivation and achievement after receiving free books over the summer of 2015 in rural high-poverty school district. This school district is located in a rural area of South Carolina with over 80% of students on free or reduced meals identifying them as low socioeconomic status (SES). Most of these students do not have books, magazines, and other reading materials in the home and as such, are at a disadvantage among the more wealthy peers.

Many researchers conceptualize research designs as descriptive or causal (Worthen, Sanders, & Fitzpatrick, 1997). Because the study sought to gain thorough information about third grade participants and information from teachers, a literacy coach and district administrator in a school district’s summer reading program, it employed a combined methods study design.
A combined methods design was used in order to gather data through quantitative and qualitative methods. By using a combined methods design, the researcher was able to understand differences using quantitative data and further explain outcomes using qualitative data (Gall et al., 2006). Additionally, qualitative data allowed the researcher an opportunity to triangulate the data in order to gain a well-rounded understanding of it. The researcher gathered quantitative and qualitative data through multiple sources including pretest/posttest of Motivation to Read Surveys and MAP Test scores (difference in raw scores) and responses (interviews with teachers, a literacy coach and district administrator) to describe the summer reading program’s impact on participants’ reading achievement and reading motivation.

**Participants**

From existing data, third grade students who attended School X in a rural high poverty school district and participated in a summer reading intervention program for summer 2015 was selected for the combined methods study. The students were in the third grade for the 2014-15 school year, and advanced to the fourth grade in the 2015-2016 school year. The sample consisted of 40 students. Once the participants were identified and the gatekeeper was secured, the researcher requested permission from the University of South Carolina’s Institutional Review Board (IRB) to conduct the study in the summer of 2015. The researcher then contacted the gatekeeper of the district and the principal of the school in order to distribute the required IRB documentation, including parent/guardian permission forms.

The sample selection criteria was that the students share common demographics and participated in the entire summer reading intervention program. Participants who did
not complete the program in its entirety were not included in the sample because they did not experience the complete program.

Sampling in field research involves the selection of research sites, time span, participants, and activities; the two basic types of sampling are probability and purposeful (Merriam, 2009). Purposeful sampling was used to select participants to interview. Teachers who taught students who participated in the summer reading intervention program were selected to interview. A literacy coach and district administrator/instructional leader who were directly involved with the summer reading program for the past 4 years were selected to interview. After establishing the initial email contact with the participants, those interested in participating responded to the invitation.

Criterion or purposeful sampling is used when researchers want to discover, understand, and gain insight and therefore must select a sample from which the most can be learned (Merriam, 2009). Because the purpose of this study is to determine the impact of the summer reading program, *Hot Summer, Cool Books* (HSCB) implemented over the summer of 2015 on third grade children in a rural, high-poverty school district, the researcher carefully selected participants, and purposive sampling was used for the sample.

With the approach of purposeful sampling, the researcher was able to draw a sample based on specified purposes. Purposeful sampling is based on the assumption that the researcher wants to gain insight, and therefore, select a sample from which the most can be learned (Patton, 2002). Likewise, with purposeful sampling, researchers intentionally select individuals and sites to learn or understand the central phenomenon
This method requires the determination of selection criteria to identify units of analysis that directly reflect the purpose of this study to gather information that is both valuable and valid. The logic and power of purposeful sampling leads to the selection of information-rich cases for in depth study. The standard used in choosing participants is whether they are information-rich cases and are those from which one can learn a great deal about issues of central importance to the purpose of the research (Patton, 2002).

Research Context

This study took place in a high poverty rural school district in South Carolina. This district is a small, rural, socioeconomically deprived district that serves approximately 3500 students, preschool to grade twelve. According to the South Carolina State Department of Education (2013) and the poverty index calculation, poverty levels in the district increased from 67 % in 2001 to 86 % in 2014.

The district strives to address three factors that foster students’ success including school readiness, school attendance, and negating summer reading loss (Fiester, 2010). The district made an effort to address school readiness by opening an Early Childhood Center (ECC). All three- and four-year-old students at the ECC are served in a full day Montessori program. Ongoing parenting programs and opportunities are in place to educate families about the importance of reading, provide strategies to support reading, and support children with choosing books that they want to read and are able to read. The district also has a variety of initiatives in place to improve school attendance. Attempts to improve attendance include quarterly attendance incentives and ongoing student and parent educational opportunities. Likewise, school counselors and interventionists
identify students who are experiencing attendance issues and counsel the students helping them understand the importance of attending school.

The high poverty, rural school district values literacy and makes literacy a first priority. A number of literacy initiatives are in place throughout the district to enhance the culture of literacy and to promote reading. However, mitigating summer loss is one of the greatest challenges for the district. Measure of Academic Progress (MAP) assessment data revealed that the students in the district experienced significant declines in their reading achievement over the summer. To combat the summer reading loss and help students succeed academically, the district set a goal to combat the decline in reading achievement that students experience over the summer.

**Procedures**

The high poverty, rural school district implemented its first summer reading program in the summer of 2012. The goal of the program was to begin mitigating summer reading loss. For the first year of the voluntary summer reading intervention program, students in grades 1-4 were the participants. For the next year summer’s reading intervention program, the program included students in grades 1-4, in addition to students in grades 5-8. For the summer of 2014, students in grades 1-4 were the only participants in the program. For the second year of the summer reading intervention program, students were randomly assigned to one of the following groups: a) books only, b) books and encouragement postcards, or c) books, postcards, and lessons to accompany the books. Students who received encouragement postcards had the postcards mailed to their homes at certain times during the summer. The postcards were designed with messages to encourage students to read over the summer and served as reminders for students to read
their books. Students who received lessons and encouragement postcards, received lessons on reading fluency and reading comprehension before going home for summer break. During the summer 2014, students were assigned to either a group that received eight books of their choice and on their independent reading level, lessons, and encouragement postcards or a group that received eight books on their independent reading level, lessons, and phone call messages to their homes. The periodic phone messages reminded students about their summer reading and were recorded by the students’ teachers before the summer break. The phone messages were delivered through the district’s phone messaging system. The messages went to the students’ homes phone every two weeks throughout the summer vacation. During summer 2015, students were assigned to either a group that received either (a) books of their choice and on their independent reading level, (b) books of their choice and on their independent reading level and encouragement postcards, or (c) books of their choice and on their independent reading level and phone messages.

