Using Literature to Help 4th and 5th Grade Students With Disabilities Living In Poverty Develop the Problem-Solving Skills They Need To Be Successful in Their World

by

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ABSTRACT

The critical-thinking skill of problem solving needs to be part of the curriculum for all students, including those with learning disabilities living in poverty; yet, too often this is not the case. Too often students in poverty and students with learning disabilities are provided a curriculum that is watered down, focused on the basics, and aimed at managing their behaviors instead of helping them learn to think critically about their world. Despite their challenges, these students can learn to problem solve.

Educators need to help students make connections between the critical-thinking skills learned in school and the problem-solving skills needed for life. One solution might be to use literature with characters facing similar problems, hold grand conversations, and teach them a problem solving method. Together, these three parts have the potential to motivate and lead students to better thinking.

This action research study explored whether literature with characters facing similar problems to the study's participants, grand conversations, and the I SOLVE problem solving method would help students with disabilities living in poverty in the Southwestern United States develop the problem-solving skills they need to understand and successfully navigate their world.

Data were collected using a mixed methods approach. *The Motivation to Read Profile,* I SOLVE problem-solving survey, thought bubbles, student journals, transcripts from grand conversations, and researcher's journal were tools used. To understand fully how and to what extent literature and grand

conversations helped students gain the critical thinking skill of problem solving, data were mixed in a convergence model.

Results show the I SOLVE problem-solving method was an effective way to teach problem-solving steps. Scores on the problem-solving survey rose pre- to post-test. Grand conversations focused on literature with character's facing problems led to an increase in students' motivation to read, and this population of students were able to make aesthetic connections and interpretations to the texts read. From these findings implications for teachers are provided.

DEDICATION

This dissertation is dedicated to the amazing and inspiring people in my life because without all of you, none of this could have ever been imaginable. First of all, my parents, Roger and Nancy, who have taught me more about the type of person and professional I want to be than any degree ever could. Your constant love and encouragement, throughout anything I pursue, gives me the confidence to tackle problems I never thought I could. Thank you for instilling in me the ability to stand up for what I believe in, no matter the cost, and a tough work ethic that carried me through these last few years. To the rest of my family: Arnie, Angela, Austin and Andrea Anderson; BJ, Diane, Sydney and baby to come Peterson, I thank each of you for your endless support, love and laughs that have all helped me to get this far. Angela and Diane, you always left big shoes to fill and living up to each of your accomplishments has helped me more than you will ever know.

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TABLE OF CONTENTS

Page

CHAPTER Page

CHAPTER Page

CHAPTER Page

APPENDIX Page

LIST OF TABLES

Table Page

LIST OF FIGURES

Chapter 1

Leadership Context and Purpose of the Action

Children today need to develop a new type of thinking to meet 21st century demands, and critical thinking is part of this need (Cromwell, 1992; Darling-Hammond, 2010; Kincheloe, 2008). While there are many definitions of critical thinking, most would agree it is the ability to reason effectively in a situation, make good choices based on evidence, and problem solve (Fasko, 2003; Griffin, 1995; Partnership for 21st Century Skills, 2010; Paul, 1993). As a teacher, I believe all students should be taught to think deeply and critically regardless of their race, class, gender, or socio-economic status. Unfortunately this is not always the case. Even though critical thinking is a common part of the curriculum for students identified as gifted or students in honors programs, it is typically not part of the curriculum for average or below average learners, or students with special needs (Griffin, 1995; Ennis, 1987; McPeck, 1981). This is an oversight because research indicates that because of their life challenges, students in regular and remedial programs need this type of instruction as much as, or more than, students with talents and gifts (Griffin, 1995; Rojewski, Schell, Reybold & Evanciew, 1995; Silverstein, 1997). Research also shows students are capable of this type of learning. Students with learning challenges often display deficiencies in their thinking and exhibit poor use of strategies, but with sound instruction these students can learn to problem solve and make good choices (Griffin, 1995; Hale, 2008; Silverstein, 1997). Students with learning challenges can learn to

think critically and problem solve with appropriate guidance, facilitation, and instruction (Echevarria & McDonough, 1995; Griffin, 1995; Howard, 2007).

Another group glossed over for critical-thinking instruction is students growing up in poverty. Due to their situation, students in poverty deal with complex, real-world issues even if they are not developmentally ready to cope with them. Students in poverty grow up fast and face adult-like issues, but too often, their education is watered-down, focused on the basics, and aimed at managing their behaviors instead of helping them learn to problem solve and think critically about their world (Kincheloe, 2008). To help students break the cycle of poverty, they need to be able to reason effectively about the obstacles that impede them, make good decisions when situations arise, and problem solve the challenges they face (Howard, 2007; Payne, 1998). Fortunately, these attributes and ways of thinking can be developed through instruction. Yet as it stands now, there are few specific strategies or clear understanding of what teachers working with children in poverty can use to achieve this goal.

One idea that is helpful albeit incomplete comes from the work of Payne (2008). Payne identified three interventions that can be helpful in raising the cognitive abilities of low-income students. First is building a strong respectful relationship between students and teachers. Second is accepting diverse ideas. Third is developing and asking questions that get students thinking deeply and reflectively about their world. However, even with these good suggestions, Payne is not very specific as to how to build relationships, the types of questions to ask, what thinking should entail, or how to connect problem solving to students' lives.

These gaps need to be filled because feeling secure and learning how to think about real-world problems should be a part of the curriculum every child receives. When it comes to students in poverty, teachers may need to think beyond classroom walls. Experts in the field stress the need for connections between critical-thinking skills learned in school and the problem-solving skills expected of students in their lives (Cromwell, 1992; Foundation for Critical Thinking, 2009; Howard, 2007; Jensen, 2009). I believe this connection should be made for students in poverty because of the complex and adult-like challenges they face.

Teachers need to do their part, but so do students. When problems arise students need to control their emotional responses and not engage in self-destructive behavior, such as fighting. Self-destructive behaviors and a lack of problem-solving skills are additional factors that can be harmful to students growing up in poverty (Hofreiter, Monroe, & Stein, 2007; Howard, 2007; Hutchins, 2001). These students need to learn how to talk about and cope with their problems. They need skills and strategies to control their thoughts and emotional responses so they can live successfully. One content area that may be especially helpful is literacy.

Freire (1970), a philosopher of critical pedagogy and thinking, noted the importance of having students interrogate and understand their lives. Using photographs of their surroundings, Freire asked Brazilian students living in poverty to step back and consider the unforeseen structures and forces that were suppressing them. With this type of questioning and instruction in critical visual

literacy and reading, students began to understand their situations, think critically about them, and be aware that things did not have to remain the same.. Freire helped students understand that they can become empowered with literacy, and that literacy can be used to understand and change their lives. Knowledge and learning literacy have been found to be inseparable from social change. Kuhn (2007), who has written about the development of critical thinking said, "Intellectual development encompasses not only the capacity for meaning-making in general, but the ability to make meaning out of one's own life – to find a purpose and to identify goals that can influence actions" (pg 6).

I believe critical thinking and literacy are powerful. The infusion of critical thinking and problem solving in the literacy curriculum has the potential to provide opportunities for children and their teachers to meaningfully interact in a variety of ways (Vasquez, 2003). Literacy is more than reading; it is about using books to convey a message, engage in critical conversations, and become transformed. Through conversations about texts, students are able to connect and learn from the literature they read (Rosenblatt, 2005a). Grand conversations, with carefully selected literature, can be a valuable tool for teaching the critical-thinking and problem-solving abilities that students, including those with disabilities living in poverty, need today (Peterson & Eeds, 2007).

Situational Context

As a teacher of students with disabilities living in poverty, I think Payne (2008) and Freire (1970) offer some good ideas on how to help students succeed in their world, but I also realize their work is incomplete for my specific context

and needs. I want to help my students learn to think critically and problem-solve the issues that they face in their world. As their teacher I strive to understand and improve their lives, and want to use literature to achieve this goal. I want to read stories and discuss topics of interest with my students so that I can get them to think critically and problem-solve the challenges and risks with which they are confronted. This is especially important for my students because they are vulnerable and at-risk for self-destructive behaviors like abusing drugs or alcohol, joining gangs, engaging in early sexual activity, and being involved in criminal behavior. Too often my students become victims of circumstance. Many are abused, bullied, or witness domestic violence in their own homes. The term at-risk has many meanings, but the following best captures my ideas and applies to my students. A child labeled at-risk is "one who because of limited English proficiency, poverty, race, geographic location, or economic disadvantage, faces a greater risk of low educational achievement or reduced academic expectations" (U.S. House of Representative Report 103-446, p 99-100).

During my four years of teaching, I have found that 100% of my students have at least one or more of the aforementioned risk factors. In conversations with my students, I have found that 25% of my 5th graders are engaged in some form of sexual activity; 50% have admitted to trying drugs or alcohol or are already affiliated with a gang. Given these facts, I believe it is vital that I act to help my students develop the problem-solving skills they need to overcome the risk factors they face in their world.

Purpose of My Study

The purpose of my study will be to help my students with disabilities living in poverty develop the critical-thinking skill of problem solving. To accomplish this, I will use carefully selected literature, grand conversations, and the I SOLVE problem-solving strategy. I want to learn from my students' voices so I can explain their views and situations. Through this participatory action research, I will attempt to answer the following questions:

1. What are my students' current motivations to read? To what extent will my intervention change their motivation?
2. How, and to what extent will literature read to my students, grand conversations about issues in their life, and the I SOLVE problem-solving method help my students gain the critical-thinking skill of problem solving?
3. How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations?
4. How will I evolve as a result of this innovation?

Chapter 2

Review of Supporting Scholarship

As a society, we cannot even guess what knowledge and skills students in the future will need (Darling-Hammond, 2010). Changes in society, especially in terms of the economic downturn are increasing and making childhood poverty and single-parent households more prevalent, lasting, and complex (Jensen, 2009; Payne, 1998). Parents used to have the time to help their children learn about their world, but more and more of this is being passed on to schools. Today teachers must not only focus on student achievement, they must serve as surrogate parents and help students learn how to cope with the challenges in their life. Old ways of childrearing have given way because of family breakdowns, economic downturns, and rising problems in our society (Darling-Hammond, 2010; Hutchins, 2001; Silverstein, 1997; Tornquist, 2005).

Given these challenges, teachers working with students in low socio-economic areas must act as surrogate parents. Teachers must fill-in for parents plus teach students the basics and much more. Students today need guidance and more than basic rote skills and a watered-down curriculum. Students today need critical-thinking skills to be successful in their complex and ever-changing worlds. Curricula need to be integrated, and learning environments need to encourage deeper thought (Kirkley, 2003; Paul, 1993; Tornquist, 2005).

Students in today's schools need to think critically about what they see and hear. They need to acquire good information, make reasoned decisions, analyze

and assess what they are learning, and make it their own (Costa, 1991; Hofreiter et al., 2007). Students today need to learn how to think critically, and they need good information so that they can solve the problems they are facing today and will face in their futures (Siegel, 1988; Snyder & Snyder, 2008). Critical-thinking skills have become survival skills for success in life, business, and school. Critical thinking is necessary because it helps students gain clarity, discover new opportunities, and avoid disastrous mistakes (Brookfield, 1987; Costa, 1991; Ennis, 1987; Fasko, 2003; Foundation for Critical Thinking, 2009; Hofreiter et al., 2007; Snyder & Snyder, 2008).

Critical thinking is defined as the ability to solve problems, reason effectively in a situation, and make good judgments based on evidence (Fasko, 2003; Griffin, 1995; Partnership for 21st Century Skills, 2010; Paul, 1993). Simply put, "Critical thinking is thinking about your thinking while you're thinking in order to make your thinking better" (Geertsen, 2003, p. 2). Individuals who are able to think critically, think about how, why, and what they think, are able to analyze situations, make reasoned judgments and effectively manage themselves (Hofreiter et al., 2007; Seker & Komur 2008). Critical thinking is complex and often broken into parts based on the type of thinking being performed.

Problem Solving

Problem solving is part of critical thinking and is defined as the process of identifying the most important elements that influence an answer while working through the details of the problem to reach a logical solution (Silverstein, 1997).

Problem solving requires one to think deeply or subjectivity about one's own experience and knowledge and at the same time it requires one to think objectivity, in a removed way. This combination of the personal and objective can be motivating especially if it connects to students' worlds (Pogonowski, 1987).

When students are encouraged to think about the problems they face, they become engaged in their learning, and with assistance, can learn how to solve their problems and broaden their perspectives. Problem solving encourages engagement and helps students become motivated to pursue additional information that will enhance their understanding (Kirkley, 2003). Yet, to teach problem solving well demands new ways of learning, and to do it well, it needs to be connected to students' everyday lives at school and at home. Given this, teachers often use structures like the I SOLVE (Forgan, 2003) model of problem solving. Teachers use I SOLVE because it provides specific steps that include: identifying and defining the problem, exploring solutions, discussing obstacles, choosing a solution, validating the solution by trying it, and evaluating the effects of one's choices. Students learning the I SOLVE model learn how to make connections between past experiences, the problems they are facing, and the solutions they choose. I SOLVE is a good model because it encourages students to brainstorm and see alternate viable solutions, as well as learn to evaluate how the solution worked (Forgan, 2003).

The critical thinking skill of problem solving is important to future success and should be part of the curriculum for all students (Al-Musaad, 2001; Griffin, 1995). Yet, this is not always the case. Too often these skills are missing from the

general or special education classroom. Students in special education and students living in poverty are rarely taught deep ways of thinking, and this is a major oversight because they, more than other students, live in complex and challenging worlds (Payne, 1998). Students outside the middle class often deal with poverty, family breakdown, bullying, homelessness, drugs, and gangs. Given this, their education must be solid and provide opportunities for them to think about issues like these. Students outside the middle class need to learn how to problem solve, and they need to transfer this knowledge outside of school to their own lives. As cited in Cromwell (1992), Sternberg (1985) stresses the need for critical thinking outside of the school setting and notes "lack of correspondence between what is required for critical thinking in adulthood and what is taught in school programs intended to develop critical thinking" (p. 198). Detached, made-up problems are not like real-world problems; therefore experts in critical thinking stress the need to make the learning of critical thinking relevant and applicable with things like problem-based learning and stories (Costa, 1991; Cromwell, 1992; Fasko, 2003; Paul, 1993; Seker & Komur, 2008). Making connections between what is taught in school and what is happening beyond the classroom is the key.

Prior research indicates the need to teach critical-thinking skills directly and with feedback. Hofreiter et al. (2007) provide suggestions teachers can use to teach critical thinking: 1) teach it explicitly by clearly presenting the thinking process and provide engaging question and answer sessions; 2) model the thinking process and avoid teaching with one "right" answer in mind; 3) use real-world examples and context with situations students can relate to, and students

need to wrestle with ideas using the problem solving tools they are taught; and 4) students' core values should be the starting point--time should be devoted to discussing the role of emotion, which often serves as a catalyst and intuitive base for engaging in critical thought. Implementing these suggestions, using literature that speaks to real-world issues, and allowing time for discussion and reflection may be ways to help students critically think about today's world (Hofreiter et al., 2007; Rosenblatt, 2005a).

Children with Disabilities Living in Poverty

In our world, levels of wealth, power, and prestige are not always consistent or fair. Children growing up at or near the federal poverty line endure tribulations other children do not face (Woolfolk, 2010). About one in six Americans live in poverty, defined by the United States Department of Health and Human Services (2005) as surviving on an income of $19,350 for a family of four. The United States has the highest rate of poverty for children of all developed nations; about 13 million children in our country live in poverty. In 2003, the absolute number of children living in poverty by race was about equal (White 4.2 million, Hispanic 4.1 million, and Black 3.9 million, Children's Defense Fund, 2005). In 2008, 19% of all children ages 0-17 (14.1 million) were victims of poverty, an increase from 18% in 2007 (Benson, 2003). Poverty has consequences, and children living in it are likely to experience difficulties in school, be tracked into special education classrooms, have chronic and lasting health problems, experience stress, and drop out of school. Students living in

poverty set low expectations for themselves and, as adults, earn less money and experience higher rates of unemployment (Jensen, 2009; Tornquist, 2005).

Caregivers. Researchers have provided several explanations for why family income might affect child development. Children living in poverty live with caregivers who are struggling to survive financially, socially, and emotionally. Families living in poverty live day-to-day and paycheck-to-paycheck. Financial hardships lead to emotional and social challenges, acute and chronic stressors, and health, nutritional, and safety issues. With these cascading risk factors, one challenge leads to another, which in turn leads to another, and collides into multiple issues caregivers must cope with on a day-to-day basis (Howard, 2007; Jensen, 2009; Payne, 2008). Poverty causes poor health and affects caregiver's mental health. Mothers living in poverty when pregnant may be undernourished; this often leads to low birth weight babies and developmental delays (Park, Turnball, & Turnball, 2002). Caregivers living in poverty also struggle with stress-related issues that form depression, which causes difficulty for them to nurture their children and promote their social and emotional development. Caregiver depression can affect children's ability to form the healthy attachments and lasting relationships needed to be successful both in and out of school (Dahl & Lochner, 2008; Holzer, Schanzenbach, Duncan, & Ludwig, 2007; Jensen, 2009; Payne, 2008). The lack of healthy attachments from the caregiver can often lead students to look for attachments in other areas, such as gangs (Dahl & Lochner, 2008; Howell & Egley, 2005).

Poverty affects caregivers' mental health, yet it also affects the amount of time parents can spend with their children. Caregivers who are struggling to stay afloat tend to work extra hours, odd shifts, or multiple jobs and are less able to provide attention, affection, time, energy, and resources to their children. These factors make everyday living a struggle and become interwoven with mental health issues. These build and play off one another with devastatingly synergistic effects (Jensen, 2009).

