Sponsoring Committee: Dr. Joseph Shosh, Moravian College
Mrs. Camie Modjadidi, Moravian College
Mrs. Susan Smeltzer, M.Ed.

THE EFFECTS OF RECIPROCAL TEACHING AND PEER TUTORING IN A THIRD GRADE CLASSROOM

Pamela S. Mertz

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ABSTRACT

This qualitative research study documents the observed and reported experiences of a regular education teacher and her class of eighteen third grade students when using the strategies of reciprocal teaching and peer tutoring in reading and other content areas in a public school located on the edge of an urban area. All participants in the study received reading instruction from the author in the regular classroom setting. The study examines the students' use of the reciprocal teaching strategy and its effects on student engagement and interaction. The study explores the quality of student discussion and involvement with text to assist students with reading comprehension. The author defines the reciprocal teaching strategy (Palincsar & Brown, 1984) and documents the process of instructing the method, including adaptations made to the strategy to better accommodate students. Reciprocal teaching and peer tutoring are similar in their social nature and the author studies the interrelationship between the two, and the ways the strategies complement each other. The study suggests that students have increased opportunity to read, contribute answers, practice verbal and written skills, and that the social interaction provides modeling from peers. The study documents the students' ongoing use and varied levels of proficiency with reciprocal teaching and peer tutoring. Finally, the author questions how to implement reciprocal teaching and peer tutoring into other content areas.

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When I remember back to my own experiences as a third grade student, I clearly recall developing a dislike for any classroom activities dealing with reading comprehension. That dislike did not come from the reading lessons themselves because I was in the top reading group and even at that young age, I felt a certain sense of superiority over the children in the lower reading groups. My dislike for reading comprehension was fostered by an independent reading program that we were required to complete during our free class time. The program consisted of a big box filled with stories and questions on cards arranged according to ability level. I suppose the object was to move each student as far as possible through that big box of stories. What I know for sure is that the task assigned was torture for me. While I hated the stories I dreaded having to look back to the passage and answer the questions. I felt all of this negativity toward reading, and I was a good reader! I was lucky to be able to start farther along in the box than many of the other students. I thought reading comprehension just must be one of those skills that I was better at than other children, even though I disliked it, and I thanked my parents for passing on that gene.

My elementary years passed with the same idea that reading comprehension was some God-given talent with which I fortunately was blessed.

Eventually, regular reading classes stopped at the end of middle school, and then I finally became a regular person capable of comprehending whatever I read. No more reading classes, which were reserved for lower functioning students. Once again, I believed I was lucky to have inherited good comprehension skills.

In my undergraduate teacher education reading courses, I learned about many wonderful children's literature selections, fun ways to complete book reports, and the importance of teaching phonics, but never did I receive guidelines regarding reading comprehension. I was well informed that reading should be modeled and enjoyed by all, but comprehension seemed to be swept under the rug. Maybe that, combined with my belief in the comprehension gene, is where I got the notion that reading comprehension was directly related to IQ. Children were either good comprehenders or they were not. I maintained that belief for several years into my teaching career. I taught the vocabulary words and skills included with each week's reading selection, and after I discussed the selection with the class it was time to assess comprehension by assigning a page of questions to be done by each student independently. I assumed that the students in my class who fared well on comprehension measures were genetically good comprehenders just like me. Lucky them! But what could be done about the others? Another of my operating assumptions at the time was that students didn't really gain anything by working together and that any work I graded that was

done with partners was not a fair way to assess either student, especially the struggling student. Boy, was I wrong on both counts!

It is important to teach children strategies to decode words and to promote reading fluency. Many literary skills such as cause and effect, sequencing, setting, character traits, vocabulary, etc. can be examined in isolation and reinforced in a variety of ways. Comprehension, however, is not a simple skill that can be defined, practiced by students and quickly internalized but rather it is a combination of many individual literary skills and metacognition, which is thinking about one's own thinking. Carter (1997) stated, "Without good metacognitive abilities, readers have little facility to understand what they read simply because, for them, the process of constructing meaning will not take place" (p.66).

I have always placed great importance on comprehension and included comprehension measures in each week's reading lesson, namely several questions related to a particular selection. After each selection was read, discussed, and reread, I assigned the questions. I dreaded correcting these assignments because it seemed that the majority of my students must have left their brains at home on the days they answered these questions. I also dreaded the discussion of the text because only a handful of students consistently participated. Reading was drudgery, and if this was my attitude, how could I possibly expect my students to be any more excited than I was? How could the students be so unmotivated and

the quality of work so poor when I asked all the important questions pertaining to the text?

The reading lesson drudgery prompted the realization that there could not only be a handful of students in my class who could comprehend what they had read. Each child in my class *had* to be able to become a better comprehender. Certainly, some children have an easier time comprehending the material they read, but I could no longer just attribute poor comprehension to the genetic make-up of the child. I *wanted and needed* to find an instructional strategy to make reading important, enjoyable, and successful for all of my students.

The search for that instructional strategy came about several years ago, after I taught a class of students who were extremely diverse academically. I had an identified learning disabled/ADHD student, an ESL student, ten Title 1 students, three students who were going through psychological testing to determine if a learning disability was present, and several very strong readers. Reading instruction was a challenge, to say the least, and I needed a strategy that would work with all students in this diverse bunch. During that same school year, I began my graduate studies and within my first class I was required to identify an area of concern in my classroom, study a strategy from the research literature, and pilot a mini-study to address this concern. The area of concern was clearly easy for me-reading comprehension!

I was using the traditional reading series with which I was quite comfortable, and which I believed all of my students should be working in. However, the new Title 1 teacher fresh out of graduate school was armed with guided reading as the method du jour (Connelly & Clandinin, 1988). She and the IST supervisor wanted me to abandon the reading series and use guided reading exclusively to meet the varied reading levels of the students in my class. This was not an acceptable option for me, as I did not have any idea what guided reading was or how to implement it in my classroom. These two teachers felt this new method was the way to go. With no manual, guidance, or materials of my own, I felt differently; I was offended that the methods, with which I felt comfortable and which had been successful at least for some students in the past, had been deemed "old hat" and useless. Dewey (1938) stated, "The problems are not even recognized, to say nothing of being solved, when it is assumed that it suffices to reject the ideas and practices of the old education and then go to the opposite extreme" (p.22). I did not believe that completely abandoning a known teaching method and implementing a new method, unknown to me, would be beneficial to my students.

I began to feel incompetent and I worried that others viewed my teaching the same way. My principal, knowing how upset I was, assured me that I was still the expert in my classroom and that I did not have to adopt a new method if I was uncomfortable with it. Armed with that reassurance I was able to compromise and integrate guided reading with the reading series. It wasn't easy, but the Title 1

teacher and the resource room teacher worked with me to develop a reading program suited to the diverse needs of my students.

When the assignment to research a teaching method and conduct a mini-study came along mid-school year, I certainly did not want to shake up my classroom any more than it already had been earlier that year. I searched for a method that would help my students become better readers, but I also hoped to find a method that would be easy for me to integrate smoothly into my classroom and complement the reading methods already in use in my classroom.

I knew I could not continue to conduct solely teacher-centered reading lessons if I expected active participation from my academically diverse students. Continuing to teach in this manner would only be adding to many of the students' difficulties with reading. Freire (1970/2000) would identify this type of teaching as the "banking approach," where a teacher simply attempts to deposit knowledge into the minds of the students (p. 72). Of course, only the students working on what I considered appropriate third grade level would be adding to their accounts, but I must admit that letting go of this teaching approach was not easy for me at first.

In my quest for a strategy to improve reading comprehension, I found reciprocal teaching, which appealed to me because, at first glance, it seemed not to stray too far from the teacher-centered reading lesson format with which I felt comfortable. Reciprocal teaching encourages students to monitor their own

thinking through the use of four basic reading skills: question generating, predicting, clarifying, and summarizing (Palincsar & Brown, 1984). How easy! Teachers use those four skills all the time! I ask the questions, clarify any misunderstandings about text, guide the predictions, and require students to write summaries. However, on further inquiry into reciprocal teaching I quickly became aware that "**I**" was the problem. "**I**" could not continue to control the reading lessons, and "**I**" had to relinquish the control to students if they were ever to take charge of their own understanding of text. Reciprocal teaching requires that students actively question text themselves.

Reciprocal teaching is a strategy that uses the activities of question generating, clarifying, predicting, and summarizing within a dialogue between students and teacher that focuses on pertinent features of text (Palincsar &Brown, 1984; Palincsar & Klenk, 1992). It is through using and practicing this set of comprehension monitoring skills that students can become adept at monitoring their own comprehension.

According to Palincsar and Brown (1984), skillful readers detect comprehension breakdowns and adjust their reading to make meaning of text more easily than less skilled readers. Palincsar and Brown selected the four activities of question generating, clarifying, predicting, and summarizing to assist less skilled readers because "they provide a dual function, that of enhancing comprehension and at the same time affording an opportunity for the student to

check whether it is occurring. That is, they can be both *comprehension-fostering* and *comprehension- monitoring activities . . .*" (p. 121).

When questioning text, students are encouraged to ask a question that they think a teacher might ask. Palincsar and Brown (1986) state, "The students become much more involved in the reading activity and in the text when they are posing and answering the questions and not merely responding to teacher or text questions" (p. 772).

When making predictions, students are required to link prior knowledge with the material presently read. Predicting also promotes the use of features in text structure, such as headings that facilitate the students' ideas about what is to come next in text (Palincsar and Brown, 1986, p. 772).

The clarifying step of reciprocal teaching requires that students identify and clear up any misunderstanding of text they may encounter. These misunderstandings could range from an unknown vocabulary word to a difficult concept. Palincsar and Brown (1986) state, "They are taught to be alert to the effects of such impediments on comprehension and to take the necessary measures to restore meaning, e.g., reread, ask for help" (p. 772).

Summarizing text can begin by simply having students summarize short passages and then gradually progress to summarizing entire selections. Palincsar and Brown (1984) suggest instructing students to eliminate trivial details and to construct a topic sentence to help compose a summary.

Palincsar and Brown (1986) believe that students may be able to master individual reading skills in isolation yet still not be successful readers, and they caution that the process of reciprocal teaching is quite different from simply instructing the four skills in isolation. They explain that "The strategies are but a means to an end; they provide the vehicle for teaching students to read for meaning and to monitor their reading to ensure that they are understanding" (p. 776).

Once a teacher has instructed and modeled each of the reciprocal teaching steps, students practice using the steps themselves in small group settings. The teacher then monitors the use of the steps and models further, assisting the students only when needed. This as needed assistance, known as scaffolding, provides a support system that gradually decreases as students become more proficient with their use of reciprocal teaching skills. Palincsar and Brown (1986) feel that the scaffold is an appropriate metaphor for this type of supportive instruction because "a scaffold is a support that is adjustable and temporary" (p. 774). Thus, students require varying levels of scaffolding, and in turn, those students who quickly become proficient with reciprocal teaching skills provide the source of scaffolding to other students.

Keeping students actively involved in reading and discussion can be a battle in itself. During lessons conducted in a teacher-centered whole class directed manner, too many students can conveniently "tune out" the lesson.

Reciprocal teaching promotes social interaction among students, which, in turn, increases participation with the lesson. Palincsar and Brown (1986) state,"The hallmark of this form of instruction is its interactive nature. There is ongoing interplay among the teacher and students as they work toward the goal of understanding the text" (p. 774). Reciprocal teaching requires that students respond at the level where they are capable of responding at any given time, which allows a teacher to monitor progress and provide feedback. Palincsar and Brown (1984) found "through interaction with the supportive teacher and their more knowledgeable peers, the students were led to perform at an increasingly more mature level . . ." (p. 169). Vygotsky (1978) termed this level of capability as the zone of proximal development, which is " the distance between the actual developmental level as determined by independent problem solving and the level of potential development as determined through problem solving under adult guidance or in collaboration with more capable peers" (p. 86).

Palincsar and Brown (1984) reported student gains in reading comprehension on several measures when students incorporated reciprocal teaching strategies into their reading. Transcribed dialogues from a group of seventh grade remedial reading students receiving the reciprocal teaching intervention showed an improvement in questions that focused on the main idea of text and improved summaries. Students in the reciprocal teaching group also achieved to the level of average readers on comprehension measures, whereas

students who received either another comprehension intervention or their regular reading instruction did not show any gains. Three months after the completion of the intervention, students who received reciprocal teaching achieved gains of an average of fifteen months on a standardized test of reading comprehension. Palincsar and Brown noted, "First an improvement was shown in the dialogues and then the independent scores began to improve. Skills practiced in the social context came to be used independently by the students" (p. 156).

Although Palincsar and Brown (1984) used reciprocal teaching with seventh grade remedial reading students with adequate decoding skills, reciprocal teaching has been used successfully with younger students and learning disabled students. Kelly, Moore, and Tuck (1994) examined the efficacy of reciprocal teaching in a study that involved fourth and fifth grade students who possessed low comprehension abilities. After the reciprocal teaching intervention, results revealed that students in two experimental groups showed a gain of more than one age-equivalent year in tested reading comprehension, and that there were no such gains found for a comparison group. Kelly, et al. reported:

> This study has provided further evidence of the effectiveness of the reciprocal teaching program as an instructional procedure for students experiencing difficulty with reading comprehension and has demonstrated the viability of implementing this focused and systematic instructional procedure in the context of a regular class

> program to effect long-term and generalizable improvements in students' comprehension. (p. 59)

Kelly, Moore, and Tuck also pointed out that regular classroom teachers, without special training or resources, conducted the reciprocal teaching intervention in the regular classroom.

Lederer (2000) examined the effectiveness of reciprocal teaching during social studies in inclusive grade four, five, and six classrooms. Lederer hypothesized that the learning-disabled students would benefit from the increased social interaction and more time spent discussing text. Lederer used the regular social studies texts and the regular classroom teachers' plans to teach the lessons to the experimental reciprocal teaching group and the control group. All students in the experimental groups performed significantly better than comparison groups on assessments of question generating and summarizing.

The literature I read supported the use of reciprocal teaching in the regular classroom at various grade levels (Kelly, et al., 1994; Lederer, 2000); it examined its effectiveness with learning-disabled students (Lederer, 2000); and it reported significant gains in reading comprehension even in a social studies classroom (Lederer, 2000). It seemed likely that reciprocal teaching would accommodate the diverse needs of my students.

Pilot Study One

Armed with a strategy that seemed relatively easy to implement into my reading curriculum and that reported comprehension gains in struggling readers (Palincsar & Brown, 1984), I modeled my first mini study after the literature I read concerning reciprocal teaching. I felt confident that reciprocal teaching could be integrated easily with guided reading and the reading series, as well as fulfill the assigned project requirements of the first course in the Master's degree program which I had just begun mid-school year.

When I began reciprocal teaching with my class, I taught the children to ask questions they thought the teacher would ask them about a passage they had read. I listed question words such as *who, what, where, when,* and *why*, among others on the board for the students. I then required students to ask and answer several "teacher questions." The first one or two tries at this produced some questions that were not relevant to the material read, so I needed to guide the students to ask questions that focused on the important details of a selection. Selections from the reading series or leveled readers served as the text.

As the weeks progressed, I introduced and modeled the other strategies of clarifying, predicting, and summarizing in small reading groups, and the students practiced them. Much of the reciprocal teaching occurred under my guidance, but the students also worked independently and in small groups using the questioning/answering, clarifying, and predicting strategies. I was able to monitor

progress in the groups I led, while the other groups used the strategies of questioning and clarifying to guide their reading.

As the students became more proficient with the strategies, I began to use reciprocal teaching in other subject areas in various ways. The questioning/answering strategy was useful in math. Rather than having me ask all of the questions and explain steps to solve math problems, I encouraged the students to do it. Many of the students were eager to ask the math questions once they saw others asking the same kinds of questions I usually ask. Explaining the steps to solving a math problem was a useful activity because another student could fill in the gaps one student left in the explanation.

