

**EFFECTS OF AMOUNT OF VOCABULARY INSTRUCTION FOR LOW -
SOCIOECONOMIC STUDENTS**

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Researchers have long acknowledged the important role that vocabulary plays in assisting in reading comprehension. Because of the importance of vocabulary, it is necessary to determine how to ensure that all students are making adequate vocabulary gains. The purpose of this study was to determine the necessary amount of instruction for students from low socioeconomic backgrounds to make vocabulary gains. This study considered if providing additional robust vocabulary instruction was beneficial for students. In addition, this study looked to determine if there was a correlation between students' standardized vocabulary test scores prior to instruction and amount of instruction provided to make gains in vocabulary knowledge and if there was a correlation between students' posttest scores and amount of instruction provided. The results of the study indicated that additional vocabulary instruction was beneficial for all students who received it. In addition, this study revealed that there was a significant negative correlation between students' standardized vocabulary test scores and amount of instruction and there was also a significant negative correlation between students' posttest scores and amount of instruction. There are several implications for both the classroom and future research deriving from this study. In the classroom, teachers must be prepared to provide additional vocabulary instruction for students who do not master the taught words at the conclusion of initial instruction. Future research must consider guidelines to determine the appropriate amount of vocabulary instruction to provide for students from low socioeconomic backgrounds. In

addition, continued research is necessary in the area of ameliorating the proven vocabulary differences in students from low socioeconomic backgrounds and their more affluent peers.

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1.0 INTRODUCTION

1.1 OVERVIEW OF CURRENT RESEARCH

Researchers have long acknowledged a relationship between vocabulary knowledge and reading comprehension (Beck, Perfetti, & McKeown, 1982; Coyne, Simmons, & Kame'enui, 2004; Cunningham & Stanovich, 1997; National Reading Panel Report, 2000; Stahl & Nagy, 2006). This relationship has lasting educational implications for students with both high and low vocabulary levels. The implications extend beyond schooling, as well. A person's vocabulary level is viewed as a means of opening or closing access to information and helps define whether a person is considered educated (Beck & McKeown, 2002; Stahl & Nagy, 2006).

Vocabulary level is related to socioeconomic factors (Beck & McKeown, 2001; Beck, McKeown, & Kucan, 2002; Biemiller, 2004; Biemiller, 2005; Stahl & Stahl, 2004). Children from families on welfare or near the poverty line often have limited vocabularies in comparison to their peers from higher-socioeconomic households. According to the Handbook of Reading Research (1991) the vocabularies of high and low ability learners show large individual differences and the differences can be attributed to socioeconomic status. Research suggests several reasons that children from low socioeconomic households have lower vocabulary levels. Factors such as lower maternal education level, higher number of children in the home, decreased access to literacy materials, lack of exposure to literacy and cultural experiences, amount of talk in the home, and higher likelihood of being from a single parent

family all factor into decreased vocabulary levels (Biemiller & Slonim, 2001; Hart & Risley, 1995; Qi, Kaiser, Milan, & Hancock, 2006).

Given the important role that vocabulary knowledge plays in reading comprehension, the issue of children from low socioeconomic homes having limited vocabularies is alarming. There is little opportunity for these students to close the vocabulary gap unless the schools provide useful vocabulary instruction (Biemiller, 2004).

Research suggests that students should be provided with rich vocabulary instruction. Rich instruction includes utilizing questioning, providing brief explanations, pointing, clarifying and repeating, when teaching higher level vocabulary to promote vocabulary development. There is agreement by many researchers that for students to have the best chance of achieving ownership of a word the instructional encounters provided students must be rich, interactive, and multi-faceted. Researchers working to increase the vocabularies of young children have utilized trade books read aloud to students to introduce, define and discuss target words (Beck & McKeown, 2005; Brett, Rothlein, & Hurley, 1996; Coyne, Simmons, Kame'enui & Stoolmiller, 2004; Penno, Wilkinson, & Moore, 2002). Coupled with the use of trade books, researchers also advocate active involvement on the part of the learner. Several studies have shown that when students are active participants in vocabulary instruction more vocabulary words are learned (Hargrave & Senecahl, 2000; Penno, Wilkinson, & Moore 2002; Senechal, Thomas, & Monker, 1995)

The subjects in this study were from low socioeconomic homes. This population was targeted because of the research suggesting that children from low socioeconomic homes often have limited vocabularies. This knowledge taken with the understanding that vocabulary plays

an important role in reading comprehension suggests the importance of learning how best to teach vocabulary to children most at-risk of having limited vocabularies.

The purpose of this study was to determine the amount of rich vocabulary instruction necessary to increase the vocabularies of young children from low socioeconomic households. The relationship between standardized vocabulary test scores prior to instruction and amount of rich instruction necessary for vocabulary gains was also considered.

1.2 LINES OF INQUIRY

This study investigated the effects of adding additional vocabulary instruction for students who did not master taught vocabulary words after initial instruction. In addition, this study investigated the relationship between standardized vocabulary test scores prior to vocabulary instruction and amount of instruction necessary to show growth. Additionally, the relationship between the amount of vocabulary instruction presented and words known a week after instruction was examined. The study explored the following:

- What is the benefit of adding additional vocabulary instruction for students who do not master all taught words at the conclusion of initial instruction?
- What is the relationship between standardized vocabulary test scores and the amount of instruction provided to students to learn Tier 2 words?
- What is the relationship between amount of instruction and words known a week after instruction?

1.3 OVERVIEW OF STUDY

The researcher worked with one first-grade group, 21 students, from one suburban public elementary school. The elementary school services students who come from low socioeconomic backgrounds.

The vocabulary instruction provided consisted of teaching students 24 Tier 2, target words. Students were presented with vocabulary instruction for at least four weeks and up to 12 weeks, depending on each subject's vocabulary word learning.

Four separate experimenter-constructed pretest/posttest measures were used to determine words known prior to instruction and words known one week after instruction. The scores from the posttest measures were used to determine amount of words known after one week and also to determine the relationship between amount of instruction provided and amount of words known after one week of instruction.

2.0 REVIEW OF LITERATURE

2.1 OVERVIEW OF RELEVANT EDUCATIONAL LITERATURE

Reading researchers have long acknowledged the important role that vocabulary plays in influencing a child's ability to comprehend text (Beck, Perfetti, & McKeown, 1982; Coyne, Simmons, & Kame'enui, 2004; Cunningham & Stanovich, 1997; National Reading Panel Report, 2000; Stahl & Nagy, 2006). There are educational implications for students with both high and low vocabulary levels.

Students who have limited vocabularies are at-risk of not becoming proficient in reading (Beck & McKeown, 2005; Blachowicz & Fisher, 2000; Juel & Defies, 2004). The educational implications for students with limited vocabularies may extend beyond reading performance in the classroom and into all facets of the student's life. Beck and McKeown (2002) state that, "Vocabulary is the hallmark of an educated individual." (p.1). Stahl and Nagy (2006) concur that a person's vocabulary level "opens or closes access to sources of information that will affect our future." (p. 3). With the established relationship between vocabulary and reading comprehension and the implications of vocabulary knowledge on a person's future, it is clear that vocabulary instruction should play an important role in a child's schooling (Beck & McKeown, 2001; Juel & Defies, 2004).

In this chapter, four issues will be considered. The first area of research considers the issues related to children from lower socioeconomic homes having limited vocabularies and the factors related to this problem. In the second section, the current views and hypotheses around the causes of limited vocabularies in relation to growing up in poverty or near poverty line homes are discussed. The third area of research considers the educational implications for children from poverty homes, whose vocabulary is limited. The consequences of limited vocabulary knowledge on a child's ability to become proficient in reading comprehension are discussed. The final section outlines the evidence supporting methods of vocabulary instruction that support the development of all children's higher level vocabularies. Current research and theory illustrates and suggests ways that schools might work to improve children's vocabularies and reduce the problem of low vocabulary knowledge for children from poverty homes. Throughout this review, current classroom practice and theory in vocabulary instruction will be presented.

2.2 SOCIOECONOMIC STATUS AND VOCABULARY LEVEL

The issue of children from families on welfare or near the poverty line having a limited vocabulary, in comparison to their peers from higher socioeconomic households, is often referenced by researchers studying vocabulary, vocabulary instruction, and the resulting effects of different types of vocabulary instruction on preschool and school aged children. Despite the frequency of reference to the difference in vocabulary levels of children based on socioeconomic factors, there is not an abundance of empirical evidence that delineates the causes for the difference. Although the volume of empirical research is limited, the studies that are available

provide some good theoretical notions about the causes of children from lower socioeconomic households having limited vocabularies. The available studies provide insight into the causes of children's vocabulary level development and suggest a set of variables that work together to either positively or negatively affect a child's vocabulary level. The differences in vocabulary levels of children from different socioeconomic backgrounds have been detected as early as when children are toddlers (Beck, McKeown, & Kucan, 2005; Hart & Risley, 1995).

Throughout reading research many references are made to the issue of limited vocabulary knowledge of children from poverty or near poverty homes. In the *Handbook of Reading Research* (1991), there is discussion that the vocabularies of high and low ability learners show huge differences and the differences can be attributed to socioeconomic level. For example, the vocabulary level of children in first grade from high socioeconomic families was about twice the size of their lower socioeconomic peers.

Juel, Biancarosa, Coker, and Deffes (2003) contribute to the discussion of limited vocabulary levels by suggesting that students from low socioeconomic backgrounds know about 6,000 fewer words than their middle-class peers do at the start of schooling. Perhaps more alarming is that according to Stahl and Stahl (2004), the vocabulary gap between children of different socioeconomic status is ever increasing.

As noted, the vocabulary gap is associated with differences in socioeconomic status. Restrepo, et al. (2006) note that children raised in poverty tend to score, on average, one standard deviation below the mean on measures of vocabulary, metalinguistic skills, narrative skills, and sentence complexity than their peers from higher socioeconomic households. Relatedly, Sharif, Ozuah, Dinkevich, and Mulvhill (2003), report that children from socially

disadvantaged homes are at a higher risk for reading failure, which is a contributing factor to school failure, juvenile delinquency and teenage pregnancy.

2.3 CURRENT HYPOTHESIS

It is important to consider what is causing the differences in vocabulary levels between children of lower and higher socioeconomic households. Being able to delineate the causes for the vocabulary level differences will help to determine how to help ameliorate the differences. Perhaps the most well-known and most cited study discussing the causes of differing vocabulary levels in children was conducted by Hart and Risley (1995). The study was a longitudinal study of 42 American families to determine the amount of talk and interaction with children within families with differing socioeconomic levels and in families of different races. The observation transcriptions were used to determine differences in amount of talk to and with each child, quality of interactions and type of talk observed.

This longitudinal study produced many profound results that have been widely cited by researchers in the field of vocabulary research. Hart and Risley found that there were many differences in the everyday lives of the children that were observed. It was concluded that a child in a family from high socioeconomic status consistently received three times more experience with language and general interaction than did a child from a family on welfare. By age four, it was found probable that the average child from a family on welfare had 13 million fewer words of language experience than did a child in a working class family. The quality of speech heard in the home of families on welfare was also less than that of working-class and high socioeconomic households.

The results of the Hart and Risley study were also analyzed to hypothesize why the amount and quality of talk differs based on socioeconomic status. Some of the differences in amount of talk and quality of talk were attributed to the different challenges that are present in families of differing incomes. It was noted that parents in welfare families had daily survival concerns that were not present for parents in some working-class and in high socioeconomic households. Also, some families on welfare did not have the resources to expose their children to as many books, literacy and cultural experiences as did families from higher socioeconomic brackets.

A subset of data was analyzed from another longitudinal study by Qi, Kaiser, Milan, and Hancock (2006) that explored the link between socioeconomic status and language ability compared to other demographic factors, the results showed that there was a relatively strong effect for maternal education level. Children with mothers who did not graduate high school scored, on average, five points lower on the PPVT-III than children whose mother had some college education and 11 points lower than children whose mother had a bachelor's degree. Marital status of a child's parents was also attributed to differences in language ability. Children from single parent homes scored, on average, five points lower on the PPVT-III than children from a two parent home. Lastly, increased family size was associated with lower PPVT-III scores. Children in families of three or more children showed significantly lower language abilities than children in families of one or two children.

Qi, Kaiser, Milan, and Hancock suggest similar reasons for the lower vocabulary ability of children from lower socioeconomic household as those that were proposed by Hart and Risley (1995). Children from lower socioeconomic households have a greater occurrence of mothers with less education and are more likely to be from single parent homes. These factors,

together with low socioeconomic status, pose many challenges. It is noted that children raised in poverty have different opportunities for word learning, fewer resources in their homes, and often have parents focused on daily survival concerns that limit interaction with their children.

These differences are supported by Coyne, Simmons, Kame'enui and Stoolmiller (2004) who note that some children enter school with thousands of hours of exposure to books and rich oral language, which translates to higher vocabulary levels. The differences in exposure and experience are often related to the socioeconomic level of the households in which children are raised. As described by other researchers, Sharif, Ozuah, Dinkevich, and Mulvhill (2003), also found that children from low socioeconomic homes are at a higher risk for reading failure, which is a contributing factor to school failure, juvenile delinquency and teenage pregnancy.

Biemiller and Slonim (2001) suggest that the most important vocabulary difference prior to grade three is a difference in experiences. The importance of experience in determining a child's vocabulary level is consistent with findings by Hart and Risley (1995) and Qi, Kaiser, Milan, and Hancock (2006). Biemiller and Slonim (2001) conclude that the differences in children's vocabulary level are a cumulative result of the level of parental language support and encouragement a child receives, along with the language support received from other caregivers and the differences in the case of how each child acquires vocabulary.

In summary, current research has indicated several factors that contribute to limited vocabulary levels in children from low or lower socioeconomic households. The factors are all related to socioeconomic level. Research suggests, and the current situation in schools shows that the differences in vocabulary levels of children of differing socioeconomic status are ever increasing (Stahl & Stahl, 2004). The educational implications and consequences of having a low vocabulary level on school achievement will be addressed next.