Using funding from a three-year grant through a local foundation, books were purchased for the summer reading intervention program. The eight books that students received to read over the summer were selected and ordered based upon students’ independent reading levels as indicated by the Fontas and Pinnel reading assessment. In addition, the books were selected based on titles that students expressed interest in and those deemed to be of high interest. Once the book order was received by the school district, the books were separated by independent reading levels and organized throughout the school in various rooms that represented the reading levels. The organization of the rooms for the books was in the format of a Book Fair and designed to
give students a choice among high-interest novels on their reading levels. In addition, each room was color coded to represent the independent reading levels of the books in the room. Prior to the students selecting their books, their teachers were provided with rosters that included the appropriate color code for the room where the student could select books. At the end of the school year, 2015, each student was allowed to choose eight books, given the books free of charge. On the day students self-selected their books, they were issued a colored card by their teacher that matched the room with the books appropriate for their reading level as indicated on the student rosters. On the day, that students had the opportunity to choose their eight free books, literacy coaches, high school mentors, and teachers assisted students with going to the rooms matched to their color card and select eight books of their choice. Once in the rooms, high school mentors and literacy coaches assisted students with the selection of their books as needed.

Students had unlimited time to choose their books. During the month of July, mid-point of the summer vacation, the district hosted a summer reading celebration where students and their families could enjoy authors, food, games, literacy based activities and a wide variety of other engaging activities.

**Research Questions**

According to Merriam (2009), research questions reflect the researcher’s thinking about the most significant factors to study. They guide the inquiry and determine the methodology for data collection and analysis.

The researcher examined the impact of a summer reading program. Specifically, the study determined if a voluntary summer reading intervention program makes a
difference in third grade students’ reading achievement and reading motivation after one year of participation. The study was guided by the following research questions:

RQ1. What is the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students in a rural school district?

RQ2. What is the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district?

RQ3. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district?

RQ4. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation of third grade students in a rural school district?

RQ5. What are teachers’ and instructional leaders’ perceptions of the HSCB summer reading intervention program in a rural school district?

Data Collection

The researcher had permission from the school district to fully access the existing data sets that were used in the study. Therefore, the study relied on existing data that was collected to measure students’ achievement in reading and students’ motivations to read and was obtained from the district’s administrative files. The following data collection tools were used: the Measures of Academic Progress (MAP), Assessment in Reading, and the Motivation to Read Profile (MRP) Survey. The MAP Assessment and Motivation to
Read Profile Survey were administered as a pre assessment (before the summer reading program) and post assessment (after the summer reading program). After submitting an IRB packet and gaining approval, the researcher executed the research.

**Reading Achievement Measure.** For the purpose of this study, reading achievement was measured using scores on the standardized Northwest Evaluation Assessment (NWEA) Measures of Academic Progress (MAP). All third grade students in the district under consideration have participated in the pre- and the post- test MAP testing. NWEA Measures of Academic Progress consist of a series of computer adaptive assessments that measure students’ general knowledge in reading, language usage, and math (NWEA, 2015). The tests are not timed (NWEA, 2015). NWEA test results used the Rasch UnIT (RIT) scale to describe student achievement and growth (NWEA, 2015). The RIT score is an equal-interval score that relates to the curriculum scale in each subject, rather than having a basis in the performance level of specified student groups (NWEA, 2015).

The MAP assessment is a computer adaptive exam that is scaled to maintain vertical alignment across grade-levels and is aligned to state standards (NWEA, 2015). Scores from the RIT scale was used for the analysis. The RIT scale uses individual item difficulty values to estimate student achievement (NWEA, 2015). The RIT scale is an equal interval scale and relates the numbers on the scale to the difficulty of items on the tests (NWEA, 2015).

**Reading Motivation Measure.** The Motivation to Read Profile (MRP) Survey was used to obtain insights about individual students’ reading motivation and development. The MRP consists of two basic instruments: The Reading Survey and The
Conversational Interview (Gambrell et al., 1996). The study used the survey to assess the specific dimensions of reading motivation, self-concept as a reader, and value of reading. The Reading Survey is a Likert-type response scale, self-report, group-administered instrument (Gambrell et al., 1996). The MRP instrument consists of 20 items. Ten items on the survey focus on self-concept as a reader and are designed to gain information about students’ self-perceived competence in reading and self-perceived performance relative to peers (Gambrell et al., 1996). The 10 value-of-reading items are designed to gain information about how students value reading tasks and activities (Gambrell et al., 1996).

**Interviews.** To obtain data needed to answer the qualitative research question, an open-ended interview question was used in the study. Data from interviews with three teachers, literacy coach, and district administrator were analyzed. The teacher interviews were a path to understanding the impact of the voluntary summer reading intervention program from their perspectives as they worked with students after they participated in the summer reading program. The interview data from the literacy coach addressed the literacy coaches’ role, perception of the program’s implementation, and all factors that facilitated the implementation of the summer reading program. The district administrator’s interview helped to gain the leader’s perception of the coordinating, implementing, and monitoring the summer reading program as well as students’ reading achievement progress once they returned to school in the fall.

According to Maxwell (2005), research questions formulate what you want to understand; your interview questions are what you ask people in order to gain that understanding. Glesne (2011) asserted, “the opportunity to learn about what you cannot
see and to explore alternative explanations of what you do see is the special strength of interviewing in qualitative inquiry” (p. 25). Marshall and Rossman (2006) have identified interviewing as a useful way to get large amounts of data. The interviews were piloted with middle school teachers not participating in this study before being formally used with the teachers participating in the study.

Pre-obtained written permission to analyze the data was obtained from the participants. The researcher obtained consent by having the interviewee complete an informed consent form. Data reduction, using validated open, axial, and selective coding procedures was performed on the verbatim text.

**Data Analysis**

To answer the research questions, quantitative and qualitative instruments were used to analyze the following data: NWEA Measures of Academic Progress (MAP) Assessment, Motivation to Read Profile Survey results, and interviews with teachers, the literacy coach, and district administrator.

Research Question 1 determined the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students in a rural school district. Research Question 2 determined the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district. Research Question 3 determined the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district. Research Question 4 determined the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation
of third grade students in a rural school district. Research Question 5 provided teachers’ and instructional leaders’ perceptions of the HSCB summer reading intervention program in a rural school district.