I used the reciprocal teaching strategies as a review tool in science and social studies to prepare for tests. Small groups of students got together to discuss the lesson, and each student was responsible for a question and answer. Each student asked the class his/her review question and called on another student to answer. During this time, we discussed ways to make questions better and clarify any problems the students had.

As a warm-up to a lesson, I gave the students several minutes to discuss what we learned in previous lessons with their groups and then had the students explain while I listed their ideas on the board. This worked well in explaining phonics, spelling, and grammar rules we learned. The quality of student questions

and answers served as an assessment tool to determine areas that needed further explanation.

Comprehension questions had been difficult for many of my students, especially higher level thinking questions that began with *why* and *how*. Students' questions and answers, as well as my own, provided lots of modeling for all. Since the focus of reciprocal teaching is to ask questions related to the main idea of text, we made a conscious effort to decide if our questions were important to our understanding of what was read. Students learned by seeing and hearing good examples.

I witnessed students assisting others with definitions of unknown words, word pronunciations, spelling, sentence formation, and clarification of other questions. Students became better at discussing their differing viewpoints, and more accepting that there can be more than one answer to many questions.

Reciprocal teaching gave students many opportunities to expand their linguistic abilities. Asking and answering questions, group discussions, and the oral reading of materials stressed spoken language. In a small group setting students had many more chances to speak compared to that in a large group setting. I noticed that the more capable students did not overshadow my poorest readers. I set the pace to give them time to work on their responses. The small group setting also forced students to participate.

Being responsible for questions, answers, and clarification kept students engaged in lessons. Whether working in large groups, small groups, or independently, students had to remain focused to be able to participate and help their peers.

I found that small groups worked best because students had more chances to contribute to the lessons in this setting. Reciprocal teaching gave the more able or extroverted students an outlet to showcase their abilities and the more introverted or struggling students more opportunity to share their ideas or get assistance from their peers in a non-threatening way.

Although verbal responses to comprehension questions improved, many students still needed more work to improve written responses. I focused more on the verbal nature of reciprocal teaching and perhaps should have integrated more writing. The step of summarizing just seemed to disappear. My students were not yet ready to construct summaries either in verbal or written form at the conclusion of the pilot study.

Pilot Study Two

When I continued my study of reciprocal teaching for another graduate class, I felt I had a solid foundation of experience with reciprocal teaching that enabled me to begin gathering data quickly. The two areas that needed further

examination, summarizing and written responses, provided a tighter focus for this second study.

I again taught and modeled the four steps of reciprocal teaching individually, and then the students and I used them together during reading lessons. I used a mix of whole class and small groupings, but I typically used the whole class format for the first reading of a selection.

Lessons seemed to take forever because of the frequent stopping to allow students to ask questions about the text and clarify any misunderstandings. Because so many students wanted to contribute a question, answer, or they needed some clarification, I realized that in the whole group setting lessons would take much longer. Once I felt the students had a solid understanding of the reciprocal teaching steps, small group settings became more time efficient.

More of my students became actively engaged in reading lessons as they helped each other clarify misunderstandings and rephrase both questions and answers. Several rather introverted students, who rarely offered answers during a whole class lesson, participated more often in the small group setting. Perhaps they felt less fear when talking to a small number of classmates.

Some of my students who had difficulty forming grammatically complete sentences, both verbally and in written form, improved with the help of other students clarifying their answers. Struggling students could rely on stronger

students to provide assistance and competent models. There was so much more teaching happening in my classroom besides *my* teaching.

During this second pilot study, I asked for the students' opinions about reciprocal teaching. I also allowed them to choose the type of grouping and the way we would arrange our chairs for the lesson. I wanted the students to have a hand in their own learning. Dewey (1938) states, "There is, I think no point in the philosophy of progressive education which is sounder than its emphasis upon the importance of the participation of the learner in the formation of the purposes which direct his activities in the learning process . . ." (p. 67).

I also administered a survey containing several questions about reciprocal teaching, and I interviewed each of my students individually. On both of these measures, students indicated clarifying and predicting as the preferred steps and small groups as their favored grouping. Most students also responded favorably to providing help and receiving it from other students. Summarizing emerged as the most difficult step, and they reported not liking to write questions. Once again, I did not accomplish much with regard to summarizing. My students struggled to form concise summaries that focused on selection main ideas. Improving summaries would perhaps require more explicit instruction and additional time for the students to practice.

During this pilot study, I made some specific adaptations to reciprocal teaching lessons to suit the needs of my students. I found it necessary to conduct

more lessons to teach and then scaffold the steps of reciprocal teaching than the twenty-day period suggested by Palincsar and Brown (1984).

To improve the transfer of verbal responses to written responses, I required the students to write their questions about the text or to jot down any words that needed clarification. Assigning these written tasks helped to keep the small groups focused.

Varying student groupings provided a change of pace and ensured that students had opportunity to work with different classmates. Alternating among whole group, groups of three, and partner settings allowed for varying degrees of student participation.

The assigning of a group leader or any other roles did not appeal to me. I did not want any of my students to feel uncomfortable in a particular role or to be held back from contributing to a lesson because of a rigid role assignment. I preferred that students participate when they chose to do so.

I liked what occurred in my classroom, and even though the results I saw pleased me, I worried that the adaptations I made invalidated my pilot study. It was not reciprocal teaching conducted precisely according to the research experts.

Regardless of the changes I had made, I desired to study this strategy in more detail as part of my graduate thesis, and as I delved further into research regarding reciprocal teaching for my thesis proposal, I was pleased and relieved to

find research that examined the types and effects of teacher adaptations of reciprocal teaching.

In their three-year study of 17 teachers' adaptations of reciprocal teaching, Hacker and Tenent (2002) found that many teachers increased the amount of time spent on instructing the reciprocal teaching process and spent more time scaffolding student use of the reciprocal teaching skills than is suggested by Palincsar and Brown (1984). Two of the teachers observed by Hacker and Tenent spent two months of whole class instruction of the reciprocal teaching steps, and that overall most teachers maintained high levels of scaffolding over time. In a study of three teachers' adaptations of reciprocal teaching Marks, Pressley, and Coley, et al. (1993) also found that teachers felt the need to spend more time instructing and scaffolding the reciprocal strategies and observed that "Reciprocal teaching had been used over time in these classrooms, much longer than in experimental validation studies" (p. 279). Hashey and Connors (2003) offer this advice based upon their teacher action research study:

> First, give it time. Introduce the strategies one by one, and review each strategy until students can monitor their own thinking and reading. In order for reciprocal teaching to be effective, children must have many opportunities to practice applying the strategies. Be patient-it's worth it. (p. 231)

Reciprocal teaching is primarily a verbal strategy, but the addition of writing is a common adaptation made by teachers and studied by researchers. Hacker and Tenent (2002) found that the addition of writing was the most common activity added to reciprocal teaching, and teachers who did so required students to write their questions, answers, and summaries as a way to guide their comprehension. The written activities also served as an assessment as to how well the students understood what they had read (p. 703). Hashey and Connors (2003) required fourth grade students to write questions, predictions, and summaries in journals. The students also provided reflections and feedback regarding their use of the reciprocal teaching steps in their journals.

Teachers varied the type of student groupings rather than always relying on small group settings in which students performed an assigned role. Hacker and Tenent (2002) found that while some teachers used the small group setting traditional to reciprocal teaching, others combined the traditional small groups with whole class lessons, and still others used reciprocal teaching in whole class settings only. Hashey and Connors (2003) reported, "Some teachers have modified the process for whole-class instruction, using writing activities for practice and feedback" (p. 231). Teachers also varied reciprocal teaching to serve as a prereading or post reading strategy in addition to using it as the guiding activity for the initial reading of text (Marks, et al., 1993).

After learning more about teacher adaptations to reciprocal teaching, I felt relieved that these adaptations had sound reasoning behind them and that they yielded positive results. Marks, et al. (1993) state, "Our observations as researchers and teacher-researchers suggest that the modifications we found deserve study because of their potential for making a theoretically attractive intervention more workable for classroom leaders" (p. 282).

Integrating peer tutoring with reciprocal teaching became an interest to me as I read about teacher adaptations to reciprocal teaching. Marks, et al. (1993) found that three teachers observed throughout their study used other instructional methods such as cooperative learning in combination with reciprocal teaching. Because I observed peer helping among the students during my pilot studies, and I did not assign rigid roles for the students to carry out, I felt that aspects of peer tutoring had already been at work with reciprocal teaching in my classroom.

Peer tutoring involves a pair of same-age students tutoring each other on specific skills. Each student assumes the role of tutor and tutee during each tutoring session. Students are able to learn more in less time by using strategies such as peer tutoring compared to more teacher-centered approaches (Greenwood & Delquadri, 1995).

Peer tutoring provides a learning setting that accommodates students with ADHD or those students who have difficulty maintaining their attention in teacher-centered lessons. DuPaul and Henningson (1993) found that peer tutoring

provides one-on-one instruction that meets the academic level and pace of an individual student with opportunity for more active learning conditions that provide immediate feedback. DuPaul, Ervin, Hook, and McGoey (1998) found that all students involved in a peer tutoring intervention demonstrated increased on-task behaviors while off-task behaviors and fidgeting decreased.

Another benefit of peer tutoring is that it allows for differentiated instruction. A teacher can use the same instructional method for all students while differentiating skill levels (King-Sears & Bradley, 1995). Peer tutoring is a useful method to practice spelling words, vocabulary words, and reading fluency and comprehension (DuPaul & Henningson, 1993; Greenwood & Delquadri, 1995).

Peer tutoring prepares students to be equal contributors to lessons and assist each other regardless of differences in ability. Every student is a participant equally sharing the roles of tutor and tutee. Having the opportunity to take on the role of tutor can boost a student's self-esteem (DuPaul & Henningson, 1993).

Peer tutoring facilitates the interactive nature of reciprocal teaching. Recognizing that social interaction is a key aspect of reciprocal teaching, Palincsar and Brown (1987) paired the strategy with peer tutoring to enhance student independence in use of reciprocal teaching skills to enhance reading comprehension. The study explored and assessed the effects of peer modeling of reciprocal teaching skills. Once peer tutors received training, they modeled and

led the reciprocal teaching groups. Teachers monitored and provided scaffolding as needed. Palincsar and Brown reported gains in reading comprehension of the tutees comparable to those made by students working with a teacher in past studies, attributing success to more student engagement, increased motivation, and a socially supportive context.

The Question

Because of my positive past experiences with reciprocal teaching and my desire to incorporate peer tutoring, the focus of my study for this school year was to report the effects of using the strategies of reciprocal teaching integrated with some aspects of peer tutoring in the third grade classroom. I believed the incorporation of these strategies to be of great importance in helping my students to think metacognitively to monitor their own comprehension across the curriculum. I believed it would also provide a social, interactive learning environment for all students regardless of ability levels.

The question guiding my research became: *What are the observed and reported experiences when using the strategies of reciprocal teaching and peer tutoring in the third grade classroom in reading and other content areas?* Because reciprocal teaching is a strategy designed to develop and enhance reading comprehension skills, this question certainly addressed improving reading comprehension. However, I wanted to focus more on the *experiences* that occurred to enhance participation while using the strategies.

My initial hunches about my study included the following:

- My students will respond more due to the small group setting and increased social interaction.
- My students will feel less apprehension to participate during lessons because of the peer helping aspect of both reciprocal teaching and peer tutoring.
- There will be more teaching and learning occurring in this setting compared to a traditional teacher-centered approach.
- Written and oral responses will improve because of the modeling done by teacher and students and the increased opportunity to respond in small group settings.

My hunches only included the positive goals that I desired to achieve during the course of my study. Of course, I had worries about my study too. My biggest concern was that my students would have difficulty with reciprocal teaching so early in the school year. In the past, I had not begun to use reciprocal teaching until midway through the school year. I hoped the students would be successful in their attempt to begin to utilize the strategy sooner rather than later. I knew that I must be sensitive to the developing attitudes and self-perceptions in my students. I wanted all of my students to have a positive attitude toward reading comprehension regardless of ability level, and I hoped neither feelings of superiority or inferiority would surface. Dewey (1938) believed "Everything

depends upon the quality of experience, which is had. . . . There is an immediate aspect of agreeableness or disagreeableness, and there is its influence upon later experiences" (p. 27). I hoped that early experiences with reciprocal teaching would be agreeable.

I also worried that the data that I collected would be too voluminous, or on the other hand too inadequate to yield any worthy analysis. Therefore, my study began with a positive history, some focused ideas of where it might lead, and the fear of not knowing where our journey would actually take us.

RESEARCH DESIGN AND METHODOLOGY

The public school in which I teach is located in a borough situated on the edge of an urban area. The student population consists of a majority of white students, but the cultural diversity is increasing each year. The students belong to mostly low to middle-income families. The school is Title 1 funded. The nine boys and ten girls in my third grade class receive reading instruction from me with the exception of one student who spends her mornings in the resource room before rejoining our class for science and social studies. One student, a boy, is an English language learner and attends the ESL support class for ninety minutes each day. One other student, a girl, receives reading comprehension support in the resource room daily but speech and language support and occupational therapy once weekly. Four students, three boys and one girl, participate in the Title 1 reading program.

My study began in September after obtaining approval from my building principal (see Appendix A) and the college's Human Subjects Internal Review Board (HSIRB) (see Appendix B), a committee that reviews research plans to ensure the safety and confidentiality of the research participants. Once I made a few minor revisions to one of the surveys I planned to administer to my students, I began to gather data. I used primarily qualitative data-gathering methods as a teacher-researcher and collected my data in the following ways:

Participant Observation

According to Arhar, Holly, and Kasten (2001), "Observation is foundational to all good research" (p. 137). Because I was actively involved in teaching during these observations, I was a participant and not merely an observer. I conducted participant observations at least twice weekly by taking anecdotal notes that included date, time, subject, room arrangement, and most importantly, student commentary. At home, I typed detailed descriptions about the day's observation, paying careful attention to capturing the students' voices.

Field Notes

I maintained a researcher log that contained participant observations of lessons involving reciprocal teaching and peer tutoring. I included my observer reflections inside brackets throughout the observations and after them as well. According to Ely, Vinz, Downing, and Anzul (1997), brackets separate what is observed from the researcher's beliefs and biases. Observer comments are the parts of field logs that contain a researcher's feelings and thoughts (Bogdan & Biklen, 1998). If, later, I recorded my thoughts about an observation in my field log, I labeled them "OC" and dated them. If I heard student comments or noticed significant behaviors related to my study throughout the day, I included them in the researcher log.

I also maintained a record sheet that included dates, subject areas, and type of grouping when using reciprocal teaching or peer tutoring (see Appendix

D). Dewey (1938) stated, "A primary responsibility of educators is that they not only be aware of the general principle of the shaping of actual experience by environing conditions, but that they also recognize in the concrete what surroundings are conducive to having experiences that lead to growth" (p. 40). I wanted to be sure to monitor my use of groupings to ensure variety and to determine which types of groupings worked best.

Class Interviews

To gather student input regarding reciprocal teaching and peer tutoring, I periodically conducted whole-class interviews in which students could volunteer their opinions. Eder and Fingerson (2002) suggest the whole-class interview because of the natural, relaxed classroom setting. Eder and Fingerson state that because the students outnumber the adults, students might more willingly contribute their opinions. I was particularly interested in the students' likes and dislikes and used them to plan future lessons and further guide my study. I felt this input gave my students a feeling that they had a hand in their own learning as well as helping me complete my "homework." Dewey (1938) and Freire (1970/2000) felt that students should have some input into their education.

