Cedarville University
DigitalCommons@Cedarville

Master of Education Applied Research Projects   Master of Education Capstones

8-15-2015

Effects of Direct Instruction of Literary Text Elements with Story Mapping on Reading Comprehension

Diane M. Hannay
Cedarville University, dianehannay@cedarville.edu

Follow this and additional works at: http://digitalcommons.cedarville.edu/education_research_projects

Part of the Curriculum and Instruction Commons

Recommended Citation

Hannay, Diane M., "Effects of Direct Instruction of Literary Text Elements with Story Mapping on Reading Comprehension" (2015). *Master of Education Applied Research Projects*. 1.
http://digitalcommons.cedarville.edu/education_research_projects/1

CENTENNIAL LIBRARY
CEDARVILLE UNIVERSITY

Effects of Direct Instruction of Literary Text Elements

with Story Mapping on Reading Comprehension

A research project submitted in partial fulfillment

for the requirements of the degree of

Masters of Education

Diane M. Hannay

Cedarville University

Abstract

The purpose for the study was to examine the effects of direct instruction of literary text elements accompanied with story mapping on reading comprehension in a fourth grade self-contained classroom. In addition, the study examined if the teacher implementing the treatment recognized a positive change in student comprehension of literary text after implementing the treatment and if the teacher was positively motivated to include direct instruction lessons on literary text elements with story mapping to enhance student reading comprehension in the future. A quasi-experimental mixed research method was used driven by the objective of explaining a cause-and-effect relationship. Results of the study supported existing research, indicated that direct instruction of literary text elements with story mapping was an effective way to increase student reading comprehension, and motivated the teacher to implement direct instruction of literary text elements with story mapping in future instruction. Results showed statistically significant increase in reading comprehension scores from the pretest to the posttest as well as large margins of positive gain for students with and without special learning disabilities. Limitations of the study, implications for Community Christian School teacher practice, and suggestions for future research are discussed.

Table of Contents

Chapter 1: Introduction

English Language Arts (ELA) curriculums are under review in many elementary schools around the United States due to newly adopted federal and state educational standards and high stakes standardized tests (CCSS; National Governors Association and Council of Chief State School Officers, 2011). Many educators concur, it is important to have common, standards-based curriculum, instruction, and assessment which provide evidence for schools to track student achievement (Mahurt, 2013). Key shifts in the ELA strands of the new *Common Core State Standards* are impacting school curriculum. The first shift in curriculum is an emphasis on regular practice with complex texts and the ability of students to understand academic language of narrative and expository texts.   A second key shift in ELA standards is the ability for students to make text-dependent analyses and inferences, which requires more careful reading than students have been asked to do in the past. The third shift is moving students to a 50-50 balanced approach to reading literary text and informational text. The balance of reading content-rich non-fiction is designed to help students build more thorough knowledge of the world. The shifts in ELA standards have created a situation in education in which schools face an urgent need for change in language arts curriculum, instruction, and assessment ("Key Shifts in English Language Arts," 2015). *Community Christian School (CCS) in the Northwest region of the United States is no exception. A pattern of low reading standardized test scores in the elementary classes at CCS has caused the administration to perform a detailed evaluation of their current reading curriculum.

In 2012, CCS implemented a new computerized standardized test called Measures of Academic Progress (MAP) developed by the Northwest Evaluation Association. A thorough analysis of MAP results in the subject of ELA at CCS from 2012-2015 was performed. A

Professional Learning Community (PLC) comprised of the CCS kindergarten through sixth-grade teachers was established to analyze the CCS ELA curriculum in light of low student achievement on MAP test results since implementation. The PLC objective was to determine the best course of action for CCS to address the low student reading test scores. The PLC was charged with the challenge of reviewing published reading curriculum and evaluating reading methods and strategies. A culmination of the PLC research was a recommended solution in reading curriculum, instruction, and assessment to the CCS Curriculum Committee in June 2015. Grade-level Common Core State Standards as adopted by the state of Oregon (CCSS; National Governors Association and Council of Chief State School Officers, 2011) and Standards for the English Language Arts (International Reading Association, National Council of Teachers of English, 2012) were used for a comparison of CCS reading curriculum content. It became evident that the current CCS reading curriculum was teaching fewer than 40% of the stated standards being assessed in the MAP reading test. One area that revealed significant deficit was instruction in literary text elements throughout the kindergarten through sixth-grade elementary reading curriculum, which correlated to the first major CCSS shift of moving to regular practice with complex texts and academic language ("Key Shifts in English Language Arts," 2015). The significant deficiency in the CCS reading curriculum led to the question: what change or supplement does CCS need to make in the kindergarten through sixth-grade reading curriculum, instruction, and assessment to include literary text elements?

Purpose

As a result of the poor standardized MAP test results, extensive educational research, and noted weaknesses in the current reading curriculum at CCS, the researcher of the current study (a fifth-grade teacher at CCS) created a curriculum supplement for her fifth-grade class. Since

research studies have shown the positive impact of narrative intervention programs with all school-aged children in regular classroom settings (Gillam, Olszewski, Fargo, & Gillam, 2014), the researcher decided to try a curriculum supplement in her fifth-grade self-contained class to address the deficit in her current reading curriculum.   According to the study by Gillam et al., children in a self-contained class, despite their diverse abilities, made significant improvements on narrative and vocabulary measures compared to children in a comparison classroom without a structured narrative instruction program. The results recorded in the Gillam et al. study provided impetus for the researcher to try the intervention on her own fifth-grade class.

The curriculum supplement designed by the researcher was a type of action research to see if supplementing the existing reading curriculum with updated standards would positively affect the MAP test scores for her 23 self-contained fifth-grade students at CCS. Community Christian School is a preschool through twelfth grade private school with 234 students averaging 17 students in each grade. According to the 2013-2014 National Center for Education Statistics, CCS is known as a "distant town" or rural school located in a city of 25,000 people that is within close proximity to a larger city. The curriculum supplement used by the researcher on her fifth-grade class involved direct instruction of literary text elements with story mapping during October and November of 2014.   Following the curriculum supplement, at the mid-year (February, 2015), reading MAP test, 81% of the researcher's 23 self-contained fifth-grade students tested at or above the Rash unIT (RIT) value status norm for middle of the year mean. Seeing positive results from the pilot study, the researcher decided a more controlled research treatment should be implemented to validate the intervention before recommending a reading supplement to the CCS curriculum committee. It was decided that the controlled research treatment could include another CCS elementary grade and its teacher, who were unfamiliar with

literary text elements. Therefore, the purpose for the research project grew from the researcher's pilot study to include the 18 students in the CCS fourth-grade self-contained class and the fourth-grade teacher.

The purpose for the study is based on the research question: does direct instruction of literary text elements accompanied with story mapping improve reading comprehension in the fourth-grade CCS classroom? In addition, the research question for the mixed study was followed up with two additional questions after treatment: 1) Did the fourth-grade instructor recognize a positive change in student comprehension of literary text after implementing the treatment? 2) Was the fourth-grade instructor positively motivated to include direct instruction lessons on literary text elements with story mapping to enhance student reading comprehension in the future? The research hypothesis was that the fourth-grade students participating in the treatment of direct instruction of literary text elements using story mapping will show a significant increase in reading comprehension scores from the pretest to the posttest.

Significance

The significance of the current study has direct implication on the development or purchase of new elementary reading curriculum for CCS. Determining the best possible reading curriculum which meets state standards and assists students in improved reading comprehension was the objective of the school's PLC. Results from the current study could help inform and guide curriculum review choices for CCS kindergarten through sixth grades reading curriculum. It was important to verify benefits of adding direct instruction of literary text elements and story mapping into the current reading curriculum prior to recommendation to the curriculum committee, thus justifying the significance of the research study. The study is significant

because the CCS curriculum committee is making elementary reading curriculum decisions at the end of the 2015 school year.

Since CCS desired to prepare students for college and career readiness, new Common Core State Standards, and success in new state assessments, it was important to the CCS administration to explore any discrepancies and gaps in student reading comprehension levels. Not only did the school MAP data show this discrepancy, but also National Assessment for Educational Progress (NAEP) scores highlighted student's lack of preparedness to read, think, and apply content from informational and narrative text. NAEP data show that 34% of the fourth-grade students in U.S. public schools perform below the basic level, which means they have not achieved mastery (U.S. Department of Education, 2009).   Based on the evidence of the lack of master, it was essential that CCS deal with the deficiency in their reading curriculum immediately in order to improve elementary student reading comprehension.

Scope and Delimitations

The scope of the study was reading comprehension at the elementary level, with a fourth-grade treatment. The research focused on the cause and effect relationship between direct instructions of literary text elements with story mapping on reading comprehension. Reading comprehension in the study was limited to a student's ability to read text, understand what they were reading, and extract meaning when they were engaged in and mentally interacting with story mapping. Delimitations of the study included the following: the current study evaluated the effect of reading comprehension instruction based on teacher direct instruction only. No other methods, such as self-study or small group instruction, were used in the study. The study excluded reading comprehension strategies of prepackaged narrative text followed by questions that monitored student reading comprehension which were commonly used at CCS. The choice

of participants was limited to only one self-contained fourth-grade classroom due to availability constraints. In addition, writing skills were not measured in the study as an aspect of the language arts curriculum because the study did not focus on writing, but rather the effects direct instruction had on reading comprehension.

Definition of Terms

The term *direct instruction* based on the work of Engelmann in the 1960's (Magliaro, Lockee, & Burton, 2005) is defined as a model of teaching that is teacher-directed and includes five phases of activity: orientation, presentation, structured practice, guided practice, and independent practice (Joyce, Weil, & Calhoun, 2009).

For the purpose of the study, the term Literary Text Elements includes two parts. First, it is comprised of the term *story grammar* based on the early work of Mandler and Johnson (1977) and Stein and Glenn (1979). Mandler and Johnson found that regardless of age or culture, a pattern is followed when individuals retell stories. The pattern of story structure is known as story grammar and includes the elements of plot, setting, characters (protagonist and antagonist), complication, and resolution. Students' knowledge of this narrative structure allows them to predict the flow of the story and aids in comprehension (Duchan, 2004). Gonzalez (2000) explains that story grammar is a tool used to increase students' skills in listening to and retelling stories. Murza, Montemurro, Schwartz, Nye, and Borokhovski (2012) suggest that explicit instruction of story grammar is distinct from other instructional methods of teaching reading. Story grammar is seen as a framework of elements that can help organize literary text so that information can be stored and retrieved (Murza, et al., 2012). Second, the term *literary text elements* include the topics of theme, conflict, and point of view based on the Common Core State Standards goals and targets for narrative comprehension (CCSS: National Governors

Association and Council of Chief State School Officers, 2011). The combination of teaching Mandler and Johnson's story grammar elements of plot, setting, characters, complication, and resolution, along with the Common Core elements of theme, conflict, and point of view, all support the first key shift in the new Common Core State Standards for ELA ("Key Shifts in English Language Arts," 2015) and will be used to define literary text elements in the study.

A third term to be defined is *advance organizer* based on the theories of Ausubel. Advance organizers are cognitive instructional strategies used to promote the learning and retention of new information (Joyce et al., 2009). An advance organizer is also commonly known as a story map or graphic organizer that uses visual symbols to depict the relationship between facts, terms, and ideas within a learning task (National Center on Accessible Instructional Materials, 2014).

A fourth term to be defined in the study is *story mapping*. For the purpose of the current research, story mapping is a type of advance organizer used to support understanding and application of direct instruction of the story grammar framework (National Center on Accessible Instructional Materials, 2014). Schorzman and Cheek (2004) defined a graphic organizer to include mapping strategies, flow chart designs, or various other schematic designs.

*Community Christian School is a pseudonym for the actual school used in the study.

Chapter 2: Literature Review

Direct Instruction

Ideas imbedded in the operant conditioning theory of behaviorist B.F. Skinner laid the foundation for the direct instruction method of teaching (Skinner, 1953). For decades, researchers have studied effective elementary reading teachers (Taylor, Peterson, Pearson, & Rodriguez, 2002). Direct instruction was one of several important strategies in successful teaching methods researched in the 1960s and 1970s (Brophy, 1973; Flanders, 1961). In more recent years, the methodology of direct instruction has been under some criticism in education, and many educators moved away from its use in modern classrooms because it is not student-centered (Joyce et al., 2009). The term direct instruction was popularized by Engelmann (Bereiter & Engelmann, 1966) which grew out of Skinner's behavioral theory (Skinner, 1953). Skinner's foundational idea of operant conditioning behaviorism is built on the belief that behavior can be changed by the environment. According to Knight (2006), the foundations of behaviorism are deeply embedded in the presupposition of naturalistic science. Skinner saw behaviorism as a philosophy of the science of human behavior (Knight, 2006). Skinner believed behaviors that are conducive to a positive outcome are selected by the consequences that follow certain conduct (Magliaro, Lockee, & Burton, 2005). His operant conditioning behavioral theory purports that the purpose of education is to change behavior so that people can be capable workers and ultimately productive citizens of society. Behaviorism explains that the task of education is to create learning environments that lead to desired behaviors and outcomes in students. Skinner's theory supports models of teaching and curriculum that break up subject matter into small, sequential steps so that students can be rewarded positively as they complete each step successfully. Operant conditioning behaviorist theory suggests that student behaviors

that are positively reinforced will tend to continue, while student behaviors that are punished will eventually end. Positive reinforcements can occur frequently as students master each step of material one at a time (Knight, 2006).