Research questions 1-4 were addressed using one tailed paired samples t-test. The items from the MRP survey were combined to create three scores: the self-concept subscale score, the value subscale score, and the (total) full survey score. The three scores were used as dependent variables in the paired samples t-test to assess the effect of the summer reading intervention program on motivation. A paired sample t-test was used to examine to assess the differences in reading motivation of the groups (books only and books/phone calls). The analysis was used to determine if there was a change in score from spring to fall.

SPSS (Statistical Package for the Social Sciences) software was used to perform the analyses. The analyses and hypotheses was organized to coincide with the research questions presented in the study.

Research Question 5 was addressed using interviews. Qualitative methods included interviews with three teachers, a literacy coach and district administrator. According to Glesne (2011), “Qualitative researchers have an active role in producing the data they record through the questions they ask and the social interactions in which they take part” (p. 47). Semi-structured interviews using an interview guide to ensure that the interviewer obtains similar information from each participant should keep the interactions focused (Merriam, 2009). The instrument used in this study was the in-depth interview. McMillan and Schumacher (2010) described the in depth interview as, “Use open-response questions to obtain data on participants’ meaning.” The interviews were audio
recorded and transcribed. Coding procedures were used for the data collection. Codes was assigned to reference such items as perspectives held by the teachers, literacy coach and district administrator. Strauss and Corbin (1990) suggest coding procedures including: open coding, axial coding and selective coding. They describe open coding as data being broken down into discrete parts, closely examined, and compared for similarities and differences while axial coding puts those data back together in new ways by making connections in a category and its subcategories (Strauss & Corbin, 1990). Selective coding is used to identify the core category of data and relating it to other categories of data (Strauss & Corbin, 1990). Selective coding involves selecting a core category, systematically relating it to other categories, validating those relationships, and filling in categories that need further modification and development (Strauss & Corbin, 1990). The coding of the data helped the researcher analyze and describe developing themes. Describing and analyzing the themes from the data answered the research questions and formed an in depth understanding of the central phenomenon (Stauss & Corbin, 1990).

Data triangulation was used for “convergence, corroboration, correspondence of results” from data in order to increase the validity of the study among multiple levels of bias and to gain an understanding of the impact of the summer reading program’s impact on students’ reading achievement and reading motivation (Greene, Caracelli, & Graham, 1989).

A triangulation design analyzed data from the interviews, reading achievement scores, and motivation to read profile scores. Using a concurrent triangulation strategy an assessment of the intervention’s overall effectiveness relative to the project’s objectives
was generated. The decision to use a concurrent triangulation design rested in the strategy’s reputation for generating well-validated and substantiated findings as well as the relatively short data collection time period when compared to sequential strategies (Creswell, 2003).

Validity and Reliability

Validity and reliability of both the data and findings was ensured by various means. Reliability refers to the extent to which the methods used in the study are consistent or can be replicated with similar results. The consistency would give the school confidence that the results actually represented the effectiveness of the program.

An assessment instrument is useful only if it is valid and reliable. Validity refers to the extent to which the researcher uses methods and procedures that ensure a high degree of research quality and rigor. Gall, Borg, and Gall (2003) described validity as the appropriateness, meaningfulness, and usefulness of the inferences made based on the data collected. There are a variety of ways to collect evidence and validity refers to the degree to which evidence supports any inferences of the researcher (Cresswell, 2013). On the other hand, reliability refers to the ability of the instrument to consistently measure that trait.

Yin (2011) emphasizes the use of construct validity, internal validity, external validity, and reliability to establish quality of research. Yin (2011) emphasizes that construct validity establishes correct operational measures for the concepts being studied. Yin (2011) recommends that researchers use three tactics to increase construct validity in the design of their study, by using multiple sources of evidence, establishing a chain of evidence, and having key informants review the draft of the case study report. Along
these same lines, Yin (2011) also suggests that researchers increase the reliability of the information in a case study by establishing a clear chain of evidence that will allow an external observer to follow the derivation of any evidence from initial research questions to ultimate case study conclusions. Lincoln and Guba (1996) state the second test for judging the quality of a research design is internal validity and assessing internal validity is the central means for ascertaining the “truth value” of a given inquiry, that is, the extent to which it establishes how things really are and really work. Internal validity is also known as credibility, which is the degree of confidence that the findings of a particular inquiry have truth for the subjects with whom the study was carried out (Lincoln & Guba, 1996).

The different sources of data allowed for triangulation of the data, thereby enhancing reliability and validity of the data. Triangulation refers to checking the consistency of findings obtained by different methods of data-collection, checking the consistency of data obtained from different sources using the same method, using more than one researcher to review findings, repeating the same study in multiple sites of the same community or culture and using different perspectives or theories to interpret the data (Patton, 2001).

Summary

This combined methods study was designed to determine the impact that a voluntary summer reading intervention program had on students’ reading achievement and reading motivation. Chapter Three presented an introduction to the methodology approach and design to the study. In addition, descriptive information that was used to answer the research questions were provided. The descriptive information included: the
participants, research site, study’s validity and reliability, data collection and procedures, and data analysis. Finally, ethical considerations were addressed to ensure confidentiality.
CHAPTER FOUR

FINDINGS

The purpose of the study was to determine the impact of a voluntary summer reading intervention program that provided eight books to third grade students to read over the summer. Based on the literature, the goal of the summer reading intervention program was an attempt to mitigate reading loss and reading motivation that students experience during the summer, especially students living in poverty.

The methodology for this study was combined methods, in which both qualitative and quantitative data was collected, analyzed separately, and merged for interpretation related to the study. By gathering and analyzing both types of data sets, a comprehensive analysis of the research questions was achieved. Using the Statistics Package for the Social Sciences v. 22, paired t-tests were administered using data collected in the spring 2015 and fall 2015 before and after the summer reading intervention program. The MAP Reading scores and Motivation to Read Profile Survey scores provided information for the quantitative research questions. Data for the qualitative question was gathered using one question developed to gain free and open responses from the participants during a 20 to 30 minute interview. The question was open enough to allow them to elaborate beyond the question, as they felt necessary. The sampling consisted of teachers of third-grade students only, a literacy coach and a district administrator. The participants were all educators presently employed in the elementary school and school district.
The outcomes of the study help explain how a voluntary summer reading intervention program impacts third grade students’ reading achievement and reading motivation.

