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Researchers claim that effective teachers adapt their instruction to meet their students' learning needs (see for instance, Bransford, Darling-Hammond, & LePage, 2005; Duffy, 2005; Pressley, Allington, Wharton-McDonald, Block, & Morrow, 2001). Little research has examined how teachers adapt their instruction or their reasons for doing so. While more open tasks lead to more student engagement and learning in different studies (Miller & Meece, 1999; Thornburg, 2005; Turner, 1995), there is little evidence to show how teaching adaptations are related to the openness of literacy tasks and student engagement.

In this study, I used a mixed-method multiple case study design (Creswell, 2005) to study six teachers' literacy instruction in each of the six elementary grade levels. Specifically, I explored the teaching adaptations as they are related to academic tasks and student motivation as measured by engaged time on task. I observed each teacher's literacy instruction approximately every three weeks over one school year to identify the teaching adaptations and rationales for those adaptations, the openness of literacy tasks and student motivation as measured by engaged time on task. After each observation I interviewed the teacher for the purposes of verifying that adaptations were changes on-the-fly and to collect their rationales for adapting.

Six case studies, one each from kindergarten to fifth grade, revealed that there is an overall low to low relationship between the quality ratings of adaptations and the openness of tasks. Thus, adaptations occurred most frequently during closed tasks and

were rated overwhelmingly as minimally thoughtful. Counter to findings from previous research on tasks and motivation, this study also found that engaged time on task was high despite the fact that the tasks were closed. Implications of how contextual issues influence methodological procedures, and studying thoughtfully adaptive teaching as it relates to tasks, teachers, engagement, and rationales are discussed.

TEACHING ADAPTATIONS AS THEY ARE RELATED TO ACADEMIC TASK

AND STUDENT ENGAGEMENT

by

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Approved by

_____
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To my beloved Granny, Betty Ross Qualls Greene

APPROVAL PAGE

This dissertation has been approved by the following committee of the Faculty of

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CHAPTER I

INTRODUCTION

This dissertation is a study of teachers' adaptations as they are related to academic

task and students' engagement. This chapter contains the background for the study. First,

I discuss the problem that this research explores, the research questions that guide the

study and the significance. Next, I provide definitions for terms used throughout this

research. Finally, I review the literature which provides a foundation for this research.

Problem and Research Questions

Various educators have claimed that effective teachers are responsive to students'

learning needs by adapting their teaching on the spot (Allington & Johnston, 2002;

Bransford, Darling-Hammond, et al., 2005; Duffy, 2005; Mazzoni & Gambrell, 2003;

Pressley, Allington, Wharton-McDonald, Block, & Morrow, 2001) and how that is

beneficial for students' engagement and learning (Miller & Meece, 1999; Pressley, 2006;

Thornburg, 2005; Turner, 1995). In recent studies of teachers' instructional adaptations

and rationales for adaptations, few thoughtful adaptations or rationales were observed

across multiple case studies (Duffy et al., 2008). Additionally, there were no data

regarding the impact on students (Duffy et al., 2008).

However, data from an earlier phase in the adaptive teaching research conducted

by Duffy and his colleagues (2006) suggested that teachers using more open tasks had

more frequent and thoughtful instructional adaptations and higher rates of student

engagement. Consequently, this study was designed to determine whether adaptations were related to the openness of tasks and, if so, whether they are in turn associated with greater motivation, as defined as engaged time on task. The specific research questions this study seeks to answer are:

1. Is there a relationship between teaching adaptations and the openness of literacy tasks?

2. If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?

It is important to note two important items. First, these questions examined *only* those adaptations that occurred in conjunction with a task. Therefore, while I will report all adaptations made by each teacher, the only ones used to answer the questions were the adaptations made during tasks. Second, rationales are not a focus of this research. They were collected starting in January in order to be consistent with the larger goals of the research team, as well as for their potential in further understanding adaptations.

Significance in Terms of Thoughtfully Adaptive Teaching

This study is important to the research on thoughtfully adaptive teaching because there is little empirical evidence about the relationship between the teaching adaptations, openness of literacy tasks and the extent of student engagement (Duffy et al., 2008; Duffy et al., 2006). It is also important that researchers find ways to determine whether there is any relationship between teachers' adaptations and student outcomes. Researchers claim that effective teachers have engaged students who learn more (Allington & Johnston,

2002; Pressley et al., 2001). Additionally, researchers claim that effective teachers adapt their instruction (Bransford, Darling-Hammond, et al., 2005; Pressley et al., 2001; Duffy, 2005). Without this evidence to support these claims, they will remain theoretical. This study explores whether adaptations are tied to specific tasks in actual classrooms across the elementary (K-5) grade levels. While all adaptations will be noted and coded, only the adaptations occurring in conjunction with tasks will be analyzed.

