ABSTRACT
                A detailed analysis was conducted of the patterns of
interactions between a child and a teacher in a one-to-one reading tutorial
setting in the context of the Reading Recovery literacy program. The
interactions between a teacher and two of her students were observed,
videotaped, and analyzed. The participation of the two students in problem
solving at a point of difficulty changed over time. One student took a
greater role in problem solving, all the while reading more complex text. The
participation of the other student changed very little, and the teacher did
not seem to offer him the same kind of support. The scaffolding the teacher
offered the lower achieving student may not have been as helpful. Overall,
the findings demonstrate the great importance of the teacher in the tutorial
process. (Contains 7 figures and 23 references.) (SLD)

Understanding Teacher Talk
to Inform One-to-One Literacy Instruction

Paper presented at the
AERA General Meeting April, 1999
Montreal, Quebec

Emily Rodgers
rodgers.42@osu.edu

2

Introduction

One-to-one tutoring is a recognized form of intervention and is becoming more widely used to prevent reading failure. However, just having a tutor is not enough to guarantee a child's success, there seems to be something about the tutoring methods used that leads to a child's accelerated learning (Pinnell, Lyons, DeFord, Bryk & Seltzer, 1994; Wasik & Slavin, 1993) More specifically, Pinnell et al. suggested that there seems to be something about the language interactions between tutor and child that are critical to the child's learning. These studies are supported by research that describes the important role of talk in learning (Diaz, Neal, Amaya-Williams, 1990).

Wasik and Slavin (1993) identify this ability to use language effectively as "tutoring methods" while Pinnell et al.(1994) characterize it as the "intensity and effectiveness of the teaching" - an outcome of the tutor's training. However, no study has as yet attempted to describe in a qualitative manner the nature of the language interaction between child and tutor. Such a study would have the potential to inform us, in a more detailed manner, about the nature of effective one-to-one tutoring. For this reason, I conducted a detailed analysis of the patterns of interactions between child and teacher in a one-to-one reading tutorial setting.

Theoretical Framework

I use a sociocultural lens to understand cognitive development. From this perspective, there is no time out from one's culture: children are immersed in the cultural practices into which they are born, whether that be mat weaving, farming and/or written literacy. Within their culture children are actively participating with more knowledgeable others in their cultural practices, therefore, social interaction is critical to learning (Vygotsky, 1978).

The difference in the way a child participates in these activities over time can be viewed as cognitive development. Initially the child requires assistance from more capable others but gradually, as capacity develops, the child is more and more able to assist himself. This span between assisted performance to assistance provided by oneself is represented by Vygotsky's notion of the "zone of proximal development" (Vygotsky, 1978).

The process by which adults mediate a child's attempts to take on new learning has been termed "scaffolding" (Wood, Bruner, Ross, 1976). This is the process by which the adult and child interact through the zone of proximal development (ZPD) as the child is learning something new. The adult controls the elements of the task that are beyond the child's ability all the while "upping the ante" in terms of what the child is expected to be able to do next.

Speech is a critical tool to scaffold the child's way of thinking and responding (Luria, 1979). Its acquisition plays a crucial role in the development of higher psychological processes (Scribner & Cole, 1981) because it enables thinking to be more abstract, flexible, and independent from the immediate situation (Bodrova & Leong, 1996). In fact, the acquisition of speech, combined with the use of other tools produces new behavior for our species - a key difference between us and higher primates (Vygotsky, 1978).

Review of Related Literature

Scaffolding

Parents seem to intuitively know how to scaffold their children's efforts to take on an oral language. Mothers, for example, shift what they accept as language from their babies, raising the ante from burps to coos, as their children's attempts become more like speaking (Cazden, 1983).

Ninio & Bruner (1978) examined the interaction between mother-child dyads during storybook reading and found that the mothers tended to scaffold their children's turn-taking. At first, the mother provided most of the talk, often taking the child's turn in the interaction. Eventually, the child's turn grew to include pointing, smiling, and vocalizations. The child was able to take on a greater role through the support, or scaffolding by the mother during the interactions around storybook reading.

Research suggests that the *type* of assistance provided to the child is critical in order to scaffold development. Wood and Middleton (1975) in a study of mothers helping their children build a pyramid from wooden blocks, identified five levels of intervention by the mothers. Wood and Middleton noted that mothers whose children were more successful were able to pitch their help at just the right level of sensitivity. In fact, success at building the pyramids was related more to the *type* of assistance provided, than the *amount* of assistance. Apparently any sort of assistance will not do.

Several studies have examined patterns of interaction in literacy learning settings and found that these interactions provide opportunities for children to have mediated literacy experiences with an expert who can monitor and guide the children's sense-making (Cochran-Smith, 1984, Taylor, 1983).

Children do not come to school with the same early literacy experiences. For these children, it is the responsibility of educators to provide these missed opportunities for interactive literacy experiences with experts who can guide their learning. Wells (1986) is convinced that these children who have not yet learned about print, need a "...personal introduction to literacy through

4

2

stories...", they need "...one-to-one interaction with an adult centered on a story..." (p.215).
These experiences can provide the child and adult with opportunities to use talk in a collaborative
fashion to extend the child's literacy learning. Reading Recovery, a one-to-one literacy tutoring
program, provides an excellent example of such interactive experiences.

Scaffolding in Reading Recovery

Wong, Groth & O'Flahavan (1994) examined five Reading Recovery teachers and ten
students over 25 lessons as the children read familiar and new books. They identified five types of
scaffolding comments made by the teachers: discussing, telling, coaching, prompting and modeling,
but perhaps more importantly, the authors also found that the teachers varied their scaffolding
comments as a function of the text familiarity. When the reading became more difficult the
teachers increased their modeling, prompting and discussion comments to provide more assistance
to the child, as needed.

Hobsbaum, Peters & Sylva (1996) examined 17 children and seven Reading Recovery
teachers during the writing portion of their lessons and described the nature of the talk between
teacher and child as "interactive talk cycles". The authors defined the teacher's role as being
"paramount". They went on to say that, "There is no relaxation of the challenges posed and the
teacher is constantly moving to what can be considered as the outer limits of the zone of proximal
development" (p.31).