Environments. Poverty affects those who care for children, and children born into families living with socioeconomic disadvantages face challenges that affect their physical, cognitive, and socio-emotional development (Hutchins, 2001). Living in an impoverished environment may impact a child's health in numerous ways. Limited access to adequate medical care and an inability to afford treatments or prescriptions increases the risk for a range of health and developmental problems including low birth weight, injuries, chronic health issues, as well as untested, undiagnosed, and untreated vision and hearing impairments that lead to learning disabilities (Dohl & Lochner, 2008; Howard, 2007; Hutchins, 2001; Jensen, 2009; Park et al., 2002). Furthermore, many caregivers living in poverty smoke; exposure to secondhand smoke increases the risk of sudden infant death syndrome (SIDS) and the risk of developing respiratory tract infections or asthma, which in turn causes the child to miss school (Benson, 2003). Students with disabilities cannot afford to miss valuable instruction in school due to health problems (Park et al., 2002).

Additionally, nutritious diets are important for brain and body health, each of which affects school and social performance. Yet, in 2001, almost 46% of children in poverty lived in households with food insecurities, meaning the parents/guardians did not always have enough money or supports to buy food (Benson, 2003). Poverty limits access to a healthy, nutritionally adequate diet (Park et al., 2002).

Children in poverty also face environmental safety issues because they often live in inadequate housing. Even in a nation as rich as ours, families in poverty are likely to have a non-working water heater, toilet or other plumbing problems, poor wiring, and live with rats, mice or roaches (Park et al., 2002). Their homes are often in unfavorable neighborhoods, and they are likely to drink water with contaminants and be exposed to indoor and outdoor air pollutants such as lead, which can have a substantial impact on intelligence and learning (Wallman, 2010). Children in poverty often live in crowded housing, and their caregivers pay rent that consumes more than 30% of their household income (Benson, 2003). For children in poverty, low budgets leave little money for enriching toys and experiences, such as access to computers, books, or family members reading to them (Bradley, Corwyn, McAdoo, & Coll, 2001; Tornquist, 2005).

Given these stressors and challenges, it is no wonder that many children in poverty tend to be low academic achievers. According to research done by Tornquist (2005), at the age of five, a child who has grown up in poverty will have an IQ score an average of nine points lower than the scores of children living

above the poverty level. In addition, a child growing up in poverty is three times more likely to have a learning disability, three times more likely to be in special education, and eleven times likelier to drop out of school.

When children in poverty experience lower academic achievement, special education often enters the picture. Research shows that children from poor families miss more school and move from school to school more often (Tornquist, 2005). Missing large amounts of school causes students to miss important content and have knowledge gaps. Moving from place to place causes inconsistent access to instruction and curricula, leading to more gaps (Dahl & Lochner, 2008). Because of these gaps in knowledge, many teachers tend to set lower expectations for students living in poverty (Hutchins, 2001). As a result, students set low expectations for themselves in academics.

Poverty takes its toll on health and cognition, and it also affects emotional and behavioral growth. Children living in poverty are more likely to live in stressful family environments and experience neighborhood turbulence (Jensen, 2009). Half of all children in families with incomes below the federal poverty line experience stressful home environments. As a result of these stressful environments, children are more likely to have high levels of emotional and behavioral problems (Tornquist, 2005). Adaptability, self-concept, and self-esteem can be negatively affected by poverty; when these are lacking, emotional and behavioral problems arise (Park et al., 2002). Also associated with neighborhood turbulence is lower engagement in school. Children in stressful

environments are nearly twice as likely to exhibit low levels of school involvement (Tornquist, 2005).

A number of studies suggest that communities with higher levels of poverty can significantly impact a child's development (Morrell, 2009). Determining the true impact of the neighborhood on child development is a difficult task and may cause more questions than answers. Yet, for children living in dangerous communities such conditions as crime rates, violence and environmental hazards matter in their lives (Howard, 2007; Jensen, 2009). A study summarized by Howard (2007) highlighted children from disadvantaged communities – whether inner-city or rural – are more likely to associate with peers who engage in antisocial behaviors such as drugs, gangs, and crime than children from more affluent communities.

Students living in poverty are frequently given the label of learning disabled. This combination makes them easily influenced by antisocial peers because they may lack attentive skills, have numerous deficiencies in cognitive processing, show impulsivity, and lack strategies that could help them in academic and social domains (Gustafson & Bochner, 2009; Holzer et al., 2007; Howard, 2007; Jensen, 2009; Manning & Gaudelli, 2006). Holzer et al. (2007) estimates that youth growing up in the bottom quartile of the income distribution and who have cognitive challenges are about 1.3 times as likely to be involved in serious crime compared with youth from the second income quintile. They also found that "lower class" youth report committing nearly four times as many violent crimes as "middle class" youth. "Low income in childhood doubles the

likelihood that individuals will commit costly crimes relative to children growing up in families with incomes near twice the poverty line" (p. 17).

Children who have had greater exposure to abuse, neglect, danger, loss or other poverty-related experiences are more reactive to stressors (Jensen, 2009). These stressors in the home and neighborhood can lead children to look for an extended family--one a gang might provide (Escribano, 2010). Howell and Egley (2005) conducted a longitudinal study on gang membership and found five risk factors: community and neighborhood, family, school, peer group, and individual. They also found that the number one risk factor for joining a gang was family poverty. Poverty places children in neighborhoods where gangs and drug usage are prevalent. In other words, living in disorganized neighborhoods with concentrated poverty and violence, in addition to experiencing low levels of parental and school attachment, may increase a child's risk of socializing with unsavory peers and internalizing antisocial values. This, in turn, may lead to gang membership and experimentation with drugs (Escribano, 2010).

Given the influence of poverty on physical, cognitive, and social development, strategies exist that can negate the effects on children. Educators need to help students growing up in poverty avoid the juvenile justice system; teaching them to think critically about their situation and behaviors may help them beat the odds (Dembo et al., 2008; Escribano, 2010; Howell & Egley, 2005; Silverstein, 1997). Teaching students to think critically and make good decisions can equip them to improve their own futures (Facione, 2010). Becoming educated and practicing good reasoning, problem-solving skills, and good

judgment does not absolutely guarantee a life of happiness, sound virtues or economic success, but they do offer a better chance at these things (Facione, 2010).

Jensen's (2009) *Teaching with Poverty in Mind* points out several interventions or "action steps" teachers can do to reduce poverty's impact. In addition to teaching problem-solving skills, he suggests teaching basic and crucial social skills like turn-taking and manners. He also notes how important it is to create a family environment, acknowledge and thank students who make it to class, and celebrate effort as well as achievement. Since students living in poverty often have a stressful home environment, educators can mitigate stress by reducing the amount of homework assigned and allowing time for homework in class. Removing the stress of homework also helps parents who work odd or long hours and who are not able to be at home to help their children with homework. Lastly, Jensen says it is important to help students deal with difficult situations in their surroundings by empowering them with conflict resolution skills, helping them learn to deal with anger and frustration, and teaching students to set goals. Role models, or individuals who show how to solve real-world problems, help students make connections from school to real life (Hutchins, 2001; Leshowitz et al., 1993; Zambo & Brozo, 2009).

Critical thinking models for situations students face combined with nurturing environments can help students be successful in and out of school (Leshowitz et al., 1993; Rojewski et al., 1995). This is the key to students who face both poverty and the learning challenges that come along. To help students

living in poverty, educators need to teach in real context. Hutchins (2001) discusses the concept of Real Context Learning, which is beneficial to all students, especially those considered at-risk. Real Context Learning is described as giving the learner a chance to solve real problems or apply specific skills such as reading and writing in an authentic context. When students learn through a real problem context, they have more meaningful dialogue because the context is engaging, satisfying, and tied to real experiences or issues. Real Context Learning provides a familiar and known setting for students to explore and develop new skills (Facione, 2010). By teaching students to make good decisions, educators can equip them with the skills needed to improve their own futures and become contributing members of society, rather than burdens.

Critical Thinking for Students with Learning Disabilities

Compared to their non-disabled peers, students with learning disabilities are in greater jeopardy of making poor decisions in academic, career, and social domains (Howard, 2007; Silverstein, 1997). Researchers report that students with learning disabilities lack attentive skills, exhibit numerous deficiencies in cognitive processing, show impulsivity, and lack strategies that could help them in academic and social domains (Echevarria & McDonough, 1995; Manning & Gaudelli, 2006; Silverstein, 1997; Tornquist, 2005). However, even though students with learning disabilities exhibit these deficiencies, they can become critical thinkers and problem solvers with the help of educators providing opportunities for active learning and deep thought (Griffin, 1995). Unfortunately, this is not often the case because too frequently teachers assume students with

disabilities cannot benefit from higher-level instruction until basic skills are mastered. This has caused learning in the special education classroom to be geared toward the “basics" instead of higher-level thought (Leshowitz, Jenkens, Heaton & Bough, 1993). The assumption that students with learning disabilities cannot benefit from instruction in higher-order thinking is wrong (Griffin, 1995). Leshowitz, et al. (1993) note “…special education research has emerged that seeks to develop and evaluate programs for teaching higher order thinking to students with learning disabilities” (p. 483). Analysis of some of the new approaches to instruction in higher-order thinking with students with learning disabilities has shown that students not only can learn higher-order skills, they can outperform their nondisabled peers if they receive intervention programs and positive means of support (Leshowitz et al., 1993; Seker & Komur, 2008).

One way to teach critical thinking to students with disabilities is by talking. A study by Leshowitz, et al. (1993) suggests that discourse has educational benefits for these students and may help them overcome other weaknesses that hamper their ability to achieve. For example, because students with learning disabilities have difficulties with reading, they often struggle to organize information, summarize main ideas, abstract information from text, and understand cause-and-effect relationships (Silverstein, 1997). A reading disability may hamper development of thinking skills when text is present, but hearing stories, being exposed to information that demands higher-level thinking and dialoguing, may help. If given the right instruction and opportunities, students

with learning disabilities can develop a reasoning level equal to or higher than that of their peers (Leshowitz, 1993).

However, even when critical thinking is taught, how to measure it when language or reading abilities are present, can be difficult. Students with disabilities may be savvy thinkers, but unless they are able to show what they know, a teacher or others trying to gain this insight may never know. Most measures of critical thinking rely on oral answers or written expression, and this is a concern (Geertsen, 2003; Kirkley, 2003). The development of a valid procedure for assessing critical-thinking skills poses a special challenge for teachers working with students with disabilities or students that have limited English proficiency because it may be difficult to disentangle what students know from their disability (Gustafson & Bochner, 2009). Students with learning disabilities may think critically, but without a means to assess this using the talents they have, their critical-thinking abilities will remain unnoticed. To understand the critical-thinking skills of students with disabilities, educators will need to think outside the box, and literacy and alternate means of expression may offer new ideas.

Impact of Literacy on Student Learning

Children's literature has played a major role in elementary school classrooms for many years. The widespread use of literature across the school curriculum has created multiple opportunities for children and their teachers to interact in a variety of ways because literacy is more than decoding (Vasquez, 2003). Literacy allows students to understand characters' lives, hear important

messages, and engage in critical thought and conversations (Echevarria & McDonough, 1995; Morrell, 2009; Vasquez, 2003). The safe, imaginary world of a story may be a kind of training ground, where a child can practice interacting with others and learn the customs and rules of society (Hsu, 2008). When readers read or hear a story, they make personal connections and relate these to the literacy context in which they are immersed (McIntyre, Kyle, & Moore, 2006). Using literature and dialogue can be transformative, especially if real-world issues are connected. Literacy can help students develop the critical-thinking and problem-solving skills they need to be successful (Smith & Wilhelm, 2002, 2006).

Literacy can be transformative because as students read and dialogue with others, they gain heightened sensitivity to the needs and problems in their context (Rosenblatt, 1978). When students step into a character's shoes they become aware of his or her feelings and their own. Experiencing feelings through a character's tale can help students prepare to deal with similar complex issues and emotions when they encounter them later (Zambo & Brozo, 2009). Students of all ability levels need the opportunity to engage with characters so they can learn to think critically, analytically, and reasonably. Unfortunately, many students with learning disabilities and students living in poverty are never exposed to complex characters or plots. Too often students with learning disabilities and students living in poverty are taught how to read instead of how to use reading to develop analytical skills, complex reasoning, and thought (Howard 2007; Leshowitz et al., 1993). This is an oversight for these students because they, just as much as others, are able and need to think critically and morally (Al-Musaad,

2001). “When children are able to think about others’ thinking – when they recognize that other views exist – they begin to understand that friends and adults have other views and feelings. Coming to recognize the feelings of others leads to moral reasoning” (Zambo & Brozo, 2009, p. 8). This is a key factor to help students ethically problem-solve issues they face in their environment. Instead of acting impulsively or unreasonably, students are able to think through options and make better choices (Kirkley, 2003; Paul, 1993; Silverstein, 1997).

However, students with disabilities and those living in poverty may need support to read complex texts. They may need texts read aloud and a supportive environment where they can talk openly about issues they face. A community of trust is needed when students are asked to take enormous risks and say what they feel and think (Peterson & Eeds, 2007).

The Grand Conversation: Using Dialogue in the Classroom

Students growing up in poverty, like all others, need to develop critical-thinking and problem-solving skills. These skills are more important to them because of the real-world problems they face. Saying ‘no’ to a peer offering drugs or trying to persuade one to jump into a gang requires reasoned judgment and analysis of facts. Students growing up in poverty need and can develop critical-thinking skills when they read and talk about stories that contain the real-world issues they face (Manning & Gaudelli, 2006). Reading stories related to past, present, and future circumstances while having a grand conversation in the classroom can be valuable. A grand conversation is defined as an authentic

student-led conversation about a story. In grand conversations, students ask the questions, discuss their thoughts and feelings, and make meaning as they talk about the story. Conversations are characterized by spontaneity rather than predictable questions. Children learn that making meaning comes from within as they apply their knowledge and experiences to the story and learn from the knowledge and experiences of their peers (Peterson & Eeds, 2007).

Grand conversations can be an important learning tool for students living in poverty if they are scaffolded a bit. Because of low reading levels, students may need to have the story read aloud to them. Reading aloud will allow students to hear stories above their reading level, hear more complex stories, and if encouraged with a grand conversation, engage in deeper and more critical thought (Peterson & Eeds, 2007; Vasquez, 2003). Additionally, if done with others, reading aloud can help students become a community of learners and develop cognitively. Vygotsky (as cited by Seker & Komur, 2008) noted that the development of language and thought meld through social interaction, and grand conversations can be a place for this to occur. A child's mind grows through interaction with other minds; with pair-work and group-work, students interact and accomplish tasks they could not master alone.

Listening to stories being read aloud offers opportunities to children as they think about their lives and make unique interpretations. Each child interprets the text in the light of his or her experiences, perceptions, culture, background, hopes, fears, and at times, guilt (Peterson & Eeds, 2007). When children are asked interrogate ideas critically, and to use their prior knowledge, beliefs and

feelings a text's potential is expanded. Having grand conversations after reading text is important for encouraging critical thinking (Peterson & Eeds, 2007).

Researchers believe that genuine meaning, or meaning over which readers take ownership, arises if readers are able to structure it themselves through their own interpretations, in the light of their experiences and their intent (Hsu, 2008; Peterson & Eeds, 2007). When students read or hear a story, the images in them come to life in the mind and heart, and feelings of joy, happiness, and anticipation are felt. When children step into a character's shoes, they experience the fate of that character and, because of this connection and personal interpretation, breathe life into the text (Rosenblatt, 2005b; Smith & Wilhelm, 2006). When children connect their minds with the character's, they give and gain meaning to the text. Interpretation is so natural that readers pay little attention to it, even though their interpretations vary with experiences, attitudes, and purpose. Interpretations are unique and meaningful and provide learning opportunities. When interpretations and dialogue are shared with a community of readers, different ideas are heard and meaning is enhanced for everyone (Peterson & Eeds, 2007).

Creating the necessary opportunity for dialogue starts with reading a story. One story can reach many students in different ways, corresponding to the various attitudes and backgrounds of the individual readers. Dialogue is an exchange of thoughts and opinions among students (Vasquez, 2003), and teachers can use it to help students learn how to discriminate between ideas, consider their values, and hear what others think. However, for this to happen for students with learning challenges, teachers need to provide opportunities for them to share their insights

and connections in a place where respect for ideas is valued (Seker & Komur, 2008). Before students can engage in grand conversations, teachers need to do the following: provide support for children to interact and share ideas, encourage personal responses to the literature, steer clear from asking too many low level questions that can limit children's responses during the discussion, and connect the books with events in children's lives (Peterson & Eeds, 2007).

Tompkins (2007) suggested the following guidelines for having a grand conversation

1) Choose a story. This can be a teacher read aloud or students reading a story or part of a story themselves.
2) Get ready to have the conversation through activities such as quick writes, literature logs, consensus board, sketch-to-stretch, life lesson charts, and other activities that get students thinking about the story.
3) Have a conversation by asking "Who would like to begin?" or "What did you think?" According to Tompkins, teachers may find small group conversations helpful before whole group conversations if students are shy and hesitant to share in a large group setting.

Teachers can use the activities above to have conversations in their classrooms. A teacher can allow students to share only two or three comments so everyone gets a chance to share. A teacher can also use questioning to direct students' attention to important story elements they may have missed like its theme, varied perspectives, structure, or author's craft. Conversations should wrap up with a summarization, prediction (next chapter), or conclusion drawing

conclusions. Having students reflect through literature logs can also be a means to make predictions. Promoting critical thinking with dialogue and writing is possible if teachers plan well and use grand conversations. Hence, well-planned grand conversations and questions can initiate and promote deep, personal, and critical thought (Tompkins, 2007).