The quantitative research questions of the study determined the difference that participation in a summer reading intervention program have on third grade students’ reading achievement and reading motivation in a rural school district. The qualitative research question involved analyzing the perceptions of teachers and instructional leaders with respect to the effects of a summer reading intervention program on students’ reading achievement and reading motivation. The research questions of this study are as follows:

RQ1. What is the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students in a rural school district?

RQ2. What is the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district?

RQ3. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district?

RQ4. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation of third grade students in a rural school district?

RQ5. What are teachers’ and instructional leaders’ perceptions of the HSCB summer reading intervention program in a rural school district?
The independent variable in research questions 1-4 was the HSCB voluntary summer reading intervention program. The goal was to ensure that students had access to books on their reading level and reading interest to read over the summer. The dependent variables in research questions 1-4 were the students’ score on the MAP Reading Assessment and the Motivation to Read Profile Survey score. The spring (end of school year) reading achievement and reading motivation scores were compared to the students’ scores on the same instruments used in the fall (beginning of school year). The goal was to determine if providing students with eight self-selected books on their independent reading level and preference to read over the summer would mitigate summer reading loss and develop a stronger sense in the student of being a confident reader who values reading.

This chapter provides the results from the statistical methods outlined in the previous chapter that were used to answer the research questions. The results of the data analysis for the study’s research questions are presented separately for the research questions that were addressed using quantitative vs. qualitative methods. Research results for questions 1-4 addressed using quantitative methods are presented first, followed by results for the qualitatively addressed research question 5. The statistical outcomes are provided for the quantitative research questions. Next, the results of the statistical tests are presented along with additional analyses of the data sets relevant to further investigation of the research questions.

Findings Related to Research Question 1

The researcher collected data from the pretest/posttest MAP Reading Achievement scores to determine the difference between spring (difference in
pretest/posttest scores) and fall. The sample obtained for quantitatively addressing this study’s research questions consisted of third grade students in an elementary school of a rural school district. The students were randomly assigned to a group (group 1) that received eight self-selected books matched to their independent reading level and interest.

<table>
<thead>
<tr>
<th>Research Question</th>
<th>Measurement</th>
<th>Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>RQ1. What is the impact of the HSCB summer reading intervention program providing eight books on the reading achievement of third grade students in a rural school district?</td>
<td>MAP Reading Achievement Score</td>
<td>Paired t-test</td>
</tr>
</tbody>
</table>

**Figure 4.1. Research Question 1.**

A RIT score indicates the difficulty level at which the student is answering about 50% of the questions correctly (NWEA, 2015). RIT scores range from about 140 to 300. Students typically begin at a level of 140 to 190 in the third grade and progress to the level of 240 to 300 by the time they are assessed in high school. A typical high reading score is 240.

The results for this research question are shown below in Tables 4.1, 4.2, and 4.3. A paired-samples t-test was conducted to compare Spring MAP Reading RIT Scores to Fall MAP Reading RIT Scores. For the 3rd grade students participating in the summer reading intervention program ($N=43$), the test showed that the difference in the MAP Reading RIT scores between Spring ($M=191.42$, $SD=8.161$) and Fall ($M=192.09$, $SD=18.217$) was not a statistically significant; $t= (.527) =, p = .3005$. Further, in order to determine the magnitude of the difference the summer reading intervention program made on student’s reading achievement, the effect size was calculated. The Cohen’s effect size value ($d=.037$) suggested a small effect.
Table 4.1

**Difference in Change of Scores on Spring 2015 and Fall 2015 Reading Achievement**

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>n</th>
<th>Std. Deviation</th>
<th>Standard Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spring 2015 MAP Reading RIT Score</td>
<td>191.42</td>
<td>43</td>
<td>18.161</td>
<td>2.770</td>
</tr>
<tr>
<td>Fall 2015 MAP Reading RIT Score</td>
<td>192.09</td>
<td>43</td>
<td>18.217</td>
<td>2.778</td>
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Table 4.2

**Paired Samples t-test Statistics for Table 1**

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<tr>
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<th>95% Confidence Interval of the Difference</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Std. Deviation</td>
<td>Std. Error Mean</td>
<td>Lower</td>
<td>Upper</td>
<td>t</td>
<td>df</td>
<td>Sig. (1-tailed)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spring 2015 MAP Reading Score and Fall 2015 MAP Reading Score</td>
<td>-0.674</td>
<td>8.397</td>
<td>1.281</td>
<td>-3.259</td>
<td>1.910</td>
<td>-0.527</td>
<td>42</td>
<td>.3005</td>
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<td></td>
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</tbody>
</table>

Table 4.3

**Paired Samples Correlations**

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Correlation</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spring 2015 MAP Reading Score</td>
<td>43</td>
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<td>.000</td>
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<tr>
<td>Fall 2015 MAP Reading Score</td>
<td></td>
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</table>

**Findings Related to Research Question 2**

The researcher collected data from the pretest/posttest Motivation to Read Profile Survey scores to determine the difference between spring (difference in pretest/posttest scores) and fall. The sample obtained for addressing this study’s quantitative research questions consisted of third grade students in a rural elementary school. The students
were randomly assigned to a group (group 1) that received eight self-selected books on their independent reading level.

The results for this research question are shown below in Tables 4.4, 4.5, and 4.6. A paired-samples t-test was conducted to compare Spring Motivation to Read Profile Survey Scores to Fall Motivation to Read Profile Survey Scores. For the 3rd grade students participating in the summer reading intervention program (N= 26), the test showed that the difference in the Motivation to Read Profile Survey scores between Spring (M= 76.19, SD=11.239) and Fall (M=79.81, SD=10.334) was not a statistically significant; t = (-1.578), p = .0635. Further, in order to determine the magnitude of the difference the summer reading intervention program made on student’s reading motivation, the effect size was calculated. The Cohen’s effect size value (d=-0.35) suggested a small effect.