2.4 EDUCATIONAL IMPLICATIONS

There are many studies that suggest that vocabulary knowledge plays a pivotal role in future schooling and many studies make a connection between a child's vocabulary level and their ability to comprehend texts. The results of experimental work suggest that a child who enters school with a limited vocabulary is at risk for reading difficulty or failure. Cunningham and Stanovich (1997) conducted a unique, longitudinal study that assessed eleventh grade students on a battery of reading assessments. The subjects in the study were previously assessed in first grade. The goal of the study was to determine if early reading acquisition had long term educational effects. The results of the study found that first grade reading ability was a strong predictor of all eleventh grade reading outcomes. In particular, the vocabulary level of children in first grade predicted their reading comprehension ability in eleventh grade.

The educational implications of being raised in a poverty home are staggering. Hart and Risley (1995) found that the socioeconomic status of a child's family could account for 42% of the variance in the child's rate of vocabulary growth, 40% of the variance in their vocabulary use and 29% of the variance in their IQ test scores when they were three years old. Overall, Hart and Risley (1995) concluded that vocabulary growth, at age three, was strongly correlated with family socioeconomic status ($r = .65$). Taken together, the findings of Hart and Risley (1995) show that children raised in welfare homes are at risk for having low vocabulary skills. In addition, further studies on the same subjects showed the vocabulary of the children at age three was equally predictive of measures of language skill at age nine or ten. The longitudinal research of Hart and Risley (1995) provides insight into both what contributes to the development of the vocabulary levels in children and the long lasting effects of these vocabulary levels, once formed.

A study was conducted in Canada by Senechal, Thomas, and Monker (1995) that explored the relationship between word knowledge of young children and their ability to learn novel words from listening to storybooks. The subjects, four year old children from middle-class homes, were assessed prior to instruction to determine placement in one of two categories: high in word knowledge or low in word knowledge.

Students were individually presented with two storybooks in which thirteen target words were identified for each book. All students' vocabulary learning was measured with tests of comprehension and production vocabulary. The results of the study included findings that the children with higher initial word knowledge produced more novel words than did children with lower initial vocabulary levels. Senechal, Thomas, and Monker (1995) concluded that this research is consistent with the finding that under certain conditions, students with greater vocabulary knowledge acquire more novel word knowledge than do children with lower vocabulary knowledge. The initial vocabulary level of young children has shown to have an effect on future vocabulary learning and knowledge.

According to the *Handbook of Reading Research* (1991) and the *National Reading Panel Report* (2000), there is strong support over an extended period of time that there is a strong relationship between vocabulary knowledge and reading comprehension. The relationship is well established from many empirical studies and the implications for students who live in poverty or near poverty homes, whose vocabulary is limited, are startling. The problem of limited vocabulary knowledge seems to compound itself throughout schooling. Nagy (2005) suggests that there is a casual connection between vocabulary knowledge and comprehension ability, with the correlations tending to be around .6 to .7. Because the relationship is seen as reciprocal, students who begin school with more vocabulary knowledge

will likely develop the ability to comprehend texts they read well and than as their reading comprehension increases, their vocabulary knowledge will increase. Students who begin school with limited vocabulary knowledge may struggle with reading comprehension and that struggle will limit their vocabulary growth. Biemiller (2005) also found a correlation between vocabulary size and reading comprehension to be around .81 showing the importance of vocabulary knowledge for reading comprehension throughout schooling.

It has been shown that differences in vocabulary knowledge, even in the very young years of a child's life, can influence that child's reading ability throughout schooling (Biemiller, 2004; Hargrave & Senechal, 2000; Juel, Biancarosa, Coker, & Deffes, 2003; Stahl & Stahl, 2004). The issue then becomes what to do to ameliorate the vocabulary differences of children as they enter school or during their preschool years. It is necessary to take the well-documented and accepted notion of the pivotal role that vocabulary plays in becoming a proficient reader and develop adequate vocabularies with the goal of supporting all children to become proficient readers. Research suggests that there is the possibility of reducing the problem of low vocabulary knowledge and suggests research based instructional techniques to be used in classrooms to support all students to develop adequate higher level vocabularies.

2.5 EFFECTIVE VOCABULARY INSTRUCTION

Given that vocabulary knowledge plays an important role in reading success, particularly in terms of reading comprehension, it is vital that schools develop instructional strategies to ameliorate the problem of limited vocabulary knowledge in some students. According to Biemiller (2004), there is little chance of closing the gaps between students who have adequate

and limited vocabulary knowledge until there is success in developing a sufficient vocabulary development program and it is consistently put to use.

Unfortunately, there is often little emphasis on vocabulary development in the school curricula (Beck & McKeown, 2005). Historically, wide reading has been viewed as the main way for children to increase their vocabularies (Stahl & Nagy, 2006). However, for students who struggle with reading and for very young students, wide reading is not an efficient or successful way to develop one's vocabulary. Also, it has been suggested that learning vocabulary from context is a very time consuming and inefficient method for vocabulary development (Beck, McKeown, & Kucan, 2002; Juel, Biancarosa, Coker, & Deffes, 2003). One method of vocabulary instruction, which is currently used in schools, is to focus on words to teach from the texts students read. The problem with this method is that the words in commercial anthologies for young readers are often words that students already know and therefore, instructional time should not be spent on these words (Blachowicz & Fisher, 2000). Therefore, other methods have to be explored.

There is a growing consensus that a good source for identifying words to teach to young readers are trade books that are read aloud to students. Trade books are chosen because they provide text with challenging concepts and higher level vocabulary that is important for comprehension (Beck & McKeown, 2001; Beck, McKeown & Kucan, 2005; Brett, Rothlein, & Hurley, 1996; Coyne, Simmons, & Kame'enui, 2004; Stahl & Nagy, 2006). The results of these studies, in which trade books have been used, are promising.

A second issue of vocabulary development deals with what words should be taught. There is some agreement that the words that instructional time should be spent on are words that are of high-utility to mature language users (Beck & McKeown, 2005; Nagy & Scott, 2000;

Stahl & Stahl, 2004). Because the time necessary to teach students new vocabulary is so great, it is important that educators choose words that will provide students with the greatest utility for comprehending, speaking, and writing. The question that remains is what are the best ways to instruct students with limited vocabularies, considering the complexity and time involved in learning new vocabulary?

There are several recent studies that provide empirical evidence outlining instructional methods for vocabulary development for young children, at-risk for having limited vocabularies. Beck and McKeown (2005) conducted research with children in Kindergarten and first grade from low-income environments. In the first of the two studies, there were two treatment classes and two control classes at each grade levels. The treatment classes received instruction with Text Talk. Text Talk is an instructional technique developed by the researchers to help young students build both their comprehension and vocabulary skills through the use of read alouds. The results of the first study showed that the instructed groups learned more words than the control groups.

The second study aimed to increase the number of words learned by the instructed groups. The hypothesis was that for children to learn and develop an understanding of sophisticated words, more instruction over a longer time was needed. Therefore, within the Text Talk intervention two treatment groups were established. One treatment was identified as “rich instruction” and the other group was “more rich instruction”. Students in the rich instruction group received 6.6 minutes of instruction per word and students in the more rich instruction group received an average of 27.6 minutes of rich instruction per word. The results of the study showed that more instruction was beneficial as the students who received more rich instruction showed vocabulary gains about twice as large as those in the rich instruction group, in both

Kindergarten and first grade. Therefore, Beck and McKeown (2005) have suggested that rich instruction with more time spent interacting with words is most beneficial for young children.

Brett, Rothlein, and Hurley (1996) conducted research that compared the effects of three reading conditions on 4th graders' vocabulary acquisition. As with Beck and McKeown's (2005) work, Brett, Rothlein and Hurley (1996) utilized teacher led read alouds in their study. The subjects were either provided with a story and brief explanations of target words, just presented with the story or in a control group with no exposure to the stories. The results of the study showed that 4th grade students can learn new vocabulary if exposed to a story and brief explanations of target words. Students who were in the treatment group where they heard a story with explanations of the target words learned more of the target words than students in the treatment group where they heard the story without target word explanations or in the control group. A limitation of this study is that the researchers did not track how much explanation was given for each word as teachers were just instructed to provide some explanation of each target word for that treatment group and not instructed on what explanations to use. Also, the researchers used only a multiple choice assessment which only measured recall of definition and it was suggested that additional research is necessary to determine if students internalized the target words in their speech and writing.

Penno, Wilkinson, and Moore (2002) also investigated the role that explaining vocabulary words while reading aloud played in vocabulary acquisition for young children. This study involved 47 children ranging in age from 5 to 8, in New Zealand. The subjects were either randomly placed in a reading only group or in a treatment group where the book was read with explanations of target words while reading. The results showed that the students in the reading with explanation group made greater gains in vocabulary knowledge of the target words.

Using storybooks with explanation of target words has shown to be effective when teaching vocabulary to students. There are several studies that require active participation on the part of the students in addition to including explanation of target words. Students are required to participate in some way in the vocabulary activities that are focused on teaching target vocabulary words. Requiring active participation from students has proven to be an effective method of teaching higher-level vocabulary.

Senechal, Thomas, and Monker (1995) added evidence to the argument that active participation in read alouds provides young children with a better opportunity to learn novel words. The researchers conducted two studies that both suggest that active responding, both verbal and nonverbal, enhance vocabulary acquisition.

In the first study 4-year-old children either listened passively or labeled pictures using novel words while listening to a story. The subjects in the labeling group comprehended and produced more words than did the students who passively listened to that story, showing that active participation produced more vocabulary learning. In the second study, another treatment was added. Some students were placed in a pointing condition, where they were asked to point to the illustration that showed a particular word as the story was being read. The other two conditions remained the same. The results of this study show that students in both the pointing and labeling condition learned more words than did students who passively listened. The findings of Senechal, Thomas, & Monker (1995) along with those of Penno, Wilkinson, & Moore (2002) lend credence to the notion that young children learn higher level vocabulary words from actively participating when stories are read aloud.

The goal of a study conducted by Hargrave and Senechal (2000) was again to look at the differences in vocabulary gains when students are read to versus when they are read

to and required to actively participate. The subjects were young children. The participation treatment group used dialogic reading. Dialogic reading encourages students to participate, provides feedback to a child and encourages the teacher to adapt their reading style to meet the needs of the children's growing linguistic abilities. During dialogic reading students are provided with language rich models and are encouraged to build upon existing language.

All subjects exhibited poor receptive and expressive vocabulary levels at the start of the study. After receiving the treatment, all students, regardless of treatment group showed some gains in expressive vocabulary but the dialogic group made greater gains. When analyzing the different treatments, it was noted that the teachers in the dialogic condition used 12 times the number of "wh" questions as the teachers in the reading only group used. Hargrave & Senechal (2000) note that this study suggests dialogic reading can be useful in larger instructional groups and can be used to positively influence vocabulary knowledge in a short time.

The above studies suggest that students make greater gains in vocabulary when they are active participants in the read aloud process. The results of the studies suggest that when teaching young children, whose vocabularies are limited, using active involvement, such as questioning, providing brief explanations, pointing, clarifying and repeating, is a useful strategy to promote vocabulary development. Research has suggested instructional practices to increase the vocabulary knowledge of young children, whose vocabularies are limited. The research has focused on using trade books in a read aloud setting with active student participation to increase students' vocabulary knowledge. The National Reading Panel Report (2000) has outlined some implications for practice in teaching vocabulary. These implications include: teaching vocabulary in rich contexts, using repetition and multiple exposures, and utilizing active engagement in learning tasks. Blachowicz and Fisher (2000) also compiled an

outline of best instructional practices in teaching vocabulary that include many of the same implications that the National Reading Panel Report (2000) outlined.

It appears that the major shift in implications for teaching vocabulary involves active participation on the part of the learner. Students can no longer be just passive listeners if educators have the goal of increasing students' vocabulary knowledge (McKeown & Beck, 2004). According to Beck and McKeown (1991), "Students are required to use information by comparing it to, and combining it with, known information toward construction representations of word meaning." (p. 807) Juel and Defies (2004) add to the discussion with the belief that vocabulary instruction must be analytic for the words to really be learned. Research is suggesting ways to better teach students with limited vocabularies.

3.0 METHODS

3.1 OVERVIEW OF METHODS

The purpose of this study is to answer three questions: (a) What is the benefit of adding additional vocabulary instruction for students who do not master all taught words at the conclusion of initial instruction? (b) What is the relationship between standardized vocabulary test scores and the amount of instruction provided to students to learn Tier 2 words? (c) What is the relationship between amount of instruction and words known one week after instruction?

In the present study, four, 6-word sets (24 words) of Tier 2 vocabulary words were taught. The words and sequence used in the four sets of instruction can be found in Table 1.

The words that were selected for instruction were taken from *Steck-Vaughn Elements of Reading: Vocabulary*. This series was also utilized for the initial week of vocabulary instruction. This research-based vocabulary series teaches Tier 2 words to students. Tier 2 words are sophisticated vocabulary often used by mature language users. These words are typically above the reading level of young students but are taught orally to increase students' sophisticated vocabularies. Another goal is to aid students' listening and future reading comprehension by teaching students some of the sophisticated vocabulary they may encounter in their reading.

Table 1: Sequence of Words Used in Four Sets of Instruction

Set	Lesson Words
1	delightful clumsy capture fierce rescue suspense
2	deserve grateful amble plead deceive challenge
3	scrunched invisible scold dreadful complain exaggerate
4	tidy irk admire chuckle astonished coincidence

Prior to instruction, students were individually administered the Peabody Picture Vocabulary Test, Third Ed. (PPVT-III). The purpose of administering this assessment was to provide a standardized vocabulary score for each of the students participating in the study. The PPVT-III scores served as demographic information about the subject and were used to explore whether standardized vocabulary knowledge is related to learning and amount of instruction. Students were also administered a pretest of each set of vocabulary words prior to the teaching of each set. Therefore, students were administered four separate pretests. Each pretest was repeated as a posttest a week after all instruction was completed to determine the amount of vocabulary words that were known by each student following the completion of instruction for each set. The assessments will be described in detail in a subsequent section.