Theoretical Framework: Reader Response Theory

I believe children have much to say about themselves and what they learn through literacy. So I looked at student's responses to stories by observing their reactions to them and listening to their voices and ideas. I want to understand how my students react to texts, so I viewed my innovation and data through the lens of Louise Rosenblatt's (2001) Reader Response Theory. Rosenblatt explains how every reading experience is unique to the individual reader because of what life experiences and schemas they carry in their minds. Knowing that my students already carry many adult like life experiences was important to my study.

Rosenblatt (2005b) acknowledges the role of the reader and his or her cultural history in the process of reading and explains two distinct kinds of responses a reader may make to a text. These distinct responses are known as "efferent responses" and "aesthetic responses". Efferent responses are factory oriented, while aesthetic responses are personally and emotionally based. It is important to keep in mind that efferent and aesthetic refer not to the text but to the reader's attitude or mind or focus of attention. By reading efferently, a reader focuses his or her attention on public meaning, abstracting what is to be retained after the reading for a factual purpose – what is read is to be recalled,

paraphrased, and analyzed. While the efferent reading response is making meaning through factual responses, reading aesthetically allows one to live through the text as one interacts with the text. While my students provided some efferent responses, I tried to evoke and encourage them to read aesthetically and gain deep insight and critical thinking from the texts we read and discussed together in Grand Conversations.

In aesthetic reading, the reader's selective attention is focused primarily on what is being personally lived through, cognitive and affective filters, during the reading event (Rosenblatt, 1995). At any moment, the reader draws on a residue of past literary and life experiences. By helping my students step into the character's shoes and face the problems he or she faces, my students will produce more aesthetic responses than efferent responses. I looked for the students' aesthetic responses as we made comparisons and connections from the text to the problems my students face within their real-life experiences. Instead of being passive listeners and readers, my students took an active role in producing meaning from the story. As cited in Tracey and Morrow (2006), Rosenblatt states that when reading for aesthetic purposes, readers fill in gaps by focusing on the unique images, impressions, feelings and reactions they bring to mind while reading. All of the reader's thoughts, opinions, personal experiences and feelings from the text make up his or her response and understanding of the literary work (Rosenblatt, 2001). My students had the opportunity to participate in the story as we identified with the characters, problem solved, analyzed, and reasoned their conflicts and feelings.

Rosenblatt (2005b) believes that the reader and the text are two aspects of a total dynamic situation. The 'meaning' does not reside ready-made 'in' the text or 'in' the reader but happens or comes into being during the transaction between reader, the text, and the situation. In this view of reading, the individual reader assumes responsibility for producing an interpretation of a text guided by the language of the text and the associations, cultural experiences, and knowledge that the reader brings to the interpretive task. Rosenblatt considers every reading act as an event, or a transaction involving a particular reader and a particular pattern of signs and text, which occurs at a particular time in a particular context. Instead of two fixed identities acting on one another, the reader and the text are two aspects of a total dynamic situation.

Rather than believing that meaning resides solely within the words on the page, this view of reading emphasizes the role of the individual reader in making meaning through a process that brings together textual and contextual evidence as well as the distinctive experience, perspective, and purpose of the reader as meaning-maker (Claggett, 2005). Every story provides connections from it to my student's lives. As their teacher I encouraged this by creating a context so students could make the connections. It was my responsibility to guide my students to these interpretations of the text from their past experiences and think critically and deeply about what they heard.

Rosenblatt's (2005b) theory is important because it notes the act of reading to be a dynamic transaction between the reader and text and that the meaning of the text is situated in a context. When a student reads or hears a story,

he or she draws on a residue of past literary and life experiences. The reader response theory has inspired teachers to develop and find the usefulness of grand conversations, response journals, literature discussion groups, and book clubs. It is the conversation, exchange of ideas and questions, and a growing awareness of themselves in a larger context of society that students need. Rosenblatt mentions the injustice we are doing to children when we forget to read stories simply for the value of the literature and for their capacities to present images, to entertain, to deal with human situations and problems, and to open up vistas of different personalities and different milieus. To Rosenblatt, literature is the key to help students deal with hardships in their environment.

Chapter 3

Methodology

I conducted an emancipatory action research study in my sphere of influence (Hinchey, 2008). The timeline for my data collection was from September 2011 through November 2011 and occurred within my classroom. This was important because action research can make a meaningful difference to the lives of teachers and students with special needs (Bruce & Pine, 2010). Emancipatory action research stresses that educational problems often reflect larger social, political, and economic conditions (Hinchey, 2008). Emancipatory researchers see the need to question every element of a situation, specifically including conditions they have formerly taken for granted. They also encourage educators to inquire about problems, listen to students' voices, and take action. Action research is an intentional, sustained, recursive, and dynamic process of inquiry in which the teacher acts – purposefully and ethically in a specific classroom context – to improve teaching and learning (Bruce & Pine, 2010; Frankel & Wallen, 2006; Mills, 2007; Stringer 2007). This is what I attempted to do. Action research was an appropriate model for my study because prior to it I had listened to my students and heard them say they wanted to learn how to solve the problems they were facing. Given this, I wanted to improve the critical-thinking skills of my students with disabilities using literacy. I decided to use picture books that would lead my students to problem-solve, engage in grand conversations, and develop aesthetic connections to texts and characters. In my work I attempted to answer the following questions:

1. What are my students' current motivations to read? To what extent will my intervention change their motivation?
2. How, and to what extent will literature read to my students, grand conversations about issues in their life, and the I SOLVE problem-solving method help my students gain the critical-thinking skill of problem solving?
3. How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations?
4. How will I evolve as a result of this innovation?

In order to answer the above-mentioned research questions, I used action research (Gay, Mills & Airasian, 2009) and mixed methods design. To understand fully how and to what extent literature and grand conversations helped my students gain the critical-thinking skill of problem solving, I collected both quantitative and qualitative data throughout the stages of the research process and mixed these sources (Johnson & Onwuebbuzie, 2004; Stringer, 2007). I used mixed methods to build on the synergy and strength that exists between quantitative and qualitative research methods. Mixed methods allowed me to provide descriptive statistics (means and standard deviations) from my quantitative measures (Fraenkel & Wallen, 2006) as well as assertions from the qualitative data collected (Corbin & Strauss, 2008). I used the QUAN-QUAL model in Figure 7 to triangulate my results, make final assertions, and insure credibility and validity of my findings.

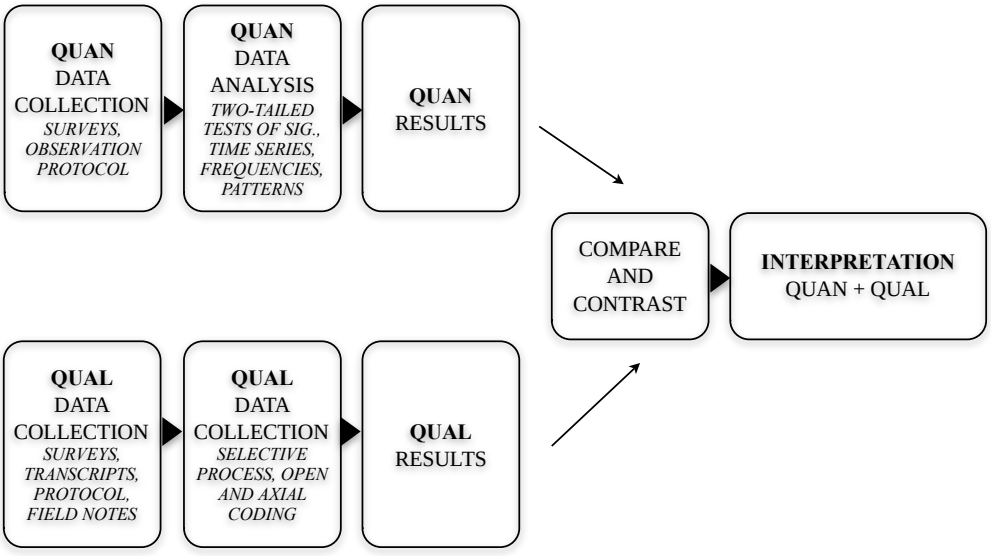

Figure 1. Triangulation convergence model. A model illustrating the timing of data collection, analysis, and interpretation. Adapted from *Designing and Conducting Mixed Methods Research* by J. W. Creswell and V. L. Plano Clark, 2007.

Setting

District. My study took place within the Lyon School District at Americus Elementary[1] in the Southwestern United States. The 6.8 square mile district has thirteen elementary schools and provides education to approximately 7,400 students in K-4, K-5 or K-8 settings. In the district, 94% of the students are of Hispanic descent, 2.6% Caucasian, 2% African American, 0.5% Asian and 0.01% Native American. Lyon district services over 900 students in special education.

School. There are approximately 750 students in grades K-5 on free and reduced lunch at the school where my study took place. About 300 students are

[1] All names are pseudonyms

considered to be English Language Learners (ELL) and are in structured English Language Development (ELD) classroom. At Americus Elementary, approximately 100 students are serviced in special education under one or a combination of the following disability categories: Significantly Cognitively Delayed, Learning Disabled, or Speech/Language Impairment. The school is nested in an area of inner city poverty. The homes in the school's neighborhood were built in the 1940's and are visibly worn from the desert heat. The average home value in the attendance area is $63,000 but higher prices in a nearby area skew that number. The median household income in the school's neighborhood is $25,562 (Prior, 2010).

Participants

Students. As part of a purposeful sample, I used the captive audience method of convenience sampling for my study (Teddlie & Yu, 2007). All students in grades four and five who are receiving special education resource services were invited to participate in my study. To invite participants, I sent home a parent consent letter inviting their child to participate in the study. Students also received an assent letter to acknowledge their agreement to participate. These two letters can be found in Appendix A.

My participants were the children with learning disabilities who come to my resource room from their general education classroom on a daily basis for small group instruction and whose consent I received. They all have current Individualized Education Plans (IEP) in one or more content areas: reading, writing or mathematics. Out of the nine special education students with IEPs in

grades four and five, seven are of Hispanic descent and eight are also English Language Learners (ELL). In addition, eight of the nine students receive speech and language services.

This sample of students with special needs in grades four and five were selected over younger students for many reasons. First, younger students are not as capable to precisely express and communicate their feelings and opinions. Students in grades four and five are the oldest students in the school and are starting to face the challenges of the outside environment. Young adolescents are easily influenced by the opinions of peers, friends, and the outside world (Dembo, Wareham, Poythress, Meyers & Schmeidler, 2008; Manning, 1988).

The participants and the weeks they were involved in my study were:

S.O. – A female, eleven year old Hispanic fifth-grader who receives special education services under the primary category of specific learning disability in the areas of reading comprehension, as well as, speech and language services. She currently reads independently on the beginning fourth grade level. When a grade level text is read to her, she is able to score an average of 85% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, her verbal comprehension is in the average range and her primary language is Spanish. From working with SO, I knew she was aware of the problem of poverty in her neighborhood. SO remained in the study the entire time.

M.L. – A female, ten year old Hispanic fifth-grader who receives special education services under the primary category of specific learning disability in the

areas of reading comprehension, basic reading skills, math calculation, math problem solving, as well as, speech and language services. She currently reads independently on the late third grade level. When a grade level text is read to her, she is able to score an average of 83% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, her verbal comprehension is in the average range and her primary language is Spanish. From working with ML, I knew she had trouble with friends and bullying. ML remained in my study the entire time.

M.R. – A female, eleven year old Hispanic fifth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, as well as, speech and language services. She currently reads independently on the beginning third grade level. When a grade level text is read to her, she is able to score an average of 74 % on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, her verbal comprehension is in the low average range and her primary language is Spanish. From working with MR, I knew she was shy in the regular classroom due to her disability. M.R. remained in my study the entire time.

J.G. – A male, ten year old Hispanic fifth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, written expression, as well as, speech and language services. He currently reads independently on the late second grade level. When a grade level text is read to him, he is able to score an

average of 68% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the low average range and his primary language is Spanish. From working with JG, I knew he had problems with bullying other students and anger issues. JG remained in my study the entire time.

V.R. – A male, eleven year old Hispanic fifth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, written expression, math calculation, math problem solving, as well as, speech and language services and occupational therapy. He currently reads independently on the mid first grade level. When a grade level text is read to him, he is able to score an average of 54% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the very low range and his primary language is Spanish. From working with VR, I knew he had a low self-esteem due to having a learning disability. VR remained in my study the entire time.

F.A. – A male, eleven year old African American fourth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, written expression, math calculation, math problem solving, as well as, speech and language services. He currently reads independently on the late kindergarten/beginning first grade level. When a grade level text is read to him, he is able to score an average of 59% on comprehension assessments. According

to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the low average range and his primary language is Kunama. From working with FA, I knew he was bullied at school and faced homelessness in the past. FA remained in my study the entire time.

A.A. – A male, ten year old Hispanic fourth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, and written expression. He currently reads independently on the late first grade level. When a grade level text is read to him, he is able to score an average of 72% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the average range and his primary language is Spanish. From working with AA, I knew he understood poverty and the issues in his neighborhood. AA remained in my study the entire time.

F.M. – A male, ten year old Caucasian fourth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, written expression, math calculation, math problem solving, as well as, speech and language services and occupational therapy. F.M. also has Attention Deficit Hyperactive Disorder (ADHD). He currently reads independently on the late kindergarten/beginning first grade level. When a grade level text is read to him, he is able to score an average of 63% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the very low range and his primary language is English. From working with FM, I

knew he had anger issues, violence in the home and was often bullied at school due to his disability. FM remained in my study the entire time.

J.R. – A male, ten year old Hispanic fourth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, as well as, speech and language services. He currently reads independently on a beginning second grade level. When a grade level text is read to him, he is able to score an average of 71% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the low range and his primary language. From working with JR, I knew he had problems controlling his anger at home. JR remained in my study for the entire time.

C.J. – A male, ten year old Hispanic fourth-grader who receives special education services under the primary category of specific learning disability in the areas of basic reading skills, reading comprehension, reading fluency, written expression and math calculation. He currently reads independently on the late first-grade level. When a grade level text is read to him, he is able to score an average of 68% on comprehension assessments. According to the Woodcock-Johnson Test of Achievement, his verbal comprehension is in the low average range and his primary language is Spanish. From working with CJ, I knew he often bullied other students at school and had anger problems at home. CJ remained in my study for five out of the seven books.

Special education teacher. I have been teaching for six years in a resource classroom and four years at my current school. My role as a special

education teacher was very important in this research study. My daily responsibilities were to teach reading, writing, and mathematics to students with special needs at their instructional level so they can meet their IEP goals. At the same time, I was required to teach students on the grade level standards so they will be able to take the state assessment. However, I realize standards do not always help students with disabilities living in poverty develop the critical-thinking skill of problem solving. Because students in poverty face complex issues, they not only need to achieve academically but they also need to be able to think critically, reason effectively, make good decisions and problem-solve the challenges they face. This worldview may affect my interpretation of the data but I acknowledge and worked to put my biases aside.

My role as the teacher, researcher, and practitioner led me to approach the study as a pragmatist. In its broadest and most familiar sense, "pragmatism" refers to the usefulness, workability, and practicality of ideas, policies, and proposals as criteria of their merit and claims to attention. A pragmatic approach to research, leads through reflection, to a kind of useful if temporary, equilibrium. Pragmatism, for me, offers a working point of view or a perspective on my study rather than a recipe. As a teacher and researcher, it reminded me to be mindful and reflective about my research and teaching activities (Bradley, 2003; Johnson & Onwuebbuzie, 2004).

Securing confidentiality and providing ethical protection for each participant and the site location was paramount to this study. As such, a request to conduct the study was submitted to the Instructional Review Board (IRB) for

the Protection of Human Subjects in Research at the University (Appendix J). Each participant signed and retained a copy of an informed consent and/or assent form describing the parameters of the study, participant involvement, measures of protections, including the right to withdraw at any time, and the intended use of the data (Appendix A). Pseudonyms were used for all participants, the program, and the location. In no case was any staff or students identified by the researcher or in the research.

Innovation

I began my innovation in August 2011 and implemented it over 14 weeks between August and November. Below is a clear articulation of each step I took.

Preliminary steps.

Step 1. I carefully selected the books I would read to my students. Careful selection of material was important to me because I wanted my students to be able to identify with and relate to real or fictional characters in the books I would read (Hsu, 2008). I settled on reading about problems I knew my students faced like bullying, having a learning disability and homelessness. For example, I read *Hooway for Wodney Wat* (Lester, 1999) because Rodney, its main character, had a disability and experienced bullying. I read the book *A Day's Work* (Bunting, 1994) to introduce my students to the character Francisco, a boy their age who lied to get work for his grandfather so that they would have enough money to buy food for their family. The entire list of books I used can be found in Appendix H.

Step 2: I then gained IRB approval and sent parent and child permission letters home to secure participants. Once I got participants, I collected baseline data with the Motivation to Read Profile and Problem-Solving Survey.

My actions: Weekly routines and data collection. On the first day of my study I introduced my students to grand conversations, reviewed turn taking and group manners, and in the spirit of emancipatory action research, talked with them about our work together and how this would become part of my study (Bruce & Pine, 2010; Hinchey, 2008).