<table>
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<tr>
<th>Research Question</th>
<th>Measurement</th>
<th>Data Analysis</th>
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<td>RQ 2. What is the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district?</td>
<td>Motivation to Read Profile Survey Score</td>
<td>Paired t-test</td>
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</tbody>
</table>

*Figure 4.2. Research Question 2.*

**Table 4.4**

*Difference in Change of Scores on Spring 2015 and Fall 2015 Reading Motivation*

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>n</th>
<th>Std. Deviation</th>
<th>Standard Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spring 2015 Motivation to Read Profile Survey Score</td>
<td>76.19</td>
<td>26</td>
<td>11.239</td>
<td>2.204</td>
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<tr>
<td>Fall 2015 Motivation to Read Profile Survey Score</td>
<td>79.81</td>
<td>26</td>
<td>10.334</td>
<td>2.027</td>
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Table 4.5

**Paired Samples t-test Statistics for Table 4**

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<th>Mean</th>
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<th>Std. Error Mean</th>
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<th>Upper</th>
<th>t</th>
<th>df</th>
<th>Sig. (1-tailed)</th>
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</thead>
<tbody>
<tr>
<td>Fall 2015 Motivation to Read</td>
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<td></td>
<td></td>
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<td></td>
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Table 4.6

**Paired Samples Correlations**

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<thead>
<tr>
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<th>Correlation</th>
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<tbody>
<tr>
<td>Spring 2015 Motivation to Read</td>
<td>26</td>
<td>.416</td>
<td>.035</td>
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<tr>
<td>Fall 2015 Motivation to Read</td>
<td></td>
<td></td>
<td></td>
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**Findings Related to Research Question 3**

The researcher collected data from the pretest/posttest MAP Reading RIT scores to determine the difference between spring (difference in pretest/posttest scores) and fall. The sample obtained to address this study’s quantitative research questions consisted of third grade students in an elementary school of a rural school district. The students were randomly assigned to a group (group 3) that received eight self-selected books on their independent reading level.

<table>
<thead>
<tr>
<th>Research Question</th>
<th>Measurement</th>
<th>Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>RQ3. What is the impact of HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district?</td>
<td>MAP Reading Achievement Score</td>
<td>Paired t-test</td>
</tr>
</tbody>
</table>

*Figure 4.3. Research Question 3.*
A RIT score indicates the difficulty level at which the student is answering about 50% of the questions correctly (NWEA, 2015). RIT scores range from about 140 to 300. Students typically begin at a level of 140 to 190 in the third grade and progress to the level of 240 to 300 by the time they are assessed in high school. A typical high reading score is 240.

The results for this research question are shown below in Tables 4.7, 4.8, and 4.9. A paired-samples t-test was conducted to compare Spring MAP Reading Scores to Fall MAP Reading RIT Scores. For the 3rd grade students participating in the summer reading intervention program ($N = 24$), the test showed that the difference in the MAP Reading RIT scores between Spring ($M = 186.79$, $SD = 17.98$) and Fall ($M = 187.21$, $SD = 17.398$) was not statistically significant; $t = (-0.339)$, $p = .005$. Further, in order to determine the magnitude of the difference the summer reading intervention program made on student’s reading achievement, the effect size was calculated. The Cohen’s effect size value ($d = -0.024$) suggested the effect was small.

Table 4.7

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>N</th>
<th>Std. Deviation</th>
<th>Standard Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spring 2015 MAP Reading Score</td>
<td>186.79</td>
<td>24</td>
<td>17.98</td>
<td>3.633</td>
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<tr>
<td>Fall 2015 MAP Reading Score</td>
<td>187.21</td>
<td>24</td>
<td>17.398</td>
<td>3.551</td>
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</table>
Table 4.8

*Paired Samples t-test Statistics for Table 7*

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<th>Mean</th>
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<th>Std. Error of the Difference</th>
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<th>Upper</th>
<th>t</th>
<th>df</th>
<th>Sig. (1-tailed)</th>
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</thead>
<tbody>
<tr>
<td>Fall 2015 MAP Reading Score</td>
<td>-0.417</td>
<td>6.021</td>
<td>1.229</td>
<td>-2.959</td>
<td>2.126</td>
<td>-2.349</td>
<td>23</td>
<td>.185</td>
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</tbody>
</table>

Table 4.9

*Paired Samples Correlations*

<table>
<thead>
<tr>
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</thead>
<tbody>
<tr>
<td>Spring 2015 MAP Reading Score</td>
<td>24</td>
<td>0.942</td>
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</table>

Fall 2015 MAP Reading Score

**Findings Related to Research Question 4**

The researcher collected data from the pretest/posttest Motivation to Read Profile Survey scores to determine the difference between spring (difference in pretest/posttest scores) and fall. The sample obtained for addressing this study’s quantitative research questions consisted of third grade students in an elementary school of a rural school district. The students were randomly assigned to a group (group 3) that received eight self-selected books on their independent reading level.
Research Question 4. What is the impact of HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation of third grade students in a rural school district?

Figure 4.4. Research Question 4.

The results for this research question are shown below in Tables 4.10, 4.11, and 4.12. A paired sample t-test was conducted to compare Spring Motivation to Read Profile Survey Scores to Fall Motivation to Read Profile Survey Scores and determine if there was a difference. For 3rd grade students participating in the summer reading intervention program (N=16), the test showed that the difference in the Motivation to Read Profile Survey scores between Spring (M=80.81, SD= 9.418) and Fall (M=80.13, SD=11.313) was not statistically significant; t= (.250), p = .005. Further, in order to determine the magnitude of the difference the summer reading intervention program made on student’s reading motivation, the Cohen’s effect size value (d=0.072) suggested a small effect.

Table 4.10

<table>
<thead>
<tr>
<th>Difference in Change of Scores on Spring 2015 and Fall 2015 Reading Motivation</th>
<th>Mean</th>
<th>n</th>
<th>Std. Deviation</th>
<th>Standard Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spring 2015 - Motivation to Read Profile Survey Score</td>
<td>80.8125</td>
<td>16</td>
<td>9.41785</td>
<td>2.35446</td>
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<tr>
<td>Fall 2015 - Motivation to Read Profile Survey Score</td>
<td>80.1250</td>
<td>16</td>
<td>11.31297</td>
<td>2.82824</td>
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</tbody>
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Table 4.11

 paired samples t-test statistics for table

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<th>95% confidence interval of the difference</th>
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<td>Spring 2015</td>
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</tr>
<tr>
<td>Motivation to Read Profile Survey Score</td>
<td>Mean</td>
</tr>
<tr>
<td>.68750</td>
<td>11.01949</td>
</tr>
<tr>
<td>Fall 2015</td>
<td></td>
</tr>
<tr>
<td>Motivation to Read Profile Survey Score</td>
<td>Mean</td>
</tr>
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</table>

Table 4.12

Paired samples correlations

<table>
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<th></th>
<th>N</th>
<th>Correlation</th>
<th>Sig.</th>
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<tbody>
<tr>
<td>Spring 2015 Motivation to Read Profile Survey Score</td>
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<td>.447</td>
<td>.083</td>
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<tr>
<td>Fall 2015 Motivation to Read Profile Survey Score</td>
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Findings Related to Research Question 5

<table>
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<tr>
<th>Research Question</th>
<th>Measurement</th>
</tr>
</thead>
<tbody>
<tr>
<td>RQ5. What are teachers’ perceptions of the effects of HSCB with or without phone calls of third grade students?</td>
<td>Perceptions Interviews</td>
</tr>
</tbody>
</table>

Figure 4.5. Research Question 5.