Following administration of the two assessments, all students received 10-20 minutes of instruction for one week (i.e., four days) on the first set of Tier 2 words. At the end of the first round of instruction (i.e., on the fifth day), students were assessed on their knowledge of the taught words. Students who did not master all six words were included in a second week of instruction that lasted an additional three days. After the second round of instruction, the students who received the instruction were again assessed on their knowledge of the taught words. Students who did not master all six words were included in a third round of instruction that lasted an additional three days. Following the third round of instruction, the students who received the instruction were again assessed on their knowledge of the taught words. Instruction, on each set of words, did not continue beyond three rounds, and all students entered the first

round of instruction for the next set of words. This process continued for four sets of Tier 2 words.

One week after instruction was completed for each set of words, students were administered a posttest of all instructed words for that set. The posttest was a randomized arrangement of the same questions used in each pretest. The purpose of the posttest was to show what words are known by each student one week after instruction is completed. The results were compared with those obtained in the pretest. The posttests will be described further in a subsequent section. The results of all the assessments were analyzed to answer the three research questions.

3.2 PARTICIPANTS

Participants in this study were first grade students from a public school district in suburban, southwestern Pennsylvania. The district consists of five elementary buildings, one middle school building, one intermediate school building, and one high school building. The district has a population of 5,287. The research was conducted in the smallest elementary building in the district. There are 209 students enrolled in this elementary school. The school is considered economically disadvantaged on the basis of approximately 30% eligible for free or reduced-price lunch. The make-up of the district is predominantly Caucasian. Given the make-up of the district, including the geographical location of the school, it can be assumed that there are significantly more students who would qualify for free and/or reduced-price lunch but families in this school are reluctant to be identified as in need of these services. Some additional

observations about the subject may prove informational. Many of the subjects come from single parent homes and from families with three or more siblings. Research indicates that this subject set is likely to have a limited vocabulary background.

One intact first grade reading class, in which the researcher is the teacher, was used in this study. The class consisted of 21 students. The school employs differentiated instruction and this reading class was considered the lower of the two reading classes based on DIBELS and other reading assessments administered to each child at the beginning of the school year. Permission was granted from the district's superintendent to conduct the study in the first grade reading class. (See Appendix A.)

3.3 INSTRUCTIONAL CONDITION

In the following sections, the instructional condition will be described and detailed information will be provided about the lesson content and instructional activities.

As noted earlier, instruction in Tier 2 words was provided for four, 6 word sets. Instruction for each set of words consisted of four instructional lessons. All students were included in the initial four days of instruction (i.e. the first round) for each set of words. The instruction was designed by Drs. Isabel Beck and Margaret McKeown and presented in Steck-Vaughn's *Elements of Reading: Vocabulary*. (An example lesson can be found in Appendix B) The purpose of the material is to provide young children with lively and engaging instruction in Tier 2 vocabulary words. Table 2 presents an overview of the activities provided in the first round of instruction.

Table 2: Elements of Reading: Vocabulary Instructional Sequence

Day	Instructional Activity
1	<p>Read–Aloud-story read to students as their first interaction with target words</p> <p>Word Watcher-introduce words and definitions; introduce the concept of adding tally marks for each time a student uses a word</p> <p>Home Connection-model letter to send home to families to introduce the target words</p>
2	<p>Word Snapshots/Photo Cards-picture representations of target words</p> <p>Word Chat/ Student Book-examples and non-examples of definitions; teacher-led completion of student book page requiring identification of synonyms, examples of words and pictures of words.</p>
3	<p>Word Chat/ Student Book-target words are used in situational examples; teacher-led completion of student book page requiring identification of synonyms, examples of words and pictures of words.</p>
4	<p>Word Organizers/ Graphic Organizers-students complete organizers with examples or definitions of target words</p> <p>Writing Activity-students respond in writing to a prompt using a target words</p>

As noted in Table 2, on Day 1 of instruction, students listened to a read-aloud story. The purpose of the read-aloud was for the students to hear the target words used in a story context. The read-aloud format was utilized because first graders are unable to read sophisticated material and the target words due to their limited decoding ability.

Following the read-aloud, students participated in *Word Watcher*. In *Word Watcher* students were introduced to the six target words and their student friendly definitions. During this activity, the researcher held up a word card with each of the target words printed on it and used each word in a sentence. Subsequently, students learned that they would receive a tally mark next to the word card each time they use one of the target words.

For example, let's consider the first set of words: *delightful, clumsy, capture, fierce, rescue, and suspense*. During *Word Watcher*, the researcher said the word *delightful*. The students were asked to repeat the word. The researcher provided the student friendly definition: *If you say someone or something is delightful, you mean that it is very pleasant*. The researcher then used the target word in a sentence to provide another context for the students: *It is delightful to enjoy a popsicle on a hot day*.

The last instructional component on Day 1 was the *Home Connection*. Students received a black line master that introduced the child's family to the target words to take home. The *Home Connection* also provided starters for each child's family to discuss each target word. Again, let's consider the word *delightful* from Set 1. The *Home Connection* provided the student friendly definition: *If you say someone or something is delightful, you mean that it is very pleasant*. Then it suggested that parents: *Ask your child to plan a delightful activity for you to share*.

On Day 2 of instruction, students participated in *Word Snapshots/Photo Cards*. Students were shown a photo card that depicted each of the target words. The teacher read a sentence on the back of the card that used the target word in relation to the photo. Consider the photo card for the word *delightful*. This card depicted three smiling girls having a tea party. The following sentence was provided: *Tea parties with friends are truly delightful*. Next students participated

in a discussion of each of the words. The discussions included distinguishing which card depicts a target word, providing personal examples for target words, and story starters. Then, students were shown two photo cards at one time and were asked to distinguish between the two cards to determine which card fits a situation or definition. Again consider the word *delightful*. Students were shown the picture card for the word *delightful*, which depicted girls having a tea party, and the picture card for *irk*, which depicted a girl scraping her nails down a chalkboard and a boy covering his ears. The accompanying question was: *Which card shows girls having a delightful time?* The activity continued for each of the six target words.

The second activity on Day 2 was *Word Chat*. During this activity, students were provided with different scenarios and were asked whether each scenario is an example of a specific target word. In Set 1, consider the word *capture*. Students were provided with the following three scenarios: *There are many beautiful and colorful birds in the jungle; I see six birds flying over the mountain; The birds at the zoo are kept in a large, comfortable cage.* Students were asked to identify and to say “captured” if the scenario described animals that have been captured. Students also completed a teacher guided page in the *Student Book*. The *Student Book* pages included activities such as coloring synonyms for target words, identifying pictures that show a target word, and matching a target word to examples of the word.

Day 3 of instruction began with another *Word Chat*. Then, students completed a teacher guided page in their *Student Book*. For example, consider the word *delightful*. Students were instructed to draw a box around the people shown on the *Student Book* page that are having a *delightful* time. The *Word Chat* continued with students being provided with discussion prompts for each of the target words, such as, *If you were eating a delightful dinner, would you be smiling or crying? Why?*

On Day 4 of instruction, students engaged with *Word Organizers*, which were graphic organizers, such as word webs. The *Word Organizers* were drawn on the chalkboard and students were led in a discussion of the target words that enabled them to provide examples of the word or synonyms to be included in the word webs. Let's consider the *Word Organizer* for *delightful*. The word *delightful* was written at the top of the word web and two lines were drawn down from *delightful* to the words *food* and *activities*. Students were asked to list foods that they think are delightful. Each food was added to the word web under the word food. Similarly, students were asked to list activities that they find delightful and each activity was added to the word web.

The last activity on Day 4 of instruction was *Your Turn to Write*, when students provided written responses to prompts. As an example, children were provided with the following prompt for the word *delightful*: *Describe a delightful day. What would you do? Who would be with you?* Students were provided with prompts for the other five target words and choose one to respond to.

The day after the completion of the first week of instruction, all the students were tested on the six words taught in that set. Students who met the criteria of learning all six words were excluded from subsequent rounds of instruction as shown in Table 3. Students who do not meet the criteria of learning all six words were included in a second round of instruction.

Table 3: Instructional Rounds and Participants

Round of Instruction	Participants
1	All students
2	Students who did not meet criteria after Round 1 of instruction
3	Students who did not meet criteria after Round 1 or Round 2 of instruction

Round 2 and Round 3 of instruction used researcher made materials (all researcher created instructional materials can be found in Appendix C). Round 2 of instruction lasted three days and involved approximately fifteen minutes of instruction on each of the three days of instruction.

Table 4: Round 2-Instructional Sequence

Day	Instructional Activity
1	<p>Review of target words and definitions</p> <p>Read-Aloud-story read to students to provide a context for the words</p>
2	<p>Examples and Non-examples-activity which requires distinguishing between correct and incorrect examples of target words</p>
3	<p>Word Chat-target words are used in situational examples</p> <p>Word Challenge-definitions are reviewed and then students brainstorm word associations for each word; associations are words with similar meanings</p>

As shown in Table 4, on Day 1 in Round 2 of instruction the initial student friendly definitions from Round 1 were reviewed. Students then listened to a second read-aloud that was written by the researcher. Following the read-aloud, students were reminded how the target words were used in the story and were engaged in a discussion about the use of the target words. For instance, consider the word *clumsy*. In the researcher created read-aloud, students heard the word *clumsy* describing a boy who is always bumping into things. Following the completion of the story, students were reminded that that is how the word *clumsy* was used in the story.

Students were then asked to tell why this was an accurate use of the word *clumsy*. The discussion continued for each of the target words used in the read-aloud.

On Day 2 of instruction, students were provided with examples and non-examples of the words and were asked to determine whether the example provided was an instance of the target words being used correctly or incorrectly. Again, consider the word *clumsy*. Students were provided with the following example: *A dog that knocks over a drinking glass with its tail*. Students were instructed to say *clumsy* if the example used the word correctly and not to say anything if the example was not an accurate use of *clumsy*. The materials provided three examples for each of the six target words.

Day 3 of instruction consisted of two instructional activities. First, the students participated in a *Word Chat* activity that consisted of discussion prompts for each of the target words. For example, students were provided with the following discussion prompt for *capture*: *Would it be easier for a lion to capture an elephant or a zebra? Why or why not?* This type of discussion prompt was provided for each of the target words.

The second activity on Day 3 of instruction was *Word Challenge*. The student-friendly definition for each word was reviewed. Then, students worked together to brainstorm word associations for each of the target words. As an example, students may have thought of *lovely*, *wonderful*, and *enjoyable* as associations for the target word *delightful*.

One day after the completion of Round 2 of instruction, students who received the instruction were administered a test of the taught vocabulary words. Students who mastered all six of the words were excluded from any further instruction. Students, who did not master all six of the words were included in Round 3 of instruction.

As Table 5 indicates, Round 3 of instruction occurred over three days, with approximately fifteen minutes of instruction on each day.

Table 5: Round 3-Instructional Sequence

Day	Instructional Activity
1	Read-aloud -story read to students to provide a context for the words Word Webs-2 words -students complete organizers with examples, definitions or word associations for the target words
2	Word Webs-2 words -students' complete organizers with examples, definitions or word associations for the target words
3	Word Webs-2 words -students' complete organizers with examples, definitions or word associations for the target words Review of words and definitions

On Day 1, students listened to a new read-aloud, created by the researcher. Following the read-aloud, students were reminded how the target words were used in the read-aloud and were asked to discuss how and why the word was used correctly.

Second, the researcher led the students in the creation of a word web for two of the targeted vocabulary words. Students were encouraged to share synonyms or examples of the target word to be included in each web. For instance, one of the target words in the first set of instruction was *capture*. In the word web for *capture*, students may have suggested synonyms such as *catch*, *trap*, and *nab*. Students could also offer examples of animals that have been captured, such as a *dog by a dog catcher*, *a pet bird in a cage*, and/or *bears at the zoo*.

On Day 2 of instruction two more word webs were completed. On Day 3 of Round 3 word webs were completed for the remaining two target words. The same instructional

procedure was followed from Day 1 in completing the word webs. Finally, on Day 3, there was a review of all of the target words and their student friendly definitions, which was the last opportunity for the students to interact with the words and their definitions.

One day after the completion of Round 3 of instruction, students included in that round were given a vocabulary assessment. The assessment tested the students' knowledge of the six target words taught. Instruction was not continued beyond three rounds.

3.4 ASSESSMENTS

3.4.1 Peabody Picture Vocabulary Test, Third Ed.

Before instruction, the Peabody Picture Vocabulary Test, Third ed. (PPVT-III) was administered to all students. The PPVT-III is a standardized assessment of vocabulary knowledge. The subject is shown four pictures and asked to choose the picture that depicts an orally presented target word. Testing results are presented as age equivalent scores and also as percentile scores. This assessment was administered individually. The purpose of administering this assessment was to provide demographic information about the subjects. Additionally, each subjects' score was correlated with rate of acquisition, as determined by number of instructional rounds, of the taught vocabulary words.

3.4.2 Pretest/ Posttest

The pretest/posttest items can be found in Appendix D. A separate pretest was developed for each set of Tier 2 words that were taught. Four question items were developed for each of the target words. For each word, two questions were created around the definition. One question presented an accurate definition and one question presented an inaccurate definition. For example, consider the word *amble*. Students were presented with the following two questions: *Does amble mean to walk slowly? and Does amble mean to watch something closely?* Additionally, for each word two questions were created around situations. One question supplied an accurate example of each word and one question supplied an inaccurate example of each word. Again, consider the word *amble*. Students were presented with the following two questions: *Would a person amble out of bed in the morning? and Should you amble outside during a fire drill?* The use of four choices for each target word also reduced the effect of guessing.