Each book was read twice. On Tuesdays, I read the book to each reading group to activate their background knowledge and ensure they comprehended the story. I did this because I wanted my students to understand the storyline and connect their past experience to the storyline and characters (McIntyre et al., 2006). On Fridays I read the book again to each group and conducted a grand conversation that focused on applying Forgan's (2003) I SOLVE strategy to the story. To ensure students understood I SOLVE, I modeled each step and provided time for guided practice. Every time I read a book I reminded students about the I SOLVE steps and would clarify any questions they had on how the steps related to the specific book we were reading. As I read, I would stop and ask questions to monitor students' comprehension and explain any new vocabulary students did not know. I did not tape record these readings. However, if a student made an interesting or relevant comment, I wrote this down in my researcher's journal. A complete description of the I SOLVE strategy and lesson plan I followed can be found in Appendix G.

During this conversation I used in-depth questions that pertained to the problem the character was facing (e.g., having a disability, bullying) and how he/she solved the problem. The grand conversation allowed my students an opportunity to freely exchange their thoughts and opinions (Vasquez, 2003). Grand conversations were a place where students could hear what others thought and consider how their ideas and opinions aligned or diverged from their own. It was hoped that grand conversations would help my students reveal and come to terms with their attitudes, hopes, and fears (Hsu, 2008). During grand conversations, I was especially interested in understanding how my students' culture and background knowledge would help them interpret the story. I also sought to understand if the I SOLVE strategy would help them problem solve (Peterson & Eeds, 2007).

Following Tompkins (2007) guidelines for having a grand conversation, I used questioning to direct students' attention to important story elements like the story's theme, plot or the characters' perspectives. I was hoping my students would make aesthetic responses and personal connections to the book (Rosenblatt, 2005a). I wanted students to step into each character's shoes, feel the emotions he/she felt, and relate these feelings to their own lives. Grand conversations ended with a summary of the events in the story, and the application of the I SOLVE steps. I did this in varied ways. Students filled out thought bubbles and wrote in their I SOLVE journals. After each grand conversation, I would also write in my researcher's journal, fill out the rubric for grand conversations, and transcribe the grand conversations from each group.

My innovation followed this routine until all books were read. The books, thought bubble questions, and journal prompts I used can be found in Appendix H.

Measures

I collected data from my participants using two pre/post surveys, thought bubbles, journals, field notes, and rubrics for evaluating and transcriptions of the grand conversations from the literature. A summary of my data sources, each measure's type, when each source was gathered, and the link of each source to my research questions is laid out in Figure 1.

Measure	Motivation to Read Survey	Problem Solver Survey	Rubric for Evaluating Grand Conversation	I SOLVE Journals	Read Aloud & Grand Conversation	Thought Bubbles	Field Notes/ Researcher Journal
Type of measure	Quantitative Data	Quantitative Data	Quantitative Data	Qualitative Data	Qualitative Data	Qualitative Data	Qualitative Data
Time measure will be gathered	Pre/Post	Pre/Post	During	During	During	During	During
Research Question							
1. What are my students' current motivations to read? To what extent will my intervention change their motivation?	X						
2. How and to what extent will literature read to my students, grand conversation about issues in their life and the I SOLVE problem-solving method help my students to gain the critical thinking skill of problem solving?		X		X	X	X	X
3. How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations?			X	X	X	X	X
4. How will I evolve as a result of this innovation?							X

Figure 2. Measure, time and type of data informing research questions

Data Collection Tools

Measure 1: Pre-post Motivation to Read Profile. In order to answer research question one: *What are my students' current motivations to read and to what extent will my intervention change their motivation?* I used the Motivation to Read Profile (Appendix B). The original instrument written by Grambell, Palmer, Codling, and Mazzoni (1996) consisted of twenty items, but to help answer my research questions, I added eight additional items; three to the Self-Concept as a Reader construct and five to the Value of Reading and Problem Solving construct. My new twenty-eight item survey had the following two constructs: Self-Concept as a Reader (questions 1, 3, 5, 7, 9, 11, 13, 15, 17, 19, 21, 22, 23) and Value of Reading and Problem Solving (questions 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 24, 25, 26, 27, 28). The survey used a four point Likert-type-scale. Each question had four answer choices, but choices were not consistently the same. To illustrate this variety I provide samples of response choices, questions, and constructs.

Sample items from the construct *Self-Concept as a Reader*: 1) I read (a) not as well as my friends (b) about as well as my friends (c) a little better than my friends (d) a lot better than my friends and 2) My parents think I am a (a) poor reader (b) OK reader (c) good reader (d) very good reader. Sample items from the construct *Value of Reading and Problem Solving*: 1) I think reading is (a) a boring way to spend time (b) an OK way to spend time (c) an interesting way to spend time (d) a great way to spend time and 2) When you listen to stories, do you try to solve the problem they face (a) almost always (b) sometimes (c) almost never (d)

never. Surveys were answered by paper/pencil and to ensure students understood the question and choices, I read the survey to them both at the beginning and end of the twelve-week study.

During the Spring of 2011, I piloted this instrument (N=8) and computed a Cronbach's alpha (Cronbach, 1951; Gay et al., 2009) test of reliability. No item was below .869. The survey was reliable because anything above .70 is considered acceptable (Nunnally, 1978). The entire survey may be found in Appendix B.

Measure 2: Pre-post Problem Solver Survey. In order to answer the research question: *How, and to what extent will literature read to my students, grand conversations about issues in their life and the I SOLVE problem-solving method help my students to gain the critical thinking skill of problem-solving?* I used the I'm a Problem Solver Survey (Appendix K) developed by Forgan (2003). The survey asked students to rate how they felt about their ability to perform each of the steps in the I SOLVE process (Identify the problem, Solutions, Obstacles, Look and choose, Try it, Evaluate). Each student chose either a ☺,😐,☹ indicating how much they felt (happy, neutral or unhappy). Surveys were answered by paper/pencil and to ensure students understood the question and choices, I read the survey to them both at the beginning and end of the twelve-week study.

Measure 3: Rubric for Evaluating Grand Conversation. To answer research questions three: *How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand*

conversations? I used the Rubric for Evaluating Grand Conversation (Appendix E) created by Peterson and Eeds (2007). The rubric had two constructs, Making Personal Connections and Interpretation/Making Meaning, which were used to evaluate students after each grand conversation. In the Making Personal Connections construct, there were five indicators (e.g., seeks meaning in both pictures and the text in picture storybooks and draws on personal experience in constructing meaning) and in the Interpretation/Making Meaning construct there were fifteen indicators (e.g., gets beyond "I like" in talking about the story, asks questions and seeks the help of other to clarify meaning, and can detect implied relationships not stated in the text) but to ensure I could answer my research questions I added three indicators (e.g., seeks to solve problems in the story and is able to analyze the situation the character is in). The rubric used a 3-point scale (often, occasionally, and rarely) to determine how well students were meeting each indicator. To look for progression in the grand conversations, I filled out the rubric for each group after each of the seven stories were read.

Measure 4: Student I SOLVE journal. To answer research questions two and three: *How, and to what extent will literature read to my students, grand conversation about issues in their life, and the I SOLVE problem-solving method help my students to gain the critical-thinking skill of problem solving? How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations?* I used a journaling method based on the I SOLVE problem-solving steps. This activity was conducted after each book (seven books total) was read and a grand conversation conducted

during the twelve-week study. To foster the writing participants, I provided a sample of prompts they could use if they could not think of something to write. All prompts for journaling are provided are in Appendix G.

Measure 5: Thought bubbles. To answer research question two and three: *How, and to what extent will literature read to my students, grand conversation about issues in their life, and the I SOLVE problem-solving method help my students to gain the critical-thinking skill of problem solving? How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations?* I had students complete thought bubbles. After each book was read and discussed with the students, each student received a picture of a character in the story with a thought bubble above his/her head. Students were asked to fill in the bubble by drawing or writing what they thought was going on in the character's mind as he/she faced the problem. To foster their writing, I provided sample prompts that related the question to the child. (e.g., If you were the character, how might you solve the problem differently?) The entire list of prompts can be found in Appendix G. An example of a thought bubble can be found in Appendix D. To gain clarification, on replies provided on thought bubbles and in journals, I individually asked students to clarify their replies. As clarifications were made, I wrote down students' replies.

Measure 6: Recordings of Grand Conversations, and Observations of Grand Conversations. To answer research question two and three: *How, and to what extent will literature read to my students, grand conversation about issues in their life, and the I SOLVE problem-solving method help my students to gain the*

critical-thinking skill of problem solving? How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with them in grand conversations? I read aloud seven books to my students and then talked with them in a grand conversation. All sessions were audio recorded and transcribed. I used the Questioning Protocol for Grand Conversations (Appendix F) to guide our conversations and understand the personal connections and meaning students are making of the texts. I wanted to understand how my students connected to the texts and used Rosenblatt's (2005b) Reader Response Theory to understand how students talk through books and make connections between the literature I am reading and the texts and problems in their own lives. To determine body language and hidden nuances, I also wrote down any observations of the students as we engaged in our conversations using the protocol in Appendix L.

Measure 7: Field notes/researcher journal. In order to answer research question four: *How will I evolve as a result of this innovation?* I collected field notes and had a researcher's journal (Appendix I). Field notes included both descriptive and reflective notes regarding personal observations of students, as well as reflections concerning how I was evolving and growing throughout the study. This was also a place to write down what state standard we were working on during the lesson.

Quantitative Analysis

Measures 1-3: Pre-post surveys and rubric for Grand Conversation. A reliability analysis was conducted to prove the survey was measuring the

research questions as intended. Pre- and post-test means were compared for the attitudes toward reading measure. Items were turned into numbers, and descriptive statistics (means and standard deviations) were computed with the Statistical Package for the Social Sciences (SPSS). A repeated measures analysis of variance (ANOVA) was used to determine whether there were statistically significant changes in the data over the course of the innovation.

Qualitative Analysis

Measures 4-7: I SOLVE journals, thought bubbles, recordings of grand conversations and field notes/researcher's journal. For all the qualitative data (I SOLVE journals, thought bubbles, grand conversation transcripts and observations, and field notes) I employed a grounded theory and constant comparative method for analyzing data in order to generate codes (Lincoln & Guba, 1985). Codes are defined as tags or labels for assigning units of meaning to the descriptive or inferential information complied during a study (Miles & Huberman, 1994). For the purpose of my study, codes were used to organize data and then later retrieve it. Codes pulled sets of data together, thus permitting analysis. A data analysis ladder is shown in Figure 2 to give an overview of the progression of the coding process.

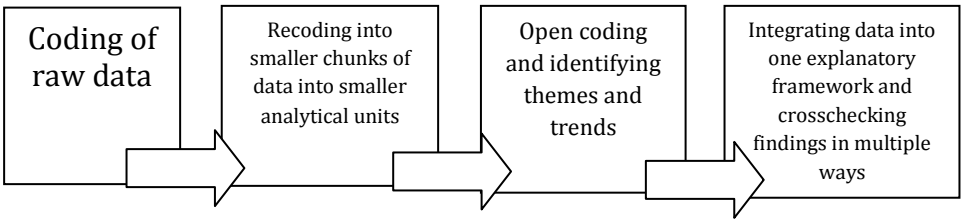

Figure 3: Progression of the coding process

For each research question, I read the responses to the data sources in the order that I collected them. I read through the data several times to obtain a general sense before focusing on anything specific. Next, I circled key terms, words, or phrases pertaining to my particular research questions. I typed all of the key terms into a spreadsheet, noted the frequencies with which the words occur, and grouped together those that had similar meanings. I remained open to possible alternative groupings as I repeatedly examined the data. Once the key terms were grouped, I constructed codes for each grouping. The codes consisted of words or phrases that expressed a central meaning for each grouping.

The mode of qualitative analysis guiding this study is a grounded theory approach. Grounded theory refers to explanations from categories that emerge from collected data (Strauss & Corbin, 1990). What differentiates grounded theory from other research is that it does not test a hypothesis, but rather argues for the application of science beyond simply re-testing and re-visiting standard assumptions (Glaser & Strauss, 1967). The emergence of theory, as Glaser (1992) put it, is fundamental to understanding the methodology, and because of this it is up to the researcher to discover the theory implicit in the data.

Reliability and Validity

In order to ensure reliability and validity with this study, I employed triangulation of multiple data sources to measure the four research questions. Both quantitative and qualitative methods were used. Member checks were also used after the grand conversations had been performed and the findings clarified with participants' thoughts.

Chapter 4

Analysis and Results

Miles and Huberman (1994) claim, "Analysis is an ongoing, lively enterprise that contributes to the energizing process of fieldwork" (p. 50). This has been my philosophy as I have worked in the field and collected and analyzed my data. In the previous chapter I explained my methodology and data collection tools. In this chapter, I first describe my analytical process and the statistical analysis I used on my quantitative data (pre- and post- student surveys) and provide the results from this analysis. Then, I explain how I analyzed my qualitative data (transcriptions from grand conversations, student thought bubbles, students journals, and researcher's journal) and provide the results from this analysis.

Quantitative Data Analysis

Motivation to Read Profile. The Motivation to Read Profile (Appendix B) was used to answer the following research question: *What are my students' current motivations to read and to what extent will my intervention change their motivation?* Participants answered the survey by paper/pencil ,and to ensure students understood what the survey was asking, I read the survey to them. The pre survey was given to eleven students at the end of August 2011, which was prior to implementation of my innovation. During my study, two students moved out of the district. The survey was administered again at the end of November 2011 to the remaining nine students at the conclusion of my innovation. The

results presented are based on the nine surveys that could be matched pre and post.

The twenty-eight item survey had two constructs, Self-Concept as a Reader and Value of Reading and Problem Solving. The survey used a four point Likert-type scale. Each question had four answer choices, but choices were not consistently the same. Each time the survey was taken, it took approximately 15 minutes to complete.

Reliability of survey. Cronbach's alpha is used as a measure of internal reliability of factors on an instrument. Alpha coefficients range in value from 0.00 (no correlation) to 1.00 (a perfect correlation). The closer to 1.00, the more reliable the generated scale. A score of 0.70 is considered to be an acceptable reliability coefficient (Cronbach, 1951). To determine the reliability of the survey, I used the Statistical Package of Social Sciences (SPSS) to calculate the Cronbach Alpha (Cronbach, 1951). This analysis showed that with an overall Cronbach Alpha of 0.91, my survey was reliable. The overall Alpha, alphas for individual constructs, and items making up each construct are shown in Table 1.

Table 1

Cronbach Alpha for Constructs on the Motivation to Read Profile

Construct	Items	Cronbach Alpha for Post-Survey
Self-Concept as a Reader	1,3,5,7,9,11,13, 15,17,19,21,22, 23	.80
Value of Reading and Solving Problems	2,4,6,8,10,12,14, 16,18,20,24,25,26, 27,28	.88
Overall		.91

Analysis of survey. To organize my data I used the Motivation to Read Profile reading survey scoring sheet (Appendix I) to help recode the data sets. To measure the impact of my innovation, I analyzed my quantitative data using descriptive and inferential statistics (Gay et al., 2009). Using SPSS, I ran descriptive statistics to calculate means and standard deviations for each of the two constructs on the survey. A *t*-test was used to note level of significance and effect size r^2 was used to determine the magnitude of the innovation (Gay et al., 2009).

Survey results. The Self-Concept as a Reader construct contained thirteen closed-ended questions with a 4-point Likert scale answer choice. My interpretation of this scale was a mean of 4.00-3.50 indicated the student saw him/herself as a very good reader, 3.49-2.50 a good reader, 2.49-1.50 an ok reader

and 1.49-1.0 a poor reader. My analysis showed that the post mean for the entire construct rose from 2.60 (.827) to 2.68 (.813) indicating students perceived themselves as an ok reader prior to my innovation and a good reader after they worked with me.

In regard to the other construct, the Value of Reading and Solving Problems construct contained fifteen closed-ended items with a 4-point Likert-type scale. My interpretation of this scale was a mean of 4.00-3.50 would indicate that the student valued reading as very important, 3.49-2.50 important, 2.49-1.50 sort of important and 1.49-1.0 not very important. My analysis showed that the post mean for the entire construct rose from 3.01 (.88) to 3.17 (.89) indicating students valued reading and solving problems as important.

Table 2

Descriptive Results For Each Construct Pre/post Student Survey

Construct	Pre		Post	
	M	*SD*	*M*	*SD*
Self-Concept as a Reader	2.60	0.83	2.68	0.81
Value of Reading and Solving Problems	3.02	0.89	3.17	0.89

Note: N=9

Statistical significance. Statistical significance was a tool used to determine whether the outcome of my innovation was the result of a relationship

between specific factors or due to chance (Gay et al., 2009). When an event happens whose probability of happening by chance is equal to or less than 5 in 100 ($p \leq 0.05$), it is believed it did not happen by chance (Gay et al., 2009). A *p* value of less than or equal to 0.05 means that there is less than a 5% chance that the results occurred by chance, and in educational research $p \leq 0.05$ is generally considered statistically significant.

To understand the significance of my innovation, I used SPSS to run a two-tailed significance test on the pre- and post- surveys. The *p* values for the two constructs were: Self-Concept as a Reader, 0.01 and Value of Reading and Solving Problems, 0.01. Both constructs were statistically significant, and I feel confident my innovation caused the improvement on these constructs, even with a minimal change in mean response.

Effect size. An effect size is a measure of the strength of the relationship between two variables in a statistical population, or a sample-based estimate of that quantity. An effect size calculated from data is a descriptive statistic that conveys the estimated magnitude of a relationship without making any statement about whether the apparent relationship in the data reflects a true relationship in the population. The following formula is used to calculate Cohen's *d* effect size values for *t*-tests:

$$d = \frac{|\bar{x}_1 - \bar{x}_2|}{\sqrt{(\sigma_1^2 + \sigma_2^2)/2}}$$

where x_1 and x_2 are the means of group 1 and group 2, and σ_1^2 and σ_2^2 are the variances of group 1 and group 2 (Soper, 2012).