Overview of Teachers and Instructional Leaders

The researcher collected data for the qualitative research question which involved analyzing a literacy coach’s, teacher’s and district administrator’s perceptions of the
summer reading intervention program on students’ reading achievement and reading motivation.

**Participant 1:** Teacher A has 17 years of teaching experience. She has a master’s degree. The researcher knew the teacher and had an established relationship prior to the interview, which resulted in a comfortable interview process.

**Participant 2:** Teacher B has approximately 28 years of experience with a master’s degree with 30 additional graduate hours. She has taught various grade levels of elementary school. The interview took place at the researcher’s house. The researcher has an established relationship with the teacher and she readily answered each question thoughtfully.

**Participant 3:** Teacher C has 16 years teaching experience. She has a master’s degree. The interview was conducted in the researcher’s home. The researcher has known the teacher over 10 years before she became a teacher, so there was an established relationship.

**Participant 4:** The literacy coach has over 21 years teaching experience but is no longer a classroom teacher. She has a doctoral degree in Curriculum Studies. She has coordinated and implemented the district’s summer reading program for 4 years. The literacy coach and the researcher have an established relationship. The interview was conducted at a restaurant and was relaxed. The literacy coach has extensive knowledge in literacy and experience with developing and facilitating summer reading programs. She was able to share her deep knowledge of pedagogy, reading engagement, and the process of reading throughout the interview.
Participant 5: The district administrator worked in the school district for 24 years. He was a biology teacher, elementary school Assistant Principal, Principal, and Associate Superintendent for 8 years. He was a supportive district leader who had a passion for literacy and helping students overcome barriers with reading. He was instrumental in starting the summer reading program for district as well as finding funding for the program. Various literacy initiatives in the district and the summer reading program evolved from his vision.

Summary of Themes

The following question was asked during the interviews: “What comments do you have about the impact of the 2015 summer reading intervention program on your student’s reading achievement and reading motivation?”

As a result of the question asked and answers provided, several themes surfaced. The themes identified were:

- Access to Books
- Mitigation of Summer Reading Loss
- Impact of the program
- Impact on Families and Community
- Reading Motivation and Engagement
- Reading Achievement

Theme #1: Access to Books

The participants felt that providing access to books had a powerful impact especially because the students are from homes that do not have access to books. Not only was it exciting and fun for the students to receive the eight new free books that they
chose to take home, but the books provided an opportunity for students to practice reading more at home. The district administrator indicated that the books made a positive difference. He stated, “Providing students access to books during the summer has also positively impacted the overall attitude and culture of literacy throughout the community.” Teacher C explained, “I think the summer reading intervention program is a great way to encourage reading in a fun, engaging way when students have the opportunity to “shop” for high interest books. Research supports the program.” Teacher C shared an insert, which stated,

A study of summer setback among economically disadvantaged elementary school students by Allington et al. (2010) concluded that “This study provides the best evidence to date that ensuring easy and continuing access to self-selected books for summer reading is one potential strategy for addressing summer reading setback and, therefore, addressing the reading achievement gap that exists between students from more and less economically advantaged families” (p. 423-424).

**Theme # 2: Mitigation of Summer Reading Loss**

Another theme that emerged from the data related to the impact of the summer reading intervention program on mitigating reading loss over the summer. Each participant felt that the summer reading intervention program addressed the patterns of reading loss the students experienced prior to the implementation of the summer reading intervention program.

The district administrator stated, “Based on longitudinal data, the summer reading intervention program implemented in a rural high-poverty school district has mitigated
summer learning loss for students in grades one through four.” He also mentioned, “The experimental design of the summer reading intervention program provided valuable information to guide system practice relative to the strategies that were most successful in either mitigating learning loss or, in many cases, promoting growth in student reading measures.”

Theme #3: Impact of the Program
The district administrator stated, “Based on analysis of the data the, program was most effective in grades six through eight which provides evidence for expansion into additional grade levels.”

Theme #4: Impact of the Program on Families
Closely related to the impact of the program on the students is the third theme of the study, impact on families and community. Providing books to students for multiple years in the early grades has enabled families to create home libraries that can be used by siblings for voluntary reading. The literacy coach stated,

As we move forward, what I hope to see is that children, that it becomes kind of a snowball effect. While we continue to give the books to children I want to see younger brothers and sisters coming to school and already knowing what it is like to have a home library and parents who continue to attend our parenting meetings and ask about the books and talk about creating a space for reading in their home and a place for all the books to come. The parent piece is so critical to the summer loss especially but also just to create a community of readers and ultimately that’s our goal is to become a community who is known for their commitment to reading and the enjoyment of reading.
Theme #5: Views of Reading Motivation and Engagement

Each of the participants felt that students benefited from the summer reading intervention program. Teacher A said,

Did not lose her gains from the 2014-2015 school year, it made her 4th grade year much easier. I think that did make her somewhat more willing to read although it still isn’t her favorite thing to do. The pressure to do well in school coming from home really overshadowed everything.

The literacy coach’s perception of the summer reading intervention program were positive. She emphasized,

When we look at data, historically from previous years, each year of the summer reading, we see a higher engagement in the classrooms. We see that when teachers work on stamina and looking at stamina charts, the students accelerate much more quickly from 5 minutes to 10 minutes to we had some that started out the year at 15 minutes which is definitely different than the years past that could be contributed to the summer reading.

She continued stating,

The biggest impact that I get to see every summer is when we give the books out and there is still a week left of school and the students come off the buses bringing the books back even though they are told not to and to keep them for the summer but they are so excited and usually they have read 2 or 3 of them before the summer or summer reading begins just because they are excited and the comments they make like these are my books and I am going to add these to my library, I know where they are going. It’s an amazing site to see students file off
the bus the morning before school gets out and every single child walks by you reading a book.