The purpose of creating four items for each target word was to be able to determine to what degree students understand each word. If a student was able to identify the accurate definition from an inaccurate definition and was able identify a situation when the target word was used correctly from a situation when a target word was used incorrectly, it was more evident that that student understood the word.

The four choices for each target word were presented together. Rather each 24 item pretest for the six target words presented in each set was randomly presented. Each test item was read-aloud and students were asked to circle yes or no on an answer sheet. See Appendix E for an example of the answer sheet. Students were presented with a pretest prior to the beginning of instruction for each set of words. Therefore, students were given four separate pretests.

The posttest consisted of the same 24 items presented in each pretest but the items were presented in a different randomized order than the pretest. Each posttest was administered one week after the end of instruction for each student. Therefore, students requiring differing amounts of vocabulary instruction were presented with the posttest at different times. There was the possibility of administering each posttest at three different times, depending on when students completed instruction. The purpose of waiting one week after the completion of instruction was to consider the extent to which the words became “permanent” in the students’ vocabulary repertoires. Instruction on the next set of Tier 2 words was not begun until all students had completed the posttest for the previous set.

3.4.3 Weekly vocabulary assessments

One assessment was administered after each round of instruction. (An example of a weekly assessment can be found in Appendix F.) Since all students received the first round of instruction, all students were administered the first assessment. Students who answered all the assessment items correctly on the first assessment were not included in any further instruction and therefore did not take any further weekly vocabulary assessments. Students who did not correctly answer all of the items on the first weekly assessment were included in Round 2 of instruction and thus were administered a second weekly vocabulary assessment. Similarly, students who participated in Round 3 of instruction were administered a third weekly vocabulary assessment.

The weekly vocabulary assessments were developed in the same manner as the pre- and posttests. Four test items were created for each of the six target words. For each word, two questions, one yes as the answer and one no as the answer, were created around the

definition, and two questions, one yes and one no, were created around situations. Thus, each weekly test consisted of 24 test items.

The items on each of the three weekly assessments were not exactly the same. Some wording and phrasing had been altered to reduce the chances that students who took multiple weekly tests recognized the questions. Table 6 shows the weekly test questions for *amble*, as an illustration of the differences in the weekly test items.

Item Type	Week	Test Question
Definition/Yes	1	Does amble mean to walk slowly?
	2	Does amble mean to walk slowly and in a restful way?
	3	Does amble mean to walk in a slow, restful way?
Definition/No	1	Does amble mean to scatter into tiny pieces?
	2	Does amble mean to bend and curve?
	3	Does amble mean a big, giant pile?
Situation/Yes	1	On a beautiful day, would people amble through the park?
	2	If you aren't in a hurry, could you amble through the mall?
	3	If you are trying to waste time, would you amble down the hall?
Situation/No	1	When you are late for school, should you amble down the street?
	2	If there is a fire, should you amble out of a building?
	3	If your parents ask you to hurry, should you amble around the house?

3.4.4 Data Analysis

Two different types of data analysis were used to address the three research questions. The first question asked if additional vocabulary instruction for students who do not master all the taught words after one week of instruction was beneficial. To address this question, student's weekly assessment results were analyzed. Students who mastered the taught words after one week of instruction will not be considered. Scores for students who did not master all the taught words in one week of instruction were considered and studied to determine if additional instruction results in these students scoring higher on the subsequent weekly vocabulary tests. An analysis of patterns of achievement for each student, not mastering the words after one week of instruction, was also considered.

To answer the second and third questions, the researcher determined if a correlation between the variables existed. The second study question asked if there was a relationship between standardized vocabulary test scores and the amount of instruction provided to each student and the third study question dealt with if there was a relationship between amount of instruction and words known one week after instruction. Each question required that a correlation coefficient be determined as well as a scatter plot developed to allow for analysis of individual student results.

4.0 DATA ANALYSIS

4.1 OVERVIEW OF DATA ANALYSIS

The purpose of this study was to investigate the benefits of providing additional vocabulary instruction for students who did not master all taught words (hereafter referred to as target words) at the conclusion of initial instruction. Also of interest was whether there was a relationship between standardized vocabulary test scores and the amount of instruction necessary for students to learn target words. Additionally, this study investigated the relationship between amount of instruction and words known one week after the conclusion of instruction.

Data collection, which occurred over twelve weeks, included a measure of standardized vocabulary level, pretests of target words, weekly tests of target words and posttests of target words one week after instruction ended. All students received a minimum of 4 weeks of instruction up to a maximum of twelve weeks of instruction. Amount of instruction was dependent on when each student mastered the target vocabulary words. These data were examined in order to answer the following research questions:

- What is the benefit of providing additional vocabulary instruction for students who do not master all target words at the conclusion of initial instruction?
- What is the relationship between standardized vocabulary test scores and the amount of instruction needed for students to learn target words?

- What is the relationship between amount of instruction needed and words known a week after instruction concluded?

4.2 RESEARCH QUESTION 1

What is the benefit of providing additional vocabulary instruction for students who do not master all target words at the conclusion of initial instruction?

This question was answered by conducting a quantitative analysis of the average number of words mastered weekly by all the students and also by calculating the average number of words mastered by those students who did not learn all the words each week. This analysis indicates that overall students benefited from additional vocabulary instruction. The mean number of words mastered increased weekly as more instruction was provided in all but two instances.

As indicated in *Table 7*, the average number of words mastered by students increased each week as additional instruction was provided. The two exceptions to this pattern occurred between week 2 (4.24) and week 3 (4.00) with Set 2 words and between week 1 (4.00) and week 2 (4.00) with Set 4 words. In the case of the Set 2 words, although students in the NM group mastered fewer words on the week 3 assessment, they still improved in the number of words that they mastered overall from weeks 1 to 3. In week 1, students in the NM group mastered an average of 3.60 words and by the completion of instruction in week 3, the NM group had mastered, on average, 4.00 words. In the instance of the Set 4 words, students in the NM group mastered the same number of words between weeks 1 and 2. Again, across the three weeks of

instruction, students in the NM group, on average, increased the number of words mastered from 4.00 to 5.08.

Table 7: Average number of words mastered over three weeks of instruction

Word set	week1	week2	week3
1	All (n=21) 3.67		
	NM (n=19) 3.42	All (n=19) 4.84	
		NM (n= 11) 4.00	All (n=11) 4.55
			NM (n=6) 3.34
2	All (n=21) 3.71		
	NM (n=20) 3.60	All (n=20) 4.50	
		NM (n=17) 4.24	All (n=17) 4.00
			NM (n=16) 3.88
3	All (n=21) 4.76		
	NM (n=14) 4.14	All (n=14) 4.57	
		NM (n=11) 4.18	All (n=11) 4.27
			NM (n=7) 3.29
4	All (n=21) 4.67		
	NM (n=14) 4.00	All (n=14) 4.00	
		NM (n=13) 3.85	All (n=13) 5.08
			NM (n= 9) 4.67

*NM indicates the group of student who did not master all the taught words in a given week

Even with the inclusion of the two instances when students average mastery did not increase across two weeks, students' average mastery of words from weeks 1 to 3 consistently increased indicating that additional vocabulary instruction was beneficial for this

group of students. Consider Set 1. During the first week of instruction, students in the NM group mastered, on average, 3.42 words. After being included in a second week of instruction, this same group of students mastered, on average, 4.84 words. When considering the students who did not master all the target words after the second week of instruction the mastery level still increased to an average of 4.00 words. These students were then included in a third week of instruction that resulted in an increase of average word mastery to 4.55.

Another indication that additional instruction was beneficial is highlighted in the number of students included weekly in instruction. All 21 students are included in the first week of instruction for each set of words. The students who did not master all the words are considered to be part of the NM group and are included in additional instruction. This pattern continues for three weeks. *Table 7* indicates that fewer students required additional instruction over the weeks. Consider Set 3. In Set 3 all 21 students are included in the first week of instruction. Out of the 21 students, seven mastered all the target words after one week of instruction and 14 students were included in week 2 of instruction. Following week 2 of instruction, three additional students mastered all the target words and 11 students were included in a third week of instruction. Following week 3 of instruction, four additional students mastered all the target words. This pattern of increased mastery is consistent for each set of target words indicating that additional instruction was beneficial for this group of students because it allowed more students to master all the target words.

4.3 RESEARCH QUESTION 2

What is the relationship between standardized vocabulary test scores and the amount of instruction provided to students to learn target words?

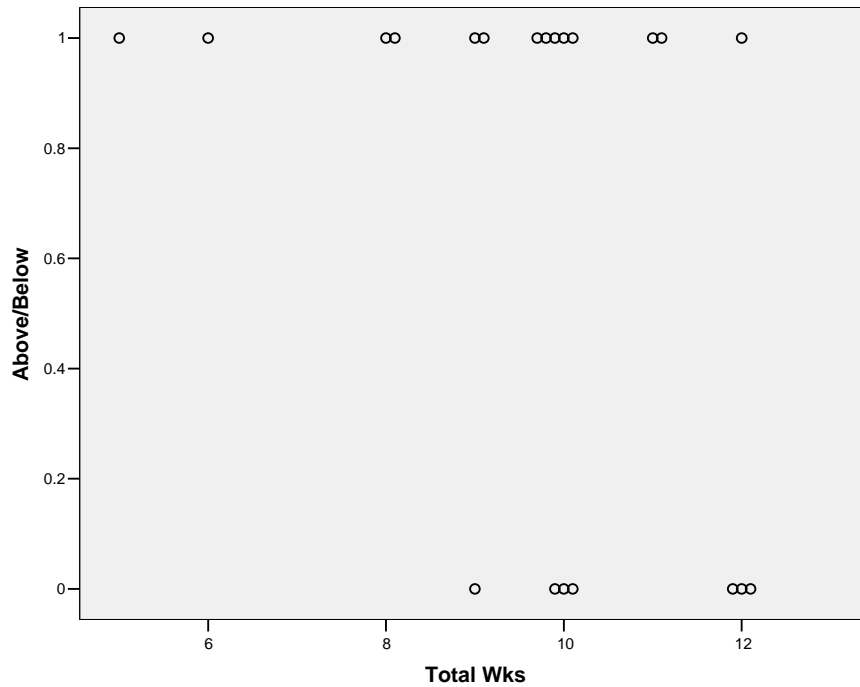
When considering research question 2, it was hypothesized that there would be a negative correlation between student's standardized vocabulary test scores and amount of instruction provided. Students were administered the Peabody Picture Vocabulary Test (PPVT-III) prior to the beginning of vocabulary instruction to determine a standardized vocabulary score for each student. To answer research question 2 two different correlation coefficients were calculated. The students' raw scores on this assessment were converted into age equivalent scores and percentile scores which were used as a variable in the correlation coefficients. Both sets of data were correlated with amount of instruction.

The age equivalent scores are considered developmental-type norms and either indicated that each child performed above their actual age level or below their actual age level on the PPVT-III. These scores were recorded as either a 0 or 1. Students received a 0 if they performed below their age level and received a 1 if they performed above their age level. The dichotomous labels were calculated with each student's total weeks of instruction to determine a correlation coefficient.

The calculation of a correlation coefficient for students' PPVT-III scores expressed by a dichotomy and total weeks of instruction yields a correlation coefficient of $-.392$. This correlation coefficient is significant at the 0.05 level with $p = 0.0395$ for a one-tailed test. This means that students who performed below their age level needed more instruction to reach mastery. These results are also presented in *Figure 1*. The scatter plot indicated the negative correlation between students' dichotomous PPVT-III score and the total weeks of instruction

necessary for mastery of the taught vocabulary. It was hypothesized prior to instruction that this would be the case as research indicates that students with higher vocabulary levels are better prepared to learn higher level vocabulary and this point is shown to the extent that students with higher PPVT-III scores required less instruction.

Figure 1: Scatter plot of student's dichotomous PPVT-III scores and total weeks of instruction



Note: Overlapping circles indicate ties for Total Weeks

It is evident in *Figure 1* that there is a negative correlation between these two variables indicating that in general, students who scored a 1 or above their age level on the PPVT-III required fewer weeks of instruction. There is, however, a group of students who

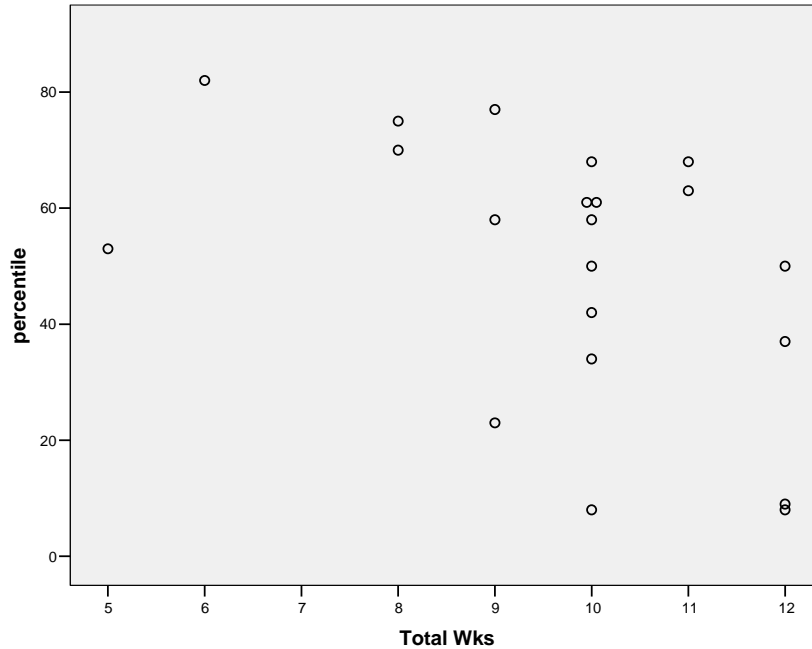
although they scored above their age level still required a somewhat increased amount of instruction.

PPVT-III scores can be expressed in a number of ways, so in order to fully explore research question 2, the PPVT-III scores were also converted to percentile scores. Percentile scores are considered deviation-type norms. Students who score at the 50th percentile are considered to have achieved an average score. Any score above the 50th percentile would be considered above average and any score below the 50th percentile would be considered to be below average.

