

**What Strategies Improve Reading Performance for Students with
ADHD in an Inclusive Setting?**

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ABSTRACT

The purpose of this quasi -experimental design study is to investigate the effectiveness of the strategies intended to improve reading comprehension for elementary students with attention deficit hyperactivity disorder in an inclusion setting. The control and treatment groups were instructed using predicting and asking questions reading techniques. Data collection consisted of administering pre and post assessments to participants to establish academic gains in reading comprehension. According to results from the study, motivational strategies affect reading performance for students with Attention Deficit Hyper Activity Disorder in inclusionary settings. The positive results from the study generate options for extending the motivational technique for longer periods of time or with additional groups of students.

CHAPTER I

Introduction

In recent years the emphasis placed on reading comprehension has gained national attention. As a result, initiatives such as Reading First and laws such as No Child Left Behind were developed to improve reading performance (Jitendra & Garjra, 2011). Many students, in particular, individuals with disabilities, experience persistent problems when comprehending text. This study expressed strategies to improve reading comprehension.

Overview

Research suggests that increasingly, inclusion has become a global agenda. Based upon the guidelines set by the Individuals with Disabilities Educational Act, disabled youngsters are to be educated with their non- disabled peers in the least restrictive environment (Laluvein, 2010). Since schools are potential sites for shared practice, inclusion is not merely a mechanism for relocating educationally disadvantaged students in neighborhood rather than in special schools. Instead, inclusion implies “a whole school approach to social relations and production of meaning reached through processes of negotiation between parents, teachers, and children” (p. 35).

Reading well or proficiently is a demanding task requiring coordination of a diverse set of skills (Roberts & Torgesen, 2008). Researchers state that good readers with and without disabilities monitor their understanding by linking new information with prior learning. When comprehension breaks down, they deploy appropriate repair strategies, like adjusting their reading rate or strategically rereading passages.

According to research, many students, especially with disabilities, struggle with reading comprehension (Manning, 2007). Although various procedures have been developed to enhance pre-reading and understanding of written material, little skill development will occur unless students choose to read. Pappas & Skinner (2010), found two strategies that have been shown to be effective for increasing the probability of students choosing to engage in academic behaviors : providing choices and strengthening reinforcement for desired academic behaviors.

Allowing students with attention deficit hyperactivity disorder to choose assignments has been shown to reduce problem behaviors and increase engagement in reading activities. Furthermore, permitting learners to choose reading material may enhance their engagement because students often choose material that they find most interesting. In the study noted in the article,” participants who chose books according to personal interest were able to meet success on the assigned task (Pappas & Skinner, 2010). Researchers indicate that in order to foster reading comprehension and motivate students to engage in given tasks, one must use reinforce desired behavior. As indicated by Pappas & Skinner , the Accelerated Reader program is designed to incorporate the elements of choice and reinforcement for reading activities. Students are allowed to choose material that is appropriate for their reading skills. When a student passes one of the quizzes in the program, the individual is given points that can be exchanged for rewards. Additionally, the incorporation of interdependent group contingencies creates a community learning environment, where all children are encouraged to meet success through group rewards.

After careful review of ADHD learners, researchers have examined best practices and the implications of including students with attention deficit hyperactivity disorder in an inclusive setting. As a result, they concluded that programs which promote repetition of reading material,

reinforcement of desired skills, and options increase reading performance. According to researchers, students with attention deficit hyperactivity disorder displayed noticeable gains in decoding, sequencing, and understanding what is directly stated in the text Boulineau et al. (2004). Moreover, examiners revealed that through the above mentioned strategies, students were able to maintain learned skills and apply them to various tasks.

Definition of Terms

Inclusion setting- is the way in which children who receives special education services are placed in regular classrooms with non-disabled students.

ADHD- is a problem with inattentiveness, over- activity, impulsivity, or a combination. For these problems to diagnosed as ADHD they must be out of the normal range for a child's age and development.

Problem Statement

What are the strategies to improve reading comprehension for students with Attention Deficit Hyperactivity Disorder in inclusionary environments?

Hypothesis

The null hypothesis for this study is there are no strategies that improve reading instruction for students with Attention Deficit Hyperactivity Disorder in inclusionary environments.

Chapter II

A REVIEW OF THE LITERATURE

This literature review explores the strategies that improve reading proficiency for students with attention deficit hyper activity disorder in an inclusive environment. Section one provides an overview of the expectancies and standards for intermediate inclusive settings. The following section explores the importance and relevance of improving reading performance for students with ADHD in inclusive environments. Section three reviews interventions to improve comprehension.