Student Interviews

I interviewed all the students who participated in the study near the conclusion of the data-gathering phase. Eighteen of the 19 students in my class participated in the study and agreed to be interviewed. One student did not receive

instruction in reciprocal teaching because she receives the majority of her instruction in a special education setting. I interviewed each student privately in a smaller classroom setting. I asked each student the nine questions I proposed (see Appendix E), but I asked additional questions to help students clarify answers or to allow the students to express themselves further as suggested by Seidman (1998). I wrote the students' responses to the interview questions as they answered and later typed each interview followed by my reflections about each one.

Written Student Surveys

I administered a written survey (see Appendix F) and a pictorial attitude scale (see Appendix G) each consisting of six questions near the conclusion of the data collection phase of my study. Some of the written survey questions were similar to the interview questions because I wanted to determine if the students wrote answers consistent with their interview responses. The pictorial attitude scale required the students to respond to six questions by circling one of three cartoon faces to indicate their level of interest regarding aspects of reciprocal teaching (Arhar, et.al, 1997). Later I was able to analyze the survey data to assist in developing the theme statements of my study. The aforementioned data provided me with insight into the thoughts and feelings of my students.

Standardized Reading Comprehension Measure

The Title 1 teacher in my school administered the Developmental Reading Assessment (DRA) to each of my students early in the school year. This assessment indicates the level at which each student is achieving with respect to reading comprehension. She again administered the DRA during January, which provided me with comparison data from the beginning of the school year to mid-year.

Student Work

I gathered written work samples periodically throughout the study. I analyzed the work to monitor progress in using the steps of reciprocal teaching. I closely monitored the weekly reading comprehension question assignments that the students completed in groups, with partners, or independently. I tracked the quality of each student's work across the varied groupings.

Trustworthiness

"*As we design our studies, we want to build in assurances for ourselves and for others that our professional judgments are trustworthy, credible, respectful, and reflective of our values*" (Arhar, et.al, 1997).

I obtained permission from the parents of all of my students to allow their children to participate in my study. In a permission letter, I provided a brief explanation of my study and assured parents of their children's anonymity and the confidentiality of the data I gathered. I also assured the parents that they had the

right to withdraw their children from the study at any time without penalty. I provided contact information if any parent wanted to discuss the study with me.

When I told my students about my study, I assured them that the decision to participate was theirs and their parents' and that I would not be upset if any of them chose not to participate. I read and explained the consent form to the students before I sent it home with each of them (see Appendix C).

I wanted to be certain to report a trustworthy and credible analysis of the data I collected. By triangulating the various forms of data gathered, I could ensure a credible report of my study. I was diligent in my participant observations and their write-ups. I wanted to be sure to capture the students' voices so I could assess how the students actually used reciprocal teaching and peer tutoring strategies. Through class interviews, I was able to gather student input to plan future lessons to accommodate their suggestions. The student attitude scale, written survey, and interview data provided me with insights into my students' thoughts and feelings regarding reciprocal teaching and peer tutoring. I wanted to give my students voice, input, and a feeling of partnership in their learning.

I read the literature concerning reciprocal teaching and peer tutoring and structured my study around it. The experiences of my past pilot studies also provided a framework on which to structure my study.

I gathered data for a period of three months, and throughout the data collection period, I wrote periodic reflective memos to document the problems,

successes, patterns, or themes I was observing. Ely, et al. (1997) state, "We've found that reflective memos lead us to think about how we, as researcher, make sense of the data and what may influence our feelings or beliefs" (p. 30). These memos helped me see in what direction my study was heading. Bogdan and Biklen (1998) suggest writing these memos to summarize patterns that are emerging.

By sharing my data with a researcher support group, I was able to gain other viewpoints and insights into my study. With their help, I was able to implement changes in my study that I may not have thought of because of my closeness to the study. According to MacLean and Mohr (1999), "The group challenges each other's assumptions, proposes alternative interpretations, offers suggestions about research methodology, responds to drafts, and often lends personal as well as professional support" (p. 21).

I used the data I collected in a variety of narrative forms to tell the story of my research study. Although these forms help analyze and report data, Ely, et. al. (1997) state, "Analytic processes should be planned for and put in place as part of the design of the research project" (p. 163). These narrative forms included plays, poems, and pastiches. A Pastiche is an amalgamation of various pieces of data that together provide multiple perspectives "above and beyond the particular parts" (p. 97). Ely, et al. state, "Oftentimes the pastiche invites the reader into

paradoxical stances-seeing two viewpoints simultaneously within the limitations of the layout of a printed text" (p. 97).

THIS YEAR'S STORY

I was set to begin my study early in September of the school year after being granted permission to conduct my study from Moravian College's Human Subjects Internal Review Board and my building principal. My proposed date to begin my study was the first week of school when I had planned to distribute the parent consent letters to my students, and once they were returned, I would begin my data collection the following week. Unfortunately, the approval from Human Subjects did not arrive before school started. Although this was alarming to me at first, I was relieved to devote time so early in the school year to getting acquainted with my students and to contend with the avalanche of work that the beginning of the school year inevitably brings.

Although I did so want to adhere to the timeline I had designed in my proposal, it would have been difficult to begin a new strategy with the students so early in the school year when everything about third grade is new to them, including me. Third grade students need time to adjust to new routines, hard cover textbooks, a later lunchtime, new rules, and more independent work, to name a few adjustments. I needed time to learn each student's name, his or her work habits, and reading levels. The first several weeks of school are the time when the students and I test each other, figuratively for the former and literally for the latter.

This class of third graders demonstrated good work habits and behaviors, and the children seemed to get along well with each other. I was pleased that the class was cooperative since the strategies of reciprocal teaching and peer tutoring require students to work with partners or in groups. I was concerned about introducing the strategies at the beginning of the school year, though. My prior uses of reciprocal teaching did not occur until midway through the school year and by that time, the students have made a lot of progress in reading, and they are much more mature than third graders are in September. I was worried that my "new" third graders might struggle unnecessarily with reciprocal teaching. Would I be asking too much too soon?

While awaiting Human Subjects approval, I conducted the first two weeks of reading lessons in a teacher-directed, whole class manner and I guided the students when answering their comprehension questions about the stories, so they became aware of the process of answering questions in complete sentence form. The students needed time to review reading skills as well as learn my expectations regarding answering reading questions both orally and in written form. Therefore, once again, it was probably worthwhile *not* to have begun formal data collection during the first week of school as I had originally intended.

By the third week of September, I was ready to send home the parent consent letters with each of my students (see Appendix C). I read the letter to the class while the students followed along, stopping every few sentences to explain

the letter in third grade language. As with another letter I sent home for a previous pilot study, I explained to my students that I, too, am a student learning how to become a better teacher and that I was asking their help to do my "homework." I explained that we would be using something called reciprocal teaching to help them learn and that it would simply be a regular part of reading lessons. With a legal pad on my lap, I continued to explain about my taking brief notes during lessons and that my notes would help me make decisions about future lessons. I assured the students that I would never use any of their names and then explained that I had given each of them a different name to use in my reports that only I knew. At this point, I was braced for twenty questions about the pseudonyms, but was quite surprised when the students had no questions about *anything* I had just told them. When I explained about the pseudonyms, I noticed many smiles and one student said, "Cool!" Jason really seemed to like this idea and replied, "I'm getting this signed." I just hoped that the parents would be as enthusiastic as Jason. Now, I just had to await parent response before beginning my study.

The students returned the consent letters within one week's time, and all of the parents granted their permission to have their children participate in my study. Sienna's mother did write a note stating, "No names please!" I wrote her a note to assure her that I would never disclose her daughter's name in any of my reports.

Questioning

By the fourth week of school, I was ready to begin. The story that the class was reading for the week was James Marshall's variation of "Goldilocks and the Three Bears," a story in the reading series. I told the class that reciprocal teaching means we take turns being the teacher, and that the word reciprocal means back and forth, so students get to be the teacher and ask questions. I explained that questioning is the first step of reciprocal teaching and that all of them should be ready to ask a question when we stop reading. I told the students that in first and second grades, they learned to sound out words and read them but that in third grade we focused on being able to *understand* what we read. I assured the students that I was certain that they could read words, but I had to be sure that they understood what was read. If they cannot ask a question or tell about what was just read, then they do not understand. I felt this gave the students an explanation about why we would spend the time asking and answering each other's questions. It gave a reason as to why we should question and discuss text.

I then explained my rules for questioning. Rule number 1: The question must be about the text we just read. Rule number 2: The asker must know the answer to the question he or she has asked. Rule number 3: No yes/no questions because they are too easy. Borrowing from a teacher research article, I introduced "fat" and "skinny" questions (Hashey & Connors, 2003). Skinny questions are easier to answer and usually only take a few words to answer, but thick questions

usually involve explaining something and usually begin with the words 'how' and 'why.' As we started the reading, we stopped page by page to practice questioning. I had the students' desks arranged in pairs, and I decided to keep the students seated because I wanted everyone focused on my teaching of effective questioning strategies.

I constructed the following poem by listing many of the students' exact questions they contributed during the first lesson of questioning with my guiding questions and comments in italics.

Poem: Our First Teacher Questions

Why did she take the shortcut?

It's a good question, but you can't ask it because it's not on this page.

But it's on the next page.

Let's remember to just stick to the page we read.

Why is Goldilocks going to town?

Why did Mom tell her not to take the shortcut?

What kind of person is Goldilocks?

Why did she just eat the small bowl of porridge?

That's an excellent question because to answer that we have to explain about all of the bowls at once. Good job!

Why did the chair break?

Awww! He took my question.

Why didn't she like the big chair?

Why is she yawning?

What was wrong with the big and medium bed?

Why were the bears surprised?

When?

When they got home?

Although I had no particular reading selection in mind to begin reciprocal teaching, "Goldilocks and the Three Bears" proved to be beneficial because the students knew it so well. Their questions came from their memories of the original version as well as from the modern rendition that we read. Although many of the questions certainly did not focus on the story main ideas, the students tried to ask questions, which means they were thinking about the story. Initially, I wanted the students to be actively questioning the text, even if the questions began on a very literal level. We would continue to work on question quality.

This familiarity with the story gave the students early success with the step of questioning. I base my teaching upon the theory that linking new lessons to that which is already familiar to students enables them to incorporate new knowledge more easily. Vygotsky (1978) states, "Any learning a child encounters in school always has a previous history" (p. 84). Since more difficult, unknown text would be forthcoming, I was glad the students had a positive foundation in the step of questioning. I expected the next story to be more challenging.

During this lesson and others that would follow I called out, "Word Alert!" when the students read a word I thought they might need explained. This was the lead-in to the next step of reciprocal teaching I wanted to introduce: clarifying. It made sense to me to introduce clarifying in conjunction with questioning because third grade students read quite a few terms they do not know in a story, but rarely stop to ask what those words mean. In some cases, skipping over an unknown word does not hinder comprehension, but often, the unknown word will cause a comprehension snag.

The teacher's manual typically has a list of words to point out to students, but it rarely encompasses all of the words that students may find confusing. If I stand in front of the class and stop the reading to define each of those words, as usual, some kids are not tuned in to hear the definitions anyway. To those students who know the word meanings, this is simply more tedium for them to endure as I drone on with definitions. I find that third graders are typically unwilling to ask about something that they do not understand whether the student is a good reader or a struggling one. In either case, the child does not want to look foolish. Perhaps children this age have simply become used to the idea that if a teacher did not point out a word, then it must not be important to the story. No matter, I want my students to become more responsible for their own understanding, and I do not always want to be the person to ask what a particular word means because a teacher's manual or even I *think* a child might not know the term. The next day's

lesson would serve two purposes: review the step of questioning, and have the students begin the step of clarifying.

At this beginning point in my study, I already adapted reciprocal teaching to meet the needs of my third graders and me. I concurrently taught questioning and clarifying strategies embedded within our reading lessons rather than teaching each step in isolation in a training-type fashion. I wanted to make reciprocal teaching a natural part of reading lessons so that the students became aware that the way to understand text was by discussing and questioning it. Hashey and Connors (2003) recognized that the four steps of reciprocal teaching are always at work in a random manner when student check their own understanding and suggested using the four steps in any order once each one has been introduced and instructed.

Each week, I ask the students to read the main selection twice. During the first reading, any misunderstandings can be cleared up and an initial discussion occurs. During the second reading, the selection can be read more fluently, discussed more quickly, and hopefully the students have a clearer understanding of it than after the first reading. For the second reading of "Goldilocks and the Three Bears," I wanted to review the step of questioning and work more on clarifying. To begin the lesson I asked the class if they remembered what we had done yesterday during our reading class. I was not surprised when nobody had a response, so I reviewed that the word 'reciprocal' means switching and that they

would get to wear the teacher hat from time to time. Jody giggled when I said this. I then reviewed calling out, "Word alert!" when an unknown word came along and told the class that they should stop and ask for help when they came across a word they did not understand. I explained that when something is not understood, it must be cleared up, and clarifying means clearing up confusion.

We sat in a circle on the floor to reread the story and I told the class that I wanted to see hands in the air when they encountered an unknown word or when something else did not make sense. I also wanted to continue our exploration of questioning again. I did not expect very many hands for clarification. In the past, it took a while for students to warm up to this step because I think most students were reticent to admit that they needed help. Some of the words that the students needed clarified were: *coarse, tuckered, parlor,* and *discover*. That was more than I had expected. I encouraged the other students to provide definitions and if they could not, then I would provide assistance. This introduced the students not only to the scaffolding that I could provide, but also to the scaffolding that their classmates could offer. During the beginning stages of reciprocal teaching, the teacher provides quite a bit of scaffolding with the goal of transferring the task to the students as they become more proficient with the strategy.

For the first week of introducing and using two of the steps of reciprocal teaching, I was pleased with the students' participation, their willingness to ask for help, and the assistance they provided to each other during the discussion. I

hoped that the students would improve on this good start as they moved into the next week.

A Positive Beginning

I chose an informational photo essay about a young rodeo star as our main selection for the second week. I was eager to see how the questioning of a non-fiction selection would compare to that of a fiction selection. I often tell my students that non-fiction texts such as those encountered in science and social studies books are "packed" with facts and pretty much everything we read in them is important. After reminding the class to be ready with teacher questions and any words they did not understand, we got started.

I had the students remain in their seats and conducted the lesson in a teacher-directed way because I wanted to conduct a few lessons together, guided, to lay a firm foundation. As an added bonus, Ms. Y, the reading specialist, led the lesson. This allowed me to interject when I needed, but I really wanted to take a close look at the students and consider their questions and behaviors. Ms. Y's lead allowed me the freedom to become a spectator in my own classroom.

I constructed the following play from the observation notes contained in my field log. It captures a glimpse of the students' early use of the steps of questioning and clarifying while receiving scaffolding from two teachers. The selection we read gave information about how the personal life of a young rodeo star is similar to the average child's life.

Play: Reciprocal Teaching Round Two

ADAM: Whose white horse is that?

KATY: His dad's horse.

TONY: Where is his grandfather's ranch?

KARA: Outside of Phoenix, Arizona.

JANE: Why is he named after his father?

The story does not explain why he is named after his father.

MS. Y: Good inferencing! *(Ms. Y then explains why some people name children after their relatives.)* Who's telling the story?

JAKE: Anthony Reynoso.

TOMMY: What takes a lot of practice?

JANE: Roping.

MRS.MERTZ: (*speaking from her desk*) More important, why does it take a lot of practice?

TONY: It takes years to learn.

(Ms. Y then wants the class to discuss hobbies that take years of practice.)

MARLA: What is a charro?

SIENNA: It's the Mexican word for cowboy.

ADAM: Why did people long ago carve things in rock?

(*This is another inferential question not explained in the selection. It is only indicated where the carvings are located.*)

TOMMY: Maybe because a long time ago they didn't have paper.