Students' percentile scores and total weeks of instruction were considered to calculate a correlation coefficient. The correlation coefficient was $-.475$ with $p = 0.0145$ for a one-tailed test. These results are significant at the 0.05 level. The calculation of this correlation coefficient also indicates a significant negative correlation between students' percentile scores and the total weeks of instruction that were necessary for mastery. This negative relationship can also be seen in *Figure 2* which is the scatter plot related to the calculated correlation coefficient.

It is evident from *Figure 2* that students with a higher percentile score on the PPVT-III required fewer weeks of instruction for mastery of the target words and students with a lower percentile score required a greater number of weeks of instruction.

Figure 2: Scatter plot of student's percentile scores and total weeks of instruction



4.4 RESEARCH QUESTION 3

What is the relationship between amount of instruction and words known a week after instruction concluded?

When considering research question 3, it was hypothesized that there would be a negative correlation between amount of instruction and words known a week after instruction. This hypothesis considered that students who mastered the words with less instruction would perform better on the posttest. This was considered because some students would not master the words

after the three weeks of instruction and therefore would not be able to perform as well on a posttest of all target words.

To determine if this hypothesis was supported, a correlation coefficient was calculated for total score on the combined posttests and total weeks of instruction. The highest possible posttest score was 96 (4 sets of words, 24 test items for each word set) and the total possible weeks of instruction were 12 (4 sets of words x 3 weeks of instruction per set). The correlation coefficient for these variables is -0.412 with $p = 0.0315$ for a one-tailed test. This correlation coefficient is significant at the 0.05 level.

The hypothesis of a negative correlation between total posttest score and total weeks of instruction is supported. This negative relationship is also illustrated in *Figure 3*.

Figure 3: Scatter plot for total posttest score and total weeks of instruction

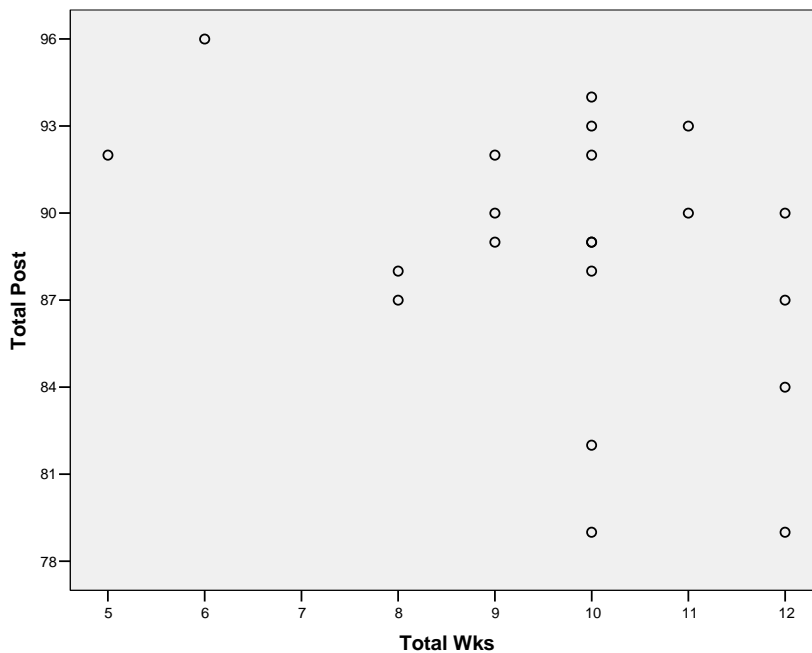


Figure 3 illustrates that students who received the highest scores on the posttest required the least amount of instruction. As scores on the posttest decreased, total number of weeks of

instruction increased. Again, this result was expected based on literature that indicates that students who are better prepared to learn higher level vocabulary will have an easier time learning rich vocabulary. It is important to note that while the least amount of instruction possible was four weeks, no student mastered all the taught words in this amount of time, which indicates that all the subjects required some additional instruction for mastery.

4.5 SUMMARY OF DATA ANALYSIS

A general response to the intervention was that all students improved in their knowledge of the target words. Students differed in the amount of time necessary for learning. This finding indicates that if these students do not master target words, additional instruction will increase their knowledge. Additional instruction did make a significant difference.

The research also intended to look at the relationship between standardized vocabulary test scores and amount of instruction necessary. This research indicated that there is a negative correlation between standardized test scores and amount of instruction needed. This negative correlation show that students with higher standardized vocabulary score required fewer weeks of instruction and as students' standardized vocabulary test scores decreased the amount of instruction necessary increased.

Lastly, this research looked at the relationship between students' posttest scores and amount of instruction necessary. Again, a negative correlation was found between these two variables. As students' posttest scores decreased, the amount of instruction necessary increased. Students with the highest scores on the posttest required the least amount of instruction. These findings will be discussed further in the subsequent section.

5.0 DISCUSSION

5.1 OVERVIEW OF DISCUSSION

This chapter will discuss issues that arise from the findings of this study. Also, instructional implications, study limitations and implications for future research will be discussed.

5.1.1 Major findings and related questions

The quantitative data presented in Chapter 4 indicates three major findings. Most importantly, providing additional rich, vocabulary instruction proved beneficial. Additionally, PPVT-III scores were predictive of the amount of vocabulary instruction that was useful for each student. And relatedly, students' posttest scores were negatively correlated with amount of instruction necessary for mastery of target words.

These findings will be discussed under two themes. First, I will consider the predictive nature of the PPVT-III and the relationship between students' posttest scores and amount of instruction necessary for mastery of target words. Second, I will deal with why additional rich vocabulary instruction allowed some students to master the target words and why some students, regardless of three weeks of quality instruction per set of words, still did not master the target word.

5.1.2 Predictive nature of the PPVT-III

The PPVT-III is a widely used receptive vocabulary assessment (Qi, Kaiser, Milan, & Hancock, 2006). The results of this study add to the research that suggests that the PPVT-III has predictive validity. Student scores on the PPVT-III effectively predicted the amount of rich vocabulary instruction that would be required to master Tier 2 words.

Students who required the least amount of instruction, scored higher on the posttest and students who required more instruction scored lower on the posttest. This finding indicates that students who have higher initial vocabulary levels are better prepared to learn rich vocabulary at a faster rate. Students who scored higher on the PPVT-III and therefore received less instruction also scored higher on the posttest than their peers who scored lower on the PPVT-III and required more instruction. Research has long supported the notion that students from low socioeconomic backgrounds are at risk for having lower vocabulary levels. This finding can be attributed to various factors, including maternal educational level, number of children in a family and parent's marital status (Hart & Risley, 1995; Qi, Kaiser, Milan, & Hancock, 2006). In addition, research has pointed to the need to provide quality, vocabulary instruction to ameliorate these differences (Beck & McKeown, 2005; Nagy & Scott, 2000; Stahl & Stahl, 2004). Therefore, this study adds to the discussion of the vocabulary gap between students who begin with higher vocabulary levels and those who have lower initial vocabulary levels.

5.1.3 The role of more instruction

Research which discusses the idea that all students do not learn in the same ways is not the implication of this study. The issue was not the way to teach vocabulary; research has already outlined what quality vocabulary instruction should look like. Research has shown that teaching vocabulary in engaging and interactive ways provides the best opportunity for word ownership (Beck & McKeown, 2001; Beck, McKeown & Kucan, 2005; Brett, Rothlein, & Hurley, 1996; Coyne, Simmons, & Kame'enui, 2004; Stahl & Nagy, 2006). The aim in this study was to determine whether “more” of the same high quality instruction would be beneficial for student learning. Data analysis provided in Chapter 4 indicates that additional instruction was beneficial. But, it is necessary to discuss the set of subjects who, regardless of receiving three weeks of quality instruction, still did not master the target words. The question remains as to why these students did not reach mastery.

First, it is important to note the incredibly stringent criteria for mastery. As noted in previous chapters, students were given weekly tests after each round of instruction, in which they participated. Each weekly test consisted of 24 items (6 words x 4 items per word). Mastery was defined as a student correctly answering all 24 test items. If students reached this stringent level of mastery, they did not participate in any further instruction for that set of words. Students who missed any test items were not considered to have mastered the target words and instruction continued.

Utilizing a stringent criterion for mastery, did not allow students to miss any test items. Therefore, a student who missed one test item was identified as non-mastery as was a student who may have missed a large number of test items. This stringent criteria was used to ensure that the mastery reported was complete and was not the result of an arbitrarily decided

upon level. It must be noted that such a stringent level of mastery may not be utilized in a school setting and therefore, may have caused some students to be labeled as non-mastery regardless of their high scores on the weekly and posttests.

As an example of the stringency of the criteria for mastery, consider Set 4. At the conclusion of week 3 of instruction, nine students still had not mastered all the target words as indicated by their score on the third weekly test. Of the nine students who did not master the target words, five scored 23 out of 24 on the weekly test. However, with mastery set at 24 out of 24 these five students were considered to have not mastered the target words. Out of the four remaining students who were considered non-mastery, two scored 22 out of 24 and the remaining two scored 21 out of 24. These results indicated that while the students did not meet the stringent level of mastery utilized in this study, they performed quite well on the weekly test and therefore, the instruction can still be seen as successful. In addition, the findings in Chapter 4 indicated that all students made gains in vocabulary knowledge when provided with additional instruction. These gains would not have been possible without additional instruction.

Another factor to consider is who the subjects of the study were. All 21 subjects were from the same reading class that was considered to be the lower first grade reading group in the small, low-socioeconomic school in which the research took place. Research indicates that students from low-socioeconomic backgrounds traditionally have lower vocabulary levels and are therefore less prepared to learn higher-level vocabulary (Hart & Risley, 1995; Qi, Kaiser, Milan, & Hancock, 2006).

Considering what research has shown about students from low-socioeconomic backgrounds, it important to consider which students did not reach mastery. Seven students scored below their age-equivalency on the PPVT-III prior to the beginning of instruction.

Research indicates that these students would experience the greatest difficulty in learning higher-level vocabulary. After three weeks of instruction, two of the seven students did not master any set of target words, two mastered only one set of target words and three students mastered two of the sets of target words. It is important to note that the two students who did not master any set of target words were both identified as in need of special education services. It is necessary to consider the possibility that the learning difficulties that these two students experience may have resulted in their difficulty mastering the target words.

Even though these two students were designated as in need of special education services, they did make progress in word knowledge. Consider set 4. After one week of instruction, the first special education student mastered three out of six words and the second student mastered four out of six words. Both of the students were involved in three weeks of instruction and following the third week of instruction the first student mastered four out of six words and the second student mastered five out of six words. The two students did not master all the target words but clearly they did make gains in word knowledge which indicates that the additional instruction was beneficial for this subset of students.

The above results can be compared to the remaining 14 students who scored at or above grade level on the PPVT-III. The lowest results were two of the 14 students who mastered one set of target words. Next, three students mastered two sets of target words. Five of the 14 students mastered three sets of target words and the best results were four students who mastered all four sets of target words. Nine of the 14 students in this group mastered three or more sets of target words whereas none of the seven students who scored below age level on the PPVT-III mastered three or more sets of words. These results are in line with research that indicates that students who have higher vocabulary levels are more prepared to learn higher level

vocabulary. Again, it can be restated that although not all students mastered the target words, data analysis indicates that all students made gains in words mastered over the course of the three weeks of instruction provided.

The last issue to consider when discussing the group of students who did not master all the target words even when provided with three weeks of rich instruction is what are realistic expectations? Complete mastery may be an unrealistic expectation for all students. All children bring different background knowledge, experiences, and intellectual ability to their schooling. Expecting all children, regardless of socioeconomic background, to meet the criteria of complete mastery of all skills taught may be unattainable. Certainly, school environments strive for all students to master all skills taught but are realistic enough to understand that all students will not meet this expectation. Therefore, schools work towards all students becoming proficient in all academic areas not reaching complete mastery. When considering that complete mastery for everyone may be unattainable, it is important to consider what gains the students made in terms of learning the target words and what effect providing additional instruction had on students' learning. As previously shown, all subjects of this study made vocabulary gains and the additional vocabulary instruction proved to be beneficial.

5.2 IMPLICATIONS

The major findings lead to implications both for further research and classroom practice. First, implications for classroom practice will be explored followed by suggestions for further educational research.

5.2.1 Implications for classroom practice

Based on the findings of this study, in addition to other research implicating the importance of providing quality vocabulary instruction, it is crucial that amount of instruction be considered. The conventional wisdom that all students do not learn in the same way may have limited the notion that some students need more of the same. In the case of the current study the same means quality, interactive instruction and more means additional instruction.

Educators must be prepared to provide additional instruction when initial instruction doesn't allow all students to reach mastery. The benefit of providing additional instruction can increase students' vocabulary gains and the probability of closing the gap between vocabulary levels of students from varying socioeconomic levels will be increased (Biemiller, 2004; Hargrave & Senechal, 2000; Juel, Biancarosa, Coker, & Deffes, 2003; Stahl & Stahl, 2004).

The issue of practicality and feasibility of providing this type of instruction in a typical classroom arises. The vocabulary instruction provided throughout the course of this study was implemented during the traditional language arts instructional time. Each lesson provided took 10-15 minutes of instructional time. Given the results of this study and prior research indicating the importance of providing students with quality, robust vocabulary instruction, the minimal time devoted to this instruction is quite feasible and practical.

5.2.2 Implications for future research

The findings in this study suggest several avenues for future research. There is a need for additional research dealing with the amount of rich vocabulary instruction that is necessary to

meet the needs of students from low socioeconomic backgrounds. Can some guidelines be established about what amount of instruction should be provided to meet the needs of the majority of students from this subset?

It is important for future research to determine whether using a different scoring scheme that would be less stringent and therefore define mastery in a different way could be beneficial. This current research can be used as a starting point for future research on the benefits of providing additional, rich vocabulary instruction for students from low socioeconomic backgrounds.