The students who truly did read over the summer many of them came back from the summer knowing what books they wanted to read next and so much with the stamina issue it was students being able to choose just right books easier because they had books in mind and they had some experiences with the book give away the spring before and see lots of titles that they want to read.

**Theme # 6: Impact of the Program on Reading Achievement**

Concerning the participants, the literacy coach explained, For the students who participated in the summer reading intervention program it was mixed. We do not ever have completely accurate data on who actually did the reading. Based on their letters, the students who completed their summer, my summer as a reader, showed they had been reading, I would say a high percentage of them demonstrated no summer loss and we did have a small percentage who saw an increase in their reading level over the summer.

Teacher B and Teacher C both felt like they had specific students who showed a difference in reading achievement after partaking in the summer reading intervention program. Teacher B reflected on two of students who came to mind when she reflected on the summer reading program. Teacher B stated,

The program impacted the readers in different ways. One of my students reading achievement increased during the year. Her love of reading increased- as well as her fluency, accuracy, and comprehension. She enjoyed telling me her “connections” to the story as well as making connections to characters. She really
enjoyed our study on character traits – physical vs. emotional. She loved to draw visual images during our Read-Aloud book and even had a few other little girls help her draw all the characters from the Humphrey series written by Betty G. Birney. The characters were so adorable, I laminated them and put them in the hall advertising the book. Another student demonstrated improvement in reading achievement during third grade. Her comprehension increased as well as her love of reading. She learned to make connections and used her connections to draw conclusions and make inferences.

Teacher C stated,

At the end of the Spring 2015 academic school year, one of my students was reading near the beginning of grade 1. She knew a small amount of sight words such as; it, I, the, and too. She struggled with words like; and, has, and here. Her handwriting was extremely illegible and her spelling was very weak. She was unable to write any correct writing sequences in a given 4 minute time frame. She was able to read only 20 words per minute on a grade 1 reading fluency passage. After participating in the summer program, her Fall 2015 benchmark score was at the mid-grade 1 reading level. She picked up on a larger chunk of sight words, relied less on pictures, and began using more reading strategies to help with unfamiliar words. However, her written expression skills, including spelling, did not offer much progress.

While all of the data outcomes in this study did not translate into significant increased scores, reducing students’ resistance to read was meaningful for teachers and students. Teachers believed that students, who participated in the summer reading
intervention program returned to school the following school year with a positive attitude about reading, were more confident in the classroom, had a desire to read beyond what was expected, and perceived reading as important. Teachers also observed that students entered the school year ready to learn, had improved reading achievement outcomes, appeared to have enjoyed reading more, and were more motivated to read.

The structure and components of the summer reading intervention program, teacher’s understanding of the more children read, the better their reading achievement will become, and teacher’s attitudes towards supporting students as readers helped to change students’ attitudes towards reading. Similar to the impact that the summer reading intervention program had on students’ excitement about reading, the program increased teachers’ knowledge, level of confidence and excitement about supporting their students as readers. As teachers’ knowledge and attitudes transformed, they were more effective with supporting their readers through curriculum and instruction. Both teachers and students were excited about receiving the free books for the summer reading intervention program. Many teachers’ attitudes shifted to being excited after recognizing and witnessing the benefits of the summer reading intervention program including their students having books to read on their reading level, books in their homes, and opportunities to read over the summer to mitigate summer reading loss.

Summary

This chapter presented quantitative and qualitative data from different instruments and integrated the results using a combined-methods model in order to address the research questions within the study. The researcher examined each question with a statistical analysis and a presentation of text that addressed the research questions.
Research Question 1 focused on the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students.

Research Question 2 focused on the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district.

Research Question 3 focused on the impact of the HSCB summer reading intervention program consisting of books and phone calls on the reading achievement of third grade students in a rural school district.

Research Question 4 focused on the impact of the HSCB summer reading intervention program consisting of books and phone calls on the reading motivation of third grade students in a rural school district.

Research Question 5 focused on teachers’ and instructional leaders’ perceptions of the HSCB summer reading intervention program in a rural school district.

The data was analyzed to determine the impact of the summer reading intervention program, *Hot Summer, Cool Books* (HSCB) implemented over the summer of 2015 on third grade students in a rural high poverty school district. The results indicated that there was no significant difference in the reading achievement and reading motivation after participating in the summer reading intervention program. The perception data indicated that the summer reading intervention program made a difference for the students who participated in the program.
CHAPTER FIVE

DISCUSSION

This study was designed to determine the impact of the summer reading intervention program, Hot Summer, Cool Books (HSCB) implemented over the summer of 2015 on third grade children in a rural, high-poverty school district. Three instruments were used in this research study. These instruments included MAP Reading Assessment, Motivation to Read Profile Survey, and interviews.

In an effort to combat summer reading loss and improve students’ motivation to read, a rural school district began implementing a summer reading intervention program in 2012. This study focused on the implementation of the 2015 summer reading program. The program provided students with eight books matched to their reading level and reading interest in order for them to have access to books and engage in reading. In a 2004 study, researchers found that students who read four or five books over the summer could prevent summer learning loss (Allington et al., 2010). The school district in this study also anticipated that giving students free books would provide access to books, help to create or add to their home library. Each of these ideas would increase students’ motivation to read and help them to avoid decline in their reading skills while at home for summer vacation. The research questions of this study were to determine the following:
RQ1. What is the impact of the HSCB summer reading intervention program consisting of eight books on the reading achievement of third grade students in a rural school district?

RQ2. What is the impact of HSCB summer reading intervention program consisting of eight books on the reading motivation of third grade students in a rural school district?

RQ3. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading achievement of third grade students in a rural school district?

RQ4. What is the impact of the HSCB summer reading intervention program consisting of eight books and phone calls on the reading motivation of third grade students in a rural school district?

RQ5. What are teachers’ and instructional leaders’ perceptions of the HSCB summer reading intervention program in a rural school district?