According to this review of the related literature, the Reading Recovery teacher makes
deliberate teaching decisions which increase accessibility to the task all the while supporting the
child's performance and maintaining the child's accelerated learning (Clay & Cazden, 1990). What
seems to be a casual conversation between child and adult in the context of reading and writing, is
actually an excellent example of a highly skilled adult moving a child through his zone of proximal
development.

My study proposes to examine this interaction in a qualitative manner, in order to relate
the child's growing literacy understandings to the language interactions between child and teacher
during Reading Recovery lessons. A closer look at the nature of the talk between the child and
adult may reveal how the adult is able to scaffold the child's learning in the context of a Reading
Recovery lesson.

5

Design

       I used a qualitative case study approach (Patton, 1990) to describe the pattern of interaction between a teacher and two of her students during one-to-one literacy instruction. Marshall & Rossman (1995) suggest that a case study is a useful research strategy when the purpose of the study is to describe a phenomenon of interest and when the research questions involve describing the "...salient behaviors, events, beliefs, attitudes, structures, processes occurring in the phenomenon" (p.41).

       For these reasons, I chose to use a case study approach to examine the interactions between one Reading Recovery teacher and two of her students. As I stated earlier, available research suggests that there is something about these interactions that leads to a child's accelerated learning.

Participants

       I conducted a case study of one particular Reading Recovery teacher. Within that case study I conducted individual case studies of two of the students in her program.

The selection of the Reading Recovery teacher, whom I shall call Adrienne, was based on several factors. First, because I planned to study language and learning within an effective one-to-one tutoring program, it was important to ensure that the teacher was also effective. This judgment was based, in part, on a recommendation from Adrienne's Reading Recovery teacher leader. One of the roles of a teacher leader is to train Reading Recovery teachers within her site, thereby making the teacher leader a likely person who can identify expert Reading Recovery teachers.

       Second, I also examined Adrienne's discontinuing rate for the last three years. Discontinuing rate refers to the number of children who have successfully completed the Reading Recovery program by reaching the average reading level of their peers. Adrienne had at least a rate of discontinuing that was equal to or greater than the average rate of discontinuing for other Reading Recovery teachers in her state.

       The selection of the students was largely left to Adrienne. I asked her to choose two of her four students whose scores on the Observation Survey of Early Literacy Achievement (OS) (Clay, 1993a), were markedly different from each other. The OS is individually administered by the Reading Recovery teacher to all first graders in order to determine who qualifies for Reading Recovery services. It consists of six literacy tasks which measure a child's understandings of print, knowledge of letters, instructional reading level and ability to hear and record phonemes.

Adrienne selected John and Nathaniel. Table 1 indicates each student's scores on the six

tasks of the OS.

Observation Survey Tasks	Range of Possible Scores	John	Nathaniel
Letter Identification (LI)	0-54	51	24
Word Test (WT)	0-20	2	0
Concepts About Print (CAP)	0-24	12	12
Writing Vocabulary (WV)	Timed task: 10 minutes	6	5
Hearing and Recording Sounds in Words (HRSIW)	0-37	1	5
Text Reading Level (TRL)	A-24	1	A

Table 1. Fall Observation Survey Results for John and Nathaniel

Nathaniel scored lower than John on each task of the OS except HRSIW and CAP. In

analyzing the results, Adrienne noted that Nathaniel was not looking at the print and did not

understand the concept of one-to-one matching. Although he knew that print contains

the message and that print operates from left to right across a page, he knew few letters and words

to aid him with reading.

John also knew that the text contained the message and that print operates from left to

right. Like Nathaniel, John did not attend to the print while reading, instead he used his oral

language to approximate the text based on what the teacher told him about the story. Unlike

Nathaniel, John was able to identify many more letters of the alphabet and he was able to form

these letters fairly easily on the writing tasks.

Data Collection: Qualitative Measures

The Reading Recovery lesson activities were organized within three distinct phases. The

7

figure below depicts the routine of the Reading Recovery lessons and the phase that I closely observed.

Phase	Time*	Activity
Phase 1	10 minutes	Read two-three familiar books Letter or word study using magnetic letters Independent reading of the last lesson's new book.
Phase 2	10 minutes	Write a story and reassemble a cut up story.
FOCUS OF THIS STUDY		
Phase 3	10 minutes	Read a new book with teacher support

*Time allotments are approximations made by the researcher and were not rigidly enforced by the teacher.

Figure 1. Routine of Reading Recovery Lessons in this Study

Glesne and Peshkin (1992) recommend the use of "multiple data collection methods" (p.24) to contribute to the trustworthiness of the data collected. They note that this process is often referred to as triangulation and that three data gathering techniques have dominated in qualitative research: participant observation, interviewing and document collection.

Participant Observation

Glesne and Peshkin (1992) describe the main outcome of participation observation as understanding the research setting, its participants and their behavior (p.42). Participant observation occurs along a continuum, from mostly participant to mostly observer (Glesne & Peshkin, 1992, p.40; Patton, 1990, p.217). The context of my study meant that my role fell further on the continuum as observer than participant. In order to observe the interactions between an effective Reading Recovery teacher and her students I could not take part in the teaching. However I was not strictly an observer. The participants in the study were aware of my presence. In addition, I did have many conversations with the teacher about the students. Because I was neither full participant nor complete observer, I will refer to my role as observer participant in the remainder of this study.

I videotaped two consecutive Reading Recovery lessons for both students every three weeks for 12 weeks. This yielded data from eight lessons for each child, or 16 lessons in total for the two children. In order to aid my immersion into the setting, I also observed each child twice a

week on consecutive days for the duration of the study. This meant that I observed each child twice during weeks one, two, four, five, seven, eight, ten and eleven. During weeks three, six, nine and twelve I observed the students and videotaped at the same time for a total of 24 observations per child. In addition, each lesson for both children was audio taped daily for the duration of the study.