Another consideration for future research would be to consider the benefits and feasibility of providing students with additional instruction only on the words that they have not mastered. This technique would require educators to track what words each student has mastered and not mastered. Additional instruction would then be provided only for the words students did not master.

Continued research is necessary in the area of ameliorating the proven vocabulary differences in students from low socioeconomic backgrounds and their more affluent peers. Research should continue to explore ways to increase the vocabulary levels of students from low socioeconomic backgrounds as early in schooling as possible. Ameliorating the differences as early as possible will allow for the best opportunity for these students to reach their reading potential and will also decrease the likelihood of reading failure, in particular, and school failure, in general (Sharif, Ozuah, Dinkevich & Mulvhill, 2003).

APPENDIX A

DISTRICT APPROVAL

SHALER AREA SCHOOL DISTRICT

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DONALD A.LEE. Ed.D.

SUPERINTENDENT

April 16, 2007

Michelle Sobolak
24 New London Lane
Oakmont, PA 15139

Dear Michelle,

RE: Request to Involve Reserve Students in Doctoral Curriculum Based Research Study

First of all, permit me to congratulate you on your goal to pursue your Doctor of Education degree. Your dedication to not only our profession but to your personal professional growth is commendable and deserving of the entire Shaler Area Education family's respect and admiration.

I was happy to meet with you today to discuss how Shaler Area might be able to assist you conclude your doctoral dissertation research as you pursue your Ed.D.

As we discussed, since your proposed program is curricular based and involves the achievement standards that your first graders are required to meet as per Pennsylvania Department of Education guidelines and the

School Board approved curriculum for first graders at Shaler Area, makes the process very easy to approve. As we also discussed. you typically pre-test students prior to a unit of instruction and post-test as instruction concludes so the testing that will occur with your class is part of your typical classroom routine. Finally, the fact that there will not be a control group and experimental group ensures that all children will receive the benefit of your prescribed instruction and assessment..

Shaler Area School District Policy #235, Student Rights, outlines the procedures for involving students in any surveyor research study. As we discussed, essential}' Policy #235 mirrors the same procedures that the University of Pittsburgh' s Institutional Review Board requires. To summarize our discussion and the essence of Policy #235 I would ask that you do the following:

- Send a letter home to all parents explaining your role as a Doctoral student and the desire for you to conduct curricular-based research with your first grade class. Please explain how the instructional and assessment procedures are identical to what you typically do as a matter of routine.

Michelle Sobolak

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April 16, 2007

- Outline the only difference will be your desire to anonymously chart the pre-test and subsequent post-tests in your dissertation. You might also want to demonstrate an example of how the results will be charted without the identity of the child being revealed.
- I further suggest you offer a meeting with the parents to explain your research and answer any questions they may have. You can also give your' email address and indicate you would gladly respond via that form of communication if they are not interested or able to come to a meeting.
- Finally, you will need a parent permission form signed by each parent granting their child's involvement and of course be willing to share your results with the parents.

If you require anything else from me, please let me know. As long as you comply with the suggestions outlined in this letter, you have the school district's permission to proceed. Good luck with your study.

Donald Lee
Superintendent

c: Rick Pelkofer
Reserve Elementary School Principal

APPENDIX B

STECK-VAUGHN ELEMENTS OF READING: VOCABULARY INSTRUCTIONAL LESSON EXAMPLE

Set 1- Week 1

Lesson 1- Day 1

Activity One:

Read-Aloud- A story is read-aloud to the students. Students are shown the picture on the title page so they have an idea of what the fish, Big Al, looks like in comparison to the other fish.

At appropriate places throughout the story, students are asked questions such as: *Why doesn't Big Al have any friends?, What just happened to Big Al and the other fish?, Where do you think the net came from?, How do the little fish feel about Big Al now?*

Big Al By: Andrew Clements

In the wide blue sea there was a very friendly fish named Big Al. You could not find a nicer fish. But Big Al also looked very, very, scary.

Other fish seemed to have at least one friend. Some had many. But Big Al had none.

He did not really blame the other fish. How could he expect little fish to trust a great big fish with eyes and skin and teeth like his? So Big Al was lonely, and cried big salty tears into the big salty sea.

But Big Al really wanted friends, so he worked at it. First he tried wrapping himself up with seaweed. He thought it was a great disguise, but no one else did. Who wants to stop and talk to a floating plant that has big sharp teeth?

Then he thought that if he puffed himself up round, the other fish would laugh, and see how clever and silly he could be. All they saw was how big he could be, and they steered clear.

Very early one morning, Big Al went down to the bottom and flopped and wiggled himself into the sand until he was almost covered up. He looked much smaller. When other fish came near, Big Al talked and joked with them and had a delightful time. But then one scratchy little grain of sand got stuck in his gills—and he...he..he...and he sn...and he SSSNEEEEEEEZED.

When the clouds of sand cleared away, all the other fish were gone.

Big Al even changed his color one day so he could look like he belonged to a school of tiny fish passing by. He bubbled along with them for a while, laughing and feeling like he was one of the crowd. But he was so big and clumsy that when all the tiny fish darted to the left and then quickly back to the right, Big Al just plowed straight ahead. He went bumping and thumping right into the little fish. Before he could say “Excuse me,” they were gone, and he was all alone again, sadder than ever.

Just when Big Al was starting to be sure that he would never have a single friend, something happened. He was floating along sadly watching some of the smaller fish, and was wishing they would come closer. As he watched, a net dropped down silently from above, and in an instant, they were caught.

Big Al forgot all about being lonely, and he forgot all about being sad. His eyes bulged out bigger and rounder than ever, and with a mighty flip of his tail he opened his mouth and charged straight at the net! The net was strong, but Big Al was stronger. He ripped right through it, and all the little fish rushed out through the hole.

But when Big Al tried to turn around and go out of the hole, he got all tangled up in the net. He was stuck! The net went higher and higher toward the bright surface of the sea, and the little fish watched Big Al as he disappeared above them. When the little fish were able to speak again, all they talked about was the huge, wonderful fish that had saved them. How great to be free, but what a shame that the big fellow had been captured.

Just then there was a tremendous, crashing splash above them, and the small fish dashed away. Was it the net again?

Not at all—It was Big Al. Those fishermen took one look at him, and threw him right back into the ocean. And now there is one huge, puffy, scary, fierce-looking fish in the sea who has more friends than anyone else: Big Al.

Activity Two:

Word Watcher

Students are introduced to the target words: *delightful*, *clumsy*, *capture*, *fierce*, *rescue*, and *suspense* through the use of word cards. Word cards are placed face down and a student picks up one word card at a time. The researcher says the word and a sentence using the word. The students repeat the word and it is placed in the chart. Subsequently, every time one of the target words is used throughout the week, a tally mark is placed next to the word in word chart.

Lesson 2- Day 2

Activity One:

Word Snapshots

Students are presented with a photo card for each of the target words. The researcher reads the sentence on the back of each card. The researcher holds up two cards at a time and asks the following questions: *Which card shows girls having a delightful time?*, *Which card shows someone looking clumsy?*, *Which card shows an animal that has been captured?*, *Which card shows an animal looking fierce?*, *Which card shows a person rescuing someone?*, and *Which card gives you a feeling of suspense?*

Activity Two:

Word Chat

Students complete a student book activity. Students are guided to complete the page. First students are given three scenarios. If the students think that the scenario describes an animal that has been captured, they clasp their hands and say captured. If not, they say nothing. The three scenarios are: *There are many beautiful and colorful birds in the jungle. I see six birds flying over a mountain. The birds at the zoo are kept in a large, comfortable cage.*

Next, students are given three additional scenarios. If the students think that the scenario describes someone who needs rescued, they say rescue. If not, they say nothing. The three scenarios are: *Jack took the train to the city to go to work. Jack's boat turned over and he found himself in ice-cold water without a life jacket! Jack drove to the supermarket to go shopping.*

Then, the researcher describes three animals to the students. If the students think that the animal being described is fierce, they make a scary frown and say "Grrrrr. Fierce!" If not, they say nothing. The three animal descriptions are: *The lion growled at the zebras nearby. The puppy jumped on my lap and licked my face. The mama grizzly bear showed her teeth when a deer came near her cubs.*

Lastly, the researcher reads synonyms for the three target words. Students are instructed to color the section of the picture with the synonym that means capture purple, the synonym that means rescue red and the synonym that means fierce green.

Lesson 3- Day 3

Activity One:

Word Chat

Students are guided as they complete a student activity page. They are to circle the people who are in *suspense*. They draw a line under the pet that is *clumsy*. They draw a box around the people who are having a *delightful* time. Then, each target word is discussed using guiding questions.

Suspense- Would you be in suspense if you were watching a person in a movie walk slowly through a scary, dark house? Why or why not?

Clumsy- Would you feel clumsy if you carefully put a vase on a table or if you knocked a vase off a table and it fell into a hundred pieces. Explain.

Delightful- If you were eating a delightful dinner, would you be smiling or crying? Why is that?

Capture- If a spider captured a fly, would it keep it or let it go? Explain what you mean.

Rescue- If you rescue someone, would they thank you or be angry with you? Why?

Fierce- If a fierce animal stood next to you, would you be bored or scared? Explain your answer.

Activity One:

Word Organizers

Students complete two graphic organizers for the words: *delightful and suspense*.. The target word is placed in the middle of the word web, which is drawn on the board. The meanings of each of the two words are reviewed. Students list different foods and activities that think are *delightful* and each is added to the word web. Next, students consider a list of activities. They have to determine if the activity is or is not suspenseful. The activities are listed on the word web.

Activity Two:

Your Turn To Write

Students are presented with writing prompts to relate the words to their own experiences. Each student responds to one of the following prompts:

Delightful- Describe a delightful day. What would you do? Who would be with you?

Clumsy- Have you ever felt clumsy? What did you do? How did you feel about it?

Capture- Have you ever played a game where you were captured? How did it make you feel? Did you get to capture someone else?

Fierce- Have you ever seen a fierce animal? How did the animal act? Did it scare you?

Rescue- Have you ever been rescued? What happened? Have you ever seen another person being rescued?

Suspense- What stories have you heard that kept you in suspense? Have you seen any movies that kept you in suspense? Describe what happened to make you feel that way.

APPENDIX C

RESEARCHER CREATED INSTRUCTIONAL MATERIALS

Round 2- Week 2

Set 1- Day 1

Activity One:

Review of target words and definitions- The researcher uses the word cards from the first week of instruction to review the pronunciation and definitions of each of the six target words. The researcher holds up each card, states the target word and asks the students to repeat each word. The teacher then states the student-friendly definition introduced in week 1 of instruction.

Activity Two:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Once upon a time, there was a very clumsy little boy named David. David was always bumping into things! Even when he tried his best to be careful, David would bump into something.

David's parents were always reminding him to be careful. David's teachers were always reminding him to be careful. And David's friends were always reminding him to be careful.

One delightful spring day, David decided to take a walk in the woods to enjoy the warm and sunny weather. As he was walking along in the woods, he noticed that a small bunny had been captured in a trap. David felt bad for this bunny. The bunny did not look fierce at all and David could not understand why anyone would want to capture a cute, furry bunny.

Although David felt badly he did not know what he could do to help rescue this bunny. While he was thinking of a plan, he decided to pet the bunny to make it feel better. As clumsy David was walking towards the captured bunny he tripped on a twig and fell right on the trap!

What do you think may have happened?

Well, when clumsy David fell on the trap, it opened up and the bunny was able to hop free. David had rescued the bunny all because of his clumsiness! Now, when people remind David to be careful he reminds them of the time that his clumsiness helped him rescue a captured bunny!

Set 1- Day 2

Examples and Non-Examples- Students listen to each example given and are required to distinguish between which examples correctly fit each target word and which examples do not. One example and non-example is stated for each target word. The examples and non-examples for each word are not presented together.

A summer day is sunny, warm and breezy. (delightful)

A person who is grumpy all the time. (not delightful)

A dog that knocks over a drinking glass with its tail. (clumsy)

A ballerina (not clumsy)

A spider trapped a fly on its web. (captured)

A robin flying outside (not captured)

A growling tiger (fierce)

A smiling baby (not fierce)

A firefighter saves a person from their burning house (rescue)

A mother wakes up her sleeping child (not rescued)

You are walking through a haunted house at Halloween (suspense)

You are lying on your couch relaxing. (no suspense)

Set 1- Day 3

Activity One:

Word Chat- Students are provided with discussion prompts for each of the six target words.

Would a delightful day be a good day to go on a picnic? Why?

Should a clumsy person hold an expensive glass vase? Why or why not?

Would it be easier for a lion to capture an elephant or a zebra? Why or why not?

Would you want to have a fierce animal as a pet? Why or Why not?

If a person who couldn't swim was thrown into a pool would they need rescued?

Why or why not?

Would you have a feeling of suspense if you were watching someone walking on a

tightrope? Why or why not?

Activity Two:

Word Challenge- the student-friendly definitions for each of the target words is reviewed. Following the review of each definition, students work together to brainstorm word associations for each of the target words. Word associations are words with similar meanings as the target words.

Round 3- Week 3

Set 1- Day 1

Activity One:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Most people do not think that it is very delightful to have a mouse in their house. Although mice are not fierce animals, people do not like the thought of a mouse running around their kitchen around their food. When people realize they have a mouse in their house, they usually want to capture it. Therefore, they would put a trap down.

A clumsy person would have to be careful around a mouse trap so they don't bump it and set it off. It would not feel good to have a mouse trap snap on your finger or toe. Some people like to capture the mouse and set it free outside. The people rescue the mouse from the trap and let it go where it belongs, outside.

Once you set a mouse trap, you might have a feeling of suspense waiting to get the mouse out of your house!

Activity Two:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Set 1-Day 2

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs

Set 1- Day 3

Activity One:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Activity Two:

Review of words and definitions: The six target words and definitions are reviewed. Students repeat the target words and hear student friendly definitions for each word.