Effect sizes complement inferential statistics such as *p*-values (Cohen, 1992). According to Cohen (1992), an effect size of 0.0 indicates that the mean is located at the 50th percentile. To interpret the resulting number, most social scientists use this general guide developed by Cohen:

< 0.1 = trivial effect
0.1 - 0.3 = small effect
0.3 - 0.5 = moderate effect
>0.5 = large difference effect

Using this interpretation, my innovation had a small and trivial effect. This is likely due to the small number of participants. .

Table 3

Two Tailed Significance Test and Effect Size Results

Construct	Sig. (2-tailed) *P* value	Effect Size Cohen's *d*
Self-Concept as a Reader	0.01**	0.09
Value of Reading and Solving Problems	0.01**	0.17

**Indicates significance at $p \leq 0.01$

Survey percentage difference. Using the Motivation to Read Profile: Reading Survey Scoring Sheet, I calculated the percentage scores for each student's pre- and post- construct (Self-Concept as a Reader and Value of Reading and Solving Problems) as well as the pre- and post- percentages scores for the entire survey. According to this information, all students had an increase in

their self-concept as a reader after my innovation except for ML and JR. Also, all students had an increase in the Value of Reading and Solving Problems construct except for ML and AA. Figure 3 illustrates the survey results.

Grade	Student	Self-Concept Pre	Self-Concept Post	Difference	Value of Reading Pre	Value of Reading Post	Difference	Total Pre	Total Post	Difference
5	JG	76.9	88.5	11.6	86.7	88.3	1.6	82.1	88.4	6.3
5	ML	78.8	71.2	-7.6	88.3	75.0	-13.3	83.9	73.2	-10.7
5	SO	57.7	69.2	11.5	93.3	96.7	3.4	76.8	83.9	7.1
5	MR	61.5	65.4	3.9	83.3	90.0	6.7	73.2	78.6	5.4
5	VR	61.5	71.2	9.7	55.0	73.3	18.3	58.0	72.3	14.3
4	FA	69.2	71.2	2.0	78.3	88.3	10.0	74.1	80.4	6.3
4	AA	46.2	46.2	0	53.3	51.7	-1.6	50.0	50.0	0
4	JR	78.8	59.6	-19.2	76.7	76.7	0	77.7	68.6	-9.1
4	FM	57.7	65.4	7.7	63.3	75.0	11.7	60.7	70.5	9.8
Average		65.4%	67.5%	2.1%	75.4%	79.4%	4%	70.7%	74%	3.3%

Figure 4. Student survey percentage difference for each construct

The Problem Solver Survey. The Problem Solver Survey (Appendix K) was used to answer the following research question: *How, and to what extent will literature read to my students, grand conversation about issues in their life, and the I SOLVE problem-solving method help my students to gain the critical-thinking skill of problem solving?* The pre- survey was given to eleven students at the end of August 2011, which was prior to implementation of my innovation. The survey was administered again at the end of November 2011 to nine students because during my study, two students moved out of the district. To enable a comparison of the same students, only the students who took both surveys were included in this analysis.

Analysis of survey. The survey required students to answer with a (☺,😐,☹) to describe how they felt they performed with each problem-solving step. The pictures were matched to corresponding numbers (3, 2, 1) and interpreted as followed: scores from 3-2.5 were interpreted to mean *a happy feeling/perception* ☺, 2.49-1.5 *a neutral feeling/perception* 😐, and below 1.49 *unhappy feeling/perception* ☹. To measure the impact of my innovation, I used Excel to calculate the pre/post means indicating change in how the students felt about the problem-solving steps.

Survey results. The pre- mean and standard deviation for the survey for all students was 2.38 (.25) and the post- mean rose to 2.83 (.14) indicating students moved from neutral to happy. Looking at the survey by grade level showed a pre- mean and standard deviation for 5^{th} grade to be 2.5 (.17) and the post- mean and standard deviation for 5^{th} grade to be 2.87 (.08). This differed for

the 4th graders who had a pre-mean and standard deviation of 2.21 (.21) and post-mean and standard deviation of 2.79 (.21). Overall 5th grade students felt happier in their ability to perform each of the problem-solving steps. Table 4 shows the means and standard deviation scores for the survey items by grade.

Table 4

Mean and SD Scores for Problem Solver Survey by Grade

Grade	Pre		Post	
	M	*SD*	*M*	*SD*
5th N=5	2.50	.17	2.87	.08
4th N=4	2.21	.21	2.79	.21
All Students	2.38	.25	2.83	.14

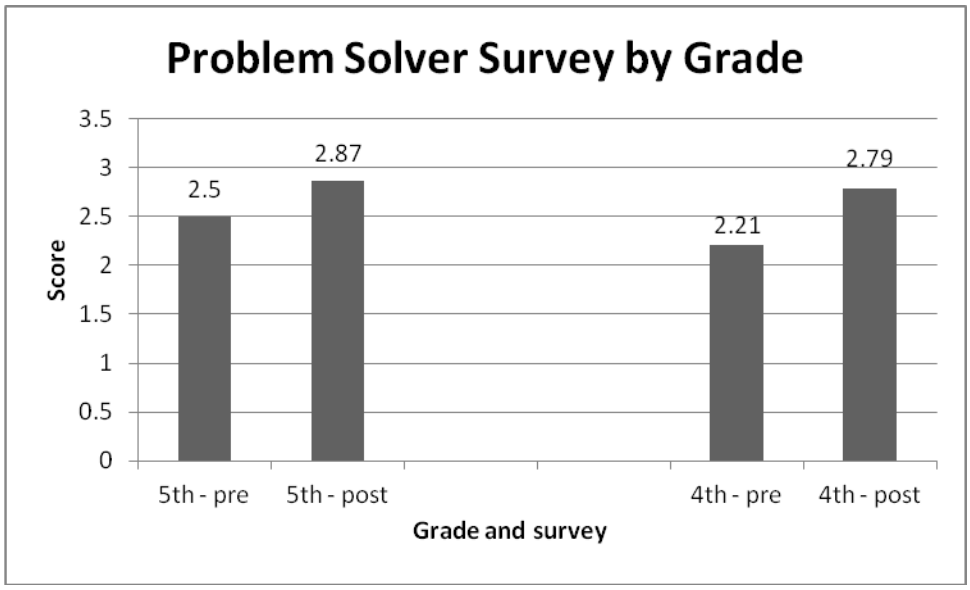

Figure 5. Visual of pre/post problem solver survey mean by grade

Rubric for Evaluating Grand Conversation. The Rubric for Evaluating Grand Conversation (Appendix E) was used to answer the following research question: *How, and to what extent do my students make aesthetic connections and interpretations of texts discussed with them in grand conversation?* I answered the survey after each grand conversation with each group (N = 3) after each book (N = 7). The rubric had two constructs, Making Personal Connections and Interpretation/Making Meaning that were used to evaluate students after each grand conversation. Group 1 included only 5th grade students: S.O., M.L., M.R., and J.G. Group 2 included 4th and 5th grade students V.R., J.R., and F.M. Group 3 included only 4th grade students A.A. and F.A.

Analysis of survey. The rubric used a 3-point scale (often, occasionally, and rarely) to determine how well students were meeting each indicator. The

words were matched to corresponding numbers (3, 2, 1) and interpreted as followed: scores from 3-2.5 were interpreted to mean the group demonstrated the indicator often, 2.49-1.5 to mean the group demonstrated the indicator occasionally, and below 1.49 to mean the group demonstrated the indicator rarely. To measure the impact of my innovation, I analyzed my quantitative data in a spreadsheet to find the means and standard deviations for each construct per group for each story.

Survey results. The mean and standard deviation on the rubric for all groups in the aesthetic connections construct was 2.51 (.25) indicating that all groups demonstrated the indicators often. The mean and standard deviation on the rubric for all groups in the interpretation/making meaning construct was 2.38 (.37) indicating all groups demonstrated the indicators occasionally. Table 5 shows the results for each construct for each story and for all groups. The mean scores started low for the first story in both the Aesthetic Connections Construct 2.07 (.50) and Interpretation/Making Meaning Construct 2.00 (.78). As the innovation progressed, the mean scores varied from story to story and then ended more positive in both the Aesthetic Connections Construct 2.87 (.11) and the Interpretation/Making Meaning Construct 2.76 (.16).

Table 5

Overall Grand Conversation Means and SD Based on Story

Grade	Aesthetic Connections Construct		Interpretation/Making Meaning Construct	
	M	*SD*	*M*	*SD*
Story 1 Hey Little Any	2.07	.50	2.00	.78
Story 2 When Sophie Gets Angry	2.47	.12	2.26	.49
Story 3 A Day's Work	2.07	.58	2.15	.36
Story 4 Hooway for Wodney Wat	2.67	.12	2.32	.25
Story 5 Stand Tall Molly Lou Melon	2.53	.23	2.48	.39
Story 6 Fly Away Home	2.93	.12	2.69	.14
Story 7 Chrysanthemum	2.87	.11	2.76	.16
All Stories	2.51	.25	2.38	.37

Qualitative Data Analysis

Journals, thought bubbles, transcripts, field notes.

Data analysis. For all the qualitative data (I SOLVE journals, thought bubbles, grand conversation transcripts and observations, and field notes) I employed the constant comparative method for analyzing data in order to develop a grounded theory (Lincoln & Guba, 1985; Strauss & Corbin, 1998). Listening served as my first round of analysis, since I recorded and transcribed all grand conversations.

For all other data, I reviewed it several times to obtain a general sense before making any inferences. Next, data were analyzed using fifteen a priori codes (Johnson & Christensen, 2007) I developed in relation to the research questions and theoretical frameworks. I applied these codes to my data. I then read through the data again and as I did themes began to rise from my data. To look for unexpected categories and relationships, this process was followed by open and axial coding (Corbin & Strauss, 2008; Glaser & Strauss, 1967). Open coding is a method of analyzing qualitative data (Corbin & Strauss, 2008; Glaser & Strauss, 1967). It starts the analysis process and lays the groundwork for axial coding. After the text has been opened up, axial coding can begin. The process of "relating categories to their subcategories is termed axial coding because coding occurs around the axis of a category" (Glaser & Strauss, 1967, p. 123).

Next, I collapsed some of the codes together and then wrote central themes based on the codes. The themes consisted of words or phrases that expressed a general meaning for each grouping. Last, I wrote assertions to articulate what each group of themes meant. This constant comparative method establishes conformability of my results (Lincoln & Guba, 1985).

Results for data sources.

Grand conversation, I SOLVE journals and thought bubbles. From the grand conversation transcriptions, student journals, and student thought bubbles, eleven codes emerged. From these eleven codes, nine themes were formed and these appeared to tell the story from all the student work and grand conversations. Table 4.8 shows all the results for the codes and themes from the journals, thought bubbles, and grand conversations.

In data from the I SOLVE journals, thought bubbles, and researcher's journal, the theme of *aesthetic connections* was discovered 130 times, (118 times in student journals and thought bubbles and 12 times in the researcher's journal). Some aesthetic connections made by students were: "I felt sad like Rodney last year when I didn't have many friends. I decided to be friends with the nice girls and ignore the mean ones and yes this helped. I just didn't play or talk to the mean girls," Another student noted, "I can relate to Victoria because I make fun of people sometimes. I do not want to make them feel bad and I feel sad when I make them cry. Once Joe and I bullied each other and we got into a fight and both got in trouble". In one journal a student wrote,

> Francisco relates to my neighbor because they don't know what to do because her mom is pregnant and she has a bad time because her dad has to go walk in the streets and ask for money. They have 5 girls and 3 boys. They have a hard time because they live in an apartment that only has one room, one small restroom and one small kitchen. They get dirty clothes in

> 2 days and they need to go to the laundry. They need to go get food for them to feed their kids. That's a very sad thing.

and "I am like Rodney rat because sometimes I get bullied and then I tell them to stop and I sometimes tell the teacher. I know how Rodney feels because I feel like him when I get bullied too. Rodney and me got the same story and life too" and "I am like Francisco because I sell soda outside my house and we are going to make a candy store to sell candy so we can get money for the car and the house. My whole family helps to make money and we each have our own job that we do. I stand out there and help take the money".

While I counted the aesthetic connections that students made during grand conversations and in the journals and thought bubbles, there were times that students would make the connections or comments when the tape recorder was off. In my field notes, I discuss students making aesthetic connections 12 times. Some comments were,

> When we were discussing the fact that the boy and his dad were homeless after the mother died, AA said it was 'because the funeral costs too much money and they probably owed too much money to the bank' I thought that was very insightful for a ten year old to know then FA asked me 'But if my mom and my dad don't work then how come we aren't homeless?' Both boys know more about rent, family struggles and finances than I ever expected and knew at their age,

and

> The last group stirred up some emotions today! When we were doing our journals the boys started talking about the names that people call them… FA mentioned they call him Brown because he is one of the only African American kids in the school, but he didn't really care or get worked up about it but when they got around to CJ he first denied ever getting made fun of then AA said 'That's a lie. Remember they called you lollipop!' He said it very nice and explained it was meant to mean small body and large head and told CJ he should still love himself like the character. When I asked him if he wanted to write about that experience in his journal he started to get really upset at me, started to cry and hid his face. He then sat back in his chair, with his eyebrows slanted and chose not to take a sticker for the day and left the room. I reminded him on his way out (away from everyone else) that I was a person that he could tell what was happening if anybody ever made fun of him, but he ignored me and walked out the door. He couldn't have gotten out of here soon enough. CJ's family has many issues in the home, such as abuse and neglect, and CPS has even gotten involved; you can really tell he has a lot of built up emotions and anger inside. This would be the last time I saw CJ before his family suddenly moved the following weekend without notice.

When discussing the I SOLVE problem-solving steps, students were often able to *identify the problem.* The data showed 52 instances in journals and thought bubbles and 102 instances in grand conversations. Some comments used to construct the theme of identifying the problem were: "Molly could have solved

her problem of getting made fun of by telling the teacher or telling the bully to stop. She could have ignored him or walked away when she started to make fun of her," and "Francisco solved his problem by telling his grandpa that he lied and that he was sorry and that he will not do it again and that they will do the job again tomorrow and we will do the job right so we could get pay and then mom will be happy for us," and "If I were Rodney I would have told my mom to tell the principal that someone was teasing me and ask if I can go to speech in that school and tell them to stop teasing me because in speech they help you learn how to say stuff".

Students were able to think about the possible *solutions to the problems* in the text and in their own real-life situations 79 times in grand conversations 223 times in student journals and thought bubbles. Some comments used to construct the theme of thinking about possible solutions were: "Molly could have solved her problem of getting made fun of by telling the teacher or telling the bully to stop. She could have ignored him or walked away when she started to make fun of her," and "Mrs. Twinkle actually solved the problem because she heard Victoria calling her names and she said she had a flower name and she liked the name chrysanthemum and was going to name her baby that," and "The ant solved the problem because the ant was tiny so he was nice to the boy and the any said I have a family too. He could have run away and tried to hide from the boy too. Sometimes it just helps to get away from the bully."

Students were able to find *obstacles to the solution* as evidenced 10 times in journals and thought bubbles and 43 times in grand conversations. Some

student's comments used to construct the theme of finding obstacles to the solution were: "Even if Molly told the teacher sometimes they still make fun of you but more cause you tattled," and "If she changed her name they will still make fun of her because they know her real name," and "They could have been even more mean or gotten other kids to be mean for him".

Finally, students were able to *evaluate the solution* 9 times in journals and thought bubbles and 36 times in grand conversations. Some comments used to construct the theme were: "It helps to tell a teacher because they can get the other person in trouble and send them to the office," and "This solved the problem because it made the kids like him," and "That doesn't always solve my problem because my mom will get mad at me".

Another theme (found 310 times in grand conversations and 68 times in journals) was *reader response*. Student comments made in reference to this include, "The bird and the boy are alike because they are both stuck in the airport. They boy probably feel scared and sad. They both want to get out of the airport and that bird got free and it gives the boy hope that he will also get out someday," and "In this picture the boy was mad because some people have a home and he is homeless and so is his dad. He's feeling mad and sad that they are (the other people) happy and have a home and a car to get out of the airport. He is mad cause he doesn't know why he don't have a house and sad cause he wants one," and "I think that would be really sad to have his family find him in the grass dead because it is sad when people die and I don't want to see dead people".

Students often talked about the specific character traits or feelings that helped to lead them to aesthetic connections. I coded *character's thoughts and feelings* 12 times in the student's journals and thought bubbles and 58 times in grand conversations. Some comments used to construct this theme were: "In this picture, Francisco was thinking about he would not lie to no one again," and "Francisco was sad because he lied and knew it was wrong but he wanted the money," and "The bird and the boy are alike because they are both stuck in the airport. They boy probably feel scared and sad. They both want to get out of the airport and that bird got free and it gives the boy hope that he will also get out someday."

While reading the student's journals, thought bubbles, and my journal, I found students evolving throughout the innovation and problem-solving steps. They were able to *analyze information and transfer to a new situation.* In all, students' transfer of learning was coded 17 times in students' journals and thought bubbles, 70 times in grand conversations, and 33 times in my researcher's journal. Some comments were, "Maybe in the new school the people bully her because they do not know her yet and the people in the old school knew her and liked her, that's why they didn't bully her," and "Without saying nothing, Mrs. Chud is saying it's ok to bully Chrysanthemum because she should say be quiet or I'm going to tell your parents or something like that or sit down to make them stop bullying," and

> ML stopped me during math today and told me 'Miss Wells I really felt like Rodney Rat today at recess because my friend told other girls that I was saying things about them and she was really a bully today' we

> proceeded to go through the I SOLVE steps to figure out what to do and she came to the realization that she should just ignore her and play somewhere else – love that she connected the story to her life on her own time!