I also observed each child in their classrooms, once every two weeks, during a regularly scheduled read-aloud time. These read aloud sessions lasted 30 minutes in both Nick and Jonathan's classrooms. Each student was expected to select several books from baskets around the room and to read independently or with a friend for the 30 minutes. During each read aloud session, the student wore a clip-on microphone and waist pack with tape recorder in it.

Document Analysis

I photocopied all lesson records for both children. The lesson record contains two forms: one which contains the teacher's notes as the lesson occurs, the second a running record; a written notation of the student's oral reading behaviors when he read a book independently that day.

Interviewing

Marshall and Rossman (1995, p.102) state that within the role as observer as participant, it may be useful to use unstructured interviews as a method to gather data. This method of data collection has been referred to as "a conversation with a purpose" (Kahn & Cannell, 1957 cited in Marshall & Rossman, 1995, p.80) and varies in terms of the amount of pre-set structure that the interviewer employs.

During each of my 24 visits to the school I conducted unstructured interviews with Adrienne between each student's lesson and after both lessons. My purpose was always to hear the teacher's perspective on the students' progress and also to understand more about the teacher's decision-making during the lessons. The teacher usually did not need any prompt to begin talking; often she began her own analysis of the lesson as soon as the student left the room.

First Level of Data Analysis: Identifying Talk Cycles

The first step in data analysis is to organize the data (Marshall & Rossman, 1995; Patton, 1990). In order to do this, I examined the videotaped lessons for both Nathaniel and John looking for cycles of interaction between the teacher and child while the child read a new book. These periods of interacting are similar to Sinclair and Coulthard's "exchanges": a unit of interaction between teacher and student (Sinclair & Coulthard, 1975, p. 49).

Hobsbaum, Peters and Sylva (1996) described a similar type of structure in their observations of the writing component of Reading Recovery lessons. They termed these

interactions "talk cycles" because they found cycles of teacher and student talk around the construction of individual words while they wrote a story together (p.24). In a pilot study I also defined these interactions as "talk cycles" in that they were cycles of talk between the student and teacher which punctuated the student's independent reading of the new book (Rodgers, 1998).

Second Level of Data Analysis: Categorizing the Teacher Talk

The next step in data analysis was to identify the categories of teacher talk present in the talk cycles. I coded the teacher moves in six ways: demonstrating, questioning, telling, confirming, praising and directing. These categories of moves emerged through inductive analysis of the data and were checked against another coder who was a trained Reading Recovery teacher. Agreement was reached on 88% of the codes.

Questioning (Q): The teacher asks the student a question. Examples: Are you right? Does it say leopard or lady?	Telling (T): The teacher reveals or tells the student. Examples: That word is girl. You skipped a page. That didn't sound right to me.
Directing (D): The teacher directs the student to take a specific action Examples: Check it to make sure you're right. Use the first sound and read that again.	Demonstrating (De): The teacher takes the student's role and demonstrates a problem solving action. Examples: The teacher rereads. The teacher articulates the first sound of a word.
Praising (P): The teacher praises the student. Examples: Good job! I like the way you tried the first sound.	Confirming (C): The teacher confirms for the student. Example: You're right, it does say "can".

Table 2. Categories of Teacher Moves

Third Level Of Data Analysis: Describing The Student's Changing Reading Behaviors

In order to describe each student's changing reading behaviors over time, I examined their plans of action at difficulty while reading aloud in their classroom during read aloud time and also their running records from the days that I videotaped their lessons. My purpose was to describe what the students did at difficulty when they were reading independently.

I described the actions they took whenever they came to a point of difficulty by transcribing what they said and did. I analyzed each transcription, and looked for patterns of responding. Patterns emerged within each lesson for each student and I was able to construct a picture of each child as a reader at four points in time, over the course of the study.

<u>Findings</u>

<u>Changing Reading Behaviors</u>

By the end of the study it became apparent that John had made significantly more progress in both reading and writing, than Nathaniel. Evidence to support this finding comes from two sources: a comparison of the students' pre and post OS scores and an examination of the changes in their text reading levels over the course of the study. I will discuss these results in detail in the next two sections.

<u>Pre and Post OS Scores</u>

When the OS was first administered Nathaniel and John's scores were very similar on every task except Letter Identification. However when the OS was re-administered, there was a marked difference between Nathaniel and John's scores on nearly every task.

Table 3 displays both students' pre and post OS scores.

Observation Survey Tasks	John Pre	Nathaniel Pre	John Post	Nathaniel Post
Letter Identification (LI) Range: 0-54	51	24	53	49
Word Test (WT) Range: 0-20	2	0	11	4
Concepts About Print (CAP) Range: 0-24	12	12	21	Not tested
Writing Vocabulary (WV) Timed task: 10 minutes.	6	5	41	24
Hearing and Recording Sounds in Words (HRSIW) Range: 0-37	1	5	34	29
Text Reading Level (TRL) Range: A-24	1	A	8	3

Table 3. Pre and Post Observation Survey Scores

It is apparent from these pre and post OS scores that after 14 weeks in the tutorial program both students made progress. By the end of the program Nathaniel could identify 49 letters, a substantial improvement from 24 letters when he entered the program. He could hear and record 29 phonemes, up from just 5, 14 weeks earlier. Also, he wrote 24 words in 10 minutes on the Writing Vocabulary task, compared to 5 words when he entered the program.

However, John seems to have made more significant gains than Nathaniel. John was able to identify half of the words on the Word Test and he could write 41 words in 10 minutes on the Writing Vocabulary task, compared to 6 words 14 weeks earlier. Significantly, John could hear and record 33 more phonemes at the end of the program while Nathaniel could hear and record just 19 more.

Perhaps even more telling is the difference in John and Nathaniel's text reading levels on the pre and post OS administrations. Even though they both began at a similar level, John was able to read at level 8 when given the OS at the end of the study, while Nathaniel could only read at level 3. In other words, John had progressed 7 levels in 14 weeks while Nathaniel had progressed only 3 levels.