Round 2- Week 2

Set 2- Day 1

Activity One:

Review of target words and definitions- The researcher uses the word cards from the first week of instruction to review the pronunciation and definitions of each of the six target words. The researcher holds up each card, states the target word and asks the students to repeat each word. The teacher then states the student-friendly definition introduced in week 1 of instruction.

Activity Two:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Once upon a time, a rabbit asked a turtle if he was up for a challenge. The turtle was never known to turn down a challenge so he agreed to participate. The rabbit challenged the turtle to a race. The rabbit knew that a turtle can only amble along, so he thought he would win for sure. The rabbit told the turtle to make the race fair, he would allow the turtle to have a head start.

The turtle started off from the start line. The rabbit waited behind the line feeling very grateful that he was a fast animal and did not have to amble along like the turtle did. The rabbit waited so long at the start line that he fell asleep. When he woke up he was worried that he wouldn't be able to catch the turtle because the turtle has gotten such a big head start. The rabbit decided that he would deceive the turtle and take a shortcut to the finish line to be sure that he would win. The rabbit did not realize that the owl was watching him as he took the shortcut. When the rabbit saw the owl, he pleaded with him not to tell the turtle. The owl knew that the rabbit did not deserve to win since he cheated, so he did the honest thing and told turtle that rabbit had cheated. Turtle was grateful to know the truth and happy that he took rabbit's challenge and won the race!

Set 2- Day 2

Examples and Non-Examples- Students listen to each example given and are required to distinguish between which examples correctly fit each target word and which examples do not. One example and non-example is stated for each target word. The examples and non-examples for each word are not presented together.

A child who does their chores gets an allowance (deserve)

A person who cheats on a test gets an A. (not deserve)

A boy thanks his mom for bringing the lunch he forgot to school. (grateful)

A child takes more than their share of candy at the party. (not grateful)

A person on a relaxing walk through the park. (amble)

A dog running after a rabbit. (not amble)

A girl begging her grandma for ice cream. (plead)

A boy who doesn't care if he goes to bed or not. (not plead)

A person who lies to their boss and says they are sick. (deceive)

A student who tells the truth. (not deceive)

Hopping on one foot up a huge hill. (challenge)

Adding 1+1 (not challenge)

Set 2- Day 3

Activity One:

Word Chat- Students are provided with discussion prompts for each of the six target words.

If a team wins the championship game, do they deserve a trophy? Why or why not?

Would you feel grateful if someone found the diamond ring you lost? Why or why not?

Would it be a good choice to amble around the track if you were in a running race? Why or why not?

If a child really wanted a new toy, would they plead with their parents to buy it for them? Why?

Is it a good idea to deceive your teacher? Why or why not?

Would you accept the challenge of a race with a friend? Why or why not?

Activity Two:

Word Challenge- the student-friendly definitions for each of the target words is reviewed. Following the review of each definition, students work together to brainstorm word associations for each of the target words. Word associations are words with similar meanings as the target words.

Round 3- Week 3

Set 2- Day 1

Activity One:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

There once was a little boy who was afraid of the challenge of a math test. Every time his class was having a test, he would plead with his parents to stay home. He even tried to deceive them and say that he was sick. His parents did not fall for his tricks. They knew that he would do a good job on his math test and they wanted him to face his fears.

The little boy was not excited to get to school so he just ambled down the street. He was almost late for school because he was walking so slowly! When he got to school his

teacher said it was time for the math test. The little boy knew it was time to face his fears and try his best on the test. He did the best he could and hoped that his hard work would pay off. His teacher was impressed with his math work and decided that he deserved and A on the test. The little boy was so excited that he had done well. He also was grateful that his parents made him face his fears and take the math test. He knew that before the next test he would not feel as nervous!

Activity Two:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Set 2-Day 2

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs

Set 2- Day 3

Activity One:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Activity Two:

Review of words and definitions: The six target words and definitions are reviewed. Students repeat the target words and hear student friendly definitions for each word.

Round 2- Week 2

Set 3- Day 1

Activity One:

Review of target words and definitions- The researcher uses the word cards from the first week of instruction to review the pronunciation and definitions of each of the six target words. The researcher holds up each card, states the target word and asks the students to repeat each word. The teacher then states the student-friendly definition introduced in week 1 of instruction.

Activity Two:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Alex was a little boy who always complained. He complained that his parents scolded him because he wouldn't keep his room clean, he complained that his teacher scolded him because he made up stories and always exaggerated when telling stories to the class. If you asked Alex he would say he had a dreadful life full of scolding! But the truth was Alex's exaggerating was the cause of all his problems. He was always telling outlandish stories about monsters, aliens and invisible friends who were responsible for any bad behavior that he did. One day he told a very wild story about why his homework wasn't done. When his teacher looked in his backpack, there was his homework scrunched up at the bottom! Of course Alex had an exaggerated story about how his invisible friend must have hidden it there. His teacher was not amused! She told Alex that he and his invisible friend would have to miss recess!

Set 3- Day 2

Examples and Non-Examples- Students listen to each example given and are required to distinguish between which examples correctly fit each target word and which examples do not. One example and non-example is stated for each target word. The examples and non-examples for each word are not presented together.

Clothes in the bottom of a hamper. (scrunched)

Clothes hanging neatly on a clothesline. (not scrunched)

Air in a glass jar. (invisible)

Candy in a glass jar. (not invisible)

Parents yelling at their child for hitting his brother. (scold)

A teacher saying good job to a student. (not scold)

Your mom's car breaking down on the way to a big game. (dreadful)

Getting to school on time and remembering all of your homework. (not dreadful)

Saying that the food in the cafeteria is absolutely awful. (complain)

Mentioning how beautiful the spring flowers are. (not complain)

Saying that your dog can beat any dog in the world in a race. (exaggerate)

Saying that you had a pretty good day. (not exaggerate)

Set 3- Day 3

Activity One:

Word Chat- Students are provided with discussion prompts for each of the six target words.

Would you rather your homework be scrunched up in the bottom of your book bag or placed neatly in your homework folder? Why or why not?

If you were invisible what would be the first thing you would do and why?

Do you think that your parents would scold you more if you hit your sibling or if you stayed up after your bedtime? Why or why not?

What would have to happen for you to say you had a dreadful day? Why?

Would you complain to your waitress if your food was cold? Why or why not?

If you wanted to exaggerate and say that you were the fastest first grader in the school what would you say?

Activity Two:

Word Challenge- the student-friendly definitions for each of the target words is reviewed. Following the review of each definition, students work together to brainstorm word associations for each of the target words. Word associations are words with similar meanings as the target words.

Round 3- Week 3

Set 3- Day 1

Activity One:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Once upon a time, there were three ghosts named Trixie, Dixie, and Mixie. They loved to make themselves invisible and fly around the house. Their only problem with this was that they couldn't see each other and would often crash into each other. One day Trixie ran into Dixie and Dixie was so angry! All day Dixie complained that Trixie never watched where she was going! Dixie was so busy exaggerating about how careless Trixie was that she didn't notice Mixie flying down the hallway. Mixie had to scrunch herself into a corner to avoid Dixie. Mixie

started to scold Dixie about her ways. This was such a dreadful house to live in with three ghosts who couldn't get along!

Activity Two:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Set 3-Day 2

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs

Set 3- Day 3

Activity One:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Activity Two:

Review of words and definitions: The six target words and definitions are reviewed. Students repeat the target words and hear student friendly definitions for each word.

Round 2- Week 2

Set 4- Day 1

Activity One:

Review of target words and definitions- The researcher uses the word cards from the first week of instruction to review the pronunciation and definitions of each of the six target words. The researcher holds up each card, states the target word and asks the students to repeat each word. The teacher then states the student-friendly definition introduced in week 1 of instruction.

Activity Two:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

Boy does it irk my mom when I don't keep my room tidy! She really admires neatness and cleanliness. Sometimes I just have to chuckle when I see my mom zipping around the house always cleaning up after everyone. You would be astonished if you could see our house after my mom is done cleaning. It is more than tidy it is sparkling! You could eat off of the floor! I think that it was more than a coincidence that my mom married my dad because he loves when things are tidy too! They are quite a clean team!

Set 4- Day 2

Examples and Non-Examples- Students listen to each example given and are required to distinguish between which examples correctly fit each target word and which examples do not. One example and non-example is stated for each target word. The examples and non-examples for each word are not presented together.

A room with no junk lying around. (tidy)

A room with clothes all over the floor. (not tidy)

When someone whistles when you are trying to concentrate. (irk)

Your brother turning off the TV when you are studying. (not irk)

A student who always helps others. (admire)

Someone who cheats on their math test. (not admire)

A funny joke. (chuckle)

A classmate falls at recess. (not chuckle)

Your teacher turns into a turtle. (astonished)

Your dog takes a nap. (not astonished)

Two teachers with the same last name. (coincidence)

Two brothers with the same last name. (not coincidence)

Set 4- Day 3

Activity One:

Word Chat- Students are provided with discussion prompts for each of the six target words.

Would you think your bedroom was tidy if all the clothes were put away but toys were still out? Why or why not?

Would it irk you more if your brother kept poking you or kept saying your name?

Why?

Would you admire a teacher who helped students who were having trouble? Why or why not?

When do you think it is more appropriate to chuckle out loud: in the middle of a math test or at recess? Why or why not?

Tell would astonish you more: if an elephant walked into the classroom or if your teacher shaved her head? Why or why not?

Has anything ever happened to you that was a coincidence? If so, what?

Activity Two:

Word Challenge- the student-friendly definitions for each of the target words is reviewed. Following the review of each definition, students work together to brainstorm word associations for each of the target words. Word associations are words with similar meanings as the target words.

Round 3- Week 3

Set 4- Day 1

Activity One:

Read- Aloud- Students listen to a read-aloud read by the researcher. Following the read-aloud, the researcher rereads the sentences from the read-aloud that contain target words and asks the students to discuss the correct use of each target word.

Read-aloud:

It can be hard to keep a young child looking tidy. That's why when my little sister Anna came in from playing outside all day, I was astonished! She looked like she had just gotten out of the bathtub. I could not believe that she looked so neat and tidy. So I asked her what she did all day. She started to chuckle and told me that she fell asleep in the hammock outside. I told her that I was astonished that she kept so clean. She said that she had slept all afternoon! I knew that my mom would not be irked that my sister stayed so clean but I knew

that she would think it was quite a coincidence that I was untidy today when I am the one who usually stays clean!

Activity Two:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Set 4-Day 2

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs

Set 4- Day 3

Activity One:

Word Webs- the researcher uses two of the target words in a word web, which is drawn on the board. The students supply examples or synonyms for each of the target words. The student responses are added to the word webs.

Activity Two:

Review of words and definitions: The six target words and definitions are reviewed.
Students repeat the target words and hear student friendly definitions for each word.

APPENDIX D

PRE/ POSTTEST ITEMS

Format

1. Definition- Yes
2. Definition- No
3. Situation- Yes
4. Situation- No

Delightful

1. Does delightful mean very pleasant?
2. Does delightful mean you can't see it?
3. Would a delightful day be warm and sunny?
4. Would a delightful person yell all the time?

Clumsy

1. Does a clumsy person have trouble moving and often trips?

2. Does clumsy mean very beautiful?
3. Would a clumsy person trip on a step?
4. Would a clumsy person carefully carry a glass vase?

Capture

1. Does capture mean to catch something?
2. Does capture mean to be thankful for something?
3. Would a captured animal be stuck in a trap?
4. Would a captured dog be able to run back home?

Fierce

1. Does fierce mean acting in a mean way and looking for a fight?
2. Does fierce mean to hold up something?
3. Would a fierce lion growl at a zebra walking by?
4. Would a fierce cat lick its owner's face?

Rescue

1. Does rescue mean to save someone from something bad happening?
2. Does rescue mean to hide something?
3. If you rescue someone from a fire, would they be safe from the flames?
4. If you rescue a cat from a tree, would it still be stuck in the tree?

Suspense

1. Is suspense a feeling you get when you know something is going to happen very soon?
2. Does suspense mean to bother someone?
3. Would you be in suspense if the TV shut off before the end of the movie?
4. Would you be in suspense if you just finished a good book?

Deserve

1. Does deserve mean you should get something because of what you have done?
2. Does deserve mean to save someone or something from something bad happening?
3. If you won a race, would you deserve an award?
4. If a dog ran away, would it deserve a treat?

Grateful

1. Does grateful mean you are pleased with someone or something done for you and you wish to thank the person?
2. Does grateful mean to really enjoy doing something?

3. Would you be grateful if your bus driver brought your book bag you left on the bus back to school?

4. Would you feel grateful if your classmate tripped you?

Amble

1. Does amble mean to walk slowly?

2. Does amble mean to watch something closely?

3. Would a person amble out of bed in the morning?

4. Should you amble outside during a fire drill?

Deceive

1. Does deceive mean to make someone believe something that is not true?

2. Does deceive mean to be so surprised you are shocked?

3. Would you be deceiving your mom if you said you were 20 years old?

4. Would you be deceiving your teacher if you said you were a kid?

Plead

1. Does plead mean to beg someone to do something for you that will help you out?

2. Does plead mean to act in a mean way?

3. Would a child plead with their parents to stay up after their bedtime?

4. Would a child plead with their parents to have broccoli instead of cake on their birthday?

Challenge

1. Is a challenge doing something that is difficult?
2. Does challenge mean to beg someone to do something for you that will help you?
3. Would it be a challenge to read the newspaper by yourself?
4. Would it be a challenge to eat lunch?

Scrunched

1. Does scrunched mean pushed together and squeezed?
2. Is scrunched a feeling you get when you've done something well?
3. Would a scrunched up piece of paper be crumbled up?
4. Is a light bulb scrunched up?

Invisible

1. Does invisible mean you can't see it?
2. Does invisible mean to walk slowly?
3. Is the air around us invisible?
4. Is your backpack invisible?