The foundation of Engelmann's direct instruction method of teaching developed out of Skinner's behavioral theory. In behavioral-based models, such as direct instruction, Skinner assumed that students must be active not passive in order to master subject matter (Skinner, 1968). Students are expected to behave in a way that assists them in learning material. Behavioral psychology applies Skinner's theory to education by analyzing the interaction between teachers and students in the area of modeling, reinforcing, feedback, avoiding digressions, and re-explaining difficult points. Engelmann's direct instruction is not to be perceived as simply a lecture approach to education, but a model that focuses on teacher and student interactions. Two major components of direct instruction are to maximize student learning time and to provide an educational environment where students experience a high rate of success (80 percent mastery or better) in the tasks they are given (Joyce et al., 2009). Behaviorism sees the teacher's role in education as one that must create an effective learning environment for students, which will provide positive reinforcement for desired student actions (Knight, 2006). A major point of direct instruction is that the type of feedback students received during structured practice impacts their success (Joyce et al., 2009).

According to Joyce et al. (2009) the direct instruction model consists of five phases of activity. These phases are orientation, presentation, structured practice, guided practice, and independent practice. In the orientation phase, a framework for the lesson is established which includes teacher expectations and student learning outcomes. The presentation phase is when new concepts or skills are explained with demonstrations and examples. Attributes of a new

concept or rule are discussed and steps with identifiable examples are used to assist the students with learning a new concept.   Structured practice is the third phase. The teacher leads students through practice examples during structured practice and provides feedback to student responses. Often objectives are reviewed during structured practice, accurate responses are enforced, and errors corrected so students can use their accurate work as a resource during independent practice. Guided practice is the next phase in direct instruction according to Joyce et al. Guided practice gives students an opportunity to practice on their own with teacher support. Teachers give corrective feedback as necessary and monitor students' work. The final phase is independent practice. When students have received 85 percent accuracy in guided practice, they are believed to be ready for independent practice. Independent practice reinforces the new learning concept or skill and ensures retention. The belief is that successful completion of independent practice confirms students have thoroughly understood the new subject matter (Joyce et al., 2009).

Engelmann created the direct instruction model in the 1960s at the University of Illinois (Magliaro et al., 2005). He moved to the University of Oregon in 1970, joining the faculty in the College of Education. Engelmann and his colleges initiated the research on the direct-instruction method with the Direct Instruction System for Teaching And Remediation (DISTAR) by the Science Research Associates which focused on primary (K-3rd grade) reading, language, and math (Adams & Engelmann, 1996). The massive Project Follow Through, which spanned nearly 30 years, was seen as the largest education experiment ever conducted. Project Follow Through compared different models of teaching involving over 75,000 students and 170 sites. Direct instruction, one of the main models researched in Project Follow Through, showed the greatest positive impact in low income disadvantaged K-3rd grade students (Adams & Engelmann, 1996).

For the decades following the DISTAR research, numerous other researchers have studied the results on the direct instruction method of teaching. Studies conducted by Barak Rosenshine in the 1970s and 1980s found direct instruction to be an effective model for student engagement and student achievement (Rosenshine, 1978, 1985).

Other key components that Engelmann included in his direct instruction method for reading include ability grouping. Ability grouping of students is the process of grouping and regrouping students throughout instruction based on their rate of success in a program. Another component Engelmann emphasized is the pace of the instruction. Students are encouraged to come to mastery and accelerate as quickly as possible during instruction. Likewise, frequent assessments, that are curriculum-based interim assessments, are designed to inform ability placement and guide interventions. Finally, Engelmann included embedded professional development in his direct instruction methods. He supported continual and careful monitoring and coaching throughout the program to ensure fidelity of implementation by way of embedded professional development practices (Adams & Engelmann, 1996).

Direct instruction continues to emerge as a trustworthy model for teaching as Schwartz and Bransford's (1998) study supports. In their "Time for Telling" article, Schwartz and Bransford report that problem-based learning approaches are enhanced by direct instruction. More recent research by Kozioff, LaNunziata, Cowardin, and Bessellieu (2001) showed direct instruction as a highly effective method of teaching which fostered positive change in student engagement and achievement. Contemporary teaching ideals and studies have helped to expand the framework of direct instruction making it an effective and efficient approach to teaching that enhances student engagement and promotes student comprehension and retention of subject matter (Magliaro et al., 2005).   Modern methods for teaching reading still value and include

direct instruction strategies, but they are now accompanied with interactive and engaging student activities which reflect best pedagogical practice (Taylor et al., 2002).

Direct Instruction is also known as *expository teaching* according to Maheshwari (2013). Ausubel also supports expository teaching as an effective method of transmitting information to students (Ausubel, 1968). When a teacher is in front of a room using direct instruction, expository teaching is taking place. Expository instruction goes beyond just presenting facts to students. It involves presenting clear and concise information in a purposeful way that allows students to easily make connections from one concept to the next. The structure of an expository lesson is believed to help students stay focused on the content (Joyce et al., 2009).

In expository teaching, the teacher gives both the question and the answer (Joyce et al., 2009). In contrast to discovery learning, the student is not required to make independent discoveries in expository teaching since all the content to be learned is given. Expository teaching is sometimes called deductive teaching because the teacher often begins with a definition of concepts or principles, illustrates them, and provides application for them. Ausubel believes that expository teaching has been incorrectly identified with *rote teaching* (Ausubel, 1968). In rote teaching the students are expected to memorize the lectures by constant review and repetition. However, expository teaching presents an important body of related facts, concepts, and principles which the students can learn and transfer (Maheshwari, 2013). Expository teaching (or direct instruction), therefore, is seen as a teaching strategy where the teacher presents students with the subject matter, rules, and examples that illustrate the rules in an engaging way. Examples are provided to give context and to help students see the subject matter from different perspectives. Students remain actively involved during expository teaching keeping them engaged and enhancing retention (Stanley, 1998).

Advance Organizers

Ausubel developed his theories of advance organizers on many of the foundational principles of Skinner's behaviorism theory. As an educational theorist, Ausubel focuses directly on how students learn subject matter. Ausubel is a strong proponent of the structure of direct-instruction model of teaching; his goal being the mastery of content through presentation. His desire is to assist teachers in organizing and presenting subject matter as efficiently as possible. Ausubel sees the teacher as responsible for organizing the material and presenting it to students through lectures, readings, and tasks so the student can integrate and apply what they have learned (Joyce et al., 2009). Similar to Engelmann's ideas, Ausubel believes the students have to be active constructors of knowledge which should be guided by the teacher. Ausubel's concept of advance organizers is designed to strengthen students' cognitive structures (Ausubel, 1963). *Cognitive structure* refers to students' knowledge of a specific subject matter and how well-organized, clear, and constant that knowledge is (Joyce et al., 2009). Ausubel suggests that a person's cognitive structure is the most important factor that determines how new content will be meaningfully retained (Ausubel, 1963).

Ausubel's theory offers educators a systematic approach to teaching. It provides a useful approach for helping students erect meaningful cognitive structures. He views knowledge as an integrated system linked together in an orderly fashion. Ausubel believes the human mind follows logical rules for organizing information into respective categories which he refers to as cognitive structure (Stanley, 1998). Subsumption is the central idea that runs through Ausubel's learning theory. Subsumption is the absorption of new information into student's prior knowledge in their existing cognitive structure (Ausubel, 1963). According to Ausubel, subsumption provides a basic structure or scaffolding, around which new information is

organized. His theory of learning explains that knowledge is organized like a pyramid with the most general ideas at the apex of the pyramid and more specific details incorporated (subsumed) under it (Ausubel & Robinson, 1969). It is believed that the concepts at the apex of the pyramid will be retained longer in memory than the details at the base of the pyramid. Ausubel's conclusion supports the idea that information is organized under concepts already existing in the learner's mind which explains his thinking regarding the use of advance organizers (Ausubel, 1963). Advance organizers are abstract ideas presented as a precursor to the lesson with a graphic image. Ausubel believes organizers can be used to assist learners in assimilating new information by helping bridge the gap between what is already known and what is to be learned (Ausubel, 1968). He believes that by providing a scaffolding of ideas at the beginning of a lesson, advance organizers will help the student understand the structure which may lead their mind to be more active as the lesson progresses (Joyce et al., 2009). Ausubel's theory suggests that organizers can be useful when learners do not already possess relevant concepts needed to integrate new information into their cognitive understanding. The use of advance organizers are seen by Ausubel as a specific technique or method of presenting new information effectively. Ausubel's theory would suggest that learners who possess well organized cognitive structures tend to retain information more effectively than learners who have poorly organized cognitive systems. Based on his theory, one way of improving student comprehension and retention is to introduce appropriate subsumers (or scaffolding to prior knowledge) before introducing new content. Ausubel believes that meaningful learning takes place when learners can take hold of the relationship between two or more ideas. A formal education is an incremental process where knowledge that is acquired one day provides the basis for what will be learned the next day (Stanley, 1998).

Based on Ausubel's theory, advance organizers can take several forms. An example of an advance organizer is the explanation of new information prior to teaching a lesson, which scaffolds prior knowledge for the student. A second example of an advance organizer is when a teacher begins a lesson using inductive strategies and mnemonics to teach students material which will link to new concepts. A third example of an advance organizer is when a teacher starts a lesson by showing a visual graphic organizer to assist students in recognizing how new subject matter is connected. Each of these examples supports Ausubel's theory of strengthening students' cognitive structures, thus impacting their ability to comprehend knowledge. Ausubel's learning theory is a logical approach to instruction that can be effectively supported with the use of graphic organizers to support hierarchal learning. Direct instruction (expository teaching) accompanied with an advance organizer can assist in the acquisition, comprehension, and long term transfer of new content (Ausubel, 1963; Stanley, 1998; Joyce et al., 2009).

Reading Comprehension

Reading comprehension is a process of constructing meaning from written text and is believed to be the most important academic skill learned in school, according to Mastropieri and Scruggs (1997). Their research shows the importance of direct instruction in specific reading skills and the use of graphic organizers, among other strategies, to assist students with learning disabilities in reading comprehension (Mastropieri & Scruggs, 1997).

Reading and comprehending text is also seen as a complex human activity and an essential component of successful functioning in our world, according to van den Broek, and Espin (2012). In addition, the extensive two year study by McKeown, Beck, and Blake (2009) describes reading comprehension as a complex cognitive process that is affected by the reader, the text, and the context. Therefore, they suggest that many approaches to reading

comprehension might contribute to overall student outcomes. The three approaches addressed in their study illustrated the need for students to be mentally active in order to process text successfully. McKeown et al.'s study did not show significant differences in student reading comprehension outcomes in a direct comparison of a content instruction approach, a strategy instruction approach, and a basal reading instruction approach to teaching reading comprehension. Duke and Pearson (2008, 2009) explained that research supports their belief that students can be taught to acquire the strategies and processes to become good readers, thus improving overall reading comprehension. Good comprehension instruction, they found, included both direct instruction in specific strategies and significant time actually reading, writing, and discussing text (Duke & Pearson, 2008, 2009).

Kaplan's (2013) study also demonstrated that reading comprehension is a lengthy and developmental process over time and maturity. For the youngest students evaluated in his study (fourth graders) it was clear that they gave mostly concrete responses, understood literal questions, and could interpret narrative texts easier than expository texts.   Seventh-grader students appeared to be transitioning from concrete to abstract thinking. The eleventh-grader students were distinctly different from the two younger groups and more closely related to adult comprehension with higher order cognitive abilities and information-processing capacities. The evidence from Kaplan's study shows a need to understand the different developmental reading comprehension stages of students.   The results of his study indicate that younger elementary students need teacher assistance to help them use more critical analysis for deeper understanding of text.   Kaplan's study indicated that the fourth-grade students showed an understanding of story schema when reading narrative text (Kaplan, 2013).

Current research based on the Common Core State Standards for reading comprehension call for evidence-based practices, including the key shifts mentioned earlier. Studies in this area show that a strong emphasis needs to be placed on student interaction with increasingly complex text, close analytic reading, and increased student capacity for comparing and synthesizing ideas. In addition, students need to be exposed to more complex academic vocabulary in preparation for college and career. Students are being asked to expand their vocabularies through direct instruction, reading, and conversation and to understand not just word meanings, but also nuances and phrases. Regarding student interaction with text, studies show that students will be best prepared for college and career if they have the ability to carefully read multiple texts and comprehend the information, arguments, ideas, and details based on evidence in the text. They will also demonstrate the ability to answer text-dependent questions (Common Core Teaching and Learning Strategies, 2012).