It can be inferred from the pre and post OS scores that John has made more gains in reading and writing during the 14 weeks of this study. Further evidence to support this finding comes from both students' record of text reading levels over the course of the study.

Record Of Text Reading Levels

Figure 2 displays each student's text reading levels at weeks three, six, nine and twelve of the study. I obtained these levels from each students' lesson records. They represent the level of the book which the student read independently during the last lesson of that particular week.
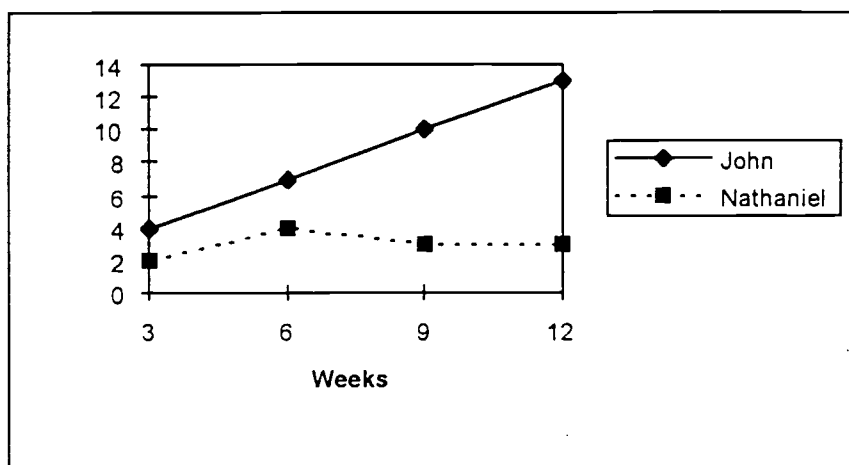

Figure 2. Text Reading Levels for John and Nathaniel

It is clear that not only did John consistently read at a higher level than Nathaniel, but also that John continued to make steady progress each week. Nathaniel, who always read at a lower level than John, even dropped a level from 4 to 3 and remained at level 3 for several weeks.

It seems apparent from the pre and post OS scores and the record of text reading levels, that John has made better progress than Nathaniel in reading. How can one account for this difference in progress? How is it that John and Nathaniel could work with the same teacher, who used the same framework for lessons and had access to the same resources, yet John was able to make such fast, dramatic progress and Nathaniel made much smaller gains? An analysis of the talk during the lessons may reveal differences in the way Adrienne and the students interacted.

Analyzing the Talk Cycles: The Students' Participation

Ratio Of Cycles To Words Read

One way to characterize the teacher-student interactions is to examine the number of cycles, or interactions that occurred during the reading. I counted the number of cycles between Adrienne and each student for two consecutive lessons at four points in time: weeks three, six, nine and twelve of the study. Then I calculated the ratio of cycles between the teacher and student to the total number of words read in each new book for both lessons, for the four focus weeks. "Words read" simply refers to the number of words in the book that the student read during that lesson.

Figure 3 offers a comparison of Nathaniel and John's ratio of cycles to words read.
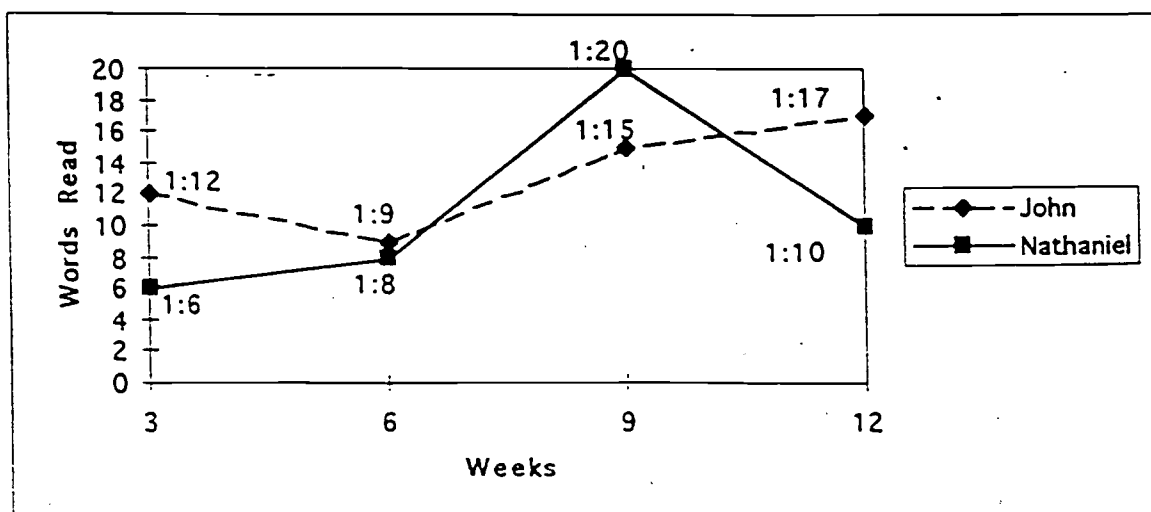

Figure 3. Ratio of Cycles to Words Read: John and Nathaniel

13

With the exception of week six, John appears to be reading increasingly more complex text with more and more independence. I can conclude that the text is indeed increasingly more complex because of the evidence from John's record of text reading level (See Figure 2, "Text Reading Levels for John and Nathaniel"). This record shows that during week three, John was reading text at level four and at week six he was reading at level seven. This rose to level ten by week nine and level 13 by week 12.

Even though John is reading increasingly more difficult text, he is also reading with more and more independence. Evidence to support the view that he is reading with more independence comes from the fact that there are fewer cycles or interactions with his teacher. This is in keeping with my definition of a cycle: an interaction initiated by the child or teacher during the reading of the new book, usually occurring around point of difficulty. When the student is not interacting with the teacher, he is either reading accurately or problem solving independently. Therefore, fewer cycles means fewer occasions when the student needs the teacher's support to read.