JANE: They didn't have crayons.

DARREN: What does Yaqui mean?

KARA: A tribe.

NICK: (*wanting clarification*) What does the word "ceremonies" mean?

(*The class is silent.*)

MRS.MERTZ: Have any of you been to a wedding or a graduation? Those are examples of ceremonies.

JANE: I have lots of ceremonies in Brownies.

SIENNA: Why does Anthony's family get all dressed up?

DARREN: Because they'll take a picture of the whole family.

SANDRA: What do they use to hit the piñata?

MRS.MERTZ: Do you think that is important to understanding the selection?

Sandra shakes her head to indicate no.

JODY: (*wanting clarification*) What does landscape mean?

KATY: Cleans roads.

SANDRA: Makes roads and sidewalks.

MRS. MERTZ: How about our school grounds. They were just landscaped after the building was finished last year. All of the trees and grass that were planted was the landscaping that was done.

BREAK FOR GYM.

The class returns from gym and silently reads that last two pages of the selection to find out what kind of student Anthony is.

ANNETTE: He's a good student.

MRS. MERTZ: How do you know?

ANNETTE: He does his homework and he forgets about the rodeo when he's at school.

MRS.MERTZ: Why does forgetting about the rodeo make him a good student?

SIENNA: It would be distracting to think about the rodeo.

MRS.MERTZ: Good word Sienna! But, what does distracting mean?

SIENNA: It would really be bothering him.

MARK: (*wanting clarification*) What does "exhibition" mean?

MRS.MERTZ: The art show and spring concert are examples of exhibitions.

Students chime in with dance recitals, sports games, and Kara points to her t-shirt that displays the swimming competition she was in.

LESSON ENDS FOR THE DAY. WE BREAK FOR LUNCH.

This questioning of the first reading of a non-fiction selection went quite well, leaving me wondering about the type of reading material used. Were the students so good at coming up with appropriate questions because the selection was full of facts and cause and effect relationships? Palincsar and Brown (1984) used non-fiction text when developing reciprocal teaching, however, fiction selections have since been utilized with reciprocal teaching (Hashey & Connors,

2003; Marks, et al., 1993). Perhaps the students found the selection particularly interesting.

I had a concern about the inferential questions that several students posed during the lesson. Two of the questions could not be answered in the text, and one of my reciprocal teaching rules is that the answer to the question must be in the text we read. These questions led to a lengthy discussion about why children are named for relatives and why ancient peoples carved pictures into rock, but those discussions did not necessarily help the students' understanding of the selection. To follow the questioning rule and to be able to answer the questions, better choices could have been: *Who is Anthony named after? Where are the rock pictures? What are the rock pictures called?*

I wanted my students to question the text in any way they could as a starting point to helping them get involved with text, but as we moved further into the reciprocal teaching strategy, I wanted my students to be able to question the text that was currently in front of them. At this point in the learning process I wanted the students to stick with the rules of forming the question and being able to answer the question by using what had just been read. My response to Sandra's question about the implement used to hit a piñata made me realize that I had to help the students decide which questions helped them understand the story and addressed the main ideas of a selection. I began to ask the students if they felt the questions they asked helped us to understand the story as a way to assist them in

questioning text main ideas. Hashey and Connors (2003) and Marks, et al. (1993) found that students initially had difficulty forming anything but literal questions about text and needed more modeling from a teacher to help focus their questions on text main ideas.

I also wondered if Sandra's question was not an example of a teacher question, but rather a question she genuinely wanted answered. I worried that I dismissed her question as one that did not address a main idea. I needed to be sensitive to this situation in the future and make certain if a student needed clarification or if the student was contributing a story question. After all, if a student is asking what a term means, it could be interpreted as a story question. From this point on, if I was not certain, I asked students whether their question needed an answer or if it was their example of a story question for reciprocal teaching.

Reciprocal Teaching Leaders

I was quite intrigued with Sienna, Jason, Adam, and Darren, all of whom tended to struggle to some degree with reading. Adam and Jason needed a bit of help with comprehension, while Darren and Sienna needed work on their decoding fluency and comprehension. What was intriguing about them is that even with their struggles, these four students became actively involved during our reciprocal teaching lessons. It can often be difficult to get struggling readers engaged in reading lessons. Sienna's vocabulary and explanations that she

provided during lessons were not congruent with her weak decoding skills and poor written responses. Jason was regularly willing to answer questions, even if his answers were not concise and he may not have known when he had answered a question. I expected my more capable readers to be more actively involved with reciprocal teaching and be the models for other students since most reading activities are easier for the stronger readers. At this point, though, the struggling readers modeled quite well for the rest of the class.

I could not be certain, but I wondered if the more capable readers did not find reciprocal teaching interesting because strong readers typically are skilled at questioning and monitoring their own thinking. Perhaps the "new idea" I presented wasn't new to them at all, but rather a well-honed skill they already possessed. I also wondered if the struggling readers finally felt they had a chance to participate without fear of saying something wrong. Nearly any question was acceptable, and if a question needed a bit of rephrasing we worked on it together on the spot. Perhaps some students felt less intimidated by participating in this situation.

Moving on to Prediction and Some Problems

In both of the prior studies I conducted on reciprocal teaching strategies, the step of prediction was the easiest one for the students to use. I have found that predicting is usually a familiar skill for third grade students. Many times, when we read a story, the children make predictions without me asking them to do so.

They seem naturally to want to tell what they think is going to happen next. So, during the reading of the next story I asked the children to make predictions along with asking questions and clarifying words they did not know. I explained that predicting means to tell what you think is going to happen next in a story based on what you have already read and what you already know.

The realistic fiction story, "The Ghost of Annabelle," tells the story of Herbie, a boy chosen by his teacher to deliver get well cards to his classmate Annabelle, who is recuperating from chicken pox. Because Annabelle doesn't want to be seen with marks on her face she hides under her sheet and mistakes Herbie for another boy in the class. Herbie plays along and finds out why Annabelle behaves the way she does toward him.

Adam eagerly told the class his prediction about why a teacher would ask a student to go to another student's house who lives near him. Adam stated, "He has to deliver homework to somebody."

When we turned the page Adam also had another prediction. "The letter "H" on his shirt probably stands for the boy's name. I was very pleased with Adam's participation. He had been an active participant and I regularly observed him using the steps of reciprocal teaching during reading lessons.

My satisfaction with prediction soon became overshadowed by my disappointment with the lack of participation from the class in questioning and clarifying. The students seemed lethargic and the very few questions that they

asked didn't address important ideas about the story, but rather superficial details. Of course, I realized that not every lesson could go smoothly. I hoped the next lesson would be better, and I decided that some writing should be introduced and that the whole class, teacher-led format should be replaced with smaller student groupings. It was time to let the students begin their use of reciprocal teaching strategies with help from me only as necessary.

In my experiences with reciprocal teaching I had found that writing questions, predictions, and words that needed clarification often helped to keep the students focused on the task of reading critically. I learned that the quality of student participation is also generally better when some written work is required. Because I could not always be a part of each group's discussion, I needed a way to help students remain focused.

Incorporating writing was important to me also because each year I have a few students who have difficulty writing their responses to reading comprehension questions even though they can answer those questions well orally. The verbal nature of reciprocal teaching is a positive aspect for those students who struggle to write answers. They can be successful contributors during discussions. It is the transfer of the good verbal responses to paper that can be a problem for some students. This year Brittany and Sienna were prime examples of students who contributed easily to the discussion, but often did poorly on written tasks related to the stories read. I hoped that the other students

with whom these girls worked would be peer tutors and model good written responses for them.

Why are we stuck on *Why*?

When we reread the story the next day, I instructed the class to write one question about the story on the back of their reading worksheet. Many of the questions the students posed both during the discussion and on the paper did not pertain to the story's main ideas and actually could not even be answered in the text of the story. It became clear to me that those "inferential" questions that the students asked of the last selection really were not inferential at all. Since I emphasized the "fat" questions that ask *why* and *how*, students began simply to turn all questions into *why* questions. They just did what I had told them to do, but now their propensity simply to ask *why* without thinking about the reading selection was posing a new problem.

Although I told the students to try to determine if the question that was asked was important to the story, this group of students seemed determined to jump right to the fat questions. I suppose that is because I told them from the start that *why* and *how* questions make better choices. It seemed the students' goal was asking as many *why* questions as possible, even though some of those questions couldn't be answered and the main ideas of the text hadn't been addressed. I should have introduced the great idea of thick and thin questions (Hashey & Connors, 2003) to my students *after* they had some success getting to the main

ideas of text. I always needed to bear in mind that much of the reciprocal teaching literature I read pertained to older students using the strategy and that I should expect that my younger students might need more time and assistance to apply reciprocal teaching skills to their reading selection in meaningful ways.

Grouping

I found that by the third story for which we used reciprocal teaching, the students were ready to work in small groups. In the whole class teacher-directed setting, too many students became inactive, and the same few students continued to volunteer. I did not want to be the center of attention anyway because teachers do the lion's share of talking in the classroom, and then we are often appalled at the students' lack of discourse skills. Delpit (2002) states, "First of all, students rarely get to talk in classrooms. The percentage of talk by the teacher far outweighs that by all the students put together" (p. 40).

It was during this third week and from thereafter that I either paired the students or put them in groups of three depending on how many students were present. I was careful to group the students so that any struggling readers had a more capable reader as one of their partners. I asked the students to stop after reading each page to ask questions and to discuss any terms that needed clarification.

I also allowed the students to answer the story comprehension questions together. Each story has five or six questions requiring written responses.

Ultimately, I hoped to have all students making satisfactory progress on these written assignments by midyear, but at the beginning of the school year, many students had difficulty with these assignments. In small group or paired settings, students provided excellent role models for each other. In the past, I questioned the fairness of group work, believing that the struggling student was not learning, but simply getting answers given to him without contributing anything to the other students. I planned to allow students to work together on the written responses for several stories and then I would require that the students complete one independently. This enabled me to see if the struggling students made progress from getting assistance from their peers. Vygotsky states, "What children can do with the assistance of others might be in some sense even more indicative of their mental development than what they can do alone" (p. 85)

I again strayed from assigning roles to the students as is suggested by Palincsar and Brown (1984), wanting the students to have an easy give and take during the discussion of a selection, contributing whenever they had something to offer. I was afraid that some students would dislike performing a particular task and find it limiting, or even stressful if they did not like a particular role. It was also possible that some students would dominate a discussion if given the opportunity to be the leader of a group. The nature of peer tutoring allows for students of varying abilities to work together, giving and receiving help from each other when needed (DuPaul, et al., 1998). Of course, many times a strong reader

would emerge as the group leader and there were times when some students tended to defer to the more capable student, but with practice of the reciprocal teaching steps and discourse skills, more students participated more often as the weeks progressed.

Each week I regrouped the students in anticipation that the different groupings would allow for more student-to-student learning as well as eliminate conflicts among students who do not get along well or get tired of working with the same classmates repeatedly (Greenwood & Delquadri, 1995). I maintained the same grouping for each week's story to provide continuity. Most weeks I grouped the students in triads, but because of absentees there sometimes had to be one or more pairs. I also had to be careful to place the four Title 1 remedial reading students in triads since they had to leave the room for a portion of reading time twice a week, and I did not want any other student left without a partner. I recorded the type of grouping I used on the lesson record sheet kept in my field log.

If I felt that a story was particularly difficult, I would conduct either the first reading or the reread in a whole-class setting. This occurred only twice because the number of students who participated decreased, and I noticed off-task behaviors increase. It became clear, early into the use of reciprocal teaching, that whole class teacher-directed reading lessons yielded less student participation and more off-task behaviors. When many words needed clarification or if I

determined that the students did not understand main ideas of a story through my visits with each group, I then gathered the class together for a quick discussion, allowing the students to talk about the story as I carefully guided them to the main points. In this way, the students maintained control of the discussion, while I kept my scaffolding to a minimum. My role in reciprocal teaching, after all, was to provide assistance *when needed.* At times, I had difficulty stopping myself from explaining things to groups of students, and I needed to take a step back and guide the students to their own understanding through involvement with the text and one another. When students become more skilled at applying reciprocal teaching steps, the teacher should reduce her instructional role and become more of a coach when providing correction and feedback (Kelly, et al., 1994).

Of course, not all groups of students worked well together. I expected this and spent much time smoothing over the bumps in the road that occurred between students. The group dynamics and the emerging proficiency with reciprocal teaching skills combined to make a frustrating situation at first. Sometimes groups used the skills well, but did not get along with each other, or some groups worked together beautifully, but did not use the reciprocal teaching skills well. The minute details of getting situated in a spot in the room, determining who would read and in what order, and respectfully listening to each other's questions and answers took up a great deal of time initially. Although these same situations happened in my two pilot studies, I still became frustrated with the slow pace at

which the students progressed and concerned that reciprocal teaching might not work with this class.

I composed the following poem to describe some of the typical behaviors that initially slowed the progress of group work and frustrated me, but gradually decreased as the students became accustomed to working together.

Poem: Working in a Group (Some Less Than Perfect Examples)

Sienna is rolling on the floor

As Sandra pouts because she wants to read more.

Arms folded across Sienna's chest

Must mean something's wrong with her group I guess.

Mark and Jason can't determine a reading order

Jake makes a face when I give him a partner.

Jason, Al and Mark have gotten off-task

While Nick asks a question he *shouldn't need* to ask.

Sandra twirls her pencil in the air

As Marla is rocking on her chair

Tommy's wiggling in his seat to the beat of Al's stomping feet.

Now Tony's coming to complain about his group AGAIN

And I begin to wonder IF and WHEN

We'll ever learn to work with one another!

I think the inability to get along well with each other frustrated me because I saw the behaviors as a barrier to working well with reciprocal teaching skills. Frequently correcting behavior took a lot of time that I just did not seem to have during the day. Reading lessons seemed to take an eternity, and I worried about falling behind, which made me wonder if this time of the year was an appropriate time to begin such an effort with "new" third graders. I had to keep reminding myself that my younger students obviously needed more time to become adept with the skills, as they had in prior studies in which I used reciprocal teaching. I also reminded myself that I had read literature regarding reciprocal teaching and younger students, which validated my use of the strategy with my third graders (Coley, DePinto, Craig, & Gardner, 1993; Hashey & Connors, 2003; Kelly et al., 1994).

As I found myself scaffolding and modeling the ways the students should be behaving and treating each other, I realized that these issues were not secondary to reciprocal teaching, but rather an aspect of it that requires instruction. The students needed to learn the ways to behave with others and cooperate so that reciprocal teaching could actually take place. I knew this would take time and patience. Some groups worked well and accomplished their assignments quickly, while other groups took quite a bit more time because of disagreements that had to be smoothed over either among the members of the group, or if necessary, by me.

The students' comfort with reciprocal teaching and their ease in using the steps became more evident each week. I noticed that students would help other students rephrase questions, pronounce words, and provide word definitions. It seemed that student scaffolding amounted to mostly pronouncing and defining words for each other, while my scaffolding helped students better understand the meaning of the text.

Jason, Darren, Sienna, and Adam continued to use the reciprocal teaching steps and they each offered and accepted help within their small groups. Adam would raise his hand or actually come to me to ask for help. He was becoming aware of his own understanding of text and took steps to correct breakdowns when he detected them. Darren often reminded me of a parrot as he imitated me when he was contributing ideas to his group. "From the point of view of development, creating an imaginary situation can be regarded as a means of developing abstract thought" (Vygotsky, 1978, p. 103). Jason was more reluctant to take the help from others, instead hoping he could figure things out himself, but he eventually worked with his group. Sienna was a bit more challenging for her group and me. Sienna often did not get along well with several girls in the class, so I had to group carefully. She also varied from little participation to dominating the group discussion.