For a total of 10 times (6 times in student journals and thought bubbles and 4 times in grand conversation), students talked about how they felt about the grand conversation. Some comments that helped construct the *grand conversation* theme were: "I like when we stop and talk during the story because it gives you a lot of clues about the story and it gives you choices about the story," and

> I like the grand conversation because it kind of helps understanding about bullying in the school and the feelings of other people. We learn about bullying in the story and can stop and talk about it. The grand conversation helped to better understand the story because I listened and answered some questions about the story and it made me think. If we didn't talk during the story then I just read the book, but not stop and think about it and look at the pictures.

Other ideas were, "I think that grand conversation was helpful because it helps me to learn. It makes me listen to the story so that I can answer the questions. It helps me to understand the story better as we go along. It also helps me to write to answer the questions."

To determine if my innovation helped students gain an enjoyment in reading I coded whenever students demonstrated an increased enjoyment or

excitement about reading and chose to read the books we were reading in the study during their free read time. Overall, I coded students' *enjoyment* a total of 12 times in their student journals and thought bubbles, 23 times in grand conversations, and 18 times in my researcher's journal. Some comments that helped construct the theme were: "During free read time J.R. came up and asked me where 'Hey Little Ant' was and if he could read it to the group on the pillows. He ended up reading it twice to the other boys," and "AA asked if he could read 'When Sophie Gets Angry' with FA on the pillows and I heard AA ask him after the first two pages, 'So what is what is the problem?' he was pretending to be me and even did a little voice, they role played like this through all the I SOLVE steps we had just reviewed," and "ML told me that after we get done with the last book next week that I should still read the books every week and still quiz them on I SOLVE but not give them the folders and just test them every week to see what they remember".

An example of a student's thought bubble is shown in Figure 5. Additional examples are in Appendix D.

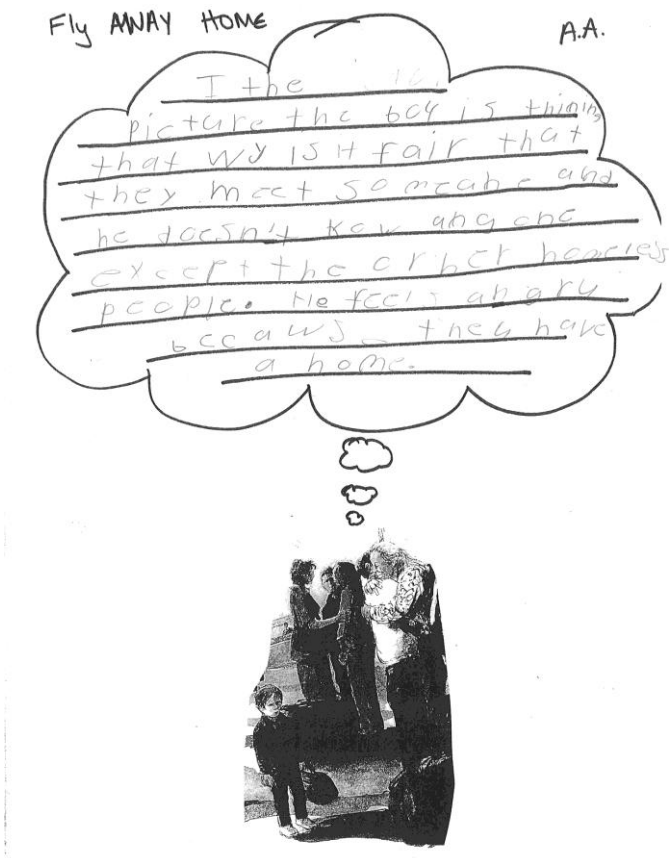

Figure 6. Student thought bubble example

Assertions	Themes	Total Number of Lines/ Phrases Coded
Students made aesthetic connections to the text and characters	Relating the text to self Relating the text to others	Journals and Thought Bubbles – 118 Grand Conversation – 130 Researcher's Journal - 12
Students were able to identify the problem in text and real-life situations	Identify the problem	Journals and Thought Bubbles – 52 Grand Conversation – 102
Students were able to brainstorm possible solutions to solve the problem	Possible solutions to the problem	Journals and Thought Bubbles – 79 Grand Conversation – 223
Students were able to identify obstacles to the solution	Obstacles to solving the problem	Journals and Thought Bubbles – 10 Grand Conversation – 43

Students were able to evaluate if the chosen solution to the problem was successful	Evaluate the solution to the problem	Journals and Thought Bubbles – 9 Grand Conversation – 36
Students were able to step into the character's shoes and identify what the character was thinking	Reader response	Journals and Thought Bubbles – 68 Grand Conversation – 310
Students were able to identify character traits and how the character was feeling	Character traits How the character was feeling	Journals and Thought Bubbles – 12 Grand Conversation – 58
Students were able to analyze information and transfer that information to a new situation	Analyze and assess information in text Transfer of information	Journals and Thought Bubbles – 17 Grand Conversation – 70 Researcher's Journal – 33
Students articulated their feelings about grand conversations	Grand Conversations	Journals and Thought Bubbles – 6 Grand Conversation – 4
Students had an increased enjoyment for reading and often chose to read the books in the study	Enjoyment/Excitement Showing enjoyment of reading Choosing to read the books in the study	Journals and Thought Bubbles – 12 Grand conversation – 23 Researcher's Journal – 18

Figure 7. Nine themes constructed from I SOLVE journals, thought bubbles, grand conversation transcriptions, and researcher's journal

Researcher's journal. Personal field notes were written throughout my innovation to answer the following research question: *How will I evolve as a result of this innovation?* I used an electronic journal to record my thoughts during my entire innovation. I would type after each grand conversation for each book and then make quick notes when students would mention something about the books, I SOLVE process, or thought bubbles during days that we were not having a formal grand conversation. I wanted to find out how I was changing both as an individual and as an educator from this innovation. Table 6 shows the results for my journal.

Table 6

Theme Constructed from Researcher's Journal

Assertion	Themes	Total Number of Phrases Coded
I changed viewpoints about my innovation and the participants as a result of doing my study	My view	Field Notes – 10

Results. There are a total of 10 times in my field notes that I wrote about my own personal changes or thoughts I had about my innovation and the participants. This was a part where I made my own aesthetic connections to the text and my students. For instance I wrote,

While talking about the story today and how the grandpa came because the mom didn't work and the family needed money since the father passed away, it was implied many times by the students that the only people that would stand and ask for work or even have a steady job were the dads or men in the families. Many of the mothers of the kids in my groups do not have jobs and it seems normal for them to stay at home all day even if there are no small kids still at home. I have learned how popular, and sometimes necessary, it is to have extended family members living together are in the Hispanic culture which I do not think would be the same way if I read this story in a district with less minorities and poverty. For instance, if any siblings in my own family, or myself, didn't make enough money I can't see my parents actually moving in with them, I think they would just send money to help something like that but not actually pick up and move,

and

In the story, Rodney hid in his jacket to get away from the bullies. While my students don't always physically hide in their jackets, I know there are only a couple students that I see who actually raise their hand and answer questions in the regular classroom. I remember being younger and feeling timid about taking the risk of being wrong when I raised my hand and answered a question so I can't even imagine what it would be like for most of these kids who are second language learners, have a learning disability

and a speech disability to want to take the chance of being right or wrong and actually raising their hand to answer a question in class.

Chapter 5

Findings

In Chapter 4, I established the reliability of my quantitative instruments, presented my analysis, and provided the results of this work. I also generated codes and themes for my qualitative data, using both a grounded approach and a priori codes based on the Reader Response Theory, my theoretical lens. From this analysis, I constructed preliminary data-based assertions from each data source.

In this chapter I use the QUAN-QUAL model in Figure 7 to triangulate my results, make final assertions, and insure credibility and validity of my findings. Gay et al. (2009) define triangulation of the data as "a process of using multiple methods, data collection strategies, and data sources to obtain a more complete picture of what is being studied and to cross-check information" (p.377).

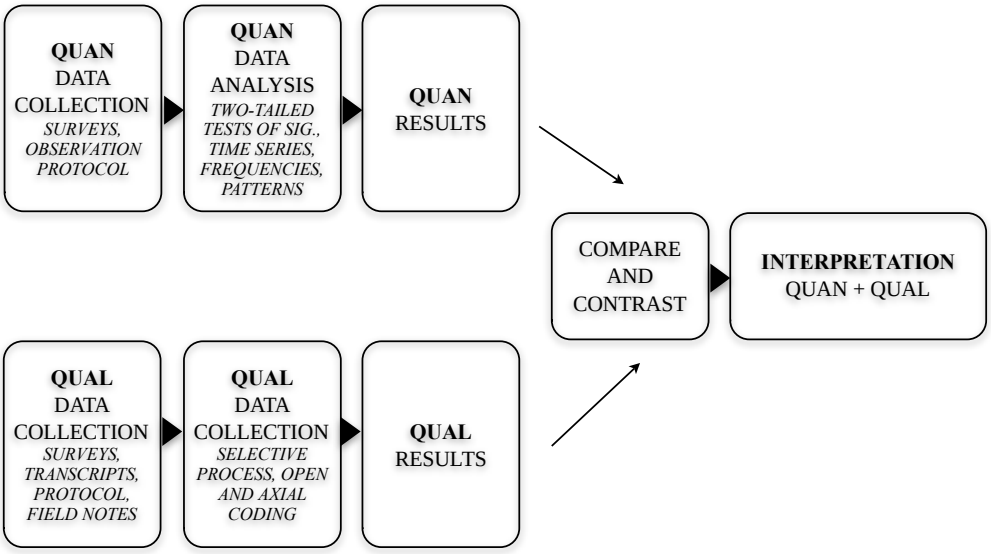

Figure 8. Triangulation convergence model. A model illustrating the timing of data collection, analysis, and interpretation. Adapted from *Designing and Conducting Mixed Methods Research* by J. W. Creswell and V. L. Plano Clark, 2007.

Given this process I combine similar assertions, compared and contrasted my findings, and created final assertions. My final assertions to answer my research questions are:

1) At the beginning of my innovation my students did not have high motivations to read. However, when I read books of interest and engaged my students in grand conversations, my students became motivated to read the books read and discussed.
2) When I read literature with characters facing problems similar to those my students were facing, and held grand conversations that focused on the characters' problems, issues in my students' own lives, and used the I SOLVE problem-solving method, my students were able to gain

the critical-thinking skill of problem solving to address their own problems.

3) Even though my students have learning disabilities, speech disorders, and are growing up in poverty, they were able to interpret text and make aesthetic connections between the literature read to them and themselves and others.
4) Through literature, the I SOLVE method was a valuable way of teaching problem-solving steps.

Final Assertions in Response to Each Research Question

Given these four assertions, I now present the answers to my research questions and provide insight into the data sources that helped me gain the final resolutions.

In response to research question one: *What are my students' current motivations to read? To what extent will my intervention change their motivation?* My innovation was designed to increase the reading motivation of the students with disabilities in my classroom. To understand if it did this, I gave my students the *Motivation to Read Profile* developed by Gambrell et al. (1996) both at the beginning and end of my innovation. The survey contained two constructs and showed that, in both, my students' self-concepts as readers and value for reading and solving problems increased as a result of what we did. All of my students changed their views as to how they felt they read compared to their friends, as well as, how they felt about reading as a way to spend their time. Both students' journals and thought bubbles confirm this assertion. Students wrote about how

they loved reading more, and they noted that they especially liked to read the books read to them as part of the innovation. My students also wrote that they liked to go through the I SOLVE steps and figure out how to help the characters solve the problem or decide how they might solve the problem differently.

My researcher's journal helped to enrich these findings. During the innovation, I wrote about instances in which students mentioned that they enjoyed hearing the books read to them, discussing the books in grand conversations, and going through the I SOLVE steps. This, along with students' voices, confirm that the combination of these three parts of my innovation were critical to increasing students' motivation to read. As noted in Chapter 2, curricula needs to be integrated, and learning environments need to encourage deeper thought (Kirkley, 2003; Paul, 1993). Using books that connected to students' worlds and the I SOLVE process of problem solving encouraged my students to think deeply and critically, enjoy reading, and feel better about themselves as readers.

Unfortunately an increase was not the case for all students. Scores on the survey and voices captured in my journal showed that two students, ML and JR, felt no better about reading after the innovation was complete than before. In my journal I noted that the post- survey was administered just after these students took the Dynamic Indicators of Basic Early Literacy Skills (DIBELS) assessment. Both ML and JR received DIBELS scores lower than their previous scores and their percentages went down on the survey. As noted in my researcher's journal, both students were very upset about their DIBELS scores and both needed

consoling. Not doing well on their assessment likely affected their outlook on the innovation that day and the survey captured their perspective.

In response to research question two: *How, and to what extent will literature read to my students, grand conversation about issues in their life, and the I SOLVE problem-solving method help my students to gain the critical-thinking skill of problem solving?* My data showed that every student who heard the stories, participated in grand conversations, and learned I SOLVE were able to identify the problem the character was facing and discuss possible solutions to the problem. Data from I SOLVE journals, thought bubbles, and the grand conversations confirm this fact. When the students discussed the problem a character was facing and how they solved the problem, they were able to relate the problem to their own lives and a similar problem they or someone they knew, had encountered. For instance, in her journal MR wrote about being bullied like Rodney the rat and AA wrote that he knew a boy who was different because he had long hair but didn't care like the character Molly Lou Melon. Rosenblatt (2005a) notes that when students take an active role in producing meaning, they make aesthetic connections to the story. This view of reading emphasizes the role of the individual reader and helps teachers understand the importance of helping students bring together textual and contextual evidence with their own distinctive experiences, perspectives, and viewpoints. Doing this helps the reader become a meaning-maker (Claggett, 2005). Unfortunately students in poverty, with special needs often receive a watered-down curriculum focused on drills and isolated facts (Tornquist, 2005).

Problem solving is part of critical thinking and defined as the process of identifying the most important elements that influence an answer while working through the details of the problem to reach a logical solution (Silverstein, 1997). Using literature that related to the problems my students were currently facing helped them connect to the characters' problems and this allowed them to be able to contribute to the grand conversation about the text. In one grand conversation, ML discussed that she had once felt sad like Rodney Rat when she did not have many friends. She went on to talk about how she solved her problem by deciding to be friends with the nice girls and ignore the mean girls. JG related Rodney Rat to someone he knew who was difficult to understand due to her speech problem and how other students often bullied the girl. Similar stories were scattered across the I SOLVE journals, thought bubbles, and other transcripts of grand conversations.

Teaching students to think critically and make good decisions can equip them to improve their own futures. Becoming educated and practicing good reasoning, problem-solving skills, and good judgment offers a better chance at a better life (Facione, 2010). The I SOLVE method is designed to help students learn how to make connections between past experiences, the problems they are facing, and the solutions they choose (Forgan, 2003). I saw this in my students when they were able to use the I SOLVE method to help them solve problems in the text.

In response to research question three: *How, and to what extent, do my students make aesthetic connections and interpretations of texts discussed with*

them in grand conversations? During the process of the innovation, I found that my students loved teacher re-alouds, of any kind, more than I had anticipated! My students really looked forward to my reading a book each week and consistently asked throughout the week when I was going to read to them. This once again ties to their motivation to read. Well-chosen texts mattered to my students' motivation and their contributions to grand conversations. During our first conversation students commented on the story a total of 98 times, but by the last story students commented a total of 259 times.

Reading aesthetically allows one to live through the text as one interacts with the text (Tracey & Morrow, 2006). My students were able to bring their background and past experiences to help make aesthetic connections to the text and characters in the stories. For example, in the journals and thought bubbles, students were not only able to relate the text to themselves but they were also able to relate the text to others they knew and make comparisons between books. In her thought bubble, SO discussed how she thought the book *Stand Tall Molly Lou Melon* (Lovell, 2001) was similar to the book *Hooway for Wodney Wat* (Lester, 1999). To her, both characters were different and got bullied because of their differences. JG related to the story *Fly Away Home* (Bunting, 1993) when he wrote about a homeless man in the nearby park who often asks him for money. JG noted he understood the man's plight but said that he would not give him money because he thinks the man would use it to buy drugs. JG's comments shows he lives in a stressful environment and research shows that educators need to help

students growing up in poverty learn to think critically to beat the odds (Woolfolk, 2010).

Reading aesthetically is being able to identify with a character. Students were able to identify with and relate to others going through the situations in the stories. As noted in my researcher's journal during the selection of the books, I made sure my elections took into account problems I had witnessed my students having in the past years I have taught them. For instance, many students in my classes deal with bullying, poverty, or being different because they have a disability. I took these life challenges into account when selecting the literature I was going to use as part of my innovation. To me, it is important that a teacher create a context so students make connections (Claggett, 2005). Choosing the appropriate text that students could connect to made the grand conversation process meaningful.

I also found that students whose verbal comprehension level (noted in Chapter 3) was low had a more difficult time interpreting the text and making the inferences needed to solve the problems. As described in my researcher's journal, as much as I wanted to have student-led grand conversations, I discovered that even though I used the smallest of steps, asked questions related to the text, and used a structured problem-solving method, my population of students needed more scaffolding than I had anticipated. While my data shows that my innovation positively affected my students' ability to problem-solve, more practice will be needed if this trend is to continue.