Expectancies and Standards for Intermediate Inclusive Settings

Reading is frequently considered as a hierarchy of skills, from processing of individual letters and their associated sounds, word recognition, and text-processing competencies. Skilled comprehension demands clear integration of all these processes, starting with sounding out words to grasping that sentences in paragraphs are a part of much larger texts. Furthermore, researchers have defined reading as the “ability to derive meaning from text accurately and efficiently” (Pressley, 2000, p.1). Additionally, the author notes that reading comprehension is characterized by the process of simultaneously extracting and constructing meaning through interaction and involvement with written language. Pressley suggests that decoding is a major factor in developing a thorough reading program. The author notes, before one can read words they have to be aware of the letter and sound relationships. Furthermore, the article suggests that children’s word recognition skills are critical to the development of skilled comprehenders.

According to Pressley (2000), it is indicated that students with proficient comprehension skills tend to have well established vocabularies. In a study analyzed by Pressley , fourth grade students were taught a corpus of 104 words over a 5- month period and results revealed that “the

children who received instruction outperformed non-instructed children on succeeding comprehension tests” (p.4.).

Current studies demonstrate that students with adequate comprehension skills are extremely active as they read. Pressley (2000) implies that “good readers are aware of why they are reading a text, gain an overview of the text before reading, make predictions about the upcoming text, read selectively based on their overview, and associate ideas in text to what they already know “(p.4). According to Pressley, self-monitoring is a noted characteristic of good readers. The author advocates that proficient readers know when to exert more decoding effort and able to distinguish what makes sense.

Importance and Relevance of Improving Reading Performance for Students with ADHD in Inclusive Environments

In recent years the emphasis placed on reading comprehension has gained national attention. As a result, several initiatives such as Reading First and No Child Left Behind were developed to improve reading performance (Jitendra & Garjra, 2011). Many students, in particular, individuals with disabilities experience persistent problems when comprehending text. Specifically, researchers noted that students with Attention Deficit Hyperactivity Disorder struggle in this area due to attention difficulties and impulsive behavior. According to Humphrey (2009), 80% of pupils with attention deficit hyperactivity disorder are educated in mainstream schools. ADHD is considered to be a medical condition “ characterized by inattention, difficulty in sustaining attention tasks, easily distracted (seeming not to listen when spoken to), hyperactivity which is often fidgeting with hands or feet, talking excessively, difficulty in playing or engaging in leisure activities, and impulsivity (often having trouble awaiting your

turn) several interruptions” (Humphrey, 2009, p. 19). Humphrey goes on to imply that students with AD/HD are more likely than others to” experience social isolation, with fewer reported friendships and greater levels of peer rejection “ (p. 20).

After careful review of ADHD learners, researchers have examined best practices and the implications of including students with attention deficit hyperactivity disorder in the inclusive setting. Additionally Humphrey (2009) defines inclusive settings as the” omission of withdrawal classes or other forms of integrated segregation, participation in equal educational experiences, acceptance by teachers and peers, opportunities for academic progress, and better social and emotional development due to more interaction with age/grade appropriate learners” (p. 20). Humphrey also, indicates that students with ADHD are the most difficult students to include effectively. As a result, researchers recommend creating a better fit between the school environment and the student, allowing opportunities for academic success. Furthermore, Humphrey notes that, “students with ADHD often experience difficulties in inclusion classrooms because the emphasis on meeting common needs means that their specific group needs are not addressed” (p. 21).

According to Danforth & Kim (2008), school is a place where children with ADHD diagnoses struggle and are frustrated the most. “Children described as having attention deficit hyperactivity disorder often begin to feel that they are inferior through their repeated failure experiences” (p. 59). Additionally, Danforth and Kim, suggest that “in order to avoid creating an oppositional binary between individual and community, one should also offer notions of individuality within communities of biological and cultural diversity” (p. 61).

Interventions for Improving Reading Performance for Students with ADHD

Research suggests that increasingly, inclusion has become a global agenda. Based upon the guidelines set by the Individuals with Disabilities Educational Act, disabled youngsters are to be educated with their non- disabled peers in the least restrictive environment (Laluvein, 2010). Schools are potential sites for shared practice. Therefore, as indicated by Laluvein, inclusion is not a mechanism for relocating educationally disadvantaged students in mainstream rather than in special schools. Instead inclusion implies “a whole school approach to social relations and production of meaning reached through processes of negotiation between parents, teachers, and children” (p. 35).