Definitions

In this section I provide definitions of terms used throughout this research. This study was conducted in the context of literacy instruction, defined as reading and writing instruction. I define adaptive teaching, rationales, quality ratings, tasks and openness of tasks, and student engagement.

Adaptive Teaching

For the purpose of this study, the definition for adaptive teaching followed the definition set forth by Duffy and his colleagues (2008). A teacher is making an adaptation if it is non-routine, proactive, thoughtful, and invented; if it includes change in the professional knowledge or the professional practices the teacher was using; and if it is done to anticipate students' learning needs. Perceived adaptations were confirmed as such by the teacher during the post-observation interview. Additionally, this study follows the distinction that Duffy and his colleagues (2008) made between teachers' reactive responses and adaptations. An adaptation is defined as meeting all three of the following criteria: (a) it was non-routine, proactive, thoughtful, and invented; (b) it included a change in the professional knowledge or the professional practices the teacher was using;

and (c) it was done to anticipate the needs of students or instructional situations (Duffy et al., 2008). Codes for adaptations can be found in Appendix C.

Rationales

For the purpose of this study, rationales were defined as the reasons teachers provided for the adaptations they made. Rationales were provided during post-observation interviews in response to a probe. Thus, rationales were teachers' oral reflections (Risko, Roskos, & Vukelich, 2005) of why they adapted their instruction. In my study, codes for adaptations and rationales described above were developed by Duffy and his colleagues (2008) through a grounded theory analysis (Glaser & Strauss, 1967) of lessons and teacher interviews. See Appendix D for codes used for rationales. While rationales are not part of my research questions, I kept track of them from January until the end of April and reported them.

Quality Ratings

Quality ratings were defined as the varying levels of thoughtfulness amongst adaptations and rationales developed by Duffy and his colleagues (2008) and I use their rubric to explain the quality levels (see Appendix E). Thus, adaptations and rationales can be categorized as considerably thoughtful, thoughtful, and minimally thoughtful. Considerably thoughtful is when the teacher makes exemplary or creative use of professional knowledge or showing exemplary or creative understanding of professional practices *and* the adaptation or rationale is clearly associated with a larger goal the teacher holds for literacy growth; thoughtful is when the adaptation or rationale is tied to the specific lesson objective and/or to a larger goal the teacher wants to develop *and* does

not meet any of the criteria for minimally thoughtful; and minimally thoughtful is when the adaptation or rationale requires minimal thought, the teacher's use of professional knowledge or practices is fragmented, unclear or incorrect, *and* the adaptation or rationale does not contribute to the development of either a larger goal or specific lesson objective (Duffy et al., 2008).

Academic Tasks

For the purpose of this study, academic tasks were defined as the work products students were required to complete as part of the instruction (Doyle, 1983). While activities typically occur throughout instruction to promote understanding, such as guided practice and sharing, academic tasks in this study were limited to tangible work products assigned by the teacher. Thus, academic tasks included any tangible student responses to task prompts that were completed in a physical form, such as drawings, paintings, models, writings, and computer-generated student work. These tasks were completed independently, with the teacher's assistance, in partners, and in groups. In instances where tasks defined in this way were not present during observed lessons, it was noted in reporting the data. Participating teachers were not required to assign a task for observed lessons.

Openness of Tasks

For the purpose of this study, the openness of tasks was defined in terms of Parson's (2008a) Academic Task Rubric and is operationally defined in the rubric (see Appendix B). This rubric was adapted from research about academic tasks and student engagement (Duke, Purcell-Gates, Hall, & Tower, 2006/2007; Miller & Meece, 1999;

Thornburg, 2005). Open was rated as a 3, moderately open was rated as a 2, and closed was rated as a 1 for each of five categories. Thus, an overall rating of 12-15 was an open task, an overall rating of 9-11 was a moderately open task, and an overall rating of 5-8 was a closed task. Open tasks require higher levels of thought with more cognitive demands, whereas closed tasks require lower levels of thought with few cognitive demands (Miller, 2003; Turner, 1995). Moderately open requires both higher and lower levels of thought and characteristics from both open and closed categories are present (Thornburg, 2005; Turner, 1995).