In response to research question four: *How will I evolve as a result of this innovation?* When I started my journey as a doctoral student I knew I wanted to make a difference in the lives of students with special needs, but I didn't know how. After years of hearing about the problems and issues my students were facing, I decided my innovation had to include students' voices, literature, and a problem-solving method. So I used these to develop my innovation focused on helping them solve the problems they were facing in the real world. In my researcher's journal, there are multiple entries where I captured my students' stories and how I really only knew a small portion of the issues that were facing. In their journals and grand conversations students opened up more about issues in their life. For instance, after reading the book *When Sophie Gets Angry – Really, Really Angry* (Bang, 1999), one student commented during the grand conversation that the time when he gets most angry is when his parents are fighting and he sees his dad hit his mother. Many other students connected with this story because of issues in the home that made them upset.

Also in my researcher's journal I noted how this study showed me that I really only scratched the surface to help students of this population through real-world issues. With budget cuts and lack of time for counseling, students' problems are often pushed to the side or not fully addressed before moving onto the next academic objective we need to cover. Having the opportunity to work with small groups gave me the time and ability to attend to these needs and help students work through the challenges in their life along with tending to their

academic requirements. I believe working through the problems my students are facing first, will help them become the problem-solvers they need to become.

Chapter 6

Conclusions

I conducted the action research reported in this dissertation to help my students with learning disabilities gain the critical-thinking skill of problem solving. My work sought to discover the impact, if any, conducting grand conversations and using the I SOLVE problem-solving steps would have on helping my students understand the problems characters in selected picture books were facing, and through this, make aesthetic connections to literature and increase their motivation to read. This chapter reports my final discussion, implications for practice, limitations to my study, and closing words.

Discussion

My innovation was designed to increase my students' motivation to read, help them learn how to problem-solve, increase their aesthetic connections to texts, and monitor my growth as their teacher, a change agent and leader. As my research shows in Chapter 5, my innovation helped to reach all the goals I had set out prior to implementing my innovation. As a teacher of students with special needs living in poverty, I saw the problems they were facing first-hand. I knew I wanted to help my students learn how to cope with and understand their challenges. My innovation was designed to do just this. My data showed that literacy and teaching problem solving can mesh. My students enjoyed hearing the books read to them and going through the I SOLVE steps as much as I enjoyed

seeing them learn the problem-solving skills I felt they needed in various situations in their life.

Through my research I found that it was important to help students deal with difficult situations in their surroundings by empowering them with conflict-resolution skills, helping them learn to deal with their emotions and feelings like anger and frustration, and teaching them the importance of setting goals (Jensen, 2009).

My data also showed that critical thinking focused on the real-world situations students face combined with a nurturing environment was key to helping my students be successful in and out of school. My findings align with other researchers who note the importance of nurturing environments (Hutchins, 2001). At the beginning of each school year, I build the supportive atmosphere students with learning disabilities need to be successful and feel comfortable in. I make sure everyone in the group values all input, the amount of wait time given for answers is increased, and the students feel their voices are heard. In addition, by conducting my innovation in groups no larger than four, I provided a small group setting that helped students feel comfortable enough to discuss situations in their lives.

The most amazing finding of my innovation for me was the realization that my students connected with the books. I knew my students would be able to make the aesthetic connections within text, but I never imagined the amount of success they would have at this skill. In grand conversations, thought bubbles, and journals, my students made hundreds of aesthetic connections throughout the

course of my innovation. Being able to connect to the stories read, contribute to the grand conversation and problem-solve the situations the characters were going through increased their motivation to read.

To provide a more in-depth perspective to my findings I now provide specific details by gender and group. Overall, my fifth grade girls were more likely to contribute to the grand conversation, and they learned the I SOLVE steps faster than boys. One student, ML, really enjoyed the I SOLVE steps and even three months after the innovation she still likes to quiz me to see if I remember them. ML has told me about how she is trying to use the steps when she encounters problems with her friends. A definite strength for SO was the ability to make the aesthetic connections from the story to other people. She was always the student that could quickly compare the problem in the story with someone she knew in her own neighborhood. For example, while reading *Fly Away Home* (Bunting, 1993), she compared the homeless boy and his father to a family she knew that frequently moved from apartment to apartment because they were not able to consistently pay the rent. On the other hand, MR's strong point was the ability to connect the story to circumstances in her own life. Even though she sometimes struggled to make connections from the text to other people, she was always able to connect to the story on a personal level. This is very positive for MR because she is often shy and does not speak up in the regular classroom. The grand conversation, in the nurturing environment I provided, gave MR the confidence to open up about how she connected to the story.

This was the same case for both my fifth grade boys, JG and VR. When in grades kindergarten through second, their speech and language scores were low enough for them to qualify for the communication disorders classroom in our district. Both students did not talk until the age of six, causing severe delays in their speech and language. Even today these fifth grade boys are very apprehensive to talk in class unless they are sure of their answers. The type of atmosphere that I provided in the grand conversation was crucial to getting these students to participate and share their ideas freely.

For my fourth grade students, it took more scaffolding and repetition on my part to help them learn and be able to apply the I SOLVE steps. For instance, soon after my innovation ended, FM completed a full battery of assessments and his full scale IQ was determined to be 67, qualifying him for the self-contained cognitively-delayed classroom in our school. Today, FM no longer receives my resource support. Given FM's struggles, I had to make sure to scaffold and ask key questions to get him to be able to comprehend the text first before I could ask him to go through the I SOLVE steps. Once he was able to comprehend the text, he was able to make the aesthetic connections and contribute to the grand conversations. This often took extra support from me in helping him to collect, finish, and convey his thoughts, because he talked in two to five word utterances and was often difficult to understand by his other classmates.

I also had to read the stories several times to ensure that students were comprehending the texts. This was especially important for a fourth grade boy, JR. As with any story I read or he reads on his own, JR's comprehension level is

very low, and he often needs multiple times going over the events in the story to grasp what is going on. Still with that help, he will often provide an answer to a comprehension question that is completely off topic. Providing the nurturing environment where he felt comfortable to contribute to the grand conversation with anything he had to say was key in getting him to participate with the group. I often guided him back into the story to help him remember what had happened and the sequence of events that led up to the problem being solved. With this assistance, he was able to comprehend the text, and in his own way, make the aesthetic connections I was looking for.

My last two fourth grade boys, AA and FA, both had the ability to comprehend the text on the first time reading and flourished with the I SOLVE steps and making aesthetic connections. These two students had some of the lowest independent reading levels of all the students in my study but were very sharp when it came to comprehending the story, being able to think abstractly about the text, and make aesthetic connections to both their own lives and others they knew. I often found myself really looking forward to reading to this group because they would literally sit on the edge of their seats waiting to hear what I was going to read next. Since then, I have incorporated more time where I read aloud stories to this group.

Implications for Practice

This research resulted in several findings that could benefit many teachers and students in other schools across my district where the population of students is similar. Some of the benefits of this study could help teachers and students

across a variety of populations in areas of different demographics. Primarily among these ideas are the importance of choosing texts that students can relate to and creating an environment and opportunities like grand conversation where students feel comfortable to exchange thoughts and ideas freely.

In recent professional developments at my school, we have discussed the need for students to gain critical-thinking skills in the 21st century. One of the critical-thinking skills mentioned was problem solving through a variety of contexts. I had the opportunity to discuss my innovation and how I helped my students with special needs learn the critical-thinking skills of problem solving. Many teachers approached me afterwards asking for more information about how they could teach problem solving in their classrooms.

During other grade-level meetings and professional developments at my school, I also had the opportunity to share how beneficial grand conversations were in helping students learn that making meaning and connecting to stories comes from within as they apply their knowledge and experiences to the story and learn from the knowledge and experiences of their peers. Accomplishing a grand conversation in a small group with students with learning disabilities gave the teachers confidence and enthusiasm that they could facilitate a grand conversation in their large classroom with students in the regular education setting.

Because this study was designed with the needs of the participants in mind, replicating it would involve changes. For instance, students who have higher reading levels may be able to read the texts on their own before going through the I SOLVE steps and participating in a grand conversation. A different

population of students may also need to read books where the characters are going through situations they are more familiar with in their own environment.

In my application to the program, I mentioned that I wanted to learn how to make thoughtful, research-based decisions about educational programs in my school and district. I feel that I have not only achieved this goal but many others in the course of the doctorate program. I have learned how to be a change-leader not only in my classroom but in my school, district, and at the state level to help students with learning disabilities gain the skills they need to be successful in the 21st century.

Implications for Research

Limitations. Although my innovation answered all my research questions positively, in my next round of action research I would like to conduct the study with a larger group of students with learning disabilities, or possibly in a regular education classroom to check the validity of my findings. I would also increase the amount of time given to having the grand conversation, allowing for more wait time for students to think about and respond to other student's perspectives.

I also feel that if I would conduct this study with a population that was not familiar with me, it may result in different findings. Since I am one of my students' primary teachers, and they know I give them a grade at the end of each quarter, most students often do things to please me. Even though I reassured students I would not be grading them on their answers and I wanted them to be

completely honest about their views on reading, by having an outside person give the surveys, their answers may have been given to please me.

Another limitation within my innovation would be the amount of time I had with each group and the length of the study. Since I had to also teach the normal range of other standards while doing my study, I had to manage time given to my study accordingly. In an ideal world, I would have enough time with each group daily to be able to tackle all the standards in reading, writing, and mathematics and still have a substantial amount of time left to teach critical thinking for real-world applications, such as problem-solving skills.

Closing Words

The data I generated suggested there is a need for students with learning disabilities in this population to learn the critical-thinking skill of problem solving, and that by reading books they could connect to, facilitating a grand conversation, and using the I SOLVE strategy is a beneficial way to gain this skill.

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APPENDIX A

PARENTAL LETTER OF PERMISSION

Dear Parent:

I am a graduate student under the direction of Professor Debby Zambo in the Mary Lou Fulton College of Education at Arizona State University. I am conducting a research study to help students with disabilities living in poverty develop the critical thinking and problem solving skills to be successful in their world.

I am inviting your child's participation, which will be included in their special education resource time for one hour a day during a span of twelve weeks. Your child's participation in this study is voluntary. If you choose not to have your child participate or to withdraw your child from the study at any time, there will be no penalty and will not affect your child's grade or progress on their IEP goals. Likewise, if your child chooses not to participate or to withdraw from the study at any time, there will be no penalty. The results of the research study may be published, but your child's name will not be used.

Although there may be no direct benefit to your child, the possible benefit of your child's participation is gaining the critical thinking skills they will need to face hardships in their life. There are no foreseeable risks or discomforts to your child's participation.

Confidentiality will be maintained during all portions of the study and your child's name will not be used in any publication. All responses provided by your child will be kept anonymous. The results of this study may be used in reports, presentations, or publications but your child's name will not be used.

If you have any questions concerning the research study or your child's participation in this study, please call me (602)442-3200 or Dr. Zambo at (602)555-5555

Sincerely,

Sheila Wells

By signing below, you are giving consent for your child _____ (Child's name) to participate in the above study.

_____	_____	_____
Signature	Printed Name	Date

If you have any questions about you or your child's rights as a subject/participant in this research, or if you feel you or your child have been placed at risk, you can contact the Chair of the Human Subjects Institutional Review Board, through the Office of Research Integrity and Assurance, at (480) 965-6788.

El uso de Literatura para ayudar estudiantes con necesidades especiales, a adquirir habilidades en el processo critico mental necesario para tener exito.

Estimados Padres de Familia:

Soy una maestro en la escuela J.B. Sutton, y candidato al doctorado bajo la direccion de la Professora Debby Zambo en el Colegio Mary Lou Fulton Teachers en la Universidad del estatal.

Estoy dirigiendo un estudio de investigacion para ayudar a los estudiantes a desarrollar, pensamiento critico, analitico, y solucion de problemas.

Estoy solicitando la participacion de su hijo/a, la cual incluira una encuesta, leida, una entrevista alineada y varias conversaciones despues de la lectura de cada pieza literaria.

El trabajo en este projecto esta limitado, a su tiempo libre, y de ninguna manera afectara el resultado de sus calificaciones. La participacion de su hijo/a en este estudio es voluntaria.
Si usted prefiere que su hijo/a no participe en este estudio, no habra ningun castigo, ni afectara sus calificaciones. Si una vez dentro de este estudio , su hijo/a desea no continuar, puede retirarse sin ningun castigo o represalia.

Los resultados de este estudio podrian publicarse, pero el nombre de su hijo sera omitido.

Aunque la participacion de su hijo/a en este proyecto no tenga un beneficio directo, su hijo adquirira habilidades para pensar de una manera organizada, resolver problemas, razonar y analizar de una manera efectiva. No existen riesgos o incomfortabilidad , con la participacion de su hijo/a.

Se le pedira a su hijo/a que use un seudonimo (nombre ficticio) el cual escribira al iniciar su trabajo. Esto me ayudara a identificar si las respuestas cambian con la variacion de libros que se les proveeran. Las respuestas seran anonimas. Los resultados de este estudio podran ser empleados en reportes, presentaciones, y publicaciones, pero el nombre de su hijo no se incluira.

Si Ud. tiene preguntas en cuanto a este estudio investigativo, o en cuanto a la participacion de su hijo/a, por favor llameme al (602) 442-3200 ext. 10221 o llame a Dr. Debby Zambo al (602) 543-6334.

Sinceramente,

Sheila Wells
Candidato al Doctorado
Inovacion y Aprendizaje

Con su firma, Ud.concede permiso a su hijo/a:_____(Nombre) de participar en el estudio arriba mencionado.

_____	_____	_____
Firma	Nombre impreso	Fecha

Si tiene preguntas sobre los derechos de sus hijos, al participar en esta investigacion, o si Ud siente que su hijo/a ha sido puesto en riesgo Ud. puede comunicarse con el director de la Junta General de Investigacion en Seres Humanos - Oficina de Integridad y Seguridad.-en proyectos de Investigacion al (480) 965-6788

Hi! My name is Ms. Wells, and I am a teacher here at J.B. Sutton.

I am asking you to take part in a research study because I am trying to help you learn the critical thinking skills of problem solving, reasoning and analysis. Your parent(s) has given you permission to participate in this study.

If you agree, you will fill out a survey that I will read to you and then listen and respond to books I read. Your name will not be on any of your work. I will not tell anyone else how you respond on the survey. Even if your parents or teacher ask, I will not tell them what you say.

You do not have to be in this study. If you do not participate in the study you will still get a chance to come to your resource time at a different time of day. No one will be mad at you if you decide not to do this study. Even if you fill out the first survey, and then change your mind and do not want to be in the rest of the study, you do not have to. You may ask questions about this study and the work at any time.

Signing here means that you have read this form, or have had it read to you, and that you are willing to be in this study. You can come talk to me in my classroom, room 12, or call me at (602) 442-3200 ext 10221 if you want to ask me any questions before you decide.

Signature of subject

_____

Subject's printed name

_____

Signature of investigator

_____

Date_____

APPENDIX B

THE MOTIVATION TO READ PROFILE

Sample 1: I am in _____.
Fifth grade
Fourth grade

Sample 2: I am a _____.
Boy
Girl

1. My friends think I am _____.
   a. A very good reader
   b. A good reader
   c. An OK reader
   d. A poor reader

2. Reading a book is something I like to do.
   a. Never
   b. Not very often
   c. Sometimes
   d. Often

3. I read_____.
   a. Not as well as my friends
   b. About as well as my friends
   c. A little better than my friends
   d. A lot better than my friends

4. My best friends think reading is _____.
   a. Really fun
   b. Fun
   c. OK to do
   d. Not fun at all

5. When I come to a word I don't know I can _____.
   a. Always figure it out
   b. Sometimes figure it out
   c. Almost never figure it out
   d. Never figure it out

6. I tell my friends about good books I read.
   a. I never do this
   b. I almost never do this
   c. I do this some of the time
   d. I do this a lot

7. When I am reading by myself I understand _____.
   a. Almost everything I read
   b. Some of what I read
   c. Almost none of what I read
   d. None of what I read

8. People who read a lot are _____.
   a. Very interesting
   b. Interesting
   c. Not very interesting
   d. Boring

9. I am _____.
   a. A poor reader
   b. An OK reader
   c. A good reader
   d. A very good reader

10. I think libraries are _____.
   a. A great place to spend time
   b. An interesting place to spend time
   c. An OK place to spend time
   d. A boring place to spend time

11. I worry about what other kids think about my reading _____.
    a. Everyday
    b. Almost everyday
    c. Once in a while
    d. Never

12. Knowing how to read well is _____.
    a. Not very important
    b. Sort of important
    c. Important
    d. Very important

13. When my teacher asks me a question about what I have read, I ____.
    a. Can never think of an answer
    b. Have trouble thinking of an answer
    c. Sometimes think of an answer
    d. Always think of an answer

14. I think reading is_____.
    a. A boring way to spend time
    b. An OK way to spend time
    c. An interesting way to spend time
    d. A great way to spend time

15. Reading is _____.
    a. Very easy for me
    b. Kind of easy for me
    c. Kind of hard for me
    d. Very hard for me

16. When I grow up I will spend _____.
    a. None of my time reading
    b. Very little of my time reading
    c. Some of my time reading
    d. A lot of my time reading

17. When I am in a group talking about stories, I _____.
    a. Almost never talk about my ideas
    b. Sometimes talk about my ideas
    c. Almost always talk about my ideas
    d. Always talk about my ideas

18. I would like for my teacher to read books out loud to the class _____.
    a. Every day
    b. Almost every day
    c. Once in a while
    d. Never

19. When I read out loud I am a _____.
    a. Poor reader
    b. OK reader
    c. Good reader
    d. Very good reader

20. When someone gives me a book for a present, I feel _____.
    a. Very happy
    b. Sort of happy
    c. Sort of unhappy
    d. Unhappy

21. My regular classroom teacher thinks I am a _____ reader.
    a. Poor reader
    b. OK reader
    c. Good reader
    d. Very good reader

22. My resource teacher thinks I am a _____ reader.
    a. Very good reader
    b. Good reader
    c. OK reader
    d. Poor reader

23. My parents think I am a _____ reader.
    a. Poor reader
    b. OK reader
    c. Good reader

d. Very good reader

24. I think reading is _____ for my other subjects in school.
    a. Not very important
    b. Sort of important
    c. Important
    d. Very important

25. I think reading could help me _____ later in life.
    a. A lot
    b. Somewhat
    c. Not that much
    d. Not at all

26. When you listen to stories, do you step into the characters' shoes?
    a. Almost always
    b. Sometimes
    c. Almost never
    d. Never

27. Do you get information from reading?
    a. Almost always
    b. Sometimes
    c. Almost never
    d. Never

28. When you listen to stories, do you try solve the problem they face?
    a. Almost always
    b. Sometimes
    c. Almost never
    d. Never

APPENDIX C

GENERAL QUESTIONING PROTOCOL FOR THOUGHT BUBBLES

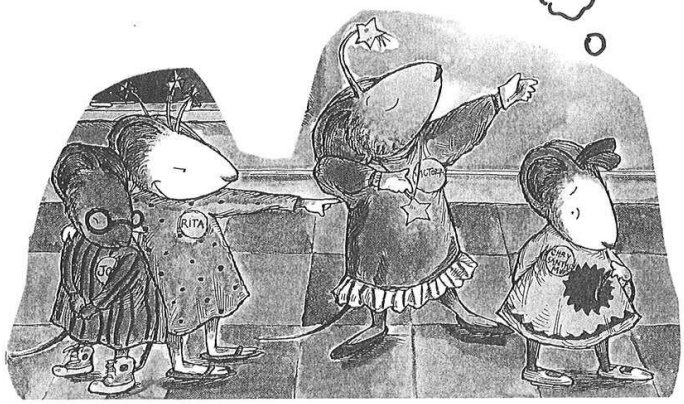
Questions	**Notes**
What problem did the character face?	
What was the character thinking about the problem?	
How is the character analyzing what is going on?	
If you were the character, how might you solve the problem differently?	