According to Jitendra and Garjria (2011), mastery of reading skills is apparent when students are able to identify a text’s organizational structure, which is critical for remembering and comprehending content necessary for extracting and constructing meaning. Also reading proficient students, non- disabled and disabled youngsters have the ability to tell a story depicting a sequence of events that involve major and minor events and predict how a story may unfold. Furthermore, when given informational text students, with standard reading ability are able to identify information through compare/contrast, cause/effect relationships, and problem/solution.

Good readers, as maintained by curriculum and state standards use questioning and self-monitoring techniques to derive meaning from a variety of texts. For instance, students ask themselves questions as they interact with the text information (Jitendra & Garjria, 2011). Proficient readers exhibit the ability to draw appropriate inference from the text, to study effectively and read critically. Furthermore, identifying the main idea from a text is central to

reading comprehension. In addition, the reader is able to develop generalizations or a thesis based upon the logical relationship of ideas about a topic. Also efficient reading ability provides students with the necessary strategies to summarize the structure of ideas and individual ideas relate to each other. Summarizing is a skill that “requires students to draw upon their prior knowledge to perform a series of cognitive operations on the information that is read” (Jitendra & Garjria, 2011, p.6). Based upon the study conducted with older elementary students, students whom met grade level standards in reading were interested and motivated by the written material (Roberts & Torgesen, 2008).

Reading well or proficiently is a demanding task requiring coordination of a diverse set of skills (Roberts & Torgesen, 2008). Researchers defend that good readers with and without disabilities, monitor their understanding by linking new information with prior learning. When comprehension breaks down, they deploy appropriate repair strategies, like adjusting their reading rate or strategically rereading passages.

Many students, in particular, individuals with attention deficit hyperactivity disorder struggle with various components of reading comprehension. Researchers conclude that comprehension difficulties are complex and may relate to inadequate vocabulary or conceptual knowledge, weak reasoning or inferential skills, or an inability to apply active comprehension strategies (Roberts & Torgesen, 2008). According to these researchers, youngsters who do not have proficient reading skills generally do not read very much, they miss out on countless opportunities for reading practice and learning from what they have read. Consequently, students with ADHD generally avoid reading as an independent activity, thus limiting their exposure to new vocabulary. Furthermore, the “school-related textbooks that they are required to read often fail to provide legitimate opportunities for vocabulary “(p.66). Additionally, textbooks are

typically too complex for struggling readers and require a level of content –specific prior knowledge. Attention Deficit Hyperactivity Disorder is characterized by difficulties with working memory and recall, which is holding facts in mind while manipulating information; accessing facts stored in long-term memory. Also, ADHD students struggle with activation, arousal, and effort; which are getting started; paying attention; finishing work. These skills are key components of executive function and the build blocks of the learning process. The above mentioned strategies are crucial to successful comprehension of reading tasks. Individuals with ADHD even those with adequate word-level skills and acceptable fluency, often fail to use these types of strategies, either because they lack necessary tools to identify and repair misunderstandings when they occur. Moreover, students with attention deficit disorder often lack motivation and engagement which limits opportunities to build vocabulary, develop effective reading strategies, and improve comprehension (Roberts & Torgesen, 2008).

Struggling readers have difficulty achieving academic success due to a number of internal factors. However Manning (2007) highlights the various teaching practices that prevent students from meeting curriculum standards. For instance, the author suggests that teacher inferiority complexes' concerning their ability to make decisions about how to develop comprehension, limit potential student growth. Additionally, research shows failing to assist learners in making connections through building content knowledge before studying topics, stifles progress in reading. Furthermore, Manning (2007) concludes that literal questioning techniques do not encourage youngsters to delve deeper into the text to gain understanding. Moreover, Manning implies that asking questions that are directly stated in the text minimize information gained from reading written material, and assignments lack purpose. According to Manning, little to no increase in reading performance occurs when individuals are instructed in isolation.

Additionally, the author notes that “using pencil and paper tasks has little to do with improving reading comprehension, instead the worksheet driven tasks ultimately causes students to dislike reading” (p.59). Also the author states that comprehension games that focus on logical and strategic word strategies only frustrate struggling learners, due to limited reading skills.