Al, an ESL student who moved from Puerto Rico only a year ago, benefited from the peer tutoring during reciprocal teaching lessons. I found that

Al was more active and even tended to show more of what he knew when he worked with other students in a small group. He had more chances to read aloud, received help with word pronunciations, and had a partner or two to help him write his answers to comprehension questions. Al also tended to lose focus during whole-class lessons and at times demonstrated some behaviors that annoyed me and the other children. The small group setting provided Al with good models, more practice reading and speaking English, and the opportunity to be more active while learning.

Initially, several of my struggling readers surprised me with their participation in reciprocal teaching lessons, while my stronger readers concerned me with what seemed their lack of interest in reciprocal teaching. Fortunately, several strong students became excellent models and strong group helpers. Kara, Sandra, Nick, and Mark worked well with pretty much anybody with whom I grouped them. They could keep a group focused and provided great models for the written tasks. Sandra blossomed when I paired her with Al. She took on the role of teacher and patiently assisted Al with reading and written responses.

Both strong readers and struggling readers worked well in small group settings with reciprocal teaching. Most of the other students in my class fit into groups nicely and worked well with each other with the exception of three: Jody, Katy, and Jake. Jody and Katy just did not work to potential. Both girls read on a third grade level and did well in other subject areas. Jody and Katy could not

seem to get focused during the small group lessons, and I often had to remind them to get and stay involved with group discussions. Jake, on the other hand, could have definitely benefited from the peer help. He did not want to work with certain other people and became uncooperative when he was in a group he did not like. Even in a group he liked, Jake often spent most of his time asking silly questions or sliding on the floor. I had to find out what these three students seemed to dislike about reading, discussing, and employing reciprocal teaching strategies and determine what I could do to support them.

Problems

At this point in my study, I had two problems. I needed to guide the students away from asking questions merely because they began with *why*. I also had to find a way to help Jody, Katy, and Jake to use the reciprocal teaching steps better and more often. During this week, we read a fun animal fantasy story, "Anansi and the Moss-Covered Rock," that tells of a clever spider who tricks other animals into saying magic words so they will be knocked senseless. While unconscious, Anansi the spider steals the other animals' food. After the students read the story for the first time, I asked each student to write a question about the story, but it could not begin with the word *why*. I explained that *why* questions are good questions, but sometimes we really could not answer them by using what we just read. It is fine to ask other questions, and in fact, many times it is better for our understanding. Providing a list of question words or question stems has been

found to assist students in forming better questions related to text (Hacker & Tenent, 2002; Hashey & Connors, 2003). I listed various question words on the board for the students, and I modeled aloud questions that began with words other than *why* and *how*.

I was worried that the questions would be quite literal with the restriction I made, but I was pleased that many of the questions started with the words *what happened when.* This story contained a lot of repetition, and sequence was an important aspect as well. Asking *what happens when* requires some explanation of the sequence of events in the story. I knew then that the students had an understanding of how to pose other question types, which was a relief. I did not have to go back to the beginning and teach question types. With some more scaffolding and assurance that other question types would be just as good as *why* questions, we continued to hone our use of reciprocal teaching skills.

As the students reread the story the following day I reminded them to try to ask questions that began with a word other than *why.* As I circulated among the groups, I carefully monitored the questions the students asked. I stopped to observe Tony and Al since Tony had been overusing *why,* and Al continued to struggle with his use of English. The following dialogue is an excerpt from this lesson's observation. It demonstrates the way I attempted to scaffold the boys' questioning of the story, "Anansi and the Moss-Covered Rock," and tried to focus them on other question types.

TONY: Why is the deer watching them?

MRS. MERTZ: Can we answer that?

TONY: No.

MRS. MERTZ: How about a WHO question?

TONY: Who is watching the animals?

AL: Little Bush Deer. This is a very funny story!

MRS. MERTZ: I'm glad you like it.

TONY: Why is Elephant sad?

AL: His food is gone.

MRS. MERTZ: How about a HOW question about feelings?

TONY: How does Elephant feel?

TEACHER: Good. It's important to know how he feels and then why he feels that way.

TONY: Who are the four animals he tricks next?

AL: Rhino, Hippopotamus…

MRS. MERTZ: (pronouncing) Giraffe.

AL: and Zebra.

The students told me that they really enjoyed this animal fantasy story and I was certainly pleased with the workings of each group. Even Jake, Katy, and Jody seemed to participate more. A lesson a few weeks ago was like pulling teeth, and both the behavior of the students and the questions they asked had left a lot to

be desired. I thought that this fun, entertaining selection had to be the cause for the great difference, but I thought I would try what MacLean and Mohr (1999) suggest and ask the students why this lesson was such a triumph and the previous one a disaster.

I told the class how pleased I was with this week's group work, and I asked them what they felt made the difference in questioning and participation between the story "Anansi and the Moss-Covered Rock" and the story "The Ghost of Annabelle." I expected most of the following responses, but I did not expect Jake's answer.

ANNETTE: It wasn't fun.

MARLA: It wasn't interesting.

ADAM: It was a little long.

TONY: I didn't have my mind on it.

JANE: I was in la-la land.

JANE: I didn't like the illustrations.

KARA: We found this story more interesting.

JAKE: Maybe we know more about asking the questions.

Jake's comment was quite different from the others and offered some support to the notion that the positive differences in group behavior could also be attributed to the progress with reciprocal teaching skills the students made over the past few weeks. When I asked Jake to clarify, he told me that maybe we are

getting better at asking questions about what we read. I was impressed that Jake seemed aware of his own learning and began to wonder if his seeming lack of interest in reciprocal teaching was really a reflection of his early struggle to learn to use the steps. Jake's behavior during reciprocal teaching lessons had frustrated me, but his comment also made me realize that often times students lose focus and display off-task behaviors when something is too difficult for them.

I suppose I expected the other students' responses that indicated liking the selection "Anansi and the Moss-Covered Rock" better than the selection "The Ghost of Annabelle" because I observed the students' enthusiasm and enjoyment of the humor in the former story and their lack of enthusiasm with the latter story. I knew that in the future I should utilize selections that I know students have enjoyed in the past when introducing the reciprocal teaching strategy. Animal fantasy stories are a familiar, well-liked genre for most third grade students; therefore starting with what is known and liked may provide a positive beginning and pave the way to using reciprocal teaching skills well with other genres.

By simply asking for my students' input, I gained some valuable insight into a problem. Freire (1970/2000) states, "The students-no longer docile listeners-are now critical co-investigators in dialogue with the teacher. The teacher presents the material to the students for their consideration, and re-considers her earlier considerations as the students express their own" (p. 81).

I then told the students that not everything that we read will be as enjoyable as what we just read, and unfortunately, we cannot always read what we choose. I then related my experiences as a student to my students for the first time. I told them that not everything I have to read for my class is enjoyable, but it is still important that I read to understand so that I learn. I hope that this helps the students understand that there probably will times when they are required to read text that is not as interesting or enjoyable. Dewey (1938) would agree and states, "The mature person, to put it in moral terms, has no right to withhold from the young on given occasions whatever capacity for sympathetic understanding his own experiences has given him" (p. 38). By relating my experiences and struggles as a learner, I hoped that my students realized that learning can be difficult for everybody at times. I had to remind myself continually to recognize when students struggled, and to be sensitive to their feelings.

As the weeks progressed, the routine for reading lessons remained the same. For both the first and second readings of a selection, I grouped the students in pairs or triads, instructed them to stop after each page they read to ask questions and clarify if necessary, and I circulated among the groups to scaffold as needed. During earlier lessons my scaffolding amounted to correcting behaviors and as the behaviors improved my scaffolding shifted to its actual purpose of assisting the students' use of reciprocal teaching skills to improve their understanding of text.

As the students became better at working together in groups, I found that I could spend time scaffolding by helping students rephrase questions and focus those questions on the text that had just been read. Since behavior wasn't as much a concern, I could visit with each group during each lesson for longer periods of time. When I noticed a breakdown in comprehension or difficulty with a particular term among several of the groups, I then briefly scaffolded or clarified for all of the students and then allowed them to get back to work. By carefully monitoring groups I provided assistance when I detected a problem, or the students asked when they detected their own problems. A teacher's manual did not dictate what I should be explaining or what the students should or should not know.

The students helped each other rephrase questions, but their assistance to each other consisted mainly of clarifying word meanings or pronouncing words for each other. The simple act of pronouncing words for each other saved time and helped to keep the reading moving. I encouraged the students to allow a group member to sound out words, but to give help if the sounding out did not work. I often found that once a word was properly pronounced, the student knew what the word meant. In the small group or partner setting, struggling over a word while reading aloud became much less intimidating for the student. Stopping to sound it out it did not slow the lesson for the entire class, and allowing students to

pronounce for each other made it seem as though I had several assistant teachers helping me.

The following pastiche illustrates the students providing assistance to each other. This pastiche is a collection of the students' actual words that I recorded throughout my study.

Pastiche: Student Scaffolding

I drew a lowercase 'b' and 'd' for Brittany because she needed help.

Tony helped me with *Chicago.*

I think we need to clarify.

If we don't know the word, write it down.

I helped Adam say the word yogurt and he helped me with containers.

Let's not ask all WHAT questions.

That's not an important question.

Oh! *Interrupted!*

There can be 40-50 tornadoes a week during tornado season. Wow!

Mrs. Mertz! I helping him and he helps me!

When students worked in small groups or pairs there was little chance for a student to become inattentive. Reciprocal teaching required that the students read aloud more often and participate by asking questions and discussing what is read. Active students could move more; verbal students had the opportunity to

talk more often; and introverted students could participate without the fear of speaking in front of the whole class. If a student chose not to work cooperatively with a group, I would be called upon to provide some motivation to that unwilling student. Everybody had a responsibility for the work that had to be done.

In the small group setting students got more practice reading aloud; they had more opportunities to answer questions than in a whole-group setting; and they honed their discussion skills. Most importantly, the students had a purpose for reading. They had to be responsible for questioning the text and providing answers to their classmates' questions. Reading instruction was not *happening to them, but rather the students made learning in reading happen.* Freire (1970/2000) would term this liberating education as opposed to the banking approach as it "consists in acts of cognition, not transferals of information" (p. 79).

By the end of the first marking quarter I believed that I had begun to see the students truly reading for understanding and not simply being "word callers," students who can read fluently but who do not comprehend the text. I told my students many times that in third grade it is mindless reading if they cannot tell me anything about what they have just read. Palincsar and Brown (1986) believe that "students very likely believe that the purpose of reading is saying the words correctly; they may not be particularly uncomfortable with the fact that the words and, in fact, the passage are not making much sense" (p. 772).

I constructed the following play from comments the students and I made during the second reading of a fun science fiction selection, "Guys from Space," a story about a boy who takes a trip to an alien planet after being invited by the aliens who land in his backyard.

Play: Teacher and Students Working In Harmony

(Reciprocal Teaching Working Well)

SCENE: *Students are seated around the room in triads ready to read a science fiction story for the first time.*

TEACHER: Make sure you stop after reading two pages to ask questions and if you need any words clarified make sure you stop to discuss them with your group or with me if you need to.

ADAM, MARLA, DARREN: *(approaching teacher)* Can we get paper to write down the words we don't know?

TEACHER: That's a great idea! *(Teacher smiles proudly-her students are using the step of clarifying so well independently)*

Teacher begins to circulate among the student groups.

DARREN: What do the aliens say when…what do the aliens say when…

KARA: When they get out of the spaceship?

TEACHER: Good, Kara. Now put what Kara said together with your question's beginning Darren.

DARREN: What did the aliens say when they got out of the spaceship?

Teacher moves to another group.

ADAM: Who did Moe call?

TONY: The FBI.

JANE: The FBI called the Pentagon.

TEACHER: Now that we know Moe called all those people, what could we ask?

Teacher repeats her question and after allowing for some think time, Adam asks the question.

ADAM: Why did Moe call the FBI and the armed forces?

Teacher observes as Jane pronounces the word "interrupted" for Adam, and Adam pronounces "panicked" for Tommy. Teacher moves on to another group.

(*Nick is writing the word interrupted on his group's clarifying list as the teacher approaches.*)

TEACHER: Why don't you chunk that word and sound it out.

NICK and KATY: Oh! Interrupted!

MARK: Mrs. Mertz, we're on page 28. I have a prediction. I think the aliens will get shot.

ANNETTE: I think the box will protect the aliens from being shot.

More groups are now ready for their predictions.

JANE: I think there is a bomb in the box and it will blow up everything.

JODY: I think the box will have a nice present in it.

TEACHER: What do all of the characters think is in the box now?

JODY: A bomb.

NICK: The aliens are going to get shot.

KATY: I think Shirley will stop the people from shooting them.

TEACHER: Good predictions. Now read the rest of the story to find out if your predictions are right. Then talk about the parts of the story you think are the funniest.

READING LESSON ENDS FOR THE DAY AND THE STUDENTS DEPART FOR MUSIC CLASS.

This play reflects the students' use of reciprocal teaching skills about two months into the school year. The students took the initiative to get a sheet of paper on which to record words that needed clarification, which demonstrates taking responsibility for their own learning. As students read this story, I observed many instances of children laughing, as they should have, as this was a silly science fiction story. This indicated their understanding of what they read. If the students did not understand what they had read they would not be able to see the humor in the story.

I decided that I needed to ask for the students' input once again, so I conducted a class interview near the end of the first marking quarter. I wanted to know the students' likes and dislikes regarding reciprocal teaching (see Figure 1). I told the students that I wanted them to be honest and not to be afraid to tell me about things that they do not like. I told them that their ideas helped me make

reciprocal teaching better for all of us. Not all of the students contributed opinions, and several students repeated the same likes and dislikes. I recorded the students' opinions on a sheet of chart paper and displayed it on an easel so all the students could see it. Figure 1 lists the students' opinions.

Figure 1. *Class Interview Responses*

Reciprocal Teaching Likes	Reciprocal Teaching Dislikes
• The questions after every page helps me. • Clarifying words, then I get to know the meanings. • I like it all because it's fun and gets you better at writing. • I like the question sheets with a buddy. • I like asking questions because then when we reread the story to answer questions it is easier. • I like it when we sit with partners to get help.	• I don't like reading the story over and over. It can get boring. • I don't like stopping at every page to ask questions. • I wish we could read the story three times before questions. • I'd rather have whole group.

The students' likes indicated that they found the reciprocal teaching steps of questioning and clarifying helpful to them, and that working with others was helpful too, especially when responding in written form on the question sheets.

One capable reader, Kara, indicated that she found rereading a story boring, while a struggling reader, Sienna, indicated that she felt three readings would be better for her. I kept the happy medium of two readings. Jody preferred whole-class lessons, and Sandra felt that stopping after every page was too much

stopping. To accommodate these two students, I told them that we would sometimes conduct whole-class lessons and that we could try stopping after every two pages for questioning, especially if the pages did not contain much text. It would depend upon how much text a page contained and we would have to determine how often we would stop after previewing the story. I was pleased that the students' dislikes did not indicate a dislike for the reciprocal teaching strategy, but rather a dislike of some of the logistics of using the strategy for which I could make accommodations.

Although lessons that utilized reciprocal teaching initially took more time to conduct than traditional teacher-led lessons and some frustrating situations occurred from time to time, I began to notice some positive outcomes of using reciprocal teaching with my students. In the following reflective memo, I recorded the positive outcomes I began to see and included it in my field log.

> *Lessons involving reciprocal teaching initially do take more time than the traditional teacher-centered approach, but I believe the extra time and effort are worth the results. Although the quality of the students' teacher questions aren't always hitting on the main ideas of what they have read, it is requiring that the partners or members of a small group be more attentive, responsible, and involved.*
>
> *Since third grade is a year of transitioning from reading primarily as decoding and fluency to reading critically for understanding, I believe*

that students MUST read more independently if they are ever to truly become life-long readers. Surely, I must continue to teach reading skills and scaffold as needed, but if I always lead the lesson in a whole-class setting then the transfer of skills and reading independently will never occur.