Scold

1. Does scold mean to say angry things to someone about something they've done?
2. Does scold mean to ask someone to do something that is difficult?
3. Would a parent scold their child for running away?

4. Would you scold your dog for doing a trick?

Dreadful

1. Does dreadful mean so terrible that it could not be much worse?

2. Does dreadful mean you can't see it?

3. Would it be a dreadful day if you missed the bus, forgot your homework, and forgot about the spelling test?

4. Would it be a dreadful day if you won an award for good behavior?

Complain

1. Does complain mean to talk about how bad or unfair things are?

2. Does complain mean to look up to someone and want to be like them?

3. Would a child complain if recess was cancelled?

4. Would you complain if your teacher said there wouldn't be any homework?

Exaggerate

1. Does exaggerate mean to make things seem much worse or much better than they really are?

2. Does exaggerate mean to push together or squeeze?

3. Would I be exaggerating if I said my dad was as tall as the school?

4. If a child said they were hungry enough to eat a plate of spaghetti, is that exaggerating?

Tidy

1. Does tidy mean neat and clean?
2. Does tidy mean to make someone believe something that is not true?
3. Would a tidy bedroom have the bed made and all the clothes and toys picked up?
4. Would a tidy person have chocolate on their face?

Irk

1. Does irk mean to make a little angry?
2. Does irk mean to laugh quietly?
3. Would it irk your teacher if you forgot your homework?
4. Would it irk your parents if you ate all your dinner?

Admire

1. Does admire mean to look up to someone and want to be like them?
2. Does admire mean to talk about how bad things are?
3. Would you admire a classmate who got an A on a difficult test?
4. Would you admire someone who robbed a bank?

Chuckle

1. Does chuckle mean to laugh quietly?
2. Does chuckle mean to make things much better or worse than they are?

3. Would you chuckle at a funny joke?
4. Would you chuckle if you hit your head?

Astonished

1. Does astonished mean something has surprised you so much you're shocked?
2. Does astonished mean you should get something because of what you've done?
3. Would you be astonished if a zebra walked into your classroom?
4. If a friend ate his lunch, would you be astonished?


Coincidence


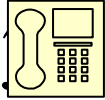
1. Does coincidence mean two things just happen but seem like they go together?
2. Does coincidence mean you catch something and keep it from getting away?
3. Would it be a coincidence if you and a classmate packed the exact same thing for lunch?
4. Would it be a coincidence if it snowed in winter?

APPENDIX E




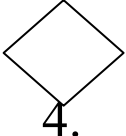
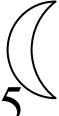

EXAMPLE OF STUDENT ANSWER SHEET


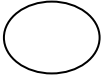
Name: _____


	<p>yes no</p>
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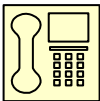
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	<p>yes no</p>

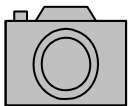
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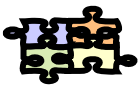
	yes	no
	yes	no
	yes	no
	yes	no
	yes	no
	yes	no


 7.	<p>yes</p> <p>no</p>
 8.	<p>yes</p> <p>no</p>

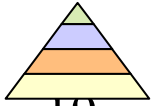
 9.	<p>yes</p> <p>no</p>
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 10.	yes	no
 11.	yes	no
 12.	yes	no
 13.	yes	no
 14.	yes	no
 15.	yes	no





 16.	yes no
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 17.	yes no
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 18.	yes no
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 19.	yes no
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	yes no
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 21.	yes no
 22.	yes no
 23.	yes no
24. 	yes no

APPENDIX F

EXAMPLE OF A WEEKLY VOCABULARY ASSESSMENT

Format

1-3 -Definitions- Yes

4-6 -Definitions- No

7-9- Situation- Yes

10-12 -Situation- No

Set 1

Delightful

1. Does delightful mean very pleasant?
2. Does delightful mean very lovely?
3. Does delightful mean very wonderful?

4. Does delightful mean a big pill?
5. Does delightful mean messy and careless?
6. Does delightful mean to eat quickly?

7. If a person is nice and kind, are they delightful?
8. If a person is friendly and wonderful are they delightful?
9. If a person is charming and lovely, are they delightful?

10. If the power went out in the middle of watching a movie, would that be a delightful day?
11. Would it be delightful is someone's house burned down?
12. Would it be a delightful if it rained when you went to an amusement park?

Clumsy

1. Does clumsy mean to have trouble moving and handling things?
2. Does clumsy mean to have trouble moving and often trip?
3. Does clumsy mean to have trouble moving and handling things?

4. Does clumsy mean to eat in tiny bites?
5. Does clumsy mean to ask questions about something?
6. Does clumsy mean to stay calm while you wait?

7. Would a clumsy cat trip up the steps?
8. If you were taking a clumsy dog on a walk, would it trip?
9. Would a clumsy bunny knock over their food bowl?

10. Would a clumsy person be a good tightrope walker?
11. Would a clumsy person be good in a maze?
12. Would a clumsy person be a good dancer?

Capture

1. Does capture mean to catch and keep something?
2. Does capture mean to catch something and keep it from getting away?
3. Does capture mean to catch and keep something from getting away?

4. Does capture mean to melt and disappear?
5. Does capture mean the scariest thing you can think of?
6. Does capture mean to warn someone of danger?

7. Is a bear in a cage at the zoo captured?
8. Is a mouse in a trap captured?
9. Is a pet bird in a cage captured?

10. Is a blue jay flying outside your window captured?
11. Is a deer in the woods captured?
12. Is a rabbit hopping through a field captured?

Fierce

1. Does fierce mean acting in a mean way and often looking for a fight?
2. Does fierce mean behaving in a mean way or looking for a fight?
3. Does fierce mean looking for a fight and acting in a mean way?

4. Does fierce mean a very large amount?
5. Does fierce mean you are very much surprised?
6. Does fierce mean you have more than you need?

7. Would a fierce alligator want to fight another animal?
8. Would a fierce bear growl at an animal who comes by its cubs?
9. Would a fierce eagle attack another bird?

10. Is a little kitten fierce?
11. Is a little baby fierce?
12. Is a small ant fierce?

Rescue

1. Does rescue mean to save someone or something from something bad?
2. Does rescue mean to save someone from a bad happening?
3. Does rescue mean to save someone or something from something bad happening?

4. Does rescue mean rather boring and not exciting?

5. Does rescue mean you want something so much you can't wait?
6. Does rescue mean you are so scared you can hardly move?

7. If a lifeguard saved a swimmer in trouble, is that a rescue?
8. When a fireman saves someone from a burning building are they rescuing them?
9. When a cat is stuck in a tree, would it need rescued?

10. If you rescue a fly from a spider web, would it still get eaten by the spider?
11. Would a person who is sleeping need rescued?
12. Would a person floating on a raft in a pool need rescued?

Suspense

1. Is suspense a feeling that something will happen soon?
2. Is suspense a feeling you get when you know something will happen soon?
3. Is suspense a feeling that soon something will happen?

4. Does suspense mean to let go of all your worries?
5. Is suspense suddenly being able to see something?
6. Does suspense mean very friendly?

7. Would you be kept in suspense if you couldn't read the end of a good book?
8. Would you be kept in suspense watching a scary movie?
9. Would watching a tightrope walker keep you in suspense?

10. Would you be in suspense after you opened a present?
11. After you finish watching a movie, are you in suspense?
12. Would you be in suspense at the end of a play?

BIBLIOGRAPHY

- Beck, I. & McKeown, M. (1991). In R. Barr, M. L. Kamil, P. Mosenthal, & P. D. Pearson (Eds.), *Handbook of Reading Research* (Vol. 2, pp. 789-814). New York: Longman.
- Beck, I. L., & McKeown, M. G. (2001). Text Talk: Capturing the benefits of read-aloud experiences for young children. *The Reading Teacher*, 55(1), 10-20.
- Beck, I. L., & McKeown, M. G. (in press). Increasing Young Low-Income Children's Oral Vocabulary Repertoires through Rich and Focused Instruction. *Elementary School Journal*.
- Beck, I. L., McKeown, M. G., & Kucan, L. (2002). *Bringing Words to Life*. New York: The Guilford Press.
- Beck, I. L., McKeown, M. G. & Kucan, L. (2005). Choosing Words to Teach. In Hiebert, E. H., & Kamil, M. L. *Teaching and Learning Vocabulary*. Mahwah: NJ: Erlbaum.
- Beck, I. L., Perfetti, C. A., & McKeown, M. G. (1982). The effects of long-term vocabulary instruction on lexical access and reading comprehension. *Journal of Educational Psychology*, 74, 506-521.
- Blachowicz, C. L. Z. & Fisher, P. (2000). Vocabulary Processes. In M. L. Kamil, P. B. Mosenthal, P. D. Pearson & R. Barr (eds.) *Handbook of Reading Research* (Vol. III, pp. 503-523). Mahwah, NJ: Erlbaum.
- Biemiller, A. (2004). Teaching Vocabulary in the Primary Grades. In Baumann, J. F., & Kame'enui, E. J. *Vocabulary Instruction: Research to Practice*. New York.

- Biemiller, A. (2005). Size and Sequence in Vocabulary Development. In Hiebert, E. H., & Kamil, M. L. *Teaching and Learning Vocabulary*. Mahwah: NJ.
- Biemiller, A. & Slonim, N. (2001). Estimating root word vocabulary growth in normative and advantaged populations: Evidence for a common sequence of vocabulary acquisition. *Journal of Educational Psychology*, 93, 498-520.
- Blachowicz, C. L. Z., & Fisher, P. (2000). Vocabulary Processes. In M. L. Kamil, P. B. Mosenthal, P.D. Pearson, & R. Barr (eds.) *Handbook of Reading Research* (Vol. III, pp.503-523). Mahwah, NJ: Erlbaum Associates.
- Brett, A., Rothlein, L., & Hurley, M. (1996). Vocabulary Acquisition from Listening to Stories and Explanations of Target Words. *The Elementary School Journal*, 96(4), 415-422.
- Coyne, M. D., Simmons, D. C., & Kame'enui, E. J. (2004). Vocabulary Instruction for Young Children At-Risk of Experiencing Reading Difficulties. In Baumann, J. F., & Kame'enui, E. J. *Vocabulary Instruction: Research to Practice*. New York: Guildford Press.
- Coyne, M. D., Simmons, D. C., Kame'enui, E. J. & Stoolmiller, M. (2004). Teaching Vocabulary During Shared Storybook Readings: An Examination of Differential Effects. *Exceptionality*, 12(3), 145-162.
- Cunningham, A., & Stanovich, K. (1997). Early reading acquisition and its relation to reading experience and ability 10 years later. *Developmental Psychology*, 33, 934-945.
- Hargrave, A. C., & Senechal, M. (2000). A book reading intervention with preschool children who have limited vocabularies: the benefits of regular reading and dialogic reading. *Early Childhood Reading Quarterly*, 15(1), 75-90.
- Hart, B., & Risley, T. R. (1995). Meaningful Differences in the Everyday Experiences of Young American Children. Baltimore, MD: Paul H. Brookes.
- Juel, C., Biancarosa, G., Coker, D., & Deffes, R. (2003). Walking with Rosie: A Cautionary Tale of Early Reading Instruction. *Educational Leadership*, 12-18.
- Juel, C., & Deffes, R. (2004). Making Words Stick. *Educational Leadership*, 61(6), 30-34.

- McKeown, M. G. & Beck, I. L. (2004). Direct and Rich Vocabulary Instruction. In Baumann, J. F., & Kame'enui, E. J. *Vocabulary Instruction: Research to Practice*. New York: Guilford Press.
- Nagy, W. (2005). Why Vocabulary Instruction Needs to Be Long-Term and Comprehensive. In Hiebert, E. H., & Kamil, M. L. *Teaching and Learning Vocabulary*. Mahwah: NJ.
- Nagy, W. E. & Scott, J. A. (2000). Vocabulary Processes. In M. L. Kamil, P. B. Mosenthal, P. D. Pearson & R. Barr (eds.) *Handbook of Reading Research* (Vol. III, pp. 269-284). Mahwah: NJ: Erlbaum.
- National Institute of Child Health and Human Development. (2000). Report of the National Reading Panel. Teaching children to read: An evidence-based assessment of the scientific research literature on reading and its implications for reading instruction (NIH Publication No. 00-4769). Washington, DC: U.S. Government Printing Office.
- Penno, J. F., Wilkinson, I. A., & Moore, D. W. (2002). Vocabulary Acquisition from Teacher Explanation and Repeated Listening to Stories: Do They Overcome the Matthew Effect? *Journal of Educational Psychology*, 94(1), 23-33.
- Qi, C. H., Kaiser, A. P., Milan, S. & Hancock, T. (2006). Language Performance of Low-Income African American and European American Preschool Children on the PPVT-III. *Language, Speech, and Hearing Services in Schools*, 37, 5-16.
- Restrepo, M. A., Schwanenflugel, P. J., Blake, J., Neuharth-Pritchett, S., Cramer, S.E., & Ruston, H. P. (2006). Performance on the PPVT-III and the EVT: Applicability of the Measures With African-American and European American Preschool Children. *Language, Speech, and Hearing Services in Schools*, 37, 17-27.
- Senechal, M., Thomas, E., & Monker, J. (1995). Individual Differences in 4-Year-Old Children's Acquisition of Vocabulary During Storybook Reading. *Journal of Educational Psychology*, 87(2), 218-229.
- Sharif, I., Ozuah, P. O., Dinkevich, E. I., & Mulvihill, M. (2003). Impact of a Brief Literacy Intervention on Urban Preschoolers. *Early Childhood Education Journal*, 30(3), 177-180.

Stahl, S. A., & Nagy, W. E. (2006). *Teaching Word Meanings*. Mahwah, NJ: Erlbaum Associates.

Stahl, S. A. & Stahl, K. A. D. (2004). Word Wizards All! In Baumann, J. F., & Kame'enui, E. J. *Vocabulary Instruction: Research to Practice*. New York: Guildford Press.