According to research, many students, especially with disabilities struggle with reading comprehension (Manning, 2007). Although various procedures have been developed to enhance pre-reading and understanding of written material, little skill development will occur unless students choose to read. Based upon Pappas and Skinner (2010), two strategies that have been shown to be effective for increasing the probability of students choosing to engage in academic behaviors are to provide choices and to strengthen reinforcement for desired academic behaviors.

Allowing students with Attention Deficit Hyperactivity Disorder to choose assignments has been shown to reduce problem behaviors and increase engagement in reading activities. Furthermore, permitting learners to choose reading material may enhance their engagement because students often choose material that they find most interesting. In the study noted in the article,” participants who chose books according to personal interest were able to meet success on the assigned task” (Pappas & Skinner, 2010, p. 7). Researchers indicate that in order to foster reading comprehension and motivate students to engage in given tasks, one must use reinforce desired behavior. As indicated by Pappas & Skinner (2010), the Accelerated Reader program is designed to incorporate the elements of choice and reinforcement for reading activities. Students are allowed to choose material that is appropriate for their reading skills. When a student passes one of the quizzes in the program, the individual is given points that can be exchanged for rewards. Additionally, the incorporation of interdependent group contingencies creates a community learning environment, where all children are encouraged to meet success through

group rewards. Evidence from the study conducted by Pappas and Skinner, show that when the participants were divided into three groups (middle, high, low), significant increases in reading performance for the low group were apparent across all three dependent variables. Moreover, the study concludes that for the low performers, these increases in comprehension occurred as they increased the grade level of the material they were reading .

Furthermore, as maintained by Therrein and Gormley (2008), interventions that focus on repeated reading strategies also increase understanding for students with attention deficit hyperactivity disorder. In the article, researchers review the Reread- Adapt and Answer – Comprehend (RAAC) intervention to enhance reading skills for students with disabilities. According to study results, the (RAAC) technique which incorporates question generation with repeated reading has found to effective in improving reading fluency as well as comprehension . Additionally, researchers report that this intervention requires teachers to prepare performance criteria, question prompts, differentiated reading materials, and an assessment following each reading task .

Flores and Ganz (2007) defend the effects of a direct instructional program on reading performance for students with Attention Deficit Hyperactivity Disorder. The study reviews the Corrective Reading Thinking Basics: Comprehension Level A, which consists of scripted teacher materials. Additionally, the authors note that to ensure efficient student learning the program is divided into strands of developing skills, and each lesson consists of instruction on statement inference, using facts, and analogies (Flores & Ganz, 2007). According to Flores and Ganz, following the given script, choral student responses, and using clear signals to elicit student responses are components of the program that improve comprehension for students with ADHD. Furthermore, these researchers conclude that there is a functional relationship between direction

and improved reading comprehension for disabled youngsters. Also students met criterion across the statement inference, using facts, analogies conditions. Furthermore, this study reveals that most of the students showed a performance on an upward path. In addition, students maintained the learned strategies up to a month after participating in the intervention (Flores & Ganz, 2007).

Boulineau, Fore, Burke, & Burke (2004), examine the use of story-mapping to improve reading comprehension of students with attention deficit hyperactivity disorder. Story mapping directs students' attention to relevant elements of stories using a specific structure. The intervention is administered through the instructor modeling how to organize specific ideas into the map. Additionally the instructor provides feedback as students give their responses. Boulineau et al. shows that the use of story maps increases various comprehension skills on independent tasks such as; sequencing, making connections, and understanding new information. Furthermore, they found positive increases of story mapping on reading comprehension performance for disabled learners.

Summary

After careful review of research, current studies conclude that programs that promote repetition of reading material, reinforcement of desired skills, and options increase reading performance. According to researchers, students with attention deficit hyperactivity disorder

displayed noticeable gains in decoding, sequencing, and understanding what is directly stated in the text Boulineau et al. (2004). Moreover, examiners revealed that through the above mentioned strategies, students were able to maintain learned skills and apply them to various tasks.

CHAPTER III

METHODS

Design

This study used a quasi -experimental design to determine the effectiveness of the strategies intended to improve reading comprehension for elementary students with attention deficit hyperactivity disorder in an inclusion setting.

Participants

Participants represented a convenience sample of 12 students enrolled in the fifth grade at a public Title 1 elementary school in Baltimore City, meaning that a majority of students qualify for free or reduced price meals. The treatment group, representing students with special needs instructed by the investigator, included six students. Within this group there were five African - American males and one African American female who have been diagnosed with a disability characterized by attention deficit hyperactivity disorder. Additionally, the control represented six students also taught by the investigator, and all were African- American students. The total school population consists of 479 students with free lunch and 17 students with reduced meals.