By contrast, although Nathaniel read with increasingly more independence, he did not read with as much independence as John. At the beginning of the study, John read about 12 words at a time before needing support from his teacher, while Nathaniel needed support after reading about six words. At the end of the study John read approximately 17 words without support while Nathaniel required support about every 10 words that he read.

A second critical feature to keep in mind when comparing the ratio of words read to cycles of interactions is that Nathaniel did not read increasingly difficult text as John did throughout the study. At the four focus points of this study (weeks three, six, nine and twelve) John read at levels 4, 7, 10 and 13 while Nathaniel read at levels 3, 4, 3 and 3.

A second way to characterize the teacher - student interactions during the reading of the new book is to calculate the percentage of moves made by student and teacher during the four points in time: weeks three, six, nine and twelve. A move, as I explained earlier, refers to each contribution made by student or teacher to a cycle. In the following section I will add the dimension of moves to this description of student-teacher interactions.

Division Of Student Moves Within Cycles

This is an interesting dimension to consider because it gives us a feel for who was doing more talking when the student came to difficulty: the teacher or the student.

In order to calculate the share of moves made by the teacher and student I again examined the focus lessons at weeks three, six, nine and twelve. I totaled the number of moves made by the student and those made by the teacher for the two consecutive lessons during the four points in

14

time. I then calculated the percentage of moves made by the teacher and the student at each point in time. Figures 4 and 5 below compares John and Nathaniel's percentage of moves in relation to Adrienne's moves.

In week three of John's lessons, across two consecutive lessons there were ten cycles of interaction between John and his teacher. Within these ten cycles, the student made 26 moves and the teacher made 19 moves. During two consecutive lessons in week six, there were 19 cycles. John made 55 moves within these cycles and Adrienne made 28. In week nine of John's program he made 60 moves in 18 cycles while his teacher made 46 moves. During the final week of the study, there were 20 cycles of interactions in which John made 59 moves while his teacher made only 28.

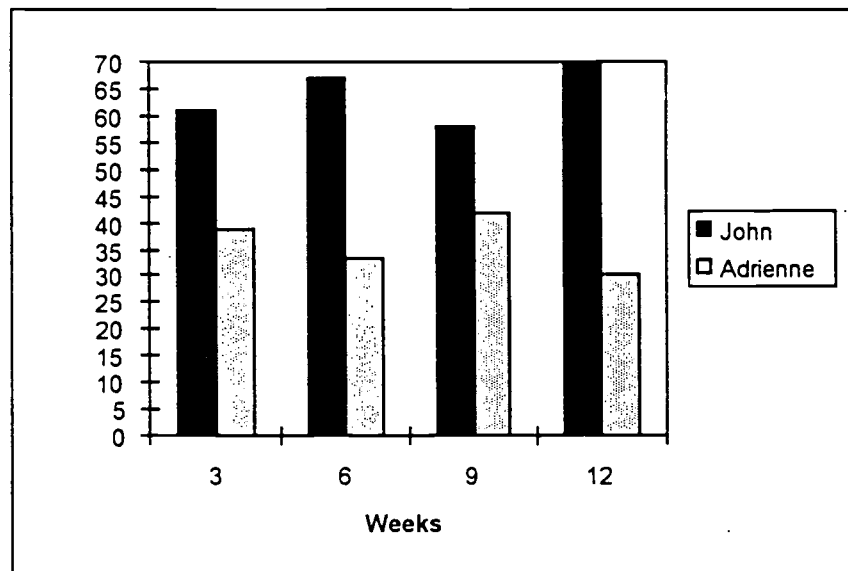Figure 4 displays the percentage of moves made by Adrienne and John at weeks three, six, nine and twelve.

Figure 4. Division Of Teacher And Student Moves Within Cycles: Adrienne and John

It is apparent that John always made more moves, or contributions to cycles of interactions with his teacher, than Adrienne has made. This is true for all four points in time that I examined. With the exception of week nine, John's share of moves increased over time, from 61 percent in week three to 68 percent in week 12.

Nathaniel's share of moves within the cycles of interaction did not increase as dramatically as John's over time, nor did he take as large a share of the moves as John did. Nathaniel made 40 moves in 14 cycles in week three, while his teacher contributed 31 moves. In week six, Nathaniel contributed 32 moves and his teacher 27 moves in 11 cycles. During week nine, the week that he read one of his new books completely independently, Nathaniel made 16 moves, as did his teacher

in just four cycles. During the last week of the study, Nathaniel made 36 moves and his teacher made 26 in 9 cycles.

Figure 5 displays the percentage of moves made by Adrienne and Nathaniel at weeks three, six, nine and twelve.
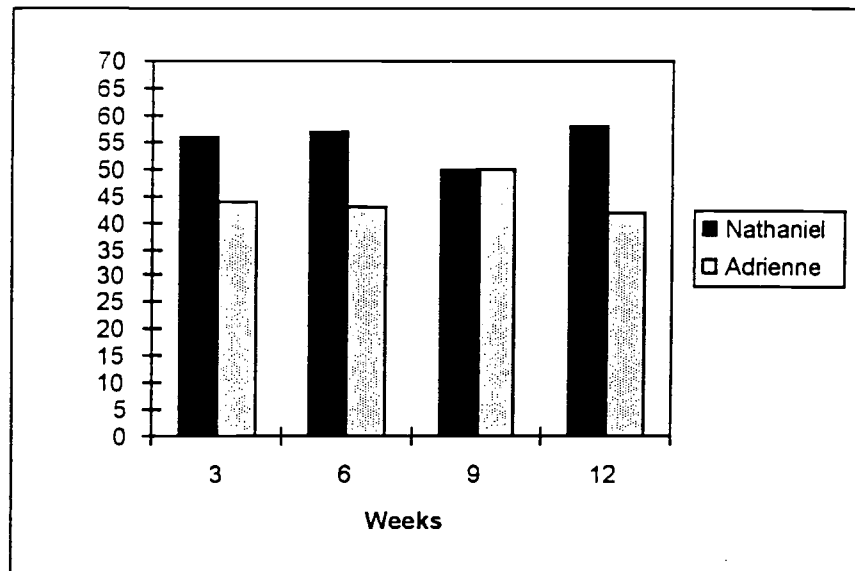

Figure 5. Division Of Teacher And Student Moves Within Cycles:
Adrienne and Nathaniel

It can be inferred from the previous table that Nathaniel and Adrienne usually made about the same number of moves as each other. This remained relatively unchanged over the course of the study. Even though the level of difficulty of texts remained relatively unchanged, the level of support that Adrienne had to give Nathaniel remained about the same: throughout the course of the study, she contributed about 50 percent of the moves. By contrast, it is interesting to note that John made the most moves, or contributions to their interactions, during the lessons in the last week of the study when the level of text was most difficult.