Story Grammar

Story grammar is a literary text structure that is common to most narrative stories (Gardill & Jitendra, 1999). Organizing and retaining important information in a story is a skill all students must learn in order to improve reading comprehension. Gardill and Jitendra promote the importance of emphasizing story structure in a framework that highlights important relationships in story grammar in order to lead to a deeper understanding of the story. A study by Nampaktai, Kaewsombut, Akwaree, Wongwayrote, and Sameepet (2013), supported the idea that the use of story grammar technique in teaching reading fostered reading comprehension and thinking skills in students. The authors suggest that teaching students strategies that focus on text structure increased their comprehension. Supported by Engelmann's (Adams & Engelmann, 1996) and Ausubel's (1963) theories, Nampaktai et al. (2013) found students are able to

understand stories consistently and chronologically by using direct instruction of story grammar, thus improving reading comprehension . Research also supports the use of story grammar to assist students with learning disabilities in their reading comprehension as Stetter and Hughes' (2010) study suggests. An instruction strategy that uses explicit steps to help students organize their thinking was beneficial for students with learning disabilities in Stetter and Hughes' study. Individual components of story grammar were defined as plot, character, setting, and theme (Stetter & Hughes, 2010).

Shannon, Kameenui, and Baumann's (1988) research results showed that grade level made a difference in elementary students' ability to identify character motives in fables. Older students were found to be more successful at identifying motive than younger students. Students were found to score higher when the target information was represented explicitly in the text. Overall, students scored higher on questions concerning detail-cues than questions concerning character motives and were more attentive to character actions than character motives. Another conclusion of the study was that fables were difficult for students to comprehend. Shannon et al.'s study supported the need to emphasize more critical thinking in classroom instruction when teaching literacy. It indicated that there was a potential need for direct instruction on some narrative elements in literacy since it was difficult for students to infer literary text elements on their own. Singer and Donlan (1982) showed evidence in their experiment on high school students that direct instruction in story grammar structures combined with student generated story-specific questions, improved comprehension of literary text. The evidence in Singer and Donlan's study suggested that direct instruction helped students improve in reader-based processing of text; especially when built on story grammar structures acquired during elementary school (Singer & Donlan, 1982).

Story Mapping

Story mapping is a strategy for teaching improved reading comprehension which directs students' attention to distinct and relevant literary text elements of stories using a specific structure (Boulineau, Fore III, Hagan-Burke, & Burke, 2004). Following after Engelmann's belief in story structure (Adams & Engelmann, 1996), Boulineau et al. believe story maps provide a visual and spatial display for specific information in narrative and expository texts. These maps provide students with a prompt to assist them in identifying story elements and provide them with organized space to record information. Story maps can be used before reading a passage (supporting Ausubel's 1963 ideas of advance organizers), during reading to facilitate discussion, and after reading to record information about the story. In addition, the use of story mapping provides a guide for students to record important information and serves as a review after reading (Boulineau et al, 2004).

A study by Gutierrez-Broajos, Fernandez, and Salmeron-Vilchez (2014) of first-grade students in Spain showed improved reading comprehension with the use of direct instruction accompanied with a graphic organizer, compared to a control group that used a different reading strategy. Two of the seven steps used in the direct instruction experiment included detailed explanation of narrative text components and the use of graphic organizers of narrative content. Gutierrez-Broajos et al. found that their research results indicated that primary students who were taught reading strategies with a direct instructional approach accompanied with graphic organizers gained a higher level of text comprehension and recall. An earlier study was designed to enhance reading comprehension performance of fifth-grade students from culturally and linguistically diverse backgrounds using integrated reading strategies (Bui & Fagan, 2013). One strategy implemented was the use of story grammar instruction accompanied with story maps.

The combined strategy was used to organize story elements into a predictable pattern and

framework for understanding narrative texts. In this framework, the instructor explicitly taught

the definitions and components of story grammar elements and modeled how to find and record

story grammar elements on a story map. During guided practice, students filled out story maps

together and during independent practice, students filled out their own story map. Compared to a

control group, students taught integrated reading strategies in Bui and Fagan's study, which

included such strategies as direct instruction and story mapping, showed a greater mean score

gain for reading comprehension (Bui & Fagan, 2013).

In addition, a study by Baumann and Bergeron (1993) found that instruction in story

mapping was an effective teaching strategy for promoting first-grade readers' ability to identify

basic literary text elements in children's literature and enhance their comprehension of

unfamiliar stories. Likewise, a study by Emery (1996) stated that understanding characters in a

narrative story was believed to be essential for comprehending the story as a whole. Her study

described how teachers can use story maps with character perspectives to help seven to 11 year

old readers improve story comprehension.   Creating story maps with character perspectives

helped students in Emery's study focus on literary text elements of plot and character. Story

mapping techniques were used to help the students in her study to consider character

perspectives during the important events in a story. Emery showed an improvement in students'

ability to infer character perspectives which led to a deeper understanding of characters and

improved comprehension of the story with the use of story maps (Emery, 1996).

Armbruster, Anderson, and Ostertag (1987) developed studies that researched text

structure and the use of graphic displays over an extended time period. One such study

successfully taught students to use generic frames as tools for organizing what they learned from

their reading. Another study showed significant improvement in fifth grader students'

understanding and recall for the texts used with visual graphic organizers as well as a transfer

effect to new texts read (Armbruster, Anderson, & Meyer, 1991).

Students qualified with learning disabilities have also benefited with the use of story

mapping according to Grunke, Wilbert, and Stegmann, (2013). Their single-case study

suggested that the use of story mapping techniques for teaching literacy text was beneficial in

improving reading comprehension of struggling readers (Grunke, et al., 2013). Likewise, a 2009

study by Stagliano and Boon from the University of Georgia showed positive effects in reading

comprehension with the use of story mapping in fourth grade students with learning disabilities.

Stagliano and Boon performed individual instruction on common elements of a story to fourth-

grade students in a pull-out resource classroom. The researchers taught the elements of a story to

the students through the completion of a story map while reading expository text passages. After

instruction, students individually read expository texts over the course of 24 sessions while

completing story maps. After each reading, students were tested with five comprehension

questions taken from the expository text reading. Study results showed improved reading

comprehension and concluded that the use of story mapping was beneficial in students with

learning disabilities (Stagliano & Boon, 2009).

Another study by Boulineau, Fore III, Hagon-Burke, and Burke (2004) documented the

results of improved reading comprehension with the use of story mapping in third-and fourth-

grade students who had learning disabilities. The positive results observed in Boulineau et al.'s

study adds to the body of research regarding methods of improving reading comprehension in

elementary students with learning disabilities. In the study, six third-through fifth-grade students

were studied. The students in the study had identified learning disabilities and were receiving

special education services in a resource classroom outside their self-contained general education classroom.   No students participating in the Boulineau et al. research had previous exposure to any type of story-mapping procedure prior to the study. The specific story mapping tool used in their study was a story map that focused on seven distinct areas of story grammar as found in a narrative story: setting, characters, problem, solution, outcome, reaction, and theme. The teacher in the study used a story grammar map as a visual organizer and prompt for the information students were expected to identify in the narrative stories they read. Teachers also used Ausubel's (1963) advance organizer idea to present the story grammar map to students prior to reading the narrative story. Skinner's theory of direct instruction was also applied in Boulineau et al.'s study when teachers gave explicit instructions about the story maps prior to having students read the text passage. In a thorough assessment of each participant with learning disabilities, noted improvement in reading comprehension was seen after the treatment was implemented (Boulineau et al., 2004).

An earlier study by Gardill and Jitendra (1999) looked closely at the effectiveness of direct instruction of an advanced story map procedure on the reading comprehension performance of middle school students with learning disabilities. Participants in Gardill and Jitendra's study were six sixth-and eighth-grade students with learning disabilities who received reading instruction in a resource classroom for part of the day. An advance story map containing common story elements was used to assist students in recognizing the explicit information in a reading text. Direct instruction by the teacher was used to help students identify important story grammar components and story details with the goal to improve student reading comprehension. In their study following direct instruction of the story map, Gardill and Jitendra had the participants orally read a text (at fourth-to sixth-grade reading levels). Following text reading,

students in the study were given tests on story grammar and comprehension. The researchers took extensive care to establish a baseline for comparison prior to the intervention. Results of Gardill and Jitendra's study showed a direct correlation to improved reading comprehension for all six students with learning disabilities with the use of direct instruction and an advanced story-map procedure. The combined effect of explicit instruction and use of the story map was seen to facilitate comprehension. It was also noted, that identifying the theme of the story was the most difficult skill for students in the study to master quickly. Because of the challenge of understanding theme right away, the teacher found it necessary to include additional examples and practice to assist students in being able to identify the story's theme during the implementation of treatment (Gardill & Jitendra, 1999).

A 2013 study by Mahdavi and Tensfeldt from Sonoma State University focused on what research had been done to show improved reading comprehension in young students who are at risk for reading failure or who have mild disabilities. The unique aspect of Mahdavi and Tensfeldt's study is that they narrowed in on at-risk students in kindergarten and first grade. Most studies about improved reading comprehension are seen in upper elementary grades, contrasting with the more common practice of focusing on phonemic awareness and phonological skills at the primary grade level. Their research findings are relevant, however, to the broader subject of exploring elementary-level strategies for improved reading comprehension in students with learning disabilities of all ages. The research conducted by Mahdavi and Tensfeldt identified an overview of many reading comprehension strategies that have been proven to be effective with students who struggle with reading in both primary and upper elementary grades. Their research supported the idea that students have a greater chance of improved reading comprehension success when two or more reading strategies are combined.

One finding showed that both primary and upper elementary students with learning disabilities improved reading comprehension as a result of direct instruction accompanied with story mapping (Mahdavi & Tensfeldt, 2013).

Another 2013 study supports the effectiveness of using story mapping graphic organizers to improve reading comprehension in six German students with some learning disabilities (Grunke, Wilber, & Stegemann, 2013). Three fifth-grade students and three eighth-grade students in a German public school were involved in the study. To create a baseline comparison, the students were first given a text to orally read. When the students had completed the reading, they were asked to write down answers to corresponding questions on a worksheet and take a comprehension test. The baseline test also instructed the students to do whatever seemed meaningful to them to assist them in memorizing the main content of each text prior to using the worksheet and taking the comprehension test. Students were observed taking notes, drawing pictures, making maps, and rehearsing information verbally. In the intervention, the students were taught how to use a story map while orally reading a narrative text through teacher direct instruction. The study compared the results of the two strategies (student self-guided or teacher directed story map) and found that the use of story mapping with direct instruction showed improved reading comprehension results (Grunke, et al., 2013).

Chapter 3: Methodology

The methodology of the study is based on the study question: Does direct instruction of literary text elements accompanied with story mapping improve reading comprehension in the fourth-grade CCS classroom? The research hypothesis was that the fourth-grade students participating in the treatment of direct instruction of literary text elements using story mapping would show a significant increase in reading comprehension scores from the pretest to the posttest. In addition, the research question was followed up with two additional questions after treatment: 1) Did the fourth-grade instructor recognize a positive change in student comprehension of literary text after implementing the treatment? 2) Was the fourth-grade instructor positively motivated to include direct instruction lessons on literary text elements with story mapping to enhance student reading comprehension in the future?

Participants

The study included 18 self-contained fourth-grade students from CCS and their fourth grade teacher. Of the 18 students solicited for participation in the study, 16 returned parental and personal consent forms. The two unaccounted students were absent from school during the duration of the treatment due to long-term health complications. In addition, one student was absent the day of the posttest, therefore 15 students were used in the study. The fourth-grade participants ranged in age range from eight to ten years and included ten girls and eight boys. Four of the students qualified for ELA special education services throughout the day. Special education services provided by CCS, was a daily, forty-five-minute pull-out class in a resource room taught by a special education teacher. The self-contained fourth-grade classroom teacher was in his second year at CCS and was not familiar with the content in the treatment.

According to the 2013-2014 National Center for Education Statistics, CCS is known as a "distant town" or rural school located in a city of 25,000 people that is within close proximity to a larger city. CCS spans preschool through twelfth grade and includes a total of 234 students. Their race and ethnicity is primarily White with 192 out of the 234 students considered Caucasian, yet includes a spattering of American Indian, Asian, Black, and Hispanic students. In viewing the enrollment for 2013-14, the third-grade class had 19 registered students compared to the 2014-15 fourth-grade class of 18 registered students, indicating there was a stable enrollment environment at CCS. The average class size at CCS for the 2014-15 school year was 17 students.

Instrumentation

Fourth-grade students participated in a pretest prior to treatment and a posttest after treatment. Following the classroom treatment, the researcher conducted a qualitative interview with the fourth-grade teacher. The interview from the participating teacher focused on his insights and experiences regarding the treatment. Treatment consisted of a student pretest and posttest written by the researcher, eight, fifty-minute lessons supported by a PowerPoint presentation created by the researcher and taught by the classroom teacher, and a one-on-one (researcher to teacher) interview following the lessons. The classroom teacher received detailed training by the researcher to insure the instruction of the eight lessons met the objectives of the researcher and were completed in a minimum of three consecutive weeks. A schedule was discussed and agreed upon by the researcher and participating teacher.

Procedure

A quasi-experimental mixed research method was used in the study driven by the objective of explaining a cause-and-effect relationship. The mixed research design followed a quantitative plus qualitative dominant status design. The study collected data from quantitative

one-group pretest-posttest design and a qualitative interview guide approach interview questions. The independent variable in the study was teaching literary text elements with direct instruction including story mapping. The primary dependent variable was the students' posttest reading comprehension grade measured at the end of the treatment. Another dependent variable was improved motivation of the fourth-grade teacher to incorporate direct instruction of literary text elements into his reading curriculum. A control group was not utilized in this study due to the limitation of class size at the treatment site. In future research, this should be added allowing more conclusions to be drawn. The study, however, did provide a design that can be successfully completed in a school-based classroom environment and provide preliminary data as to the success of a treatment.