It was anticipated that the program would reduce or eliminate summer reading loss for the participants and positively impact reading motivation. The existing research indicated that students who do not have access to books over the summer suffer from declines in reading achievement (Allington et al., 2010). Likewise, readers who are motivated will engage in more reading. Providing books matched to students’ reading levels and reading interest should reduce this loss as the students will be more likely to read over the summer. It was also expected that students’ confidence in reading and motivation to read would improve as a result of participation in the program.
Interpretation of the Data

An analysis of the data helped to determine the impact the summer reading intervention program, *Hot Summer, Cool Books* (HSCB) implemented over the summer of 2015 had on third grade children’s reading achievement and reading motivation. The researcher gathered data to determine the impact of the summer reading program had on students’ reading achievement and reading motivation by determining the difference between the students’ reading achievement and reading motivation before and after participating in the program. Data also helped to conclude how teachers and district instructional leaders’ perceived the impact of the summer reading program on the students’ reading achievement and reading motivation. The results of this combined-methods research was gathered using two quantitative instruments and a qualitative instrument.

Previous longitudinal research data for the *Hot Summer, Cool Books* program consistently showed a reduction in the amount of learning loss experienced over the summer months in experimental groups. The quantitative data, provided through the MAP Reading assessments and the Motivation to Read Profile Survey, did not show a statistically significant difference in the reading achievement and reading motivation pre and post scores for the 2015 implementation of the program. Results of the study did not show the significant differences as supported by other research that show when students who participate in summer reading programs they will score higher on reading achievement tests at the beginning of their fourth grade year than the students who did not participate in a program. However, the findings indicate that participation in a summer reading intervention program combats summer reading loss. As the reading loss
is continuously addressed and mitigated each summer through a summer reading intervention program that provides access to books, it is predicted that students will score higher on reading achievement tests at the beginning of the school year.

Additionally, the qualitative data, provided through interviews indicated that the participants felt the HSCB summer reading intervention program was beneficial to students. The teachers and instructional leaders reported that the students who participated in the program demonstrated improved reading skills, reading motivation, reading enjoyment, and confidence in reading. The data collected from the interviews was supportive of the literature on summer reading intervention programs and reading motivation.

**Implications of Findings**

The research findings on summer reading intervention programs should inform school districts, policy, and efforts to design effective interventions to support students’ reading achievement during the summer vacation. The consistent finding that children living in poverty have the greatest need for summer reading programs suggest that when designing and implementing summer reading intervention programs, they must include effective practices and be implemented with fidelity. Using the research that has identified research-based best practices for implementing school reading intervention programs, efforts to design and implement effective summer reading intervention programs should include components, strategies, and resources that have been shown to be effective.
Connections to Other Research

The outcomes of the study connect to other bodies of research on providing students with access to books and participation in summer reading intervention programs supports students reading achievement and reading motivation. Bodies of research suggest that increasing low-income students’ access to books during the summer months fosters reading activity thus minimizes summer reading loss (Allington & McGill-Franzen, 2008). Furthermore, existing bodies of research on the implementation of summer reading programs have documented summer reading programs as an intervention to mitigate summer reading loss (Allington, 2012). While the difference in reading achievement scores for students who participated in the summer reading intervention program were not statistically significantly different, the small difference suggests that the program made a difference. The outcomes for the qualitative research question analyzing the perceptions and attitudes of teachers and instructional leaders with respect to the effects of summer reading intervention program on students’ reading achievement and reading motivation connects to bodies of research that suggest increasing low-income students’ access to books during the summer months fosters reading activity and thus minimize summer reading loss (Allington & McGill-Franzen, 2008).

Recommendations for Future Studies

After analyzing the results of this study there are several recommendations that could be made for future research based on this study. Most research on summer reading programs have focused on the effects of summer reading programs. Studies on summer reading loss provide students with books as an intervention. However, they do not measure whether students have read the provided books. To gain an understanding of
what students do with the books provided for summer reading, the types of experiences students had over the summer, and what educational activities they engaged in during the summer, data should be collected. Likewise, a reading log signed by a parent/guardian that includes the free books students read for the program and any books beyond the free books provided by the program should be collected from participants. Studies show that different methods including phone calls are made to students’ homes to encourage student to read over the summer. Because often the phone calls do not reach the students’ home for various reasons, other methods to improve this contact feature to encourage support should be explored.

**Researcher’s Claim**

Despite the challenges associated with planning, implementing, maintaining, and funding a summer reading program, the district in this study is committed to providing a meaningful, purposeful summer reading program in efforts to combat summer reading loss. The supportive leadership from the district administrator who valued the program and dedication of the dedicated and knowledgeable literacy coaches who executed the program’s vision made a significant positive difference in the lives of children in the district. The school district’s efforts to address the needs of students to be able to read on grade level and combat the potential for achievement loss over the summer three years prior to the Read Succeed Act, made a significant difference in helping to increase students’ engagement in literacy, promote life-long reading, and create a culture of reading in the schools and the school community. Furthermore, the district’s proactive approach to not only provide students with access to books, but provide books that appeal to the students’ interests through a highly structured summer reading program made a
significant positive difference in students’ reading achievement and student’s attitudes toward reading. The students demonstrated consistent gains in their academic achievement and displayed positive feelings regarding the summer reading program each summer. Likewise, students and parents expressed positive attitudes about having choice in their reading selection and the opportunity to read over the summer. Not only has the summer reading program had a positive impact on students but also it has had a significant impact on families and community members. Parents value the opportunity to engage in reading with their children throughout the summer with books that their children enjoy reading. Homes where families did not value reading transitioned to homes that had a desire to devote family time to reading. Similarly, parents and siblings expressed positive thoughts about having books at home and having opportunities to engage in reading. Older children in some homes spent time reading to younger siblings as a result of having books in the home to read. As community members understood the district’s efforts and the importance of reading, they began to support and collaborate with the school district seeking ways to extend opportunities for students, families, and other community members. In addition, the district was able to establish partnerships with a number of churches, businesses, and civic organizations that believed in their work towards increasing opportunities to read and create a culture of reading. They partnered with the school district to support the summer reading intervention program in various ways. Overall, the district has made differences in mitigating summer reading loss. In the future, now that they have lessened or stopped the reading loss for many students, they will begin to experience increased gains in the reading achievement of their students.
Conclusion

Combating summer reading loss is a crucial piece to the success of students reading achievement. Many researchers have written about the problems of summer reading loss and access to print. Researchers have also written that students’ lack of motivation leads to decreased efforts to read frequently, which results in low reading achievement. Through this combined methods this study explored the impact of the summer reading intervention program on students’ reading achievement and motivation in high poverty rural school districts. Based on the themes that emerged from this study, recommendations were made to strengthen existing summer school programs. Finally, the results of this study show that further studies are needed on summer programs that impact student achievement and reading motivation.
REFERENCES