Because traditional teaching usually allows the teacher to do the majority of the talking, students can't learn to work well with others or have a good discussion and learn from one another. Students must be allowed to work together and talk so they can learn to work cooperatively with others. I often tell my students that employers want to hire people who can work well together. This is why I vary the grouping each week. I want to ensure that all students work with each member of my class.

When students get off task, I relate my experiences as a learner to their situations. I have told them that Mrs. S, Miss L, and I work in groups at our class and sometimes get off task, talk too much, and then our teacher may even have to tell us to get back to work. I hope this adds to the feeling that my students are co-researchers and not experimental subjects. 10/27/05

At times, I questioned the value of taking the time and energy to use reciprocal teaching with my students, and I even second-guessed myself with regard to allowing students to work together and assist each other, especially with

written responses. Since I graded the story comprehension question page each week, my belief that a struggling student was not progressing with help from another student resurfaced occasionally.

When I had doubts about reciprocal teaching I looked to my colleagues for support, in particular, Ms. Y, the reading specialist with whom I worked. Near the end of the data collecting phase of my study, I asked her what she thought about the partner and triad grouping and student discussion of the stories. She told me that she really liked what I was doing. She told me that she always appreciated the discussion of the texts she read for her graduate classes, and she felt that elementary school-aged students should benefit from discussion as well.

Written Responses Still Need Work

The students' questions and discussions became more focused on the main points of the stories each week, which I believed showed an increase in student comprehension. The quality of student questions, group discussion and interaction, and the scores on the weekly multiple choice reading selection tests showed understanding of what the students had read each week. However, written responses still showed room for improvement.

Each week I assigned a question page that contained either five or six questions about the week's reading selection to which the students responded in written form. At the beginning of the school year, I modeled answering the questions with help from the students in a whole-group setting. Once we started

reciprocal teaching, I allowed the students to answer these questions in their groups. These assignments came easily to some students, and those students served as the peer tutors for students who struggled to respond successfully in written form.

Initially, many students had difficulty with the questions because they did not have strong comprehension skills, but as they became more proficient at questioning, clarifying, and discussing the text, their oral comprehension improved. Several years ago, the speech and language therapist in my school told me that correct oral responses had to precede correct written responses. Vygotsky (1978) stated, "Understanding of written language is first effected through spoken language, but gradually this path is curtailed and spoken language disappears as the intermediate link" (p. 116). I kept this in mind, viewed the improved oral responses to comprehension as a success, and continued to hope that the successful transfer of those answers to paper would occur.

Near the end of the data-gathering phase of my study, I stopped allowing the students to work together when writing the answers to the story questions so that I might determine if the students improved in transferring their oral responses to written responses. I did allow the students to use the story question worksheet as a guide for the rereading of the reading selection each week so when the answer to one of the questions came about in the story, the group could stop to discuss the answer.

Jason, Darren, and Adam showed improvement in their written responses. These students responded in complete sentences, and Jason's earlier rambling responses became more concise. Brittany contributed to group discussions and even received extra comprehension assistance in the resource room setting, but she still failed to answer successfully the comprehension questions nearly every week.

Sienna caused the biggest frustration for me. She made quite a bit of progress in using reciprocal teaching skills and she questioned the text, contributed to the group discussions cooperatively, and she even pointed out when the answers to the comprehension questions occurred in the story. However, when required to answer in written form, she met with little success. On several occasions, I asked her to tell me the answers aloud and she successfully answered each one, but she did not transfer those correct answers to the page. Sienna struggles with handwriting, and although her responses are correct orally, I must help Sienna to improve her written skills to ensure future school success.

Because Sienna demonstrates good reading comprehension orally, I could assess her oral answers to selection questions and then allow her to work with a peer tutor to transfer her answers to written form. The resource room teacher with whom I work suggested that I encourage my students to form a response orally and keep repeating it to themselves while writing it. I also will need to provide

Sienna with practice to improve her handwriting. Poor handwriting slows work speed, and that can be frustrating to a student.

Interviews and Surveys

During the week of Thanksgiving, I administered a written survey (see Appendix F) that contained six questions about reciprocal teaching and peer tutoring and a six-item pictorial attitude scale on which students circled a response that described their attitudes about aspects of reciprocal teaching (see Appendix G). The students responded to the written survey and the attitude scale during reading class on separate days. I asked the students to be honest with their answers because their ideas would help me continue to make reciprocal teaching better for all of us. The written survey required that the students provide reasons why they chose a favorite and least favorite reciprocal teaching step and type of grouping.

Results of the attitude scale showed that a majority of the students liked working in small groups and enjoyed giving help to other classmates and receiving help from others. A majority of the students also indicated a dislike of whole-class reading lessons. I found several students' responses interesting because they supported my earlier hunches about these students, but their responses also supported their own ideas from prior class interviews. Only one student, Jody, indicated that she did not like working in small groups as she had told me earlier in my study. Sandra responded that she did not think that the

reciprocal teaching steps helped her understand what she read. Sandra initially did not seem to enjoy reciprocal teaching until she started to help others. I believe that Sandra already possesses the skills to make her a capable reader. Jason circled that he did not like getting help from others, a behavior that I noticed throughout my study. He would have rather solved all of his own problems, but he ultimately did take the help from others when necessary. Al indicated that he did not like using the steps of reciprocal teaching, although the partner and group work certainly helped him work on his reading skills as well as his acquisition of the English language. Table 1 displays the results of the pictorial attitude scale.

Table 1

Student Attitude Scale

Question	No way	O.K.	Great
I like using the steps of reciprocal teaching.	1	9	8
Reciprocal teaching helps me understand what I read.	1	9	8
I like working in small groups.	1	1	16
I like working in a big group with the whole class.	0	6	12
I like helping classmates when we use reciprocal teaching.	1	5	12
I like being helped by classmates when we use reciprocal teaching.	3	3	12

Seventeen students completed the written survey. Al did not complete the written survey because his written English proficiency would have prevented him

from answering the questions and I did not want to influence his answers by having him dictate his answers to me.

All the students indicated a like of the strategy on the written survey. A majority of students once again indicated liking to work with other students. Thirteen of the seventeen students felt that they would remember and use the steps of reciprocal teaching next year, which particularly pleased me because I want these skills to help my students across the curriculum and in the future. I hope that my students do not think this is just a third grade activity.

When asked for a favorite or least favorite step of reciprocal teaching, several students had no favorite, and explained that none of them stood out as particularly good or bad. None of the steps stood out as an overwhelming favorite; however questioning did stand out as the most difficult or least favorite step. At first, this surprised me, but on further analysis into the reasons the students listed for choosing questioning it became clear that the students felt that it was difficult to come up with questions sometimes and that stopping to question the text took too much time.

It also surprised me that 13 of the students chose partners as their favorite grouping, while three chose small groups, and one student, again Jody, chose whole group. Although we most often used small group settings for reciprocal teaching, the students explained that when working with a partner less conflict

occurred. This information certainly supported the initial scaffolding and modeling I needed to provide concerning working together cooperatively.

The attitude scale and written survey results provided me with more insight into why the students and I had experienced earlier difficulties. Now that I realize questioning is more difficult for my students than I had anticipated, the problems of getting to the main ideas and the overuse of 'why' questions do not seem so frustrating anymore. The students' explanations as to why they preferred partners also supported my earlier realization that learning to work together takes time and that it can be difficult for the students.

I also individually interviewed each student who participated in my study. By design, the interview questions had many similarities with the written survey questions. I wanted to see if the students' written responses matched their interview responses. I worried that in a one-on-one situation with a teacher, some students may be hesitant to answer honestly, even though I encouraged them to do so.

Over a three-day period, I interviewed the students in Ms. Y's Title 1 reading room during the time that she conducted reading lessons for me in my classroom. I had a list of questions to guide the interviews (see Appendix E), but I questioned further to assist the students with their explanations or in some instances, I needed clarification (Seidman, 1998). I wanted to be sure that I interpreted their responses correctly. Before I interviewed any of the students, I explained to the class that I

wanted to ask each of them a few questions about reciprocal teaching and that I wanted them to be honest because it would help me make reciprocal teaching better for all of us. In the actual interview setting, I told each student to answer as best he or she could and if a question was too difficult to answer, we could just skip it.

The students' responses to the interview questions supported the answers that they provided on the written survey and attitude scale. The students favored partners and small groups overwhelmingly over whole group instruction. The most common reasons the students provided for choosing these two groupings were that they can work faster, they get more opportunities to read and respond, and they like being able to move to other spots in the room to work.

The students indicated that the most common ways that they either gave or received help from others were by sounding out words or providing word definitions. Although the goal of reciprocal teaching is comprehension and not decoding and fluency, third grade students benefited from the immediate feedback that might not occur in a teacher-centered reading lesson. Peer tutoring blended well with reciprocal teaching in this respect.

The information the students provided supported the positive aspects of using reciprocal teaching and provided valuable insights into how I can adapt the strategy better to meet the needs of third grade students.

The following pastiche, constructed from the students' responses to several interview questions, illustrates their likes and dislikes of using reciprocal teaching.

Pastiche: The Good Things about Reciprocal Teaching

☺ I like the questions. I like to write them.

☺ I like when we ask the questions.

☺ A few minutes ago, I was helping Jake and Brittany figure out a word.

☺ I like answering the questions together and reading together.

☺ It's fun when we get into small groups and make predictions.

☺ I like when we work with other people and when we do the questions with buddies.

☺ I think reciprocal teaching is good because you can learn more things from friends and you can help them with more complicated things.

☺ I think it's a better way to learn, especially the clarifying. If your whole group doesn't know a word, someone else will.

☺ We can read together.

☺ The reciprocal teaching helps me read better. I used to hate reading.

☺ It's fun. You get to be with other people and they help you.

☺ We can help others clarify and figure out a word if they don't know it.

☺ You get to work in different groups all the time.

☺It's good because I can get help from my friends if I get stuck.

☺ *It's good and fun.*

Pastiche: Things We Don't Like about Reciprocal Teaching

☹ *When we hafta summarize it.*

☹ Sometimes I don't like going in a group.

☹ *I don't like when we read in a big group altogether with the whole class.*

☹ I don't like doing the question pages by ourselves.

☹ I don't like asking questions after every page.

☹ Answering questions.

☹ *I really don't like asking questions.*

☹ I don't want to work in a big group. It's like you get crowded.

Ms. Y administered the DRA, a reading comprehension assessment, to my students early in the school year and again in January to track growth in reading comprehension. All students improved their individual reading level and 16 of the 18 students achieved within the range of expected performance, between levels 30 and 40, for third grade students during mid-school year. Since the DRA provides an objective measure of comprehension growth independent of instructional method used to teach reading, the data support my use of reciprocal teaching as a comprehension strategy because all of my students demonstrated comprehension growth. Table 2 on page 87 displays the results of the DRA assessments.

Table 2

DRA Results

Student	Fall level	Winter level
Al	6	8
Darren	20	24
Adam	28	28
Jake	24	30
Jody	40	40
Sandra	30	34
Nick	30	38
Jane	38	40
Mark	30	34
Kara	34	38
Brittany	30	34
Jason	28	30
Tommy	28	30
Annette	30	34
Sienna	28	30
Marla	38	40
Katy	38	40
Tony	28	30

METHODS OF ANALYSIS

I frequently reviewed the data gathered in the researcher log and added observer comments in addition to the reflections I had initially included within the typed observations. According to Ely, et al. (1997), "Qualitative analysis requires that the researcher go back again and again over the accumulated log material in a process that for many has a cyclical feel" (p.175). As I revisited the log, the observer comments documented new insights or questions I had about a particular observation or piece of student work. I labeled the comments "OC" and dated them (Bogdan & Biklen, 1998).

In the margins, I labeled the data with codes. Ely, et al. (1997) define coding as providing labels that "identify a meaning unit" (p. 162). For example, when a paragraph or section of student dialogue pertained to a student's use of scaffolding, I labeled that section SCAFFOLDING, S. I organized the codes into an alphabetized list including page numbers on which I would find particular codes. I began coding the field log after conducting several participant observations.

I then sorted the related codes into categories called bins. According the Ely, et al. (1997) bins are an "initial rough sort" of the codes (p. 162). I arranged the bins into a graphic organizer to search for relationships among the bins and to distill theme statements from the bins. A theme is a "statement of meaning that runs through all or most of the pertinent data" (p. 206). Ely, et al. suggest that a

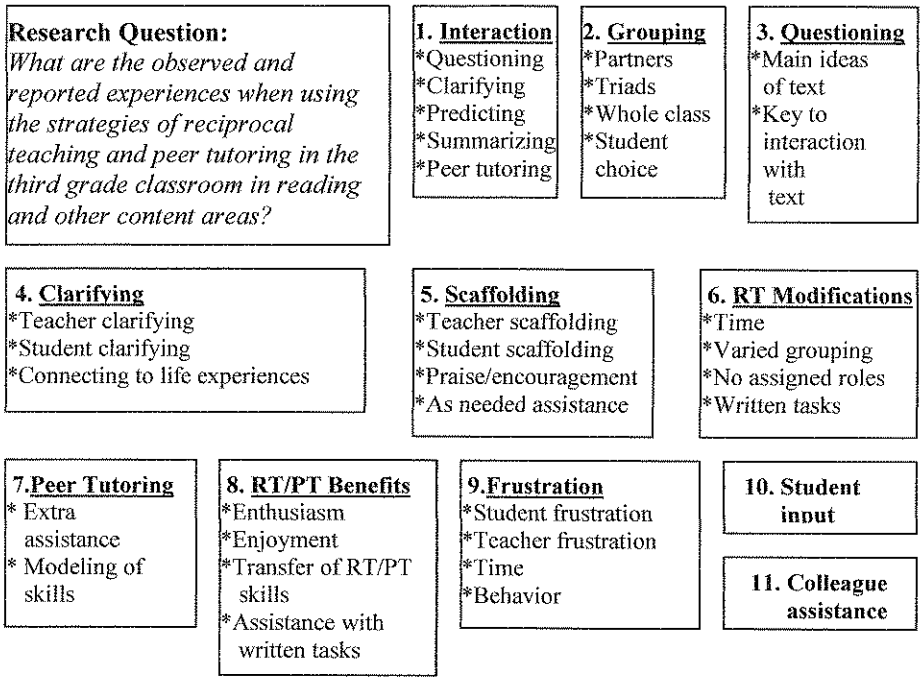
researcher "look for relationships among the categories and arrange them into some sort of organized form, an outline perhaps" (p. 162). Analysis of the relationships among the codes in the bins led to the formation of the important theme statements that ran throughout my data (see Figure 2 on page 90).

Through frequent reviewing and coding of the field log, I began to see the successes and problems with my students' use of reciprocal teaching strategies, and patterns began to emerge. By writing analytic memos (Bogdan & Biklen, 1998; Ely, et al., 1997), I could summarize and track these emerging patterns and document the positive and negative aspects of the reciprocal teaching approach to help me proceed. Ely et al. state, "Analytic memos, then, become vehicles through which we shape the lived experience" (p. 30). As I wrote subsequent analytic memos, I compared them to the previous ones to confirm or refute my developing findings.

I frequently examined the lesson record sheet that documented my use of reciprocal teaching and peer tutoring to be sure I used a variety of student groupings. The record sheet also included the subject area and the steps of reciprocal teaching used.