In the following section I will examine how the teacher's participation in the talk cycles changed over time and between students.

Analyzing the Talk Cycles: The Teacher's Participation

I described earlier (see Table 2) the categories of teacher moves that emerged from my coding. Figures 6 and 7 display the types and frequency of teacher moves that were present in

16

Adrienne's contributions to the talk cycles in Nathaniel and John's lessons. The same lessons were analyzed as in the previous figures which showed the students' participation in the cycles.
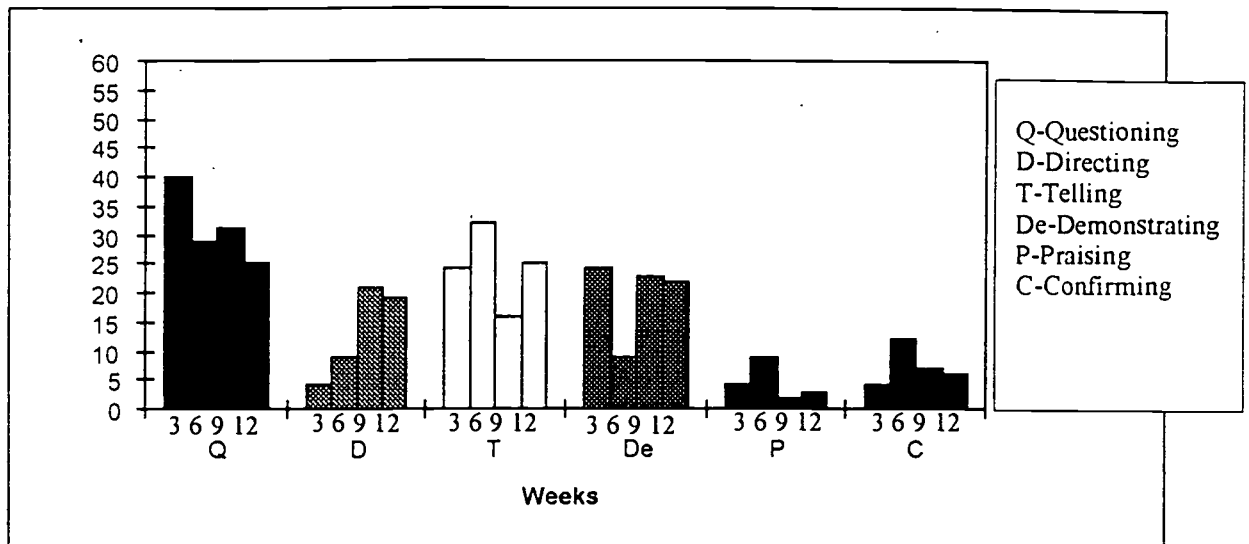

Figure 6. Frequency and Type of Teacher Moves in John's Lessons in Weeks 3, 6, 9 and 12

It is interesting to note the steady increase in Adrienne's use of directing moves. These moves have the effect of directing the student to take a problem solving action. For example, John read "The lion got up" but the text actually said: "The lion looked up". John did not notice the error and Adrienne directed him to take an action ("Read that again") without actually telling John what was wrong. Such moves by Adrienne were rare initially but became more common later on.

demonstrating move recorded for John represents this kind of action early on: the teacher reread and articulated the first sound of the word. I suspect that without these demonstrations of what it meant to "try the first sound" then Nathaniel did not know how to do what he was being directed to try.

Summary

Both Adrienne and John's participation in problem solving at difficulty changed over time. John took a greater role in problem solving, all the while reading more complex text. Adrienne appeared to shift from demonstrating problem solving action when John needed help, to directing him to take certain actions.

Nathaniel's participation in the reading process did not appear to change. He read text at about the same level of difficulty at the end of the study as he had at the beginning. Nathaniel's participation in the problem solving at difficulty changed very little as well. He seemed to need help as often and he did not take a greater role in the problem solving process. Unlike with John, Adrienne did not demonstrate problem solving actions with Nathaniel as frequently. Instead, she most often directed or questioned Nathaniel at difficulty. This kind of support seemed to be not helpful because it did not shift Nathaniel's participation in the activity so that he could become a more independent reader like John. On the basis of this analyses, there seems to have been a difference in the quality of the scaffolds created by Adrienne for John and Nathaniel.

Cazden (1988) and Bliss, Askew and Macrae (1996) all concur that it may be more difficult to scaffold a child's learning in a school setting where specialized knowledge is concerned than the kind of everyday learning that takes place at home. This study appears to support their belief. In fact, an important implication for one-to-one literacy tutoring emerges from this analyses.

Instead of focusing on Nathaniel and conditions within him as being the cause of his slow progress, attention is focused more on the way the teacher supports him in his problem solving. One may ask for example, "What is the nature of the support that the teacher is giving the student?" "Has the teacher provided clear demonstrations, as needed, of the tasks required of the student?" "Has the teacher continued to give clear demonstrations even as the task becomes increasingly more difficult?" "Is the teacher directing or questioning the student to take a problem solving move that he does not understand?"