Instrument

The instrument used in this study was the Kaufman Test of Educational Achievement, which is an individually administered assessment for ages four through six, 25 composed of 14 separate subtests in Form A and B. There are two subtests for each area which form composites in reading, math, written language, and oral language. In particular, the letter-word recognition and reading comprehension make up the reading composite. Letter – word recognition requires students to identify letters and pronounce phonetically irregular words. Furthermore, the reading comprehension subtest requires students to read passages and orally answer questions about the passage. According to the Mental Measurements Yearbook, the internal consistency coefficients by age and grade are generally impressive by traditional psychometric standards, and follow a

typical pattern (Bonner, 2004). The highest stability is associated with reading composite, math composite, spelling, and word decoding, .93-.97. The validity information consists of inter correlations of subtests and composites. The KTEA- II reading composite correlates .85 with the WIAT-II across all grades. Buros's Measurement Yearbook concluded that the Kaufman Test of Educational Achievement is a highly measure of general achievement.

Procedure

The research study began on February 28, 2012. Each group met for an hour in the morning a day until the Open Court unit Making a Nation concluded on April 16, 2012. Pre - tests were administered to participants during the first week of the study. Although, schools were closed for a total of seven instructional days due to spring break, each group was able to receive quality instruction.

The first part of instruction consisted of selections one through three from the theme unit Heritage. The control and the treatment group were instructed using the suggested reading strategies; making connections, visualizing, and summarizing. A separate strategy was addressed per lesson. Participants in the control group received minimal motivation throughout the lesson and limited incentive to score 70% or better on the weekly selection test which measures comprehension of read material. However, the treatment group received frequent motivation during instruction and extra free time as a reward for satisfactory performance on end of story assessments. At the conclusion of the stories the participants took the same test.

Instruction on the second portion of the unit consisted of selections four through six, also from the theme Heritage. The control and treatment groups were instructed using; predicting and asking questions reading techniques. The students in the control continue to be minimally motivated with absence of an incentive plan for satisfactory or better performance. Whereas, the

treatment group received constant motivation during instruction and increased tangible rewards for satisfactory or better performance were implemented by the investigator. At the end of each story selection, group participants took identical tests. The post test was administered to the participants on April 16, 2012.

With the exception of motivation and incentives, all classes followed similar routines, documented accommodations, and behavior intervention plans.

CHAPTER IV

RESULTS

This study explores strategies that improve reading proficiency for students with Attention Deficit Hyperactivity Disorder (ADHD) in an inclusive environment. A convenience sample of 12 students with diagnosed ADHD was selected to participate in a pre-test assessment. Over the course of six weeks, the control and treatment groups were instructed. The students in the control continued to be minimally motivated with absence of an incentive plan for satisfactory or better performance. Whereas, the treatment group received constant motivation during instruction and increased tangible rewards for satisfactory or better performance that were implemented by the investigator. The post-test was administered to the participants to conclude the study and the results were recorded. In addition to modified instruction and materials, the participants received positive reinforcements for achieving proficiency standards.

The null hypothesis that strategies would not improve the reading proficiency for students with ADHD in an inclusionary environment was rejected based upon post-test assessment results.

Table 1 shows the means and the standard deviations of the group on the pre- and post-test measures of the reading assessment completed by the students.

Table 1 (KTEA-Reading) Pre- and Post-Test Means and Standard Deviations for the Group

Pre- Test	Post- Test
73.17 (6.55)	80.33 (5.57)

A dependent t-test was run to compare the group's pre-test and post-test means on reading performance. Results of the t-test revealed a significant difference, $t(5) = -5.207$, $p < .01$.

Analysis of the pre- and post-test data shows that implementing motivational strategies had a positive effect on student performance. As indicated in the table above the null hypothesis was rejected. There were significant differences in pre- and post-test that can be attributed to treatment. The results and their implications will be discussed in the next chapter.

CHAPTER V

DISCUSSION

The null hypothesis that reading strategies would not improve comprehension for students with ADHD in an inclusive setting was rejected. According to the data, it is evident the treatment led to enhanced reading performance. There was a significant change in reading performance of the experimental group from the pre-test results to the post- test results. The participants were motivated by using tangible rewards and positive reinforcement.