The pretest (see Appendix A) was distributed and administered by the researcher to the fourth-grade students on May 4th shortly after the consent forms were collected. The researcher clearly explained the purpose and intent during the assent discussion prior to the pretest. The same test was used for the pretest and the posttest in the treatment. The test was designed by the researcher and contained 34 questions on the five distinct literary element topics taught in the treatment lessons (see Table 5). The topics assessed on the pretest and posttests were story vocabulary, story theme, elements of plot, types of conflict, and point of view. Test questions written for each topic were designed from different levels of Bloom's Taxonomy to assess student understanding from recall to synthesis.

After the pretest, during the following two-and-a-half weeks, all eight lessons were conducted by the classroom instructor (not the researcher) when the sixteen self-contained students were present. Each lesson took 50 to 60 minutes to complete and included a brief review of the previous day's lesson along with 20 minutes of direct instruction of a literary text

element accompanied with the use of a story mapping graphic organizer. A PowerPoint

presentation accompanied the direct instruction of the eight lessons, which gave explicit

directions and visual assistance to each assignment. Fifteen minutes of guided practice followed

the direct instruction for students to fill out, assemble, and glue the story map into a Literature

Journal (see example of a Plot Pyramid story map in Appendix B). A completed example of

each lesson's story map was provided by the researcher as an example (see Appendix C). Each

lesson's story map was pre-cut by the researcher and ready to be assembled by the students at the

time of instruction. The conclusion of each lesson included a 15 minute independent practice

assignment to provide an opportunity to apply the lesson's concept. Therefore, each class period

included a brief review of the prior day's lesson, direct instruction for the new day's content with

use of PowerPoint, opportunity to create a story map which was glued into a Literature Journal,

an activity to apply the concept with guided practice including teacher feedback, and an

opportunity for student independent practice. Every step of the lesson followed the direct

instruction model as outlined in Joyce et al., (2009). Each lesson was carefully organized in a

three-ring binder which included detailed lesson plans, PowerPoint loaded on a computer flash

drive, story map in separate labeled envelopes, and clear instructions. The researcher worked in

the same building as the treatment instructor and was available for clarifying questions as

needed. Prior to treatment, the researcher met with the instructor for a 30-minute meeting and

went over each lesson for clarification. There were two times during the treatment

implementation that the instructor asked for more specific assistance in clarifying a minor aspect

of a lesson with the researcher.

At the conclusion of the eight-lesson treatment, the classroom teacher administered the

posttest on Friday, May 22. One student was absent on the posttest and unable to make it up the

following week. A week following the posttest, the researcher conducted an interview with the

classroom teacher.   The interview session lasted 50 minutes and included 10 pre-written open-

ended questions and one Likert Scale question.

Chapter 4: Results and Analysis

Quantitative Results

The research hypothesis for the current study was that fourth-grade students participating in a treatment of direct instruction in literary text elements using story mapping would demonstrate a statistically significant increase in reading comprehension scores from the pretest to the posttest. After gaining consent and assent, the researcher administered the pretest that lasted thirty minutes. The self-contained fourth-grade students answered as many questions as they could on the pretest. Soon after starting the pretest, a few students quickly gave up due to a lack of understanding of the content, as evidenced by one student raising his hands and saying, "I don't know what this [test] is talking about!" Similar to the Boulineau et al. (2004) study, the students in the current study had no previous exposure to any specific type of story mapping procedures.   Following the pretest, the classroom teacher conducted eight direct instruction lessons on literary text elements with story mapping over two-and-a-half weeks. At the conclusion of the eight-lesson treatment, the classroom teacher administered the posttest. Data was hand-graded and calculated by the researcher from the 15 students who completed the pretest, eight lessons, and posttest; therefore, N=15. An Excel spreadsheet was created and a paired two sample for means t-Test was used for comparing results and testing the hypothesis. Mean levels of pretest and posttest scores were compared. The mean pretest score was 40.6 and the mean posttest score was 82.1. Table 1 shows the pretest and posttest scores by all fifteen students.   Score differences from the pretest to the posttest were also calculated and compared (see Table 1). An alpha level of .05 was used for statistical analyses and N=15. The results of the t-Test showed $t(14)=9.97 p<.05$ which supported the research hypothesis with statistical significance. Based on the t-test results, the hypothesis was accepted with confidence.
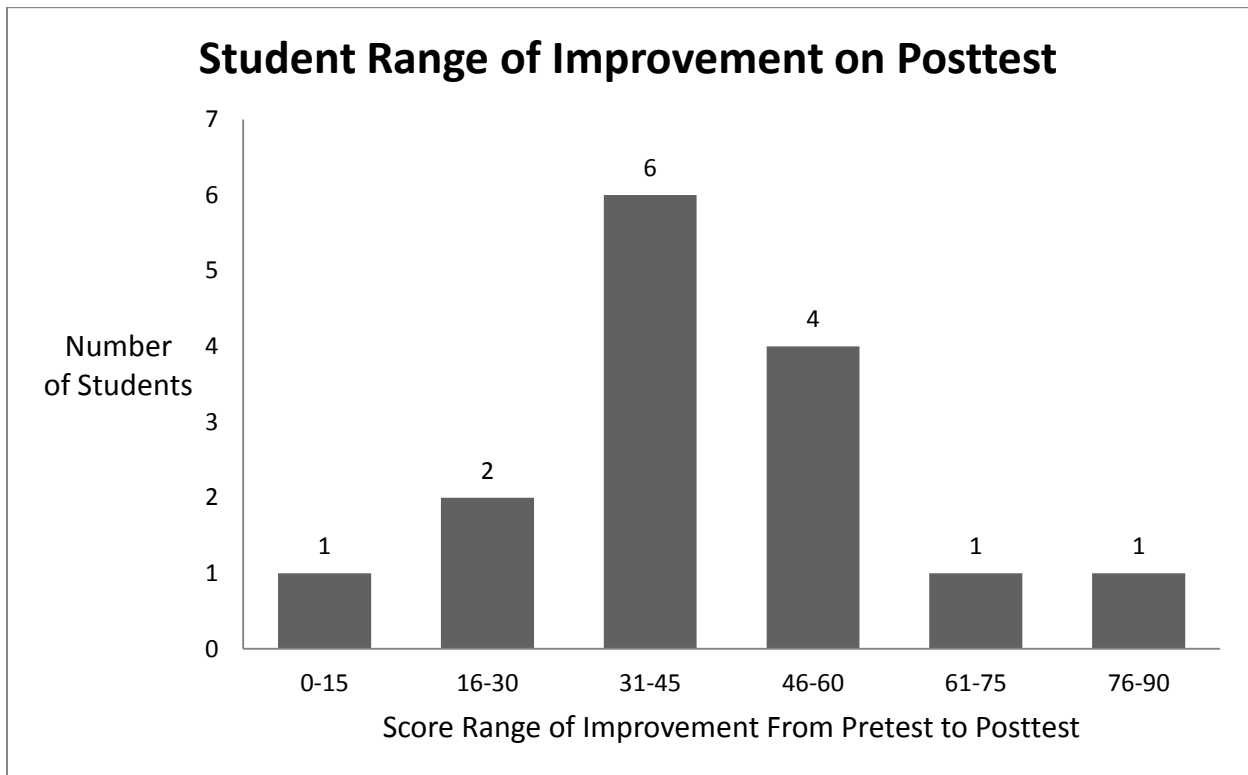
Table 1

4th Grade Student Pretest and Posttest Scores and Pretest and Posttest Score Differences

Student Identification Number	Student Pretest Scores	Student Posttest Scores	Student Pretest to Posttest Score Difference
2	59	97	38
3	62	88	26
4	29	85	56
*5	32	44	12
*6	50	88	38
*7	24	59	35
8	35	68	33
9	29	91	62
10	56	97	41
*11	18	53	35
12	47	97	50
13	44	91	47
16	41	91	50
18	9	85	76
19	74	97	23

Note. Asterisk represents students that receive accommodations for learning disabilities in reading and spelling in a daily pull-out class.

Figure 1 is a histogram that illustrates the range of improvement in student pretest to posttest scores. Fifteen out of the 18 students completed the pretest and posttest and are included in the histogram chart. The largest range of improvement from pretest to posttest scores was in the range of 31-45 point difference. Six out of 15 students improved in the 31-35 point range. 40% of the fourth-grade class improved in the 31-35 point range. The second largest range of improvement from pretest to posttest scores was in the range of 46-60 point difference. Four out of 15 students improved in the 46-60 range. Adding the two highest range improvement columns together, 67% of the class improved in their pretest to posttest scores in the range of 31 to 60 points. All students made improvements, and the test scores proved growth with the treatment.

Figure 1
Range of Improvement in Student Scores from Pretest to Posttest

Student Range of Improvement on Posttest

Number of Students

Score Range of Improvement From Pretest to Posttest

0-15: 1
16-30: 2
31-45: 6
46-60: 4
61-75: 1
76-90: 1

Qualitative results

The study is guided by the following research question: did direct instruction of literary text elements accompanied with story mapping improve reading comprehension in the CCS fourth-grade classroom? In addition to the quantitative data collected from the pretest and posttest, the researcher examined two additional qualitative questions. The following questions were developed because the literature was scarce as to the impact direct instruction of literary elements with story mapping has on teachers. The first question was: 1) Did the fourth-grade instructor recognize a positive change in student comprehension of literary text after implementing the treatment? The second question was: 2) Was the fourth-grade instructor

positively motivated to include direct instruction lessons on literary text elements with story mapping to enhance student reading comprehension in the future?

A qualitative teacher interview was conducted by the researcher on June 9th with the classroom teacher who had implemented the eight treatment lessons (see interview questions in Appendix D). The interview guide approach (Johnson & Christensen, 2008) was used in the interview session that lasted 50 minutes and included 10 pre-written open-ended questions and one Likert Scale question. During the interview, the researcher used specific probes, prompts, and follow-up questions to enhance the interview questions and keep the interviewee on track. Due to the existing professional co-worker relationship between the interviewer and interviewee, there was an established trust and rapport which provided an excellent atmosphere for the qualitative interview. As Johnson and Christensen encouraged, the open-ended questions used were to obtain in-depth information about the teacher's thoughts, beliefs, knowledge, reasoning, motivations, and feelings about the eight lessons he taught. Open ended questions based on the teacher's experience provided a rich source of insight into the value of direct instruction with literary text elements and its effect on student reading comprehension.

In response to the first interview question, the instructor shared his experience teaching the eight treatment lessons on literary text elements. He expressed that he appreciated that the lessons were "nicely put together, easy to follow, and well organized" giving him confidence in teaching the unfamiliar content. He felt the lessons were "age appropriate and written at a fourth-grade level" which allowed his students to grasp the concepts easily. He liked how the lessons were "fun and engaging" to all his students, because there were many features included in each lesson. He felt the lessons were interactive, "yet had a pinpointed focus at a specific learning target." The teacher recognized that the students he "struggles" to keep engaged were

surprisingly active, involved, and interested in the lessons. The enhanced engagement of the students that the teacher "struggles" to keep engaged impacted him greatly. "I loved it," he said. "The kids loved it, and they [the students] met the objectives." During the two-and-a-half weeks that the fourth-grade teacher was implementing the treatment, the researcher received unsolicited information from some of the fourth-grade students expressing their opinions about the lessons. An example was when the researcher passed the fourth-grade class in the hall and a fourth-grade student looked at her and enthusiastically said, "Your lessons are so much fun!"

Describing the highlight of teaching the eight lessons, the teacher quickly responded that the interactive journal was the highlight. Having a place to glue down the story mapping graphic organizers in an orderly and organized fashion proved "something special to use with review" he stated. When students took the time to do their best on the journal following clear steps given as to how to assemble the journal through direct instruction, the teacher felt the students had more confidence that the content in the journal was correct and reliable. He shared that in contrast, when he had previously attempted other journals that were not as specific in content, they appeared to not be as valuable for students since they were not a tool he witnessed the students using for review. In the teacher's opinion, the students appeared to not trust what they wrote down in his pre-administered journals because he had not given the students clear directions about what content to include in the journal. In contrast, when a reliable source of authority gave clear directions about what to write down in the Literature Journal included in the treatment lessons, the students appeared to trust the content as evidenced by their constant use. The teacher's observation mirror's what the literature supports (Grunke, Wilbert, & Stegemann, 2013). The results from the Grunke, et al.'s (2013) study suggested that teacher direct

instruction with story mapping was a more effective way to teach reading comprehension than to leave it up to self-guided student strategies.

Another highlight mentioned in the interview was the benefit of story mapping graphic organizers provided for each lesson. Students had specific content to write on specific graphics, which had real "meat to it," the teacher observed. The journal and story mapping graphic organizers were perceived to work nicely together to reinforce the information being taught. The teacher felt the visuals were fun, engaging, easy to use and assemble, and at a fourth-grade level.