APPENDIX D

THOUGHT BUBBLE EXAMPLES

Chrysanthemum M.R.

The Problem in the story Was that Victoria Was bulling chrysanthemum because she has a long name and she Was named after a flowers Mrs. Twikle actually solved the problem because she herd victoria calling her names and she said she had a flower name and she liked the name chrysanthemum and was going to name her baby that.



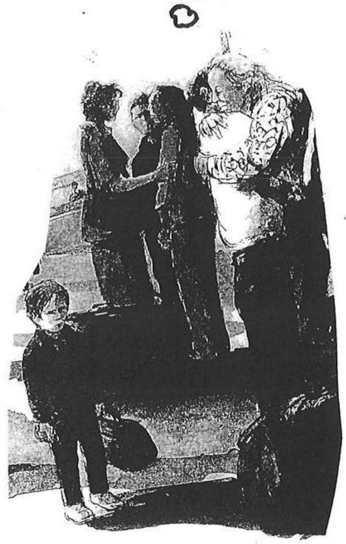
Stand Tall Molly Lou Melon

F.A.

I am like Molly because People make Fun of me because I am different because I am brown. when I cut my hair they call me a bald chicken headed. I get mad when they call me the names and I tell my tracher and my Parents.

Fly AWAY HOME A.A.

I the picture the boy is thining that wy is it fair that they meet somtabe and he doesn't kow anyone except the orher homeless people. He feels angry becaws they have a home.



APPENDIX E

RUBRIC FOR EVALUATING GRAND CONVERSATION

Goals	Indicators	Often	Occasionally	Rarely
Making Personal Connections	Seeks meaning in both pictures and the text in picture storybooks			
	Can identify the work of authors that s/he enjoys			
	Sees literature as a way of knowing about the world			
	Draws on personal experience in constructing meaning			
	Draws on earlier reading experiences in making meaning from a text			
Interpretation/Making Meaning	Gets beyond "I like" in talking about the story			
	Makes comparisons between the works of an individual author and compares the works of different authors			
	Appreciates the value of pictures in picture storybooks and uses them to interpret story meaning			
	Asks questions and seeks the help of others to clarify meaning			
	Makes reasonable predictions about what will happen in a story			
	Can disagree without disrupting the dialogue			
	Can follow information important to getting to the meaning of the story			
	Attends to multiple levels of meaning			
	Is willing to think about and search out alternative points of view			
	Values others perspectives as a means for increasing interpretative possibilities			
	Turns to text to verify and clarify ideas			
	Can modify interpretations in light of "new evidence"			
	Can detect implied relationships not stated in the text			
	Is secure enough to put forward ideas that aren't fully formed to benefit from others' responses			
	Can make statements about an author's intent drawn from the total work			
	Seeks to solve problems in the story			
	Is able to analyze the situation the character is in			
	Demonstrates the ability to reason			

Adapted from G*rand Conversations*, Updated Edition © 2007 by Ralph Peterson and Maryann Eeds, Scholastic Teaching Resources

APPENDIX F

QUESTIONING PROTOCOL FOR GRAND CONVERSATION

For each book read aloud, these anchor questions will be used to start the grand conversation with students.

Questions	Notes
What challenges did the main character face?	
How did those challenges affect other people in their life?	
What qualities did the main character display?	
What decisions did the main character make?	
What happened as a result?	
How did this affect the other people in their life?	
What were the choices the character had to choose from?	
How could the character have solved the problem/challenge differently?	
Have you seen someone deal with these types of challenges? If so, where?	
How does this relate to the challenges in your life?	
Would you have made different decisions than the main character? If so, how?	

APPENDIX G

COMPLETE DESCRIPTION OF THE I SOLVE STRATEGY

AND LESSON PLAN

Component 1: Each time you introduce the I SOLVE strategy, provide the rationale for why it is important to learn how to solve problems. Begin by asking students if they have ever experienced problems with their friends or classmates. Ask a volunteer to share their problem, or share one of your personal experiences with a problem. After sharing, emphasize to students that you are going to teach them a strategy to help them solve these types of problems. Tell them the strategy is called "I SOLVE" because it emphasizes working together to solve problems.

Component 2: Model the steps of the I SOLVE interpersonal problem-solving strategy to the students. Begin by telling students that I SOLVE is an acronym and that each letter in I SOLVE stands for a different step in helping to solve problems.

I – Identify the problem presented in the book

S – Solutions to the problem are brainstormed

O – Obstacles to the solution are identified

L – Look at the solutions again and choose one

V – Validate the solution by trying it

E – Evaluate how the solution worked

Using an example of a problem, model the second component of applying the steps of I SOLVE and write it on the board. For example, as the teacher I would model the strategy by sharing a common elementary school experience such as losing a pencil or forgetting a homework assignment.

First, ***identify*** the problem. Model the strategy steps and "think aloud" so that students hear the metacognitive process of thinking about our own thinking. In my situation I identified the problem: The girl did not have her homework to turn in.

Next, brainstorm a list of possible ***solutions*** to the problem. These were some possible solutions to the problem: 1) the girl calls a parent and asks them to bring the homework 2) the girl doesn't turn in the assignment 3) the girl explains to her teacher and asks if she could turn in the assignment the next day. Let students know it is permissible to generate a longer list of potential solutions. The purpose of the brainstorm is to help students to think about many different ways for solving the problem.

Next, tell students that ***obstacles*** are like barriers or roadblocks that may stop them from successfully solving the problem. Some solutions first appear wonderful but upon closer examination have a barrier that makes them unattractive. These were the obstacles to my three potential solutions: 1) parents are not home or do not have time to return the homework to school 2) not turning in the assignment would have resulted in her receiving an F grade, and she would have felt bad about the situation 3) explaining the situation to her teacher might have caused the teacher to say, "No, you cannot turn in the assignment late."

Step three is to ***look*** again at all the solutions and obstacles and think about which solution is associated with the least negative consequence and can help to solve the problem for the long term. Again, "think aloud" and examine

each solution and obstacle. We selected the third solution: the girl would talk to her teacher.

The next step, ***validate by trying it,*** would require the girl to talk to her teacher once she arrived at school. She discussed the problem with her teacher, and her teacher was very understanding.

In the final step, ***evaluate how the solution worked,*** I told students that the teacher allowed the girl to turn her homework in the next day, since she rarely forgets it. I explained to students that if the outcome had not been successful, I would return to the ***look*** step and choose another solution to try.

Component 3: Provide practice for students to apply the I SOLVE steps. Teachers can ask for additional examples of problems and have students model the I SOLVE steps in front of the class as they provide guidance. Another activity is to provide a generic problem for all students to solve (such as what to do when they need a snack or when they do not understand an assignment), divide the class into groups, and let them practice the steps.

Component 4: Help students maintain this strategy as well as generalize this strategy to other school or community settings. As discussed prior, after your initial instruction, students need prompting and guidance to remember when to apply the I SOLVE strategy. As the classroom teacher, use the "teachable moment" to remind and guide students. Daily opportunities arise for students to practice problem solving in the classroom and on the playground. By applying and using the problem-solving strategy, students will remember the strategy. Some teachers find that assigning strategy homework helps students remember to

use the problem-solving strategy in other contexts.

APPENDIX H

BOOKS READ, THOUGHT BUBBLE QUESTIONS, AND JOURNAL PROMPTS

Book – Issue	Thought Bubble Q's	I SOLVE Journal Prompts
Hey, Little Ant *Helping Students Respond to Bullies	1. What problem did the ant face? How did he solve it? 2. What was the ant thinking about the problem in this picture? 3. If you were the ant how would you have solved the problem differently?	1. What challenges did the ant face? 2. Write and draw what you thought about the story. 3. How does the ant's life relate to you or someone you know? 4. What did you think about the grand conversation and did it help you to understand the story? 5. What were the solutions the ant had to choose from?
When Sophie Gets Angry, Really, Really Angry *Helping Students Understand Anger and Feelings	1. What problem did Sophie face? Why? 2. What was Sophie thinking about the problem in the picture? 3. If you were Sophie, how might you solve the problem differently?	1. Describe a time where you felt like Sophie. 2. Write and draw what you thought about the story. 3. How does the problem Sophie went through compare to you or someone you know? 4. What did you think about the grand conversation and did it help you to understand the story? 5. What were the solutions the Sophie had to choose from?
A Day's Work *Helping Students Understand Diversity and Poverty	1. What problem did Francisco face? 2. What was Francisco thinking about the problem in the picture? 3. If you were Francisco, what would you have done to solve the problem?	1. What challenges did Francisco face? 2. How did poverty affect Francisco? 3. What good and bad qualities did Francisco have? 4. Write and draw what you thought about the story. 5. How did Francisco solve his problem? 6. How does Francisco's problem relate to you or someone you know? 7. What were the choices Francisco had to choose from to solve the problem? 8. What did you think about the grand conversation and did it help you to understand the story better?
Hooway For Wodney Wat *Helping Students Understand Disabilities	1. What problem did Rodney face? 2. What was Rodney thinking about the problem in this picture? 3. If you were Rodney, what would you have done to solve the problem?	1. What challenges did Rodney face? 2. How did Rodney's speech affect this school life? 3. What was Rodney's problem in the story and how did he solve it? 4. Write and draw what you thought about the story. 5. How does Rodney's life relate to you or someone you know? 6. What did you think about the grand conversation and did it help you to understand the story better?

Stand Tall Molly Lou Melon *Helping Students Feel Confident About Who They Are	1. What problem did Molly face and how did she solve it? 2. What was Molly thinking about the problem in this picture? 3. If you were Molly, what would you have done to solve the problem?	1. What challenges did Molly face and how did she overcome them? 2. What was Molly's problem in the story and how did she solve it? 3. Write and draw what you thought about the story. 4. How does Molly's life relate to you or someone you know? 5. What did you think about the grand conversation and did it help you to understand the story? 6. What were the choices Molly had to choose from to solve the problem?
Fly Away Home *Helping Students Understand Poverty and Homelessness	1. What was one problem Andrew faced? 2. What was Andrew thinking about the problem in this picture? 3. If you were Andrew, what would you have done to solve the problem?	1. What challenges did Andrew face? 2. What was the problem in the story and how did Andrew and his dad keep solving the problem? 3. Write and draw what you thought about the story. 4. How does Andrew's life relate to you or someone you know? 5. What did you think about the grand conversation and did it help you to understand the story better? 6. How were the bird and Andrew alike?
Chrysanthemum *Helping Students Improve Self-Concept	1. What was the problem in the story and how did she solve it? 2. What was Chrysanthemum thinking about the problem in this picture? 3. If you were Chrysanthemum, how would you solve the problem differently?	1. Do you think Chrysanthemum should have changed her name and why? 2. What was Chrysanthemum's problem in the story? Who and what helped her to solve it? 3. How does Chrysanthemum's problem relate to you or someone you know? 4. What did you think about the grand conversation and did it help you to understand the story better? 5. Write and draw what you thought about the story. 6. Describe a time that you felt like Chrysanthemum.

APPENDIX I

SCORING DIRECTIONS: MRP READING SURVEY

The survey has 28 items based on a 4-point scale. The highest total score possible is 112 points. On some items the response options are ordered least positive to most positive (see item 2 below) with the least positive response option having a value of 1 point and the most positive option having a point value of 4. On other items, however, the response options are reversed (see item 1 below). In those cases it will be necessary to recode the response options. Items where recoding is required are starred on the scoring sheet.

Example: Here is how Maria completed items 1 and 2 on the Reading Survey.

1. My friends think I am _____.
    a. a very good reader
    b. a good reader
    c. an OK reader
    d. a poor reader

2. Reading a book is something I like to do.
    a. Never
    b. Not very often
    c. Sometimes
    d. Often

To score item 1 it is first necessary to recode the response options so that
a poor reader equals 1 point,
an OK reader equals 2 points,
a good reader equals 3 points, and
a very good reader equals 4 points.

Because Maria answered that she is a good reader the point value for that item, 3, is entered on the first line of the Self-Concept column on the scoring sheet. See below. The response options for item 2 are ordered least positive (1 point) to most positive (4 points), so scoring item 2 is easy. Simply enter the point value associated with Maria's response. Because Maria selected the fourth option, a 4 is entered for item 2 under the Value of reading column on the scoring sheet. See below.

Scoring sheet

Self-concept as a Reader	Value of reading
*recode 1.**3**	2.**4**

To calculate the Self-concept raw score and Value raw score add all student responses in the respective column. The full survey raw score is obtained by combining the column raw scores. To convert the raw scores to percentage scores, divide student raw scores by the total possible score (52 for Self-concept subscale, 60 for Value subscale, 112 for the full survey).

Adapted from *"*Assessing Adolescents' Motivation to Read" by Pitcher et al., 2007, *Journal of Adolescent & Adult Literacy*, 50(5), p. 381-386.

MPR Reading Survey Scoring Sheet

Student Name_____
Grade _____
Administration date _____

Self-concept as a reader	Value of reading
1. _____	2. _____
3. _____	4. _____
5. _____	6. _____
7. _____	8. _____
9. _____	10. _____
11. _____	12. _____
13. _____	14. _____
15. _____	16. _____
17. _____	18. _____
19. _____	20. _____
21. _____	24. _____
22. _____	25. _____
23. _____	26. _____
	27. _____
	28. _____

SC raw score: _____/52 V raw score: _____/60

Full survey raw score (Self-concept & Value): _____/112

Percentage scores: Self-concept _____
Value _____
Full survey _____

Comments:
_____
_____
_____

Adapted from "Assessing Adolescents' Motivation to Read" by Pitcher et al., 2007, *Journal of Adolescent & Adult Literacy*, 50(5), p. 381-386.

APPENDIX J

INSTITUTIONAL REVIEW BOARD APPROVAL

ASU Knowledge Enterprise Development

Office of Research Integrity and Assurance

To:	Debby Zambo 4701 West
From:	Mark Roosa, Chair Soc Beh IRB
Date:	07/29/2011
Committee Action:	**Exemption Granted**
IRB Action Date:	07/29/2011
IRB Protocol #:	1107006665
Study Title:	Using Literature to Help 4th and 5th Grade Students with Disabilities Living in Poverty Develop the Critical Thinking Skills They Need to be Successful in Their World

The above-referenced protocol is considered exempt after review by the Institutional Review Board pursuant to Federal regulations, 45 CFR Part 46.101(b)(1) .

This part of the federal regulations requires that the information be recorded by investigators in such a manner that subjects cannot be identified, directly or through identifiers linked to the subjects. It is necessary that the information obtained not be such that if disclosed outside the research, it could reasonably place the subjects at risk of criminal or civil liability, or be damaging to the subjects' financial standing, employability, or reputation.

You should retain a copy of this letter for your records.

APPENDIX K

PROBLEM SOLVER SURVEY

I'm the Problem Solver!

Directions: Circle the face that shows how you did with each problem-solving step. Rememner the I SOLVE steps are:

I – Identify the problem
S – Solutions to the problem are brainstormed
O – Obstacles to the solution are identified
L – Look at the solutions again and choose one
V – Validate the solution by trying it
E – Evaluate how the solution worked

Circle the face that shows how you did/

Identify the problem			
Solutions?			
Obstacles?			
Look and choose			
Try it!			
Evaluate			

Adapted from *Teaching Problem Solving through Children's Literature* by James Forgan (2003).

APPENDIX L

OBSERVATIONS FOR GRAND CONVERSATION

Date:
Location:
Grade of Students:
Start and Stop Time:
Purpose of the Observation:
State Standard:
Setting:

Descriptive Notes Detailed, chronological notes about what the observer sees, hears, etc.	**Reflective Notes** Concurrent notes about the observer's personal reactions, experiences, etc.