I gathered some quantitative data throughout my study as well. I organized the data from the attitude scale into tables. The results of the Developmental Reading Assessment (DRA) administered by the Title 1 reading specialist to all students in my class during October and January also provided another angle from

Figure 2. *Bins and Theme Statements*



Theme Statements

1. Student interaction promotes involvement with text, and the reciprocal teaching steps provide the framework for focused student interaction.
2. Student grouping determines the quality of student interaction; therefore, it is an essential element to the success of reciprocal teaching.
3. Questioning promotes interaction with text and helps students focus on main ideas of text.
4. Clarifying provides assistance with decoding words as well as providing definitions of unknown words or concepts.
5. Scaffolding, both teacher and student, remains a constant key component of reciprocal teaching for providing assistance when needed.
6. Modifications to reciprocal teaching are necessary for success in any classroom and should be tailored to meet the needs of each class.
7. Peer tutoring provides extra assistance, and modeling of skills.
8. Reciprocal teaching and peer tutoring promote student enthusiasm and enjoyment during lessons and the transfer of skills to other subject areas.
9. Frustration, both teacher and student, should be expected when first implementing reciprocal teaching and peer tutoring.
10. Student input assists in further planning and promotes an atmosphere of teacher and student partnership in learning.
11. Colleague assistance provides support, help in assessing students and providing other data, and another perspective from which to view the progress of reciprocal teaching and peer tutoring.

which to monitor growth in reading comprehension. I analyzed this quantitative data to determine how it either supported or disputed the qualitative data I gathered.

I analyzed student work samples to monitor student use of and understanding of reciprocal teaching steps. These work samples helped me track student progress and plan accordingly.

I also analyzed my data by viewing them through a variety of theoretical perspectives, or "lenses". These perspectives guided aspects of my study and provided support for the themes that emerged. I gained valuable insights about my students' learning and my own teaching by examining my practice through traditional, progressive, dialogical, feminist, social constructivist, linguistic, cultural, and socioeconomic lenses. I found "snapshots" of each of these theories at work in my classroom. Throughout the course of my study, I wrote reflective memos after reading works by Delpit (2002); Dewey (1938); Freire (1970); and Vygotsky (1978) that related these various educational perspectives to my own teaching practice and my study.

FINDINGS

The overarching theme of my study is that student involvement with text is crucial if students are to become successful readers, and that reciprocal teaching provides a framework for student interaction while reading and discussing text. Some of my more capable readers already have well-developed skills to self-monitor and self-correct their own comprehension; however many of my students have just begun to develop these skills. Through structured interaction, readers that are more capable provide modeling to their peers and with help the students who need more assistance will gradually advance to monitoring their own comprehension (Palincsar & Brown, 1986).

Many of my students also need to become more proficient with both written and spoken language. When working together in groups, students are hearing spoken language modeled and seeing written responses modeled as well. Some students need much more practice and modeling of speaking, writing, and reading than any teacher can provide in teacher-centered lessons. When students interact in small groups, there is more time to practice proper speech, fluent reading, thinking skills, and writing while an expert teacher is nearby for support as needed.

An essential element of reciprocal teaching and peer tutoring is the type of grouping utilized. The involvement the students had in questioning and discussing

text depended upon the cooperative interaction within the student grouping. When students became proficient at working together cooperatively, good quality peer tutoring and scaffolding could occur.

I utilized three types of student groupings throughout my study; partners, small groups of three, and whole group. Initially, I started reciprocal teaching lessons in whole group because the lessons needed much teacher guidance. As the students needed time to practice a step of reciprocal teaching, I varied between partners and small groups of three. I began to rely on the groups of three because one of the days that we do reciprocal teaching in reading, the Title 1 teacher pulled her four students from the class leaving a student alone. In addition to that, I felt that three heads were better than two were.

I thought the social interaction and student input would be better with three students working together. However, on analysis of the student survey and interview data, my students clearly favored partners over the other two groupings because they felt that partners worked more easily together without conflicts. My early frustrations with group behaviors obviously had been a frustration to my students as well. The students are continuing to work in small groups, and there is now less conflict among the group members.

The small group setting need not be abandoned, but rather alternated more often with partner groupings. It may be beneficial to partner students in the initial

stages of reciprocal teaching and gradually add in students to form triads. Students can then work on improving their use of reciprocal teaching strategies and cooperative group work skills concurrently, and perhaps I will need to model and scaffold group work skills less than I had to this school year.

I quickly began to abandon whole group settings even for rereading the stories because too many students were quite passive in that setting. Some of my most capable readers did not participate at all, and some students who struggle with reading were inattentive. Dewey (1938) believed that "Enforced quiet and acquiescence prevents pupils from disclosing their real natures" (p. 62). In whole group situations, I am in control of what is going on in my classroom, but I am not in control of what is going on inside my students' brains. Without opportunities to read, talk, and question, too many of my students were tuning out.

I needed to loosen my control and allow the students the freedom to read independently and discuss text. I certainly was not giving up control entirely, but rather controlling in a different way. Dewey (1938) states, "The teacher loses the position of external boss or dictator but takes on that of leader of group activities" (p. 59). My students were not left to go on their own, but rather I established some guidelines for working in groups, and I monitored groups. How else would I know if groups used reciprocal teaching steps and made progress unless I monitored them?

Whole group settings may be important in the early stages of instructing reciprocal teaching steps, but groupings that promote student interaction are a key aspect. Dewey (1938) felt that education is a social process. Reciprocal teaching is a method that relies on student dialogues about text read. Small groups and partners allow more time to read, question, and discuss text. Students must learn to interact with text independently to become proficient readers. Additionally, students who are more introverted and tend not to participate in whole class situations are not as intimidated among peers. With careful teacher monitoring, students can be assessed in a non-threatening way.

It took time to determine how the group dynamics affected the quality of group discussions. It was necessary to group the students to ensure a mix of reading abilities so that no group struggled unnecessarily. Although I wanted all of my students to work well with one another, some students just did not work well together, and I had to be careful not to pair students whose personalities just did not mesh.

Grouping students for reciprocal teaching, explaining and modeling proper group behaviors, and ironing out the wrinkles along the way became as much an area of instruction as the actual steps of reciprocal teaching. Hacker and Tenent (2002) state, "Many students had little or poor prior experience working in groups and, therefore, were uncertain about even the basic rules of group discourse" (p. 712). If students do not know how to work well with others, then

no strategy that requires group work can be successful. If I had not continued to adjust the groupings, model group discourse skills, and take into account students' input regarding grouping, reciprocal teaching would not have been successful for my class.

I introduced the step of questioning to my students first. Questioning provides the start of students' interaction with text. To be able to ask a question about text, a student must have an understanding of it. Questioning provided the framework for discussion of text. If a teacher leads a reading lesson, she would ask the question after a passage is read. Student questioning transfers the responsibility of reading for understanding to the students. Questioning is part of every lesson involving reciprocal teaching. It keeps the students actively involved in reading. Students need to stay focused on what they are reading to be able to ask a question or answer another student's question.

Initially, any question that a student asked about text was a good starting point for learning how to question that text. However, it became clear very early in the questioning of text that students at this age need much guidance in learning to question the main ideas of text. I found it necessary to work on questions that started with a variety of words besides *why* and *how* as some of my students relied on *why* and *how* to form all questions. By introducing the ideas of thick and thin questions (Hashey & Connors, 2003), with *why* and *how* questions being the better thick questions, I inadvertently caused my students some confusion. I

should have introduced the concept of thick and thin questions after the students had a better foundation with questioning in general.

My students found questioning to be challenging and tedious at times. Sometimes a page they read really did not contain many important questions about selection main ideas, so questioning became difficult. Stopping to question and discuss after every page or two made reading a selection take much more time, especially during the initial stages of learning to question the text. As students became better at questioning and their discussions became more focused, reading lessons involving reciprocal teaching took less time.

Clarifying is a step used to clear up any misunderstanding of text be it a word meaning, a concept, or for my third graders decoding words. Reciprocal teaching is a strategy designed for adequate decoders of text (Palincsar & Brown, 1984), but my students still need that extra help with decoding skills, and phonics is an important component of the third grade curriculum. My students did help each other with word meanings, but I observed more often students pronouncing words for one another. Often times the students knew the meaning of the word, but simply could not decode it. Once they said the word, their understanding was restored.

I also observed students clarifying word meanings for each other. With the varied life experiences of my students, many times they were able to explain for

each other. I think that clarifying helped promote reading fluency and cleared up minor comprehension problems quickly. I also believe that some students found it easier to ask another student what a word means, especially the more introverted students. Even some of the more capable readers sometimes did not understand something, and in those instances received assistance from another classmate.

My students seemed to become proficient with clarifying quite quickly. They stopped reading frequently to ask me word meanings when we worked in a large group. During small group situations, I asked students to write down words that confused them and later we discussed them. Students soon began to ask me if they could write down words they misunderstood without my direction. Clarifying has moved from very teacher-centered to student-centered. When a student does not understand something, he should stop and ask, talk about it, and get the understanding needed. A whole group, teacher led lesson may not allow for this discussion.

I often was surprised at the words that either did or did not need clarification from me. A group member could clarify many terms I thought might cause a problem, but other times words I assumed that third graders would probably know needed the most help from me. Students seemed to enjoy showing the other students and me their word knowledge. Being the expert boosted a student's self-esteem.

Initially, I conducted a majority of the scaffolding with a move to more student scaffolding as my study progressed. Scaffolding is necessary to bridge the transfer of reciprocal teaching skills from teacher to students and then from more capable peers to other students. The reciprocal teaching skills are in most of the students' zones of proximal development (Vygotsky, 1978), but cannot be practiced or mastered unless students first receive some guidance. What a student can do today with a little help from me, he can do tomorrow by himself.

At the start of my study, I found I had to make sure that the groups of students remembered to question the text as they read it in addition to helping students hone in on the main ideas of text. To help the students overcome their too frequent use of *why* at the beginning of questions I would guide students to other question words. Early in my study, I felt a bit dizzy at times since I felt I was circulating among the groups at a frantic pace, and now at times I feel as though I am not needed at all. This feeling scares me a bit, but I realize I should be feeling proud because my students are demonstrating just how far they have come to be readers that are more independent. Klinger and Vaughn (1996) state:

> That students can implement comprehension strategies while working in peer groups has important implications for classroom instruction-teachers do not need to sit constantly with a group for learning to occur. Once students have learned the strategies, a class

> can divide into several groups operating simultaneously while the teacher moves from group to group, facilitating progress. (p. 290)

I still scaffold as needed as I circulate among the groups to monitor them, but my students are practicing what I have modeled, some more exactly than others. These students will make the skills their own as they become more proficient with them.

When I first used reciprocal teaching in a pilot study, I worried that my adaptations rendered the strategy invalid because I had not conducted reciprocal teaching exactly as it was presented in the research literature I read. Fortunately, as I studied the literature further I found many studies that used reciprocal teaching with primary students (Kelly et al., 1994), learning disabled students (Lederer, 2000), and ESL students (Klinger & Vaughn, 1996). When I located some literature regarding teacher adaptations of reciprocal teaching written by both "lab coat" researchers and teacher action researchers (Coley, et al., 1993; Hacker & Tenent, 2002; Hashey & Connors, 2003; Marks, et al., 1993), I knew I had done nothing wrong by accommodating the needs of my students. In fact, I had made some of the same adaptations that I read about *before* I read the literature.

Modifications to reciprocal teaching are acceptable and necessary for the success of the strategy and should be tailored to meet the needs of a particular

teacher and individual students. Hacker and Tenent (2002) believe that "Instructional methods change with each teacher, and perhaps they need to change at least to some extent to become part of a teacher's constructed practice" (p. 699). I employed several modifications to my use of reciprocal teaching. I varied student groupings, avoided assigning particular roles to students, and spent more time modeling and scaffolding the reciprocal teaching steps and group discourse skills. I also encouraged the students to use the steps of reciprocal teaching in any order they wished rather than in a structured order and occasionally incorporated written tasks.

I varied the student groupings among partners, triads, and whole class settings. I also regrouped the students every week or two to avoid conflicts among group members and to ensure that all students worked with every other student in the class. I carefully grouped the students to provide a variety of reading ability levels, and I closely monitored the students' interactions to avoid grouping together students who did not work well with each other.

I did not assign particular roles to any of the students when placed in groups. I wanted all students to be able to contribute freely during lessons involving reciprocal teaching. Requiring that a student be in charge of asking all of the questions or making all of the predictions simply seemed to limit the other students' participation. Additionally, a particular role may be unappealing or

difficult to a student and therefore lead to a dislike of reciprocal teaching in general. I wanted my students to feel that they made worthwhile contributions.

I spent quite a bit of time modeling and scaffolding appropriate group work skills during the initial stages of reciprocal teaching instruction. At this age, some students do not have much experience working cooperatively, and they need more time to practice working well with others. Expecting the students to work in harmony after instructing the reciprocal teaching skills would be wishful thinking, at least with students this age. My students really did not start to make strides with reciprocal teaching until they learned to be respectful of each other. The students needed to practice taking turns and listening quietly and patiently, and they needed an awareness of respecting others' opinions, and being sensitive to others' feelings. It is essential that students work cooperatively for reciprocal teaching to be a beneficial strategy. Hacker and Tenent (2002) found that teachers modified reciprocal teaching and addressed group discourse problems "by teaching their students how to be good listeners, how to negotiate compromise, how to take turns, and how to give constructive feedback in positive ways" (p. 712).

I introduced the steps of questioning and clarifying together and added prediction a few weeks later. When students used reciprocal teaching during reading lessons, I did not require that they use the steps in any particular order as suggested by Hashey and Connors (2003). If a term needed clarification or a

student had a prediction before asking a question about the text, so be it. I felt that the fewer restrictions I made, the more easily the students would be able to interact with text. Hashey and Connors believe that comprehension does not happen in a linear manner and, therefore, the steps of reciprocal teaching should be used in a recursive process.

Summarizing is quite difficult for third grade students at the beginning of the school year, and to require that all students summarize even a page of text would be frustrating to most. As in prior studies I conducted, summarizing required some instruction in isolation and quite a bit of practice since this is a relatively new, challenging skill for third grade students. Learning to question the main ideas of text took quite a bit of time, and my students are still working on improving their questions.

Although reciprocal teaching is a discussion strategy and peer tutoring also requires some discussion, I incorporated some written tasks from time to time. Initially, I had students write one or two questions about the selection they read to assess progress with addressing the main points of text. This also required all students to ask a question or two even if they had not contributed verbally. Of course, writing is an important skill and written tasks provided much needed practice transferring the spoken word to the page. Adding written tasks to

reciprocal teaching was one of the most common modifications that teachers made to the strategy (Hacker & Tenent, 2002; Hashey & Connors, 2003).

Whereas reciprocal teaching provided the structure for discussion of text, peer tutoring provided the avenue for students to support each other on written tasks related to reading, particularly the weekly selection question sheet I assigned after the students read each selection twice. At the beginning of the school year I modeled how to answer these questions, and then I allowed the partners or triads to work together to answer them. Some students only required my brief modeling, while other students needed much more guidance in completing these assignments. Early in the school year, some students needed help locating the correct answers to the questions in the text in addition to forming grammatically correct responses. As the school year progressed, some students improved their ability to find the answers in the text, but continued to have trouble with sentence structure. The members of the groups provided assistance with comprehension and grammar. Students pointed out the location of answers in text and dictated grammatically correct sentences to other students who experienced difficulty with these tasks. Most often, the more skillful readers emerged as the peer tutors and assisted the other students, but again, since I did not assign particular roles to any members of the groups, peer tutoring occurred at any time from any student who could provide the assistance. All students had opportunity to practice being the

tutor and they benefited from the extra teaching occurring in the classroom (King-Sears & Bradley, 1995).

In some instances, I did have reason to pair several students with more capable peers. Al, Sienna, and Brittany needed some consistent support and modeling from other students. Al initially required support for focusing attention, finding main ideas in text, and completing written tasks. He has made progress in all these areas, but he still needs assistance writing his answers. His peers continue to help him face the challenges of acquiring the English language.