The greatest challenge the teacher faced during the treatment, he explained, was the effort on his part to fully understand the subject material prior to teaching each lesson. Since the content was completely new to him and not something he developed himself, he lacked confidence in the subject matter. He feels that he is not a strong language arts instructor and that it is his weakest subject to teach. He was grateful and said, it "was extremely helpful" to have clear instructions and examples for each lesson, prepared by the researcher, to assist him in understanding the desired content and outcome. Another challenge expressed in the interview was that the teacher felt the 50 minutes allocated for the lessons was too short. He would have preferred to stretch the lessons out longer and suggested that a few of the lessons could have been divided in half and made into their own separate lesson to extend learning.

When asked what he would do differently next time, the instructor said he would like to teach the lessons near the beginning of the year to be able to apply the content throughout the entire school year. One observation the teacher made was that the students applied the content on literary elements to prior stories that had been read in the earlier part of the school year. "It was excellent how the students immediately transferred the information being learned to old stories as well as applying it to new stories being read in the classroom," he stated. He was

surprised to see that students initiated application of past stories which clearly helped with comprehending the current lesson and brought connection. Due to the transferability of the direct instruction content, there seemed to be a positive impact on comprehension, according to the teacher. The subject lesson that taught the concept of story theme was seen by the teacher as the most difficult lesson for the fourth-grade students to completely understand and apply. After the direct instruction lesson on theme as outlined in the lessons, the teacher felt it necessary to initiate transfer of the concept to prior stories. He felt it was necessary to assist with better comprehension because it appeared to the teacher that the students lacked mastery of the literary element concept of theme due to student feedback during independent practice and review.

The classroom instructor felt all eight lessons strongly communicated the learning goals set out by the researcher. An area of improved learning that was a surprise to the instructor throughout the implementation of the treatment was a, "Heightened excitement for reading because of the positive engagement from the combination of quality direct instruction and interactive journal lessons." He felt it was eye-opening for the students to realize the complexity of a literature story for the first time, since they were exposed to an underlying framework of literature that they never realized existed. The teacher said, "Getting a peek at the patterns and framework of literature created an atmosphere of excitement, engagement, and enthusiasm for literature that was not experienced prior" in the fourth-grade classroom. The teacher commented that he observed the more students began to know about literature the more questions they were asking and the more interested they became.   He further explained that such realizations showed that "the more you know, the more excited and engage you are" about learning.   A noted change in students was the fact that they began to perceive literature more deeply. They were able to pick up and spot most of the different and distinct literary elements that had been taught in the

treatment lessons and were using the story vocabulary words in a broader context, supporting his

belief that students were able to make an immediate assimilation of content. The teacher felt that

his students made, "huge steps forward in understanding literature concepts" through the

implementation of the treatment lessons.   When asked if he felt his student's received any

benefit from the lessons, the teacher replied, "Yes, of course! One of the best parts was how the

lessons were immediately applicable after the framework was laid down for them."

The teacher was asked to rate his motivation to use direct instruction to teach literary

elements with story mapping before and after the lesson treatment on a prepared Likert Scale.

The Likert Scale asked the teacher to select from five options to describe his motivation to use

direct instruction with literary text elements before and after the treatment was implemented.

Before treatment, he rated himself as "not very motivated" to use direct instruction with story

mapping to teach literary elements, but after treatment he rated himself "very motivated." The

Likert Scale was transferred into a number scale as seen in Table 2.

Table 2
Number Value Assigned to the Likert Scale Question Options

Likert Scale	Number Value
Not at all Motivated	1
Not Very Motivated	2
Neutral	3
Somewhat Motivated	4
Very Motivated	5

Figure 2 illustrates the Likert Scale results of the improved motivation by the teacher that

implemented the treatment. His motivation increased from almost the lowest option on the

Likert Scale to the highest option (as seen on Figure 2) indicating that the treatment had a

positive impact on the teacher.

Figure 2

Likert Scale Results of Teacher Self-Evaluation of Motivation to Use Direct Instruction to Teach Literary Text Elements with Story Mapping Before and After the Lesson Treatment
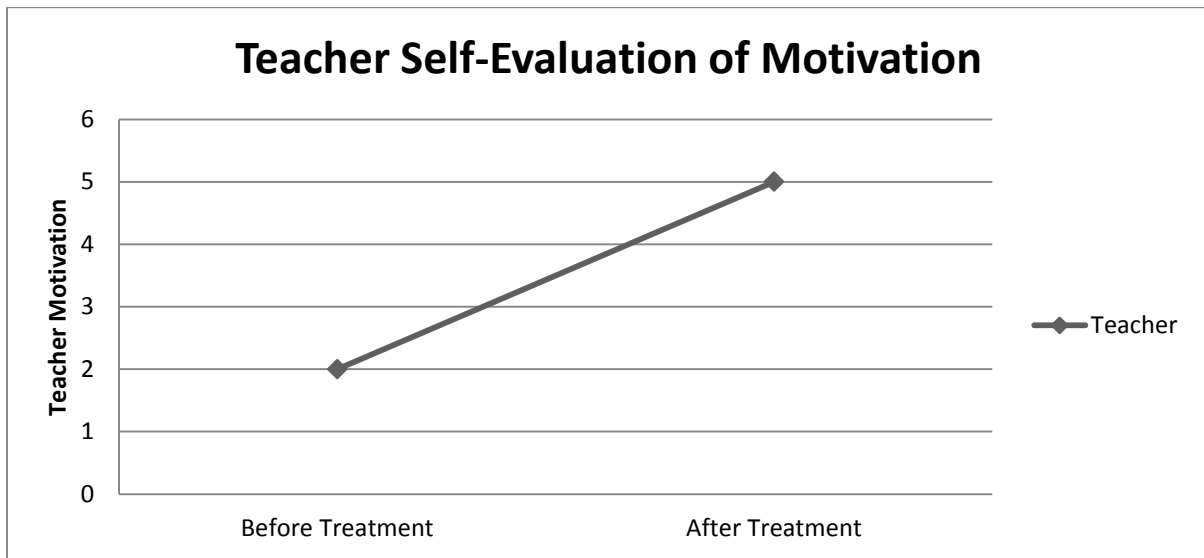
When asked if he would teach the same eight lessons to his fourth-grade class next year, he quickly replied, "Yes, I plan on it!" The teacher stated that he would like to use all eight lessons again next year, but teach them near the beginning of the academic year. Based on the results the teacher observed in his students' improved reading comprehension, he was positively motivated to include direct instruction lessons on literary text elements with story mapping in the future.

The instructor saw a tremendous benefit to having students use story mapping to assist them in learning new concepts. He suggested that he was going to look into implementing math and science journals the following school year as well as the Literature Journal to see if they, too, would be beneficial. He also mentioned the benefit story mapping, especially with the use of the graphic organizer of the plot diagram, would have on the application of Bible story lessons in his Bible curriculum. During the interview, the teacher had an "ah-ha" moment in considering the implication of story mapping across other subject content. He was reflecting on how challenging

it is to have his fourth-grader students prepare adequate book reports. In a self-reflection of his

objectives for book reports, it was apparent that the students were hindered by their limitations in

writing skills which was not part of his original objective. He simply wanted to know if they

read the book and followed the plot. "I could use the plot diagram for a book report," he stated.

Then he excitedly restated what he had just said. "I could use the plot diagram for a book report!

This would clearly show if the students can identify all the literary elements, yet be a more

thorough, as well as fun and enjoyable way to communicate that they read and understood the

story." He got very excited about this idea and made notes in his academic lesson plan book to

remember for the following year, committing to implement this change. Even though his "ah-

ha" moment is not directly related to the researchers study, it shows the value and transferability

of direct instruction of literary text elements.

The interview concluded with an example of how the eight literary element treatment

lessons expanded learning in other subjects in the fourth-grade classroom. When the treatment

was concluded there were still three weeks of school left in the year. One of the last stories the

teacher was planning for his class to read was the novel, *Stone Fox*, by John Reynolds Gardiner.

Since his students had new understandings of the different literary elements, the reading of the

story had new meaning and depth. Since *Stone Fox* ended with a cliffhanger, the students

identified that there was no resolution to the story (correctly applying the use of one of the story

vocabulary terms learned in the treatment lessons). The teacher instinctively used this as a

teaching opportunity and promptly created an unplanned assignment. The students were asked to

write a resolution to the story. "I asked them to write chapter 11, since the story ended at chapter

10," he said. Each student was expected to write a resolution by taking existing knowledge of

the book and resolve it, thus proving they knew how to apply the story element of resolution.

According to the teacher, this unplanned assignment was a success only because the students had a foundation in literary text elements from the provided treatment lessons. "Your goal was achieved," he stated at the conclusion of the interview. The teacher witnessed excellent transfer of knowledge beyond the eight treatment lessons and a noted improvement in students' reading comprehension of literary texts used in the classroom.

Chapter 5: Discussion and Findings

In the study, reading comprehension was investigated in a self-contained, fourth-grade private school, with the aim of tracing the effect of direct instruction of literary text elements accompanied with story mapping graphic organizers.   Designed to determine the causal relationship between direct instructions with story mapping to reading comprehension in the elementary classroom, the study concluded that the hypothesis was supported. There were statistically significant and positive correlations between direct instruction of literary text elements with story mapping and students' improved reading comprehension as seen in the pretest and posttest scores. In addition, the classroom instructor recognized a positive change in student comprehension of literary text after the implementation of the eight week treatment. In turn, following the treatment, the instructor was positively motivated to include direct instruction lessons on literary text elements with story mapping to enhance student reading comprehension in the future.   The findings of the study are supported by and contribute to the research of Adams and Engelmann (1996), Rosenshine (1978, 1985), Schwartz and Bransford's (1998), Kozioff et al. (2001), and Magliaro et al. (2005). The previous studies conducted support the belief that direct instruction will have a positive effect on reading comprehension.   The current study attests to the previous statement and supports it. It also supports and contributes to the research on improved reading comprehension with the use of advance organizers by Ausubel (1963) and the use of story mapping by Gutierrez-Broajos et al., (2014).

The study's mixed method research design made it possible to evaluate quantitative data from a pretest and posttest direct comparison of students and a probing qualitative teacher interview aimed at gaining deeper understanding beyond factual data into the impact of instruction on the teacher. Students' reading comprehension outcomes and objectives were

evaluated by the students' quantitative data and teacher's qualitative opinions of the results and impact of the treatment. The study hypothesis was supported in both the quantitative and qualitative data collected. Student reading comprehension scores increased with the use of direct instruction and story mapping. Story mapping increased reading comprehension by prompting the students in the study to recognize literary text story grammar elements and was an effective technique guiding the students through literary text in an organized structure.

Overall, results of the quantitative data showed significant improvement from the pretest to the posttest with an average increase in score of 41.47 points. The pretest scores for the 15 students researched averaged 40 out of 100 score and the posttest scores averaged 82 out of 100. That is over 100% increase in scores from pretest to posttest. According to the paired two sample for means t-Test, the critical two-tail results were 2.15 which showed a significant difference beyond .05. Therefore, the pretests to posttest results after treatment are statistically significant.

A common grading scale in most American schools is the criterion-referenced grading system (Table 3). A Criterion-referenced grading system is based on a fixed numeric scale that is usually equated to a letter mark. The scale most commonly used in United States elementary schools is seen on Table 3. The common letter to number scale is: an A is assigned for 90-100%, a B is assigned for 80-89%, a C is assigned for 70-79%, a D is assigned for 65-69% and an F for anything below a 65% mastery of material showing a failing grade (see Table 3).

Table 3

Common Criterion-Referenced Grading Scale Used in United States Elementary Classrooms

United States		
Letter Grade	Number Grade	Implication
A	90-100	Excellent
B	80-89	Above Average
C	70-79	Satisfactory/Average
D	60-69	Below Average
F	0-59	Failure

Note. Adapted from "Structure of the U.S. Education System: U.S. Grading Systems," (2008, February). *International Affairs Office, U.S. Department of Education*. Retrieved from http://www.ed.gov/international/usnei/edlite-index.html

Based on a common criterion-referenced grading scale, only two out of the 15 students passed the pretest with scores of 74 (a C letter grade) and 62 (a D letter grade). Conversely, 12 out of 15 students passed the posttest with seven students earning A's, four students earning B's, one student earning a D, and three students earning F's (see Table 4). As a result of the treatment, 12 out of 15 students improved two or more letter grades in the posttest. Even though three letter grades (F) remained the same, the test results showed positive improvement in points earned from pretest to posttest.

Table 4

Comparison of Student Pretest and Posttest Criterion-Referenced Grades

Student Pretest Scores		Student Posttest Scores	
Letter Grade	Number of Students	Letter Grade	Number of Students
A	0	A	7
B	0	B	4
C	1	C	0
D	1	D	1
F	13	F	3

The range of improvement or difference in the pretest to posttest scores was 12 to 76

points difference.   All students improved from their pretest to posttest scores. Figure 1

illustrates in a histogram the difference in scores showing that the largest number of students (six

out of 15) showed an increase in test scores in the 31-45 point range. In addition, Figure 1

showed that one student increased in the 0-15 point range of improvement, two students

increased in the 16-30 point range, four students increased in the 46-60 point range, one student

increased in the 61-75 range, and one student increased in the 76-90 point range. The results

from the pretest and posttest show a significant improvement in test results after completion of

the eight treatment direct instruction lessons on literary text elements.   The quantitative data

from Table 1, Table 3, and Table 4 support the hypothesis that direct instruction of literary text

elements with story mapping has a positive effect on students reading comprehension.