It may be argued that such a perspective places too much responsibility on the teacher if the student does not succeed. It seems to me however that, rather than condemning the teacher, this perspective places tremendous power in her hands. Where once it may have been assumed that a

18

17

Figure 7 displays Adrienne's moves within cycles of interactions with Nathaniel, the student who made little progress.
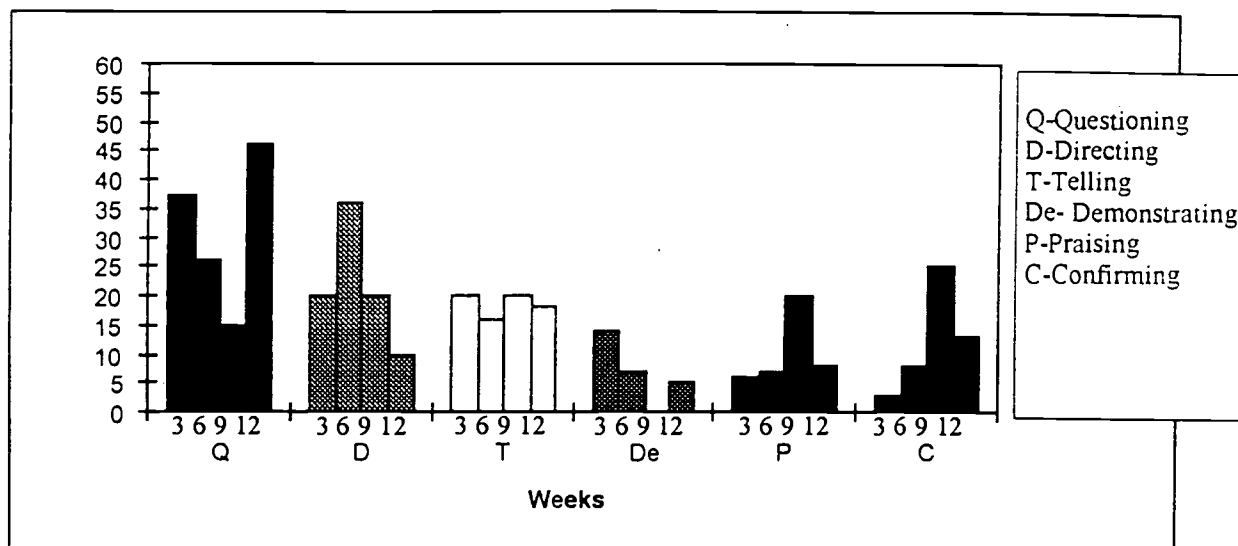

Figure 7. Frequency and Types of Teacher Moves in Nathaniel's Lessons in Weeks 3,6,9 and 12.

The most notable difference between the teacher talk in John and Nathaniel's lessons is the difference in the frequency of several types of moves. Nearly one quarter of all Adrienne's moves in John's lessons were demonstrating moves, with the exception of week six. Early on in the program she did not direct John to take a specific action - but she increasingly used this move by weeks nine and twelve. It can be inferred from the frequency and types of moves in the scaffolds in John's lessons that Adrienne demonstrated actions before she directed him to try them himself.

By contrast, the moves in Nathaniel's cycles of interactions were mostly directing and questioning moves from the outset. Although Adrienne used demonstrating moves in week three of the program - they only made up 14 percent of her moves, compared to 24 percent in John's program at that time. Thereafter, Adrienne rarely demonstrated for Nathaniel. Instead she seemed to make more directing and questioning moves. As a result, because she had not first demonstrated for Nathaniel, she was directing him to take actions that she had not taught him or she was questioning him about things he did not know.

For example, often Adrienne directed Nathaniel to try the first sound to help himself at difficulty, however she rarely demonstrated for him how to reread and articulate the sound of the first letter of the word. This was a common move in John's lessons. In fact, nearly every

child could not learn because of difficulties beyond the teacher's control (an impoverished home life for example) it can now be assumed that the teacher can have enormous influence on a child's learning.

A one-to-one tutoring context has the potential to provide powerful occasions for learning especially if, as Wood, Bruner and Ross (1976) noted the teacher combines her theory of the task at hand with their theories of their student's ability. I would add that effective tutorial instruction is not only tutee and task dependent, it is also dependent on the nature of the teacher and student's language interactions. This dynamic element is created when teacher, task and student come together. It can be molded to a large degree by the teacher insofar as she can examine and change her own talk, and in this way, create a rich learning context for a student just emerging into literacy.

20

References

Bliss, J., Askew, M. & Macrae, S. (1996). Effective teaching and learning: Scaffolding revisited. *Oxford Review of Education, 22* (1), 37-61.

Bodrova, E., & Leong, D.J. (1996). *Tools of the mind: The Vygotskian approach to early childhood education*. Englewood Cliffs, NJ: Prentice-Hall.

Cazden, C. (1988). *Classroom discourse: The language of teaching and learning*. Portsmouth, NH: Heinemann.

Clay, M.M. (1993a). *An observation survey of early literacy achievement*. Portsmouth, NH: Heinemann.

Clay, M., & Cazden, C. (1990). A Vygotskian interpretation of Reading Recovery. In L. Moll (Ed.), *Vygotsky and education* (pp. 206 - 222). NY: Cambridge University Press.

Cochran-Smith, M. (1984). *The making of a reader*. Norwood, NJ: Ablex.

Diaz, R., Neal, C., & Amaya -Williams, M. (1990). The social origins of self-regulation. In L.C. Moll (Ed.), *Vygotsky and education: Instructional implications and applications of sociohistorical psychology* (pp.127 - 154). NY: Cambridge University Press.

Glesne, C., & Peshkin, A. (1992). *Becoming qualitative researchers*. NY: Longman.

Hobsbaum, A., Peters, S., & Sylva, K. (1996). Scaffolding in Reading Recovery. *Oxford Review of Education, 22*(1), 17 - 35.

Luria, A. (1979). *The making of mind*. Cambridge, MA: Harvard University Press.

Marshall, C.M., & Rossman, C.B. (1995). *Designing qualitative research*. Thousand Oaks, CA: Sage.

Ninio, A., & Bruner, J. (1978). The achievements and antecedents of labeling. *Journal of Child Language, 5,* 1-15.