Implications of Results

In this experiment, there was a significant impact on reading comprehension for students with disabilities in an inclusionary setting, when motivational techniques are used by the instructor. The results showed that there was a significant difference between the pre-test results and the post test results for the experimental group.

In order to determine the appropriate motivation, pupils were given a list of options of incentives to receive after achieving reading standards. Therefore, providing students with choices allowed them to become active participants in the educational process and interested in learning. This is evident when analyzing post-test results. Based upon Pappas & Skinner (2010), two strategies that have been shown to be effective for increasing the probability of students choosing to engage in academic behaviors are to provide choices and to strengthen reinforcement for desired academic behaviors. Allowing students with ADHD to choose assignments has been shown to reduce problem behaviors and increase engagement in reading activities. Pappas and Skinner indicate that in order to foster reading comprehension and motivate students to engage in

given tasks, one must use reinforce desired behavior. As a result, further research can be conducted on various groups using the generalization above.

When the instructor administered the pre-test to the participants, the students displayed a lackadaisical attitude toward completing the task. In turn, they used minimal reading strategies and put forth little to no effort into meeting proficiency. As a result, throughout the study, students were instructed using research based reading improvement strategies that focused on summarizing, questioning, and visualizing. Many of the students were familiar with the techniques; however, prior to incorporating motivating incentives, they rarely demonstrated this knowledge on assessments. The results suggest that when tangible rewards are introduced, learning became meaningful and set a purpose for learning.

Threats to Validity

In a quasi-experimental study, assignment to a given treatment condition is driven by something other than random assignment and the researcher may have control. The lack of randomization makes it harder to discount variables that may affect the control and the treatment group and may cause threats to internal validity. As a result, it is difficult to use the data to determine causal relationships. Additionally, factors such as convenience and smaller groups of participants could allow threats to validity. Students actively participated in the study by completing required tasks. Internal threats to validity were minimal due proper administration of the study. Additionally, there was an adequate sample of behavior on the pre- and post-test. External forces to validity include effects of medication or lack thereof and the appropriate implementation of behavior improvement plans which could have impacted results.

The instructor followed proper testing procedures set forth in the assigned manual.

Additionally, students were assessed using appropriate setting and presentation accommodations, as stated by the individualized educational plan. In turn, threats to validity of the study were minimized. In order to increase opportunities to obtain academic success, the experiment group which consisted of special learners was allowed extra response and processing time, thus, allowing the researcher to gain a sufficient sample of performance on the pre- and post-tests.

During the study two participants experienced periods without their prescribed medications. Although the post data reflects growth in reading performance, further progress could have been achieved with proper administration of medicine as prescribed. Consequently, external factors may have impacted test validity.

Similar Research

The research performed in this study is closely related to the experiment conducted by Pappas & Skinner (2010). As indicated by Pappas & Skinner, a program designed to incorporate the elements of choice and reinforcement for reading activities with motivational techniques lead to improvements in reading performance. Evidence from the study conducted by Pappas and Skinner, show that when the participants were divided into three groups (middle, high, low), significant increases in reading performance for the low group were apparent across all three dependent variables. Moreover, the study concludes that for the low performers, these increases in comprehension occurred as they increased the grade level of the material they were reading.

Additional research suggests that teaching strategies utilized in the study promote reading proficiency for students with disabilities. Furthermore, Therrein and Gormley (2008) note that interventions which focus on repeated reading strategies also increase understanding for students with attention deficit hyperactivity disorder. Additionally, researchers report that this intervention requires teachers to prepare performance criteria, question prompts, differentiated

reading materials, and an assessment. According to the results in this study, the reread- adapt and answer –comprehend (RAAC) technique which incorporates question generation with repeated reading has found to effective in improving reading fluency as well as comprehension. In addition, all participants correctly answered more factual and inferential comprehension questions during the intervention. Furthermore, Therrien and Gormley (2008) suggested that children whom are motivated to learn adapt positive attitudes about their reading ability and are more likely to attempt reading for a variety of purposes.

Implications for Future Research

Results from the study showed that motivational strategies affect reading performance for students with ADHD in inclusionary settings. The positive results from the study generate options for extending the motivational technique for longer periods of time. Additionally, the study was limited to six participants; however increasing the number of students may yield more relatable results. Finally, the students in the study were in the intermediate elementary grade level. A study applying a motivational strategy with primary students could produce long term reading success and build a desire to learn.

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