Outliers

There were two outlier student scores in the study worth noting. Student number five and

student number 18, as listed on Table 1, showed unusual scores compared to the rest of the class.

Student five made the lowest difference in improvement by showing a gain of only 12 points

from pretest to posttest scores which was considerably lower than the average difference of

approximately 41 points. On the opposite end of the outlier scale, student 18 made the largest

difference of 76 points from pretest to posttest as compared to the average difference of

approximately 41 points. Interestingly, both the low and high outliers were around 30 points

away from the average difference. Student five was 30 points below the average and student 18

was 34 points above the average difference. Justifications for the outlier scores are only

speculation and would need further study, but possible factors could be considered. For student

five, it is a known fact by the classroom instructor that this particular student who qualifies for

special education services, struggles with test taking and reading at a fourth-grade level. Student

five's test scores could have been impacted by such factors as test anxiety, a built up emotional

resistance to test taking, intellectual and developmental weaknesses, and other factors that would

result in lower test scores. In comparison, student 18, who usually receives average to good

grades in the fourth-grade class according to the teacher and does not qualify for special

education services, may have simply had unusual circumstances. The unusual circumstances

could have caused an uncharacteristically bad pretest score which did not indicate full potential

of the student's knowledge of literary text elements. Student 18 scored the lowest pretest score

of only nine points on the pretest, which is unusual for this student's grade patterns throughout

the fourth-grade year according to the classroom instructor, thus indicating some unusual

extenuating circumstances. The posttest score for student 18 of 85 (scoring a letter grade of B) is

reflective of the grades received by this student during the fourth-grade year according to the

classroom teacher's records. Perhaps student 18 was not feeling well, had emotional trauma, got

hurt at recess, or had some other extenuating circumstance on the day of the pretest that impacted

the pretest score. Regardless of the reason for the two outlier scores, it is important to note that

both students five and 18 made statistically significant improvement on their pretest to posttest

scores, thus supporting the hypothesis of the study. Student five scored 32 points on the pretest

and 44 points on the posttest showing a positive improvement difference of 12 points. Student

18 scored nine points on the pretest and 85 points on posttest showing a positive improvement

difference of 76 points. Both student five and student 18 scored considerably above the

probability value for statistical significance that is greater than .05. The researcher removed the

two outlier scores and ran the t-Test: paired two sample for means again in order to compare

results from the first t-Test. Without the outliers the data analyzed was N=13 and the results

showed t (13) =12.9p. Results of the t-Tests showed similar statistically significant results and support of the research hypothesis. One fascinating comparison was observed from both t-Tests: the average student difference from pretest to posttest in both t-Tests was almost exactly the same. The first t-Test showed an average difference of 41.93 points and the second t-Test showed an average difference of 41.08 points. Quantitative data results were not substantially adjusted with or without the two outlier scores.

Special Population

A subset of the participants included students numbered five, six, seven, and 11 as listed on Table 1. These students qualified for special educational services in reading and/or spelling during the school year of 2014-2015 in which the study treatment was implemented. On the data sample in Table 1, these students were identified with an asterisk and were part of the CCS Multi-Sensory Language Arts pull-out program which assisted students who have individualized educational plans (IEP) or personalized educational plans (PEP) in the area of reading and/or spelling. Each of the four qualified students attended a daily 45 minute reading and spelling class with a special education teacher outside of their regular classroom instruction. The researcher found it interesting to isolate students five, six, seven, and 11's pretest and posttest scores and analyze them separately. Only one of these four students scored a passing grade (above 65) on the posttest following treatment; however, their margin of improvement was in ranges that were similar to the students who passed the posttest which contributes to the research conducted by Grunke et al. (2013) that showed the benefits of story mapping for special needs students. The average difference in scores for the subset of students who qualify for special educational services was a positive difference of 30 points, compared to the whole group average of approximately 41 points. Removing the lowest outlier as indicated in the previous paragraph,

the average difference of the remaining students in the subset is a positive increase of 36 points, which more closely resembles the whole group average. Interesting to note, removing the four subset students from the whole group and recalculating the average positive difference, the results show an improvement in score of approximately 46 points. For comparison, removing the high-end outlier, the average improvement in score is approximately 43 points, which is extremely close to the same as the average improvement in score of the whole group of approximately 41 points.   Therefore, the outliers and the subset of students who qualify for special education do not significantly impact the reliability of the final results.

Topic of Theme

According to the qualitative teacher interview, the classroom treatment instructor felt that out of all eight lessons, theme was the least mastered by the students. The opinion of the teacher was based on his observation of students as they interacted with him during direct instruction of the lesson on theme and the student answers in independent practice and follow up questions during review of the concept of theme. Based on the opinion expressed in the qualitative teacher interview, the researcher decided to investigate the idea further by carefully scrutinizing the quantitative data results of each of the distinct unit topics from the posttest scores in order to validate the teacher's claim. A summary of each lesson taught in the treatment is helpful in this comparison.   There were seven distinct literary text elements that were taught via direct instruction with story mapping in the treatment. The first lesson taught the concept of story vocabulary which included explaining and defining setting, plot, complications, antagonist, and protagonist. The second lesson taught students how to construct meaning for the story vocabulary terms. The third lesson taught about the structure or elements of plot in literature. The fourth lesson taught about story theme. The fifth lesson taught about internal and external

conflict. The sixth lesson taught about four specific types of conflict (man vs. self, man vs. man, man vs. nature, and man vs. society). The seventh lesson taught literary point of view focusing only on first-person and third-person points of view. The eighth lesson was a culminating student activity requiring them to apply each of the seven concepts taught in the unit.

A deeper analysis of the quantitative data by the researcher indicated support for an observation by the classroom teacher during treatment. Posttest results confirmed that theme was difficult for the fourth-grade students to fully understand, as the teacher had observed. To begin the analysis of each question on the tests, the researcher separated the 34 total questions on the pretest and posttest into their subject content. Table 5 shows the number of questions asked about the different topics on the pretest and posttest.

Table 5
Frequency of Questions on Different Topics in Pretest and Posttest

Content in Pretest and Posttest Questions	
Topic	Frequency (number of questions asked on test)
Story Vocabulary	10
Elements of Plot	10
Types of Conflict	8
Point of View	3
Theme	3

The researcher noticed that there were three out of the 34 posttest questions that focused on the topic of theme and were written at different levels of Bloom's Taxonomy. Twelve out of 15 students answered correctly the recall definition of theme which was the simplest of the theme questions according to Bloom's Taxonomy. Nine out of 15 students answered correctly the theme application question which was the second hardest question on theme, but only five out of 15 students were able to answer the most challenging theme synthesis question correctly.

Twenty out of 34 posttest questions were related to story vocabulary or plot which made the comparison of the data not a reliable comparison. However, comparing posttest questions about theme with questions about the topic of point of view and the topic of conflict provided a similar comparison worth analyzing. Similar to theme, there were three questions focusing on point of view that represented three different levels of Bloom's Taxonomy. Fourteen out of 15 students answered the simplest recall question correctly. Twelve out of 15 students answered the application question of point of view correctly. Lastly, 10 out of 15 students answered the most challenging synthesis level question on point of view correctly. Comparing theme with point of view, the researcher would concur with the classroom teacher that students had more difficulty answering the theme questions correctly compared to the point of view question on the posttest. Interestingly, in a comparison with theme posttest questions to conflict posttest questions, the results are more closely correlated. There were three conflict posttest questions that were similar in Bloom's Taxonomy levels to the three theme posttest questions and were compared. In the first and simplest conflict question, all 15 students got the answer correct. 11 out of 15 students answered the second application conflict question correctly, but only six out of 15 students answered the most challenging synthesis question on conflict correctly. Results of conflict questions were the most closely resembling theme questions, however, theme topic questions did prove to be the most often missed on the posttest, thus supporting the classroom teacher's opinion that theme was the most difficult concept for the students to understand. Table 6 shows a direct comparison between correct answers to posttest questions of theme, point of view, and conflict.

Table 6

The Number of Students Who Correctly Answered Posttest Questions about Theme, Point of View, and Conflict

Topic	Question 1 Bloom's Taxonomy level: recall	Question 2 Bloom's Taxonomy level: application	Question 3 Bloom's Taxonomy level: synthesis	Total Correct
Theme	12	9	5	26
Point of view	14	12	10	36
Conflict	15	11	6	32

According to the posttest data, out of all the literary elements taught, theme was the most abstract and difficult for the fourth-grade students in the study to truly comprehend in its entirety. A question is developed from the posttest data on the topic of theme: are fourth-grade students at a developmental stage and readiness to analyze and synthesize the concept of literary text theme? The question supports the qualitative interview data collected by the classroom teacher's observation while teaching the lesson on theme as well as the quantitative posttest results. Further research should be conducted to evaluate the developmental stage of fourth-grade students for understanding the abstract concept of theme as defined in the literary text element lesson plan executed in the current study's treatment. The conclusion by the teacher and the researcher that theme is a challenging concept for fourth-grade students to master is similar to the observation found in the study conducted by Gardill and Jitendra (1999). The findings also support Kaplan's (2013) study that found fourth-grade students were mostly concrete thinkers and need teacher assistance to help them use more critical analysis for deeper understanding of text.

Student Journals

A reflection about the student's interactive journals was made by the teacher during the qualitative interview. After the treatment, the implementing teacher surmised that when students

are discovering information on their own instead of being led by the teacher in direct instruction that the students can easily get distracted and confused by unnecessary information. The teacher felt students who are distracted by unnecessary information had difficulty independently determining what was important to write down in their journals. Skinner (1953, 1968) and Engelmann's (1996), behavioral theory of direct instruction supports the observation that students need more guidance to feel confident in obtaining new content. In the data collected from the fourth-grade teacher's interview and the treatment results, it appeared that students learn new concepts and ideas better if all of the information they need to know is laid out before them by the classroom teacher in sequential steps that are easy to follow. Supported by decades of research on direct instruction from Adams and Engelmann (1996), Rosenshine (1978, 1985), Schwartz and Bransford's (1998), Kozioff et al., (2001), and Magliaro et al., (2005) and the results from the current study, the researcher saw value in using direct instruction in modern classrooms. Paired with the interactive and engaging advance organizers such as story mapping, it was clear to see the positive effect direct instruction with story mapping had on student reading comprehension.

Significance to a Biblical Worldview

God's plan for mankind is beautifully described in Genesis chapters 1 and 2. The Garden of Eden was the perfect environment for God to place Adam and Eve and instruct them on His abundant plan. The careful and meticulous creation of the earth and its inhabitance illustrated God's omniscience, sovereignty, and love. His crowning creation, however, was in the image-bearers of Adam and Eve. Unique to all of God's creation, humans are set apart as image-bearers of God himself. Genesis 1:26 (New International Version) states, "Then God said, 'Let us make man in our image, in our likeness, and let them rule over the fish of the sea and the birds of the

air, over the livestock, over all the earth, and over all the creatures that move along the ground."

Although it is a tremendous privilege, there are obligations accompanying the positions of being

an image-bearer of God and a steward of His resources. As an image-bearer, people are to

resemble God by living such a way that they demonstrate God and His love to others. As a

steward, people are to care for creation, teach others to do the same, and strive to fulfill their

human potential. Christian educators are called to the profession of teaching and charged with

the responsibility to value all students as image-bearers and train them in stewardship.

The corruption of sin in Genesis chapter 3 follows the description of the exquisite

creation in Genesis chapters 1 and 2. As is the nature of Satan, he seeks to destroy the mandate

for Adam and Eve and God's perfect plan for them. Upon being deceived and disobedient, sin

entered the hearts of Adam and Eve and changed the course of all humanity. Not only is

mankind affected as a result of sin, but all of creation feels the pain and burden of the

consequences of sin according to Genesis 3:17. God created man relational for the purpose of a

relationship with Him as well as others for the betterment of man and for the glory of God.

Man's sin nature causes a dilemma in fulfilling this responsibility. Man desires autonomy and

independence which is in direct rebellion with God's purpose in creation and causes man to be

separated from God, others, and nature. Until man is reconciled to God through forgiveness of

sin, he does not fulfill his purpose as image-bearer and in contrast seeks to serve himself. God

holds all people accountable for being image-bearers and stewards of their resources as stated in

Romans 6:23 states, "For the wages of sin is death, but the gift of God is eternal life in Christ

Jesus our Lord." Through grace as stated in Ephesians 2:8, God provides a free gift as a way for

sinful man to be reconciled to him through forgiveness of sins by the sacrificial blood of Jesus

Christ on the cross of Calvary. In a classroom setting, teachers and students learn to live in relationship built on an understanding that all individuals require grace and forgiveness.