Brittany continues to have difficulty with comprehension and written tasks. She has benefited from other students dictating answers to her. Her learning disability causes comprehension difficulties and fine motor problems that make handwriting problematic for her. She contributes to the reciprocal teaching discussions. On several occasions, the resource room teacher has observed her leading a group of students by using reciprocal teaching skills when she is in the resource room. Lederer (2000) observed that some students with learning disabilities seemed to enjoy their role as a tutor.

Sienna put effort into using reciprocal teaching skills early in the school year, and she continues to use them well. Her ability to get along well with others has improved, and she is an active contributor to group questioning and discussion. Because of her handwriting difficulties, she often does not transfer her

correct verbal responses to paper and still needs support for these written tasks. Since she demonstrates good comprehension verbally, I believe providing a peer tutor to assist her in forming her written responses would be a simple way to scaffold her emergent writing skills.

The group setting and opportunity for discussion allowed for students to demonstrate their enjoyment of reading selections. Many times, I observed students laughing aloud when reading humorous sections of a selection or pointing out illustrations they found interesting. Often times, during a whole group lesson, I am unable to call on all of the students who would like to comment simply because it would take far too long to get through the selection. In a small group, students could all contribute an opinion if they desired in a brief amount of time before continuing to read more of the selection.

I noticed a transfer of reciprocal teaching and peer tutoring skills to other subject areas. Tommy explained and sounded the short 'A' sound for Al and pronounced spelling words for him while they practiced them the day before a test. It seemed like Adam constantly asked for word meanings in all subject areas. I complimented his willingness to want words clarified. The students pronounced words, pointed out answers in the text, and assisted each other with written assignments during science and social studies lessons. Students have been working in small groups to reread science and social studies texts, but I have not

assigned the more structured use of reciprocal teaching skills to these subject areas at this time. I am pleased that I am noticing the students assisting each other in other subject areas without being told to do so.

Frustration occurred for me when I felt reciprocal teaching lessons took too much time, when students had difficulty working cooperatively in groups, or when I was disappointed with student responses. It seemed there was never enough time in the school day to accomplish everything I had planned, and reading lessons took longer to complete as the students questioned text. When disagreements among students in the groups occurred and required that I spend time settling these disputes, I wondered whether reciprocal teaching proved to be too difficult for third grade students so early in the school year. Often, particularly early in the school year, I found that I was disappointed with the students' struggle to ask questions that addressed the main ideas of text or when the quality of written responses did not match the quality of the verbal responses I observed.

As the students became more familiar with reciprocal teaching skills, reading lessons fit into the time slot I had allotted for them. Disputes between students diminished as the students learned to work in groups, and questioning and written responses improved for most of the students. In the future, I must allow extra time for reading lessons in the initial stages of instructing the steps of

reciprocal teaching and be patient with the students while they develop their skills.

I realize that I caused my own frustration and unnecessary doubts about using reciprocal teaching because I was impatient and expected too much too soon. In order to use the strategies of reciprocal teaching proficiently, students need varying amounts of time to practice, and they must continue to receive scaffolding from a teacher. Coley et al. (1993) found that teachers needed varying amounts of time to instruct the reciprocal teaching steps depending on the grade level taught. The instructional time ranged from two to three months for first grade students to two or three class periods for eleventh and twelfth grade students. Hacker and Tenent (2002) found that teachers continued to scaffold the reciprocal teaching steps two to five months after instructing the steps.

My students provided me with ideas and input throughout the course of my study, and they continue to do so. My knowledge of their preferences assisted me in planning further lessons and tailoring reciprocal teaching and peer tutoring to meet their needs. I accommodated my students' requests whenever reasonable or explained the reasons why accommodations would not be possible. I wanted them to know that I valued their opinions and that I considered them partners in planning their instruction. Compromise between students and teacher became a

valuable aspect in the success of reciprocal teaching and peer tutoring. Freire would agree and states:

> Through dialogue, the teacher-of-the-students and the students-of-the-teacher cease to exist and a new term emerges: teacher-student with students-teachers. The teacher is no longer merely the-one-who-teaches, but one who is himself taught in dialogue with the students, who in turn while being taught also teach. They become jointly responsible for a process in which all grow. (p. 80)

Colleagues provided valuable assistance and insight throughout my study. Ms. Y, the Title 1 reading specialist, led lessons so that I could conduct some non-participant observations and interview my students one-on-one. She administered a comprehension assessment to all of my students at the beginning and after the data-gathering phase of my study. Ms. Y also listened to my concerns and doubts about reciprocal teaching and supported my efforts. Her assistance provided me with additional data and another viewpoint from which I could analyze the data I gathered. Mrs. S, the resource room teacher with whom I work, reported that Brittany used reciprocal teaching on her own when she was in Mrs. S's classroom. Mrs. S provided ideas for improving written responses and so many times, she listened as I vented my frustrations with reciprocal teaching.

Conducting this study would have been much more time consuming and discouraging at times without their support.

It took time, effort, and patience to instruct, model, and scaffold the strategies of reciprocal teaching and peer tutoring, and as I continue to use these strategies, I expect that I will modify them to achieve better results with each unique class of students I teach. I now view my role as a teacher in a different light. I let go of the notion that I had to be the sole provider of knowledge to the students and that I should be the only one to determine what my students know and still need to learn. Freire (1970) states, "Education must begin with the solution of the teacher-student contradiction, by reconciling the poles of the contradiction so that both are simultaneously teachers *and* students" (p. 72). Together, my students and I must determine the course we will take to achieve further growth and understanding.

WHERE DO WE GO FROM HERE?

In addition to working on improved written responses, I still need to work on the reciprocal teaching step of summarizing. At the beginning of the school year, third grade students have difficulty summarizing what they have read, due in part to lacking the skills to identifying the main ideas of a story. In third grade curriculum, summarizing begins to occur about mid-year. When used with older students, all four steps of reciprocal teaching usually occur in any given lesson, but for my students summarizing will need continued work in isolation, before successfully integrating it with the other reciprocal teaching steps.

Requiring my third grade students to summarize what they have read each week would frustrate too many students, as it is currently not in the zone of proximal development (Vygotsky, 1978) for many of them. In fact, when I did ask the groups to write a summary for one of the stories, Marla cried and told me she did not know how to write a summary. Marla is one of my more capable students, and if she had this much frustration with summarizing, my struggling students would certainly be frustrated too. I believe reciprocal teaching would not have benefited my students if I had initially required summarizing. It has taken several months for my students to become successful with questioning, clarifying, and predicting.

I am continuing to see the students' questions improve, and during the second half of the school year, I will instruct the students in summarizing. Initially, as with other reciprocal teaching steps, we will practice summarizing together as a whole class and then proceed to summarizing within the small group and partner settings. I expect to provide oral and written practice with summarizing as well. I believe that as the students' skill levels in questioning the main ideas of text continue to improve, their ability to connect those main points will lead them to good summaries.

Recently, in addition to requiring that the students stop to question text, I have now asked them to discuss what has happened in the text they have just read with a focus on who is in the selection, what is happening, and why it is happening. This process is called paragraph shrinking (Fulk & King, 2001).

I would also like the students to use reciprocal teaching skills in other subject areas, particularly science and social studies. Since these subject areas require reading critically, I believe that the questioning and discussion of these texts would be beneficial to my students. Hashey and Connors (2003) found that students who used reciprocal teaching in various subject areas made the largest gains.

I think that peer tutoring will be also be useful in these subject areas because the student who rejoins our class for science and social studies in the afternoon after attending the resource room for instruction in other subjects has a

severe learning disability and needs assistance with reading. Al returns from the ESL support class with only fifteen minutes left in the school day and he, too, needs support with science and social studies since he misses so much of these subjects. Students provide a ready resource to assist their peers and their teachers with instruction in the regular classroom (Miller & Kohler, 1993).

I had hoped to branch out more into other subject areas during my study, but my students needed a firm foundation with reciprocal teaching skills before transferring those skills to other areas. I have begun the use of reciprocal teaching in small groups to reread science and social studies lessons and to complete lesson review worksheets. I would also like to provide time to my students so that they may study together before tests in these subject areas, a perfect peer tutoring opportunity.

I hope that my students will use reciprocal teaching strategies if something they read is difficult for them in the future, and that they will ask that other classmates or an adult clarify misunderstandings. My greatest wish is that through the practicing of the steps of reciprocal teaching my students will be on their way to being proficient at detecting their own understanding or misunderstanding of text.

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APPENDIXES

Appendix A: Principal Consent Letter

September 22, 2004

Dear (principal's name),

During the 2004-2005 school year I will be taking courses toward a Master's degree in curriculum and instruction at Moravian College. These courses assist me in implementing effective teaching methods and reflecting on my own teaching practices.

During this semester, August 30th through December 23rd, I am required to conduct a systematic study of my own teaching. My research will examine the impact of reciprocal teaching and peer tutoring on reading comprehension, thinking skills, verbal and written expression, and peer learning relationships. Reciprocal teaching and peer tutoring are valuable strategies students can use across subject areas throughout their schooling. These strategies provide students with skills to monitor their own comprehension and learn from peers.

I will be gathering information to support my study through student interviews, surveys, work samples, and observation. All students will have the opportunity to provide feedback to me through these methods. I will only use information collected from students who have permission to participate in the study in any written reports of my research. All of the students' names will be kept confidential as well as the names of teachers and other staff, and school names. Any information that may reveal a student's identity will be altered to protect anonymity. No names will be included on work samples or in any reports of my study. All research materials will be kept in a secure location in my home. All data gathered during the study will be destroyed at the conclusion of the study.

All students will be participating in reciprocal teaching and peer tutoring as part of the regular curriculum, therefore no student will be singled out as a participant or non-participant. Any child may withdraw from the study at any time without any penalty. Withdrawal **will not** affect any child's grades. If a child withdraws, I agree that I will not use any data pertaining to the child in any written reports of my research. Parents can notify me by phone or in writing if their child wishes to withdraw from the study. A child will only be considered a subject in my study if I receive written parent permission.

If you have any questions or concerns about my research, please contact me at home (phone number) or email me at (email address). My faculty sponsor is Dr. Joseph Shosh. He can be contacted at Moravian College by phone at (610) 861-1482 or email at .

If you are willing to grant permission for me to carry out this study, please sign and return the bottom portion of this form.

Sincerely,

Mrs. Mertz

As principal of the teacher conducting this research, I give permission to Pamela Mertz to conduct this study at (school name). I understand that Mrs. Mertz will be observing and collecting data as part of her research on reciprocal teaching and peer tutoring in her classroom.

Principal's signature: _____

Date: _____

Appendix B: HSIRB Approval Letter

MORAVIAN COLLEGE

September 17, 2004

Pamela S. Mertz

Dear Pamela Mertz,

The Moravian College Human Subjects Internal Review Board approved your proposal: The effects of reciprocal teaching and peer tutoring in a third grade classroom. Given the materials submitted, your proposal received an expedited review. A copy of your proposal will remain with the HSIRB Chair.

Please note the possible multiple item in Appendix E, Attitude Scale: Item #3

Please note the phones numbers you have on both Informed Consents for Dr. Shosh may be incorrect.

Should any other aspect of your research change or extend past one year of the date of this letter, you must file those changes or extensions with the HSIRB before implementation.

This letter will be e-mailed and snail-mailed to you. Best of luck with your research.

James Barnes
Chair, Human Subjects Internal Review Board
Moravian College
610-861-1672 (voice)
610-861-1657 (FAX)
barnesj@moravian.edu

Appendix C: Parent Consent Letter

September 22, 2004

Dear Parents or Guardians,

I am currently taking courses toward a Master's degree in curriculum and instruction at Moravian College. These courses assist me in implementing effective teaching methods and reflecting on my own teaching practices.

During this semester, August 30th through December 23rd, I am required to conduct a systematic study of my own teaching. My research will examine the impact of reciprocal teaching and peer tutoring on reading comprehension, thinking skills, verbal and written expression, and peer learning relationships. Reciprocal teaching and peer tutoring are valuable strategies students can use across subject areas throughout their schooling. These strategies provide students with skills to monitor their own comprehension and learn from peers.

I will be gathering information to support my study through student interviews, surveys, work samples, and observation. All students will have the opportunity to provide feedback to me through these methods. I will only use information collected from students who have permission to participate in the study in any written reports of my research. All of the students' names will be kept confidential as well as the names of teachers and other staff, and school names. Any information that may reveal a student's identity will be altered to protect anonymity. No names will be included on work samples or in any reports of my study. All research materials will be kept in a secure location in my home. All data gathered during the study will be destroyed at the conclusion of the study.

All students will be participating in reciprocal teaching and peer tutoring as part of the regular curriculum; therefore no student will be singled out as a participant or non-participant. Your child will only be considered a subject in my study if I receive your written permission below. Your child may withdraw from the study at any time without any penalty. Withdrawal **will not** affect your child's grades. If your child withdraws, I agree that I will not use any data pertaining to your child in any written reports of my research. Please notify me by phone or in writing if your child wishes to withdraw from the study.

If you have any questions or concerns about my research at any time, please contact the principal or me at the school at (phone number). My faculty sponsor is Dr. Joseph Shosh. He can be contacted at Moravian College by phone at (610) 861-1482 or email at

If you approve of your child being a participant in my teacher research, please sign and return the bottom portion of this letter. Thank you for your help.

Sincerely,

Mrs. Mertz

I understand that Mrs. Mertz will be observing and collecting data as part of her research on reciprocal teaching and peer tutoring in her classroom, and my child has permission to be a participant in the study.

Child's name: _____

Parent/Guardian signature: _____

Date: _____

Appendix D: Record Grid

Reciprocal Teaching/Peer Tutoring Record Grid

Date	Subject	Strategy Used RT/PT	Type of Student Grouping

Appendix E: Proposed Interview Questions

Proposed Interview Questions

1. Tell me your thoughts/feelings about reciprocal teaching.
2. What do you think are good things about reciprocal teaching?
3. What don't you like about reciprocal teaching?
4. Do you think reciprocal teaching has helped you learn?
5. Do you like helping others learn?
6. Do you like getting help from other classmates?
7. Do you think reciprocal teaching has helped you learn?
8. What kinds of groups do you like best? (Whole class, small groups, partners) Why?
9. What would you tell a student from another class about reciprocal teaching?
10. Is there a way that you think reciprocal teaching could be made better? Explain.

Appendix F: Student Written Survey

Name: _____

Reciprocal Teaching/Peer Tutoring Survey

Directions: Answer each question as best you can. Please explain your answers and answer honestly. There are no right or wrong answers. I really value your opinions!

1. Do you like using reciprocal teaching? Why or why not?

_____

_____

_____

2. What step of reciprocal teaching do you like best and why?

_____

_____

_____

3. Which step of reciprocal teaching is difficult or your least favorite and why?

_____

_____

_____

4. Do you think you will remember and use the steps of reciprocal teaching next year to help you?

_____

_____

_____

5. Do you like working with others? Why or why not?

_____

(OVER)

6. Which kind of group did you like working in most? Circle one.

small groups **partners** **whole group in a circle**

Why?

Appendix G: Reciprocal Teaching Rating Scale

Name: _____

Reciprocal Teaching Rating Scale

Directions: Respond to each statement by circling one of the faces. Choose the face that best describes your feelings about the statement.

1. **I like using the steps of reciprocal teaching.**

2. **Reciprocal teaching helps me understand what I read.**

3. **I like working in small groups.**

4. **I like helping other classmates when we use reciprocal teaching.**

5. **I like getting help from other classmates when we use reciprocal teaching.**

(OVER)

6. I like working in a big group with the whole class.

NO WAY 

O.K. 

GREAT