Patton, M.Q. (1990). *Qualitative evaluation and research methods*. NY: Sage.

Pinnell, G., Lyons, C., DeFord, D. Bryk, A., & Seltzer, M. (1994). Comparing instructional models for the literacy education of high-risk first graders. *Reading Research Quarterly, 29,* 8 - 39.

Rodgers, E. (1998, February). *Understanding teacher and student talk.* Paper presented at the 13th Annual Reading Recovery Conference and National Institute, Columbus, Ohio.

Rogoff, B. (1990). *Apprenticeship in thinking: Cognitive development in social context.* NY: Oxford University Press.-

21

Sinclair, J., & Coulthard, R. (1975). *Towards an analysis of discourse*. NY: Oxford University Press.

Taylor, D. (1983). *Family literacy: Young children learning to read and write*. Portsmouth, NH: Heinemann.

Vygotsky, L. (1978). *Mind in society: The development of higher psychological processes*. Cambridge, MA: Harvard University Press.

Wasik, B.A., & Slavin, R.E. (1993). Preventing early reading failure with one-to-one tutoring: A review of five programs. *Reading Research Quarterly, 28*(2), 178 - 201.

Wells, G. (1986). *The meaning makers: Children learning language and using language to learn*. Portsmouth, NH: Heinemann

Wood, D., Bruner, J., & Ross, G. (1976). The role of tutoring in problem-solving. *Journal of Child Psychology, 17,* 89 - 100.

Wood, D., & Middleton, D. (1975). A study of assisted problem-solving. *British Journal of Psychology, 66*(2), 181 - 191.

22

U.S. Department of Education
Office of Educational Research and Improvement (OERI)
National Library of Education (NLE)
Educational Resources Information Center (ERIC)

ERIC®

REPRODUCTION RELEASE
(Specific Document)

I. DOCUMENT IDENTIFICATION:

Title: Understanding Teacher Talk to Inform One-To-One Literacy Instruction

Author(s):

Corporate Source: AERA General Meeting

Publication Date: April 99
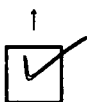
II. REPRODUCTION RELEASE:

In order to disseminate as widely as possible timely and significant materials of interest to the educational community, documents announced in the monthly abstract journal of the ERIC system, *Resources in Education* (RIE), are usually made available to users in microfiche, reproduced paper copy, and electronic media, and sold through the ERIC Document Reproduction Service (EDRS). Credit is given to the source of each document, and, if reproduction release is granted, one of the following notices is affixed to the document.

If permission is granted to reproduce and disseminate the identified document, please CHECK ONE of the following three options and sign at the bottom of the page.

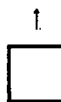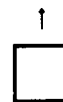| The sample sticker shown below will be affixed to all Level 1 documents	The sample sticker shown below will be affixed to all Level 2A documents	The sample sticker shown below will be affixed to all Level 2B documents
PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL HAS BEEN GRANTED BY ___ Sample ___ TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC) 1	PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE, AND IN ELECTRONIC MEDIA FOR ERIC COLLECTION SUBSCRIBERS ONLY, HAS BEEN GRANTED BY ___ Sample ___ TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC) 2A	PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE ONLY HAS BEEN GRANTED BY ___ Sample ___ TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC) 2B
Level 1 ↑ [✓]	Level 2A ↑ [ ]	Level 2B ↑ [ ]
Check here for Level 1 release, permitting reproduction and dissemination in microfiche or other ERIC archival media (e.g., electronic) *and* paper copy.	Check here for Level 2A release, permitting reproduction and dissemination in microfiche and in electronic media for ERIC archival collection subscribers only	Check here for Level 2B release, permitting reproduction and dissemination in microfiche only

Documents will be processed as indicated provided reproduction quality permits.
If permission to reproduce is granted, but no box is checked, documents will be processed at Level 1.

I hereby grant to the Educational Resources Information Center (ERIC) nonexclusive permission to reproduce and disseminate this document as indicated above. Reproduction from the ERIC microfiche or electronic media by persons other than ERIC employees and its system contractors requires permission from the copyright holder. Exception is made for non-profit reproduction by libraries and other service agencies to satisfy information needs of educators in response to discrete inquiries.

Sign here,→ please

Signature: Emily Rodgers

Organization/Address: The Ohio State University 29 W. Woodruff Ave.
200 Ramseyer Hall
Columbus, Ohio 43210

Printed Name/Position/Title: Emily Rodgers Visiting Assistant Professor

Telephone: 614 292 9288

FAX: 614 292 4260

E-Mail Address: rodgers.42@osu.edu

Date: 11/10/99

(over)

III. DOCUMENT AVAILABILITY INFORMATION (FROM NON-ERIC SOURCE):

If permission to reproduce is not granted to ERIC, *or*, if you wish ERIC to cite the availability of the document from another source, please provide the following information regarding the availability of the document. (ERIC will not announce a document unless it is publicly available, and a dependable source can be specified. Contributors should also be aware that ERIC selection criteria are significantly more stringent for documents that cannot be made available through EDRS.)

Publisher/Distributor:	
Address:	
Price:	

IV. REFERRAL OF ERIC TO COPYRIGHT/REPRODUCTION RIGHTS HOLDER:

If the right to grant this reproduction release is held by someone other than the addressee, please provide the appropriate name and address:

Name:	
Address:	

V. WHERE TO SEND THIS FORM:

Send this form to the following ERIC Clearinghouse:

University of Maryland
ERIC Clearinghouse on Assessment and Evaluation
1129 Shriver Laboratory
College Park, MD 20742
Attn: Acquisitions

However, if solicited by the ERIC Facility, or if making an unsolicited contribution to ERIC, return this form (and the document being contributed) to:

ERIC Processing and Reference Facility
1100 West Street, 2nd Floor
Laurel, Maryland 20707-3598

Telephone: 301-497-4080
Toll Free: 800-799-3742
FAX: 301-953-0263
e-mail: ericfac@inet.ed.gov
WWW: http://ericfac.piccard.csc.com