The terms high, medium, and low will be used to discuss the relationship between the adaptations and their associated tasks. Considerably thoughtful adaptations will be considered as high, thoughtful adaptations will be considered medium and minimally thoughtful will be considered low. Likewise, open tasks will be considered high, moderately open tasks will be considered medium and closed tasks will be considered low. Thus, a high to high relationship between the adaptation and task indicates that the adaptation was considerably thoughtful and the task was open, whereas a low to low relationship would indicate that the adaptation was minimally thoughtful and the task was closed. However, the adaptation and task may not always have the same ranking. For instance, there could be a medium to low relationship, where the adaptation was thoughtful, but the task was closed. Hence, there will be nine possible combinations of adaptations and tasks: High to high, high to medium, high to low; medium to high, medium to medium, medium to low; low to high, low to medium, and low to low.

Student Engagement

For the purpose of this study, student engagement was defined as students' percentage of time-on-task (Anderson, Evertson, & Brophy, 1979; Guthrie, 2004; Pressley et al, 2001; Woolfolk, 2007) while completing the academic tasks as measured by Thornburg's (2005) Student Engagement Log (see Appendix A). For the purpose of this study, on-task behavior was defined as students' active participation in working toward task completion without distraction. The percentage of time-on-task was measured using the Student Engagement Log (see Appendix A) adapted from Thornburg's (2005) research. For the purpose of this study, off-task behavior was defined as not working toward task completion due to other distractions or general lack of involvement. Following Thornburg's (2005) definition, off-task behaviors included doing such things as playing with pencils, talking, sleeping, drawing, walking around, looking around, etc. Further, an on-task percentage of 66 percent or more was considered to be on-task behavior.

As described more fully in Chapter II, the following data will be collected and analyzed in order to answer the two research questions. First, adaptations and rationales will be collected in association with literacy tasks. Next, tasks will be rated. Then, students' engagement will be measured using the Student Engagement Log (see Appendix A).

In this section I provided definitions of terms used throughout this research. Next, I provide the review of the literature which provides a foundation for this research.

Review of the Literature

Introduction

There are three relevant issues to review for this study and they will be discussed in separate sections below. They are: (a) adaptive teaching and teachers' rationales for adapting, (b) tasks, and (c) student engagement.

Research on Teachers' Adaptations and their Rationales for Adapting

In this section I review the literature that provides the foundation for teachers' adaptations and rationales. First I review the literature on reflections, which began nearly 75 years ago with Dewey. Next, I review the literature on teachers' decision-making. Finally, I review the literature on thoughtfully adaptive teaching and rationales.

Research on reflections. Previous research examines teachers' reflections on why they made decisions in their instruction (Clark & Peterson, 1986; Dewey, 1933; Romano, 2006; Risko, Roskos, et al., 2005; Schon, 1983; Zeichner & Liston, 1996). According to Dewey (1933), teachers' reflections begin when there is an event that cannot be immediately resolved. In this troublesome event, teachers pause to analyze the experience and how to proceed, such as proceeding with the instruction as planned or to adapt the instruction based on the classroom event. Further, Dewey (1933) made the distinction in adaptive teaching between the routine or automatic responses, and the reflective or thoughtful and purposeful. While Dewey began this line of research 75 years ago, it continues to be pursued today.

Schon (1983) made the distinction between automatic actions teachers make in the classrooms each day and thoughtful reflections. Indeed, teachers examining their

practice through reflection in order to improve their craft are more thoughtful than those who make adaptations and are unable to express why they did so afterwards (Schon, 1983). Further, Schon (1983) determined that teachers can reflect in three different times, before, during, or after a lesson is taught. What Schon (1983) calls reflection-on-action occurs before or after a lesson is taught. Teachers making adjustments, or adaptations, on the spot during instruction are participating in what Schon (1983) calls reflection-in-action. Reflection-in-action occurs when there is a troublesome event and the teacher engages in critical thinking, making instructional adaptations to solve the problem on the spot (Schon, 1983). When soliciting the rationales, or reasons, behind instructional adaptations, this engages the teacher in reflection-on-action, since it is a prompted reflection after the event occurred. It is assumed that by adapting their instruction, teachers are engaging in reflection-in-action. The reflection-in-action is important for understanding teachers' rationales for their instructional adaptations.

According to Zeichner and Liston (1996), reflective teachers think about how they will solve the problem at hand. Instead of being compliant technicians, reflective teachers consider their own expertise when making instructional decisions (Zeichner & Liston, 1996). Reflections of instructional decisions can have different levels of thought and different topics (Zeichner & Liston, 1996). Indeed, Zeichner and Liston (1996) recognize the "complex realities of teaching" (p. 62) and suggest that teachers sharing their reflections for their many instructional decisions can lead to true professional development, where teachers continue to learn about teaching through reflecting on their teaching. Thus, asking teachers to provide reasons, or rationales, for their instructional

adaptations allows teachers to reflect on their teaching, which could lead to their own professional growth.

Reflections compel teachers to provide reasoning for their instructional decisions (Risko, Roskos, et al., 2005). These decisions can be made to anticipate future actions, to analyze and reflect on past actions, or in the moment while the teacher engages in reflection of the situation, where teachers engage in problem-solving processes (Risko, Roskos, et al., 2005; Risko, Vukelich, & Roskos, 2002). When teachers provide rationales for their instructional decisions that they made in the moment, it provides them with opportunities to reflect aloud on their actual teaching. Risko and her colleagues (2002, 2005) found that collecting teachers' reflections in written formats often stifles the teachers' abilities to reflect. Thus, collecting teachers' oral rationales would allow teachers to freely express their reasons for their instructional adaptations without the constraints of writing.

The research on teachers' reflections often overlaps with research on teachers' decision-making because reflection is based on teachers' actions. Actions are driven by decisions. Thus, the next logical step is to examine the research on teachers' decision-making.

Research on decision-making. Joyce and Harootunian (1964) made the case for studying student teachers' instructional decisions and their reasons for doing so to identify what constitutes "teacher effectiveness." Their study came at a time when society thought effective teaching was intuitive rather than intellectual, so Joyce and Harootunian (1964) aimed to make the connection between the thinking behind the teaching and

content from the university's coursework. It was assumed that the reasons why teachers made instructional decisions would reveal how knowledge from their coursework informed their teaching (Joyce & Harootunian, 1964). After observations and interviews of 39 student teachers' lessons, Joyce and Harootunian (1964) decided there was a lack of thoughtful and reasoned responses regarding instructional decisions. Thus, there was a lack of transfer from the teacher education program to the real classroom teaching. Joyce and Harootunian (1964) recommended that more opportunities be provided for education majors to practice what they learn in their coursework in order to enhance their decision-making skills.

Recognizing Joyce and Harootunian's (1964) recommendation for decision-making and in an effort to help teachers learn to make better professional decisions related to students' learning in the classroom, Hill and Martin (1971) provided training for inservice teachers in the decision-making process. Thus, solving problems in the classroom using a decision-making model was emphasized rather than simply making choices. When provided with classroom scenarios, teachers were found at the end of the training to have a greater perceptual awareness of the steps in the decision-making process in their written responses to the prompts. Hill and Martin's (1971) study was conducted as professional development outside of actual classrooms and there was still a need to studying decision-making with inservice teachers in the moments the decisions were made. Thus, lessons in future studies were videotaped and used during interviews as stimulated recall to identify decisions made (see, for instance, Sutcliffe & Whitfield, 1976).

In their study of observable, immediate decisions, Sutcliffe and Whitfield (1976) found that teachers were often unaware of the decisions they made in the moment while teaching. After analyzing videotaped lessons and using stimulated recall with participating teachers during the interviews, three observable stimuli that caused teachers to make decisions were students' behavior, lesson content, and the environment (i.e., materials, distractions beyond student behavior). Additionally, Sutcliffe and Whitfield (1976) found that experienced teachers believed that making spur of the moment decisions without awareness of the decision-making process was a measure of experience. This informed the field because now there were themes identified as kinds of decisions made in actual classrooms and the possible connection to teacher development was made. Thus, it was a possibility that decision-making had to do with teaching experience.

Building on Sutcliffe and Whitfield's (1976) findings, Hargreaves (1977) recognized that different kinds of decisions were made in the classroom each day and that they require different levels of thought. For instance, a curricular decision would warrant more thought than making a decision related to managerial issues in the moment (Hargreaves, 1977). Additionally, teachers with more experience made such managerial decisions automatically because they had experienced similar situations already, whereas new teachers found each situations novel. Thus, experienced teachers have the ability to automatically anticipate students' actions and predict what will work for their students, while new teachers learn from each new problem as it arises. Hargreaves (1977) advocated asking teachers for their rationales for each decision that they made in order to

understand the goals, the knowledge used to understand the problematic event, and the action. However, Hargreaves (1977) found it difficult for teachers to provide rationales for their instructional decisions because they did not typically discuss their tacit knowledge. This study was important in furthering our understanding of teachers' decision-making because it affirmed that decisions were made based on kinds of stimuli and discussed how teachers differ in their decision-making skills, as well as the levels of thought behind their decisions.

Calderhead (1981) reviewed studies on teachers' decision-making and found that teachers deviate from their plans when something unexpected happens in the classroom. Additionally, teachers most often cited issues of classroom management for making decisions about changing their lessons, followed by instructional concerns. Further, Calderhead (1981) found that the research literature suggested there were developmental implications for teachers' decision-making. Indeed, beginning teachers are more concerned with their performance and control of the classroom whereas experienced teachers are more concerned with students' learning (Fuller, 1969, as cited in Calderhead, 1981). Thus, in studies where novice and experienced teachers were provided with scenarios from classrooms, novice teachers' decisions were focused on managerial aspects while experienced teachers' decisions focused on students' learning. Calderhead (1981) suggested that teachers who make decisions to alter their instruction and analyze why they made those decisions would be more metacognitive in their teaching. This review was important because it was found that teachers make decisions at different

times, for different reasons, and that teachers' development influences their instructional decision-making.

Recognizing that teachers make decisions at different times from previous research, Shavelson (1983) reviewed studies that explored teachers' decision-making as it related to both the planning and interactive phases of instruction. Shavelson (1983) found that decisions made during the interactive phase are made while teaching and are, therefore, made quickly. Often those decisions to make changes (adaptations) to instruction are made due to a problem that arises and the teacher does not stray far from the lesson plans (Shavelson, 1983). Indeed, teachers were found to be reluctant to adapt their instruction, mainly because they wanted to preserve the routines and keep classroom management intact. Thus, Shavelson's (1983) review on decision-making research narrowed the focus to decisions made at both the planning phase and interactive phase (teaching), and the purposes for making those decisions. Still, more research was needed in actual classrooms with inservice teachers.

Putnam and Duffy (1984) studied Duffy's preactive and interactive decision-making when teaching elementary grades reading instruction. Interactive decisions were categorized as either related to classroom management concerns (materials, organization, etc.) or instructional changes (examples given, the lesson itself, responding to students) (Putnam & Duffy, 1984). Interactive decisions regarding management diminished as routines and procedures were established and few instructional changes were made, due to the decisions made in the preactive phase (Putnam & Duffy, 1984). However, students' cues prompted Duffy to make interactive decisions and he changed his instruction in the

moment to meet his students' learning needs. This study furthered the field's understanding of interactive and preactive decisions made during reading instruction, while providing evidence supporting previous research findings of themes in the decision-making stimuli.

Clark and Peterson (1986) reviewed studies that examined teachers' decision-making while teaching and determined that the majority of decisions made in these teachers' classrooms were focused on the students or instructional strategies. These studies are the precursor to research on adaptations and the rationales because the researchers focused on the causes behind teachers' decisions while reflecting on videotaped lessons with the teacher and talking about the teacher's thoughts. By contrast, this study identifies adaptations during observations of actual instruction and the teacher confirmed whether or not it is an adaptation during the semi-structured interview. Further, in the Clark and Peterson (1986) review, decisions were inferred from interview questions and discussions, whereas this study uses clearly defined and established criteria for what constitutes adaptations and rationales (see above section on adaptations for criteria) from Duffy and his colleagues (2008), including levels of thoughtfulness (see Appendix E). Additionally, Clark and Peterson (1986) categorized the causes for teachers' decisions as being related to student and non-student cues. Student cues included students' questions, responding to behavioral issues, and selecting students to answer prompts. Non-student cues included the minutia of teaching, such as time limitations, interruptions, and issues with classroom materials.

Duffy, Roehler, and Putnam (1987) found that accountability concerns and teaching in mandated ways did not allow even more experienced teachers to make decisions about their instruction because their focus was on complying with mandates. Indeed, teachers' independent instructional decisions took more effort than following the provided materials and they found it easier to follow the mandated materials, despite the fact that they were more effective in their instruction when the teachers were the decision-makers (Duffy et al., 1987). Thus, contextual issues influence teachers' ability and willingness to make decisions in their instruction. Duffy (1993) challenged teacher education programs to ". . . figure out how to help teachers take charge of their own instruction so that they can be creatively adaptive in shaping and modifying instructional interactions" (p. 244). Only then will teachers be able to think for themselves when making instructional decisions in their classrooms (Duffy, 1993).

Studying teachers' instructional decisions provides a better understanding of the process of teaching, as well as the thoughts behind the decisions (Borko & Shavelson, 1990; Joyce & Harootunian, 1964). Borko and Shavelson (1990) found that teaching includes numerous routines, which minimize conscious decision making and instead allows teachers to monitor student cues. Instructional adaptations (changes) occur when the cues indicate potential problems or unexpected classroom events and those adaptations are minor adjustments (Borko & Shavelson, 1990). Like Clark and Peterson (1986), Borko and Shavelson (1990) identified student cues and non-student cues as prompts for instructional adaptations. In their review of studies on differences between experienced and novice teachers' decision making, Borko and Shavelson (1990) found

that experienced teachers were able to quickly draw upon their knowledge of students and classrooms to adapt their routine when change was necessary. Additionally, experienced teachers adapt their instruction with automaticity, or without conscious awareness (Borko & Shavelson, 1990). Further, the focus of adaptations for experienced teachers tends to be based on instructional concerns, whereas novice teachers tended to focus more on classroom management and behavioral concerns (Borko & Shavelson, 1990).

Bransford, Darling-Hammond, et al. (2005) claim that in order to be effective, teachers must be able to handle the complexity of the classroom. Hammerness and her colleagues (2005) discuss these classroom complexities and illustrate how multiple demands are made on teachers and require many decisions to be made simultaneously. This requires teachers to not only know their students and how they learn, but also continuously monitor students' learning in order to make decisions moment-by-moment (Bransford, Derry, Berliner, Hammerness, & Beckett, 2005; Hammerness et al., 2005). Thus, ongoing assessments enable teachers to adapt their instruction to provide additional support for students to enhance their learning (Bransford, Derry, et al., 2005).

In her study of a teacher's instructional decisions made during second grade writing and their triggers (cues), Pole (2006) found that the amount of time between the implementation of the decision and the actual enactment mattered when trying to find the reasons behind the decisions. When the teacher had more time to make and implement the decision, it was more likely that the decision was grounded in curriculum, whereas decisions made close in time to implementation were more likely to be informed by

students' needs. Similar to the student and non-student cues Clark and Peterson (1986) and Borko and Shavelson (1990) found for teachers' decision-making, Pole found the following triggers (cues) for decisions: What to teach, how to group students, classroom procedures, where writing happens in the classroom, writing goals, and the use of supplies and materials. Further, Pole (2006) found that the more the decisions were made based on students' learning needs, the more evident it was that the students learned.

Romano (2006) acknowledges that teachers often make decisions instinctively while confronting a problematic situation and frequently many decisions are made at once. However, those instinctive decisions are made based on their knowledge or beliefs (Romano, 2006). In order to understand the reasoning behind the immediate decisions teachers make in their classrooms, reflections allow the teachers' reasoning to be shared instead of lost with the moment. Romano's (2006) study of "bumpy moments" examined ". . . the teaching incidents that require the teacher to engage in reflection to make an immediate decision" (p. 974) in responding to those troublesome incidents. Teachers revealed their reasons for their instructional decisions through oral reflections during and after the "bumpy moments" (Romano, 2006). Indeed, teachers' revealing their thinking sheds light on why they made their instructional adaptations.

Schepens, Aelterman, and Keer (2007) further explore the interactive cognitions, or reflections while teaching, of preservice teachers through stimulated recall interviews to determine changes in their interactive cognitions. Findings indicated that themes in the reflections evolved from concerns about self to concerns about students as the preservice teachers gained experience, but the amount of change varied due to contextual constraints

(Schepens et al., 2007). Like Romano (2006), Schepens and her colleagues (2007) suggest that teachers place decisions they make in long-term memory, so that they easily retrieve this information when facing the same situation in the future. Thus, as teachers gain experience, they tend to make adaptations automatically and stimulated recall interviews allow teachers to share the rationales behind their actions.

While the research on teachers' reflections and instructional decision-making extends back at least 75 years to Dewey (1933), a gap in the literature remains. In order to fully understand how and why teachers make instructional decisions on-the-fly, an investigation of their teaching adaptations is needed.

Research on thoughtfully adaptive teaching and rationales for adapting.
Adaptive teaching is where teachers transform instruction to meet their students' academic needs as they are teaching (Duffy et al., 2008). Some researchers have described this type of teaching as responsive elaboration (Duffy & Roehler, 1987), responding to bumpy moments (Romano, 2006), adaptive expertise (Bransford, Darling-Hammond, et al., 2005), adaptive metacognition (Lin, Schwartz, & Hatano, 2005), flexibly accommodating teachable moments (Pressley et al., 2001), and opportunistic teaching (Wharton-McDonald & Hamptson, 2006). Regardless of the label, it is agreed that good teachers recognize and make the most of these teachable moments in response to students' learning needs (Wharton-McDonald & Hampston, 2006).

This is a timely topic because various educators have made the claim that there is a connection between adaptive teaching and teacher effectiveness (see, for instance, Bransford, Derry, et al., 2005). Further, educators have made the claim that more

effective teachers deviate from their lesson plans to make adjustments in their instruction

to meet students' learning needs while teaching (Allington & Johnston, 2002; Pressley et

al., 2001). For instance, the teaching situation, such as students' learning needs, drives

instructional decisions (Clandinin & Connelly, 1996; Stodolsky & Grossman, 2000;

Wharton-McDonald, Pressley, & Hampston, 1998; Wharton-McDonald & Hampston,

2006). Indeed, researchers have found that effective teachers made instructional decisions

based on students' learning needs by using a variety of strategies and techniques to fit the

situation (Stodolsky & Grossman, 2000; Wharton-McDonald et al., 1998). Thus, teachers

are considered adaptive experts when they recognize students' lack of understanding and

flexibly alter their instruction in order to meet their students' learning needs (Bransford,

Darling-Hammond, et al., 2005; National Research Council, 2000; Stodolsky &

Grossman, 2000).

The unpredictability of the classroom and need for simultaneous decisions place

great demands on teachers, yet ". . . the need for adaptive teaching within this complex

environment persists" (Corno & Snow, 1986, p. 624). Adaptive teachers make

instructional adjustments based on students' responses and their perceptions of students'

understanding and motivation for learning (Corno & Snow, 1986; Corno, 2008). Indeed,

adaptive teaching is student-centered, where scaffolding is provided when needed to

build students' understanding. In short, adaptive teachers are spontaneously responsive to

their students' learning needs (Corno, 2008).

Stodolsky and Grossman (2000) found that some teachers make minor

adjustments, while others make larger adaptations to the curriculum. While adaptations

varied, teachers made choices as to whether and how they would adapt based on their teaching contexts, learning goals, and relationships with and expectations for students. Teachers from a collegial department that valued professional development were flexible in designing their instruction, nurtured relationships with students and their families, and had high expectations for all of their students made more adaptations and felt that they were effective in their instruction (Stodolsky & Grossman, 2000).

Romano (2006) investigated adaptations, or bumpy moments, made in four teachers' elementary classrooms, but focused on the different types of knowledge they used when making the adaptations instead of the rationales behind the adaptations. In accord with previous researchers (Dewey, 1933; Duffy et al., 2008; Schon, 1983), Romano made the distinction between automatic responses to commonplace events and incidents which require more thought. Overwhelmingly, issues regarding classroom management followed by unpreparedness and time management were the adaptations made in Romano's (2006) case studies.

To develop a better understanding of adaptive teaching, the reasons behind such adaptations should also be examined. While researchers acknowledge the numerous decisions teachers make due to the complexity of the job (see, for instance, Bransford, Darling-Hammond, et al., 2005; Clark & Peterson, 1986; Romano, 2006), there is little research on why teachers adapt their instruction in the moment (Duffy et al., 2008; Duffy, Webb, & Davis, in press). Instead, the focus has been on teachers' reflections on their actions in the classroom (see, for instance, Dewey, 1933; Schon, 1983) and the causes behind teachers' decisions (see, for instance, Clark & Peterson, 1986).

Liston and Zeichner (1990) assert that educational rationales are justifications for teachers' instructional decisions. However, those rationales are shaped by the norms and standards of the school context, as well as by the teachers' values and beliefs (Liston & Zeichner, 1990). Collecting teachers' rationales is important for understanding their instructional adaptations, especially as they relate to the school context and their values and beliefs.

In 13 recent case studies examining teachers' rationales for their adaptations, Duffy and his colleagues (2008) found a variety of reasons teachers provided for their adaptations (see Appendix D). Additionally, differing levels of thought were found in teachers' rationales (see Appendix E). This finding supports prior distinctions (Dewey, 1933; Schon, 1983) between the routine or automatic responses, and the reflective or thoughtful and purposeful.

Summary of research on teachers' adaptations and their rationales for adapting. Adaptive teaching has been a topic of interest in our field, at least since Dewey (1933). The terminology differs from one study to the next, so that what Duffy and his colleagues (2008) call adaptive teaching has also been described in such terms as responsive elaboration (Duffy & Roehler, 1987), responding to bumpy moments (Romano, 2006), opportunistic teaching (Wharton-McDonald & Hampston, 2006), and so forth. Many researchers claim that teachers who adapt their instruction to meet their students' learning needs are more effective (see, for instance, Bransford, Derry, et al., 2005; Wharton-McDonald et al., 1998). However, we lack empirical evidence to make the connection between adaptive teaching and effective teaching.

Reasons behind teachers' actions have been collected in various studies for a number of years. This line of research follows teachers' reflections on their actions in the classroom (Dewey, 1933; Shon, 1983) and the causes behind teachers' decisions while reflecting on lessons (Clark & Peterson, 1986). However, there are few studies about teachers' reasons for adapting their instruction (Duffy et al., 2006; Duffy et al., 2008).

There is evidence that rationales for instructional adaptations can be collected and coded for type of rationale and level of thoughtfulness (Duffy et al., 2008). However, further investigation is needed with a larger sample size and over a longer period of time to strengthen these findings. Additionally, more research is needed to determine whether there is a relationship between teaching adaptations and tasks.

Research on Tasks

Previous studies of academic tasks focus on students' motivation for learning (Doyle, 1983; Miller & Meece, 1997; Miller & Meece, 1999; Miller, 2003; Thornburg, 2005), self-regulated learning (Paris, Byrnes, & Paris, 2001; Paris & Paris, 2001; Perry, 1998), and authenticity of tasks (Duke et al., 2006/2007; Parsons, 2008a; Teale & Gambrell, 2007). For instance, in separate studies and in different grade levels, both Turner (1995) and Thornburg (2005) found that students completing more challenging tasks preferred more open tasks and were more engaged with the lessons. Turner (1995) conducted observations of teachers' instruction and students' motivation in first grade classrooms. As a result, Turner (1995) distinguished task types as being "open" and "closed." Open tasks were more student-directed, where students had more choices in

their problem solving and learning, whereas closed tasks were teacher-directed and there was one right answer.

Similar to Turner's (1995) research on tasks, Miller and Meece (1999) collected third-grade students' completed work samples and developed levels for the tasks. Similar to Turner's (1995) open tasks, Miller and Meece's (1999) high-challenge tasks required students to use higher cognitive processes to get an answer. Thus, students would work more with partners or groups, have choices in their tasks, engage in more extended writing (sentences and paragraphs), and work on tasks for more than a single setting or day (Miller, 2003). Similar to Turner's closed tasks, Miller and Meece's (1999) low-challenge tasks required minimal thought for completion. For instance, students completing a low-challenge task would work independently on a single-day assignment requiring few marks, such as circling the correct answer, filling in the blanks with words, and turns it in for a grade (Miller, 2003). Thornburg's (2005) work adapted Miller and Meece's (1999) challenge levels by introducing a "medium-challenge" category. Thus, Thornburg suggested that a blend of descriptors from the high-challenge and low-challenge categories would be necessary for the tasks that do not fit one category or the other, due to the task requirements.

Parsons (2008b) borrowed from previous research on academic tasks (Duke et al., 2006/2007; Miller & Meece, 1999; Thornburg, 2005) to create an academic task rubric to determine the openness of literacy tasks (see Appendix B). The challenge level was rated by five criteria: the authenticity of a task, the amount of collaboration during the task, the cognitive challenge of the task, how student directed or teacher directed the task is, and

the sustainability of the task (Parsons, 2008b). Within each section there are three possible ratings, which when summed provides an overall rating for the challenge level of a literacy task (Parsons, 2008b). Tasks are considered open if the total score is 12-15, moderately open is 9-11, and closed is 5-8. Construct validity of the task rubric is based upon previous research on each of the five task components, which demonstrates that they enhance students' engagement and learning (see, for instance, Duke et al., 2006/2007; Miller & Meece, 1999; Turner, 1995).

In three separate case studies of adaptive teaching, findings suggest that open tasks used during literacy instruction resulted in different types of adaptive teaching and more student engagement than those found in teachers' classrooms where closed tasks were the norm (Duffy et al., 2006; Kear, in progress; Parsons, 2008a; Scales, in progress). Indeed, there was a noticeable difference in lessons that were followed by academic tasks that promoted practicing isolated skills rather than having a more authentic purpose to connect school literacy learning with "outside of a learning-to-read-or-write context" (Duke et al., 2006/2007, p. 346). Thus, the implications from the number and types of adaptations from different contexts raised questions as to whether there is a relationship between teaching adaptations and the openness of the literacy tasks, and a corresponding relationship with student motivation as measured by engaged time on task.

Additionally, it was found that when open tasks were used, the quality of the instructional adaptations was rated at considerably thoughtful or thoughtful (Parsons, 2008a). When closed tasks