Training students in stewardship is a goal of Christian educators. Equipping students in a way that honors them as image-bearers of God, yet takes into account their sin nature requires knowledge, insight, and understanding. Training students in stewardship includes the development of language. Helping students meet their greatest potential in oral and written communication fulfills the biblical principle in 2 Timothy 4:2 to be well prepared to speak for the Lord. It says, "Preach the word; be prepared in season and out of season; correct, rebuke and encourage with great patience and careful instruction." Additionally, 1 Peter 3:15 states, "But in your hearts revere Christ as Lord. Always be prepared to give an answer to everyone who asks you to give the reason for the hope that you have. But do this with gentleness and respect," Being a steward of language also encompasses instruction in reading comprehension so that students have the capacity to independently read and understand the Bible. In 2 Timothy 2:15 it says, "Do your best to present yourself to God as one approved, a worker who does not need to be ashamed and who correctly handles the word of truth." Christian educators should use the principle of stewardship to develop and implement curriculum and pedagogy that seek to empower students to use their talents and gifts for the glory of God and the benefit of others.

Implications

CCS's 2014-2015 PLC consisted of all the CCS elementary teachers, including the teacher implementing the current fourth-grade study treatment. As part of the 2014-2015 PLC, he was involved in previewing prospective reading curriculum to make necessary improvements in the CCS elementary reading curriculum for the 2015-2016 year. A noteworthy finding during the teacher interview was a statement he made about preferring the method of instruction used in

the treatment to teach literary text elements. He compared the compacted style of introducing

the elements in the treatment's direct instruction method with the prospective reading

curriculum's method of slow integration of literary elements throughout the entire fourth-grade

year. He felt that using the direct instruction method with story mapping was "simpler and more

thorough" than using the "new curriculum which would take longer to teach the same things and

[the new year-long reading curriculum being reviewed] would not be as clear." He noted that the

direct instruction method allowed him the opportunity to expand on all eight of the literary text

elements in the treatment immediately following the two-and-a-half week lessons.

Comparatively, he felt that it would take the full ten months of the school year to introduce all

eight literary text elements with the prospective reading curriculum, thus hindering student use

and application. The teacher acknowledged that the prospective reading curriculum "goes

deeper" and is more thorough in instruction of all eight literary text elements. Even though the

teacher recognized a positive attribute of the prospective reading curriculum, he preferred the

direct instruction teaching method of introducing literary text elements which supports the

researcher's thesis.

Since the fourth-grade teacher saw rapid student results of understanding and applying

new concepts of literary elements in his classroom through direct instruction with story mapping,

it made him reevaluate other reading methodologies. His solution was to incorporate the eight

direct instruction lessons on literary text elements with story mapping at the beginning of the

school year prior to introducing any other reading curriculum. He felt this would lay a solid

foundation to build on throughout the year. The teacher thought the combination of direct

instruction lessons before the use of the new prospective reading curriculum would supplement

and support the reading objectives laid out by the CCS curriculum committee. It is the opinion

of the researcher that the classroom teacher discovered the value of having a foundation of direct instruction with story mapping. He discovered the foundation provided immediate understanding and application of literary text elements for improved student achievement just as Rosenshine's (1978, 1985) research supported. He also discovered the foundation assisted students in assimilating new information as Ausubel (1960) believed. Furthermore, He discovered the foundation illustrated how story mapping could bridge the fourth-grade students' prior knowledge and provided an excellent scaffolding of ideas helping them identify the structure in new content just as Ausubel's theory of advance organizers explained and Gutierrez-Broajos et al., (2014) research confirmed (Ausubel, 1968).

In conclusion, the researcher discovered that the positive results of the data in the current treatment study supported the unofficial action research previously conducted with her fifth-grade students and the work of Mahdavi and Tensfeldt (2013). Since the study conducted for the research project resulted in a statistically significant positive effect on reading comprehension in the fourth-grade classroom at CCS, a recommendation was made by the PLC to implement direct instruction of literary text elements with story mapping into the third-through sixth-grade CCS new elementary reading curriculum. As a result of the research conducted in the current study, the PLC asked the CCS curriculum committee to strongly consider implementing direct instruction of literary text elements with story mapping in the third-through sixth-grade classes with the goal of seeing improved student reading comprehension test scores. In addition, a new reading curriculum for third-through sixth-grade students was purchased by CCS that includes year-long instruction and application of each of the specific literary text elements outlined in the treatment lessons. The newly purchased reading curriculum will support assimilation and retention of the direct instruction of literary text elements in the third-through sixth-grade classes

at CCS. A direct implication of the study is for CCS to further their research on the effects of reading comprehension with the use of direct instruction and story mapping in the elementary classroom. Even though there are current negative connotations associated with direct instruction in general education, the results of the study give strong evidence to the fact that direct instruction with the addition of student engaging story maps, is an effective teaching method to inform current classroom practice.

Limitations

During the course of the study, several limitations became evident. The first limitation concerns the sample group. Complete analysis of fifteen students from one self-contained fourth-grade classroom at CCS is a limitation. A convenience sampling was utilized in the study because it was available at CCS and the fourth-grade class was a group of students accompanied with a teacher who were unfamiliar with the content of the treatment. Since a convenience sampling was used the data collected in the study cannot be generalized to all student populations. A larger sampling of students over a greater span of elementary grades would be beneficial and the results considered more conclusive. Having a sample size with fewer than 30 students impacts the study and is considered a limitation to its validity. The second limitation concerns the demographics of the students in the CCS fourth-grade classroom. The sample group was made up entirely of Caucasians and had no race diversity. For more significant and comprehensive results, having a sampling of students with a wider mix and variety in race to support validity would be preferred. The third limitation to the study is methodological. The study was conducted using a quantitative pretest-posttest method of comparison and a qualitative teacher interview. Using a mixed research approach in the study is considered a limitation since there is less research supporting the merits of a mixed research design of study compared to a

defined quantitative or qualitative research design.   The fourth limitation is the amount of

participants in the qualitative study of the research. The only participant in the qualitative study

was one fourth-grade teacher and unknown factors or variables may have influenced the study

results. Including the students' opinions of a change in their reading comprehension following

the treatment could have given more validity to the qualitative study.   A fifth limitation is the

timing and time span of the study, which was conducted over three weeks near the end of the

school year. Several limitations could have impacted the results when considering the time of

school year. Conducting a study in the final month of school (May) could hinder the study

because students are tired of school and looking forward with anticipation to summer vacation.

Had the study been conducted in the fall instead of the spring, students would potentially be

more alert and focused affecting the test results positively. The implementing teacher stated in

the interview that he would plan to teach the lessons near the beginning of the school year next

time. In addition, during spring vacation just weeks prior to the treatment, CCS moved to a new

building location. The upheaval caused by moving the entire school, is a limitation on the

students and teacher involved in the treatment. The unusual circumstance of a large-scale move

disrupted the regular academic progress in the CCS fourth-grade class and added additional

stress to students and teacher which may have impacted treatment results. A sixth limitation is

the classroom instructor. The classroom instructor who executed the treatment lessons had

limited knowledge and experience teaching the subject matter in the treatment. He had not

previously taught his students about literary text elements. If a teacher with experience teaching

the subject matter had administered the treatment, the results might be less statistically

significant. Students with prior knowledge of literary text elements could score higher on the

pretest than students with no prior knowledge resulting in less statistical significance from

pretest to posttest. A final limitation is other factors that influence reading comprehension. Extensive research is available that explores many factors that increase reading comprehension which were not included in the hypothesis of the current study.

Future Research

Continuing the examination of research-based experimental designs to improve reading comprehension in elementary students is a task scholars in the field of reading education must continue to pursue. Both researchers and teachers must look carefully at the best pedagogical teaching methodologies for instructing reading comprehension. Based on decades of supporting research by Adams and Engelmann (1996), Rosenshine (1978, 1985), Schwartz and Bransford (1998), Kozioff et al. (2001), and Magliaro et al. (2005) and the results of the current study, the independent variable of direct instruction of literary text elements with story mapping is a strong method for consideration to improve the dependent variable of student reading comprehension test scores and should be strongly considered for implementation. Future research could examine the individual literary text element of theme as referenced in Gardill and Jitendra's (1999) study as it relates to developmental readiness at the fourth-grade level. Another consideration for future research is to conduct further studies in story mapping and direct instruction with a larger population for the purpose of generalizability and reliability within special populations. Adding a qualitative study that includes student's thoughts on their improvement in reading comprehension is a consideration for future research.

References

Adams, G. L., Engelmann, E. (1996). *Research on direct instruction: 25 years beyond DISTAR.*

Seattle, WA: Education Achievement Systems.

Armbruster, B. B., Anderson, T. H., & Meyer, J. L. (1991). Improving content area reading using

instructional graphics. *Reading Research Quarterly*, 26(4), 393-416.

Armbruster, B. B., Anderson, T. H., & Ostertag, J. (1987). Does text structure/summarization

instruction facilitate learning from expository text? *Reading Research Quarterly*, 22, 331-

346.

Ausubel, D. P. (1963). *The psychology of meaningful verbal learning*. New York, NY: Grune,

& Stratton.

Ausubel, D. P. (1968). *Educational psychology: a cognitive view*. New York, NY: Holt,

Rinehart, & Winston.

Ausubel, D. P., & Robinson, F. G. (1969). *School learning; an introduction to educational*

psychology. New York, NY: Holt, Rinehart, & Winston.

Baumann, J. F., & Bergeron, B. S. (1993). Story map instruction using children's literature:

effects on first graders' comprehension of central narrative elements. *Journal of Reading*

Behavior, 25(4), 407-437.

Bereiter, C., & Engelmann, S. (1966). *Teaching disadvantaged children in the preschool*.

Upper Saddle River, NJ: Prentice Hall.

Boulineau, T., Fore III, C., Hagon-Burke, S., & Burke, M. D., (2004). Use of story-mapping to

increase the story-grammar text comprehension of elementary students with learning

disabilities. *Learning Disability Quarterly*, 27, 105-121.

Brophy, J. E. (1973). Stability of teacher effectiveness. *American Educational Research Journal*, 10(3), 245-252.

Bui, Y. N. & Fagan, Y. M. (2013). The effects of an integrated reading comprehension strategy: a culturally responsive teaching approach for fifth-grade students' reading comprehension. *Preventing School Failure*, 57(2), 59-69.

Common core teaching and learning strategies. (2012, May). *Illinois State Board of Education*. Retrieved from http://www.isbe.net/common_core/pdf/ela-teach-strat-read-text-k-5.pdf

Duchan, J.F. (2004). The foundational role of schemas in children's language and literacy learning. In C.A. Stone, E.R. Silliman, B.J. Ehren, & K. Appel (Eds.), Handbook *of Language and Literacy: Development and Disorders* (pp380-397). New York, NY: Guilford Press.

Duke, N. K., Pearson, P. D. (2008/2009). Effective practices for developing reading comprehension. *Journal of Education*, 189, 107-122.

Emery, D. W. (1996). Helping readers comprehend stories from the characters' perspectives. *The Reading Teacher*, 49(7), 534-541.

Flanders, N.A. (1961). Analyzing teacher behavior as part of the teaching-learning process. *Educational Leadership*, 173-200.

Gardill, M. C., Jitendra, A. K. (1999). Advanced story map instruction: effects on the reading comprehension of students with learning disabilities. *The Journal of Special Education*, 33(1), 2-17.

Gillam, S. L., Olszewski, A., Fargo, J., & Gillam, R. B. (2014). Classroom-based narrative and vocabulary instruction: results of an early-stage, nonrandomized comparison study. *Language, Speech, and Hearing Services in Schools*, 45, 204-219.

Gonzalez, D. (2000). Story grammars and oral fluency. *The Journal of the Imagination in Language Learning and Teaching*, 5. Retrieved from www.njcu.edu

Grunke, M., Wilbert, J., & Stegemann, K. C. (2013). Analyzing the effects of story mapping on the reading comprehension of children with low intellectual abilities. *Learning Disabilities: A Contemporary Journal*, 11(2), 51-64.

Gutierrez-Broajos, C., Fernandez, R. S., & Salmeron-Vilchez, P. (2014). How can reading comprehension strategies and recall be improved in elementary school students? *Estudios Sobre Educacion*, 26, 9-31.

International Reading Association, National Council of Teachers of English. (2012). Standards for the English language arts. 9-32. Retrieved from www.ncte.org

Johnson, B., Christensen, L. (2008). Methods of data collection. *Educational research quantitative, qualitative, and missed approaches* (3rd ed.) (pp.199-219). Thousand Oaks, California: Sage Publications, Inc.

Joyce, B., Weil, M., & Calhoun, E. (2009). Learning from presentations advance organizers. *Models of teaching* (eighth Ed.) (pp.247-261). Upper Saddle River, NJ: Pearson Education Inc.

Kaplan, D. (2013). Development of reading comprehension from middle childhood to adolescence. *Written Language & Literacy*, 16(2), 208-240.

Key shifts in English language arts. (2015). *Common Core State Standards Initiative*. Retrieved from http://www.corestandards.org/other-resources/key-shifts-in-english-language-arts/

Knight, G. (2006). Contemporary theories of education. *Philosophy & Education an introduction to Christian perspective* (4th Ed.) (pp.103-145) Berrien Springs, MI: Andrews University Press.

Kozioff, M. A., LaNunziata, L., Cowardin, J., Bessellieu, F. B., (2001). Direct instruction: its
   contributions to high school achievement. *The High School Journal,* 84(2), 54-71.

Magliaro, S. G., Lockee, B.B., & Burton, J. K. (2005). Direct instruction revisited: a key model
   for instructional technology. *ETR&D*, 53(4), 41-55.

Mahdavi, J. N., & Tensfeldt, L. (2013). Untangling Reading comprehension strategy instruction:
   assisting struggling readers in the primary grades. *Preventing School Failure*, 57(2), 77-
   92.

Maheshwari, V. K. (2013, August). Expository teaching – a direct instructional strategy.
   Philosophical commentary on issues of today. Retrieved from
   http://www.vkmaheshwari.com/WP/?p=928

Mahurt, S.F. (2013). Developing the critical skills the new ccss assessments will measure.
   Reading Today. 22-24. Retrieved from www.reading.org

Mandler, J. and Johnson, N. (1977). Remembrance of things parsed; story structure and recall.
   Cognitive Psychology. 9, 111-115.

Mastropieri, M. A., Scruggs, T. E. (1997). Best practices in promoting Reading comprehension
   in students with learning disabilities: 1976 to 1996. *Remedial and Special Education*,
   18(4), 197-213.

McKeown, M. G., Beck, I. L., & Blake, R. G. K. (2009). Rethinking reading comprehension
   instruction: a comparison of instruction for strategies and content approaches. *Reading
   Research Quarterly*, 44(3), 218-253.

Murza, K.A., Montemurro, A., Schwartz, J.B., Nye, C., & Borokhovski E., (2010). Story
   grammar instruction in improve narrative comprehension and production in preschool

through secondary students. *The Campbell Collaboration*. Retrieved from

www.campbellcollaboration.org

Nampaktai, P., Kaewsombut, R., Akwaree, S., Wongwayrote, U., & Sameepet, B. (2013). Using

story grammar to enhance reading comprehension. *International Forum of Teaching and

Studies*, 9(1), 35-38.

National Center on Accessible Instructional Materials. (2014). Retrieved from

http://aim.cast.org/learn/historyarchive/backgroundpapers/graphic_organizers#.VZsY8_3

bKUk

National Governors Association and Council of Chief State School Officers. (2011, October 27).

Common Core State Standards Initiative. Retrieved from www.corestandards.org

Rosenshine, B. (1978, August). Academic engaged time, content covered, and direct instruction.

The Journal of Education, 160(3), 38-66.

Rosenshine, B. (1985). Direct instruction: in T. Husen & I.N. Postlethwaite. *International

Encyclopedia of Education*, 3, 1395-1400.

Schorzman, E. M., & Cheek, E. H. Jr. (2004). Structured strategy instruction: investigating an

intervention for improving sixth-graders' reading comprehension. *Reading Psychology*,

Schwartz, D. L., & Branford, J. D. (1998). A time for telling. *Cognition and Instruction,* 13(4),

475-522. 25, 37-60.

Shannon, P., Kameenui, E. J., & Baumann, J. F. (1988). An investigation of children's ability to

comprehend character motives. *American Educational Research Journal*, 25(3), 441-

462.

Singer, H., Donlan, D. (1982). Active comprehension: problem-solving schema with question

    generation for comprehension of complex short stories. *Reading Research Quarterly*,

    17(2), 166-186.

Skinner, B. F. (1953). *Science and human behavior*. New York, NY: Macmillan.

Skinner, B. F. (1968). *The technology of teaching*. Englewood Cliffs, NJ: Prentice Hall.

Stagliano, C., & Boon, R. T. (2009). The effects of a story-mapping procedure to improve the

    comprehension skills of expository text passages for elementary students with learning

    disabilities. *Learning Disabilities: A Contemporary Journal*, 7(2), 35-58.

Stanley, D. I., (1998). Ausubel's learning theory: an approach to teaching higher order thinking

    skills. *High School Journal*, 82(1), 8-35.

Stein, N. and Glenn, C. (1997). An analysis of story comprehension in elementary school

    children. In R.D. Freedle (Ed.), *Advances in Discourse Processes*. 2, 53-119.

    Measuring individual differences in reading comprehension. *School Psychology Review*,

    41(3), 315-325.

Stetter, M. E., Hughes, M. T. (2010). Using story grammar to assist students with learning

    disabilities and reading difficulties improve their comprehension. *Education and*

    Treatment of Children, 33(1), 115-151.

Taylor, B. M., Peterson, D. S., Pearson, P. D., & Rodriguez, M. C. (2002). Looking inside

    classrooms: reflecting on the "how" as well as the "what" in effective reading instruction.

    The Reading Teacher. 56(3), 270-279.

U.S. Department of Education, International Affairs Office. (2008). *Structure of the U.S.*

    education system: U.S. grading systems. Retrieved from

    http://www.ed.gov/international/usnei/edlite-index.html

U.S. Department of Education, National Center for Education Statistics. (2009). *Reading 2009*

national assessment of educational progress at grades 4 and 8. Retrieved from

http://nces.ed.gov/nationsreportcard/pdf/main2009/2010458.pdf

van den Broek, P. & Espin, C. A. (2012). Connecting cognitive theory and assessment:

measuring individual differences in reading comprehension. *School Psychology Review*,

41(3), 315-325.

Literary Elements Unit Pre and Post-test

Name: _____ Date:_____

I.   Match a letter from column B with the correct word in column A.

Column A   Column B

_____ 1. plot   A. The time and place of a story.

_____ 2. setting   B. The character or force in conflict with main character.

_____ 3. complication   C. The chain of events that makes up a story.

_____ 4. protagonist D. The main character in a story.

_____   5. antagonist E. Problems that arise as characters struggle to reach
                goals.

II.   Fill in the blanks below with the correct element of plot. Use the following words to help you: falling action, rising action, resolution, exposition, climax.

8.

7. _____

9. _____

6. _____

10._____
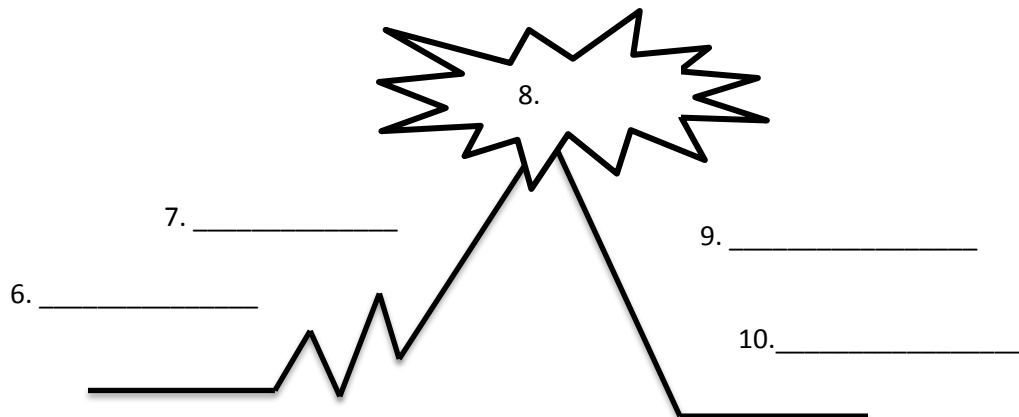
III.   Write True or False on the line next to each sentence.

11. _____ Man vs. Self is the struggle between a character and his feelings.

12. _____ Man vs. Society is the struggle between a character and another character.

13. _____ Man vs. Nature is the struggle between a character and beliefs of a group.

14. _____ Man vs. Man is the struggle between a character and elements of nature.

15. _____ External conflicts include Man vs. Self struggles.

16. _____ A child being stung by a bee is an example of external conflict.

17. _____ A child confused about what game to play is an example of internal conflict.

IV. **Circle the correct answer to the following questions.**

18. The action in a story which is a series of related events that builds and grows.
    A. climax
    B. setting
    C. plot
    D. complication

19. The truth or central idea a story reveals about life.
    A. resolution
    B. plot
    C. climax
    D. theme

20. Where the story takes place.
    A. hour
    B. setting
    C. location
    D. event

21. The most exciting part and the turning point of the story for the main character.
    A. rising action
    B. climax
    C. falling action
    D. exposition

22. End of a story where loose ends are tied up.
    A. falling action
    B. resolution
    C. exposition
    D. conflict

23. Introduction of a story and the first part of a plot diagram.
    A. rising action
    B. entrance
    C. beginning
    D. exposition

24. **Check** the sentence that is written in first person point of view:

_____ A. Elsa wandered the snowy hills before she built a castle.

_____ B. I could not help but wonder what was going to happen next.

25. **Check** the sentence that is written in the third person point of view

_____ A. Rapunzel wasn't sure she could find her way out of the forest.

_____ B. We worked hard during the search and found her.

X. Read the following stories and answer the questions below them.

Today was a great day! It was so exciting to see so many animals. My favorite animal to see was the tiger. I sure was glad he was behind metal bars though. I also thought the baby elephant was really cute. I took lots of pictures and I can't wait to show them to my best friend.

26. In what setting is this story most likely to have taken place?
    a. My house
    b. My school
    c. A farm
    d. A zoo

Tim loved baseball but hated his old baseball glove. He wanted to play with a new glove, but he had spent all the money he earned from his job, so he decided to steal one. But when Tim got caught stealing the glove, his parents said he couldn't play baseball at all that summer as his punishment.

27. What is the BEST theme for this passage?
    e. You should always just take what you want.
    f. Stealing is never a good idea.
    g. If you want something, you should work for it.
    h. Only lie to your parents if you won't get caught.

Colleen was having a bad Friday. First she woke up late. Then she tripped on her way to the bathroom and hurt her knee. When she got to the bathroom, her brother Kyle was in there, and she had to wait five whole minutes until she could use it. She ran back to her room to get dressed for school, and when she finally was able to use the bathroom, Kyle had left the floor wet. Her socks were completely soaked from walking across the wet floor, and they were her last clean pair for the week! She decided to take off her wet socks and try to let them dry on the way to school. She went downstairs to grab something to eat before she left for school. Her mom was in the kitchen as she grabbed a banana and headed for the door. As she ran out of the door her mom called after her, "Where are you going, Colleen?"

"School, I'm running late!" She yelled over her shoulder.

"But today is Saturday." Her mom called after her.

She stopped and turned around. Her mom was in the doorway with a smile on her face. Colleen smiled back and walked back into the house, happy she wasn't late for anything.

28. What is the setting of this passage? _____

29. Who is the protagonist in the story? _____

30. What is the complication in this story? _____

_____

31. What is the climax in the story? _____

_____

32. What point of view is the story being told from? _____

33. Name one *type of* conflict in the story: _____

34. What do you think the theme of this story is? _____

_____

Appendix B – Story Map (Plot Diagram)

CLIMAX

RESOLUTION

FALLING ACTION

Conflict: _____ vs. _____

RISING ACTION

Point of View:

Inciting Incident:

Setting:

Main Characters:

Title:

Author:

EXPOSITION

27

© 2013 erin cobb imlovinlit.blogspot.com

Appendix C –Teacher Example of Story Map in Literature Journal

Plot Diagram

Title: Goldilocks & the 3 Bears
Author: none given

CLIMAX
• Bears find Goldilocks and she wakes up.

• Goldilocks eats porridge, breaks chair, and falls asleep in bed.

• bears went for a walk, return home, find someone had been there.

RISING ACTION

FALLING ACTION
• She screams & runs out of the house.

RESOLUTION
Goldilocks never returns again

Conflict: Man vs. Man

Point of View: 3rd person

Inciting Incident:

Setting: bears house, in the forest past

Main Characters: Goldilocks (protagonist) 3 bears

EXPOSITION

Appendix D – Fourth-Grade Classroom Teacher Interview Questions

Qualitative Research Teacher Interview Questions after Treatment using the Interview Guide Approach (interview should last 30-60min.)

Interviewer: _____Date: _____

Interviewee: _____ Start Time: _____ End Time: _____

Objectives: 1) Does the teacher recognize a change in student understanding toward comprehending literary text after implementing the treatment? 2) What is the likelihood of the teacher including direct instruction of literary text elements with story mapping in the future?

Probes to consider using during interview:

- Repeat question
- Anything else?
- Any other reason?
- Any others?
- How do you mean?
- Could you tell me more about your thinking on that?
- Would you tell me what you have in mind?
- What do you mean?
- Why do you feel that way?
- Which would be closer to the way you feel?

Questions:

1. Can you share your experience teaching the eight lessons on literary elements that were given to you for the M.Ed. capstone project?
2. What were the highlights?
3. What were the challenges?
4. What would you do differently next time?
5. What do you feel the lessons communicated to the fourth-grade students?
6. Did you notice a change in the students after the lessons? (if yes, please explain the change observed)
7. Do you feel the student's received any benefit from the lessons? (if yes, please explain)
8. As outlined on the Likert Scale below, rate your motivation to use direct instruction to teach literary elements with story mapping before and after the lesson treatment.

Before Treatment:

Very	Somewhat	Neutral	Not Very	Not at All
Motivated	Motivated		Motivated	Motivated

After Treatment:

Very	Somewhat	Neutral	Not Very	Not at All
Motivated	Motivated		Motivated	Motivated

9. Would you teach the same eight lessons to your fourth-grade class next year if you could?

10. Would you implement the use of story mapping in your own work in the future?

11. Any other insights you would like to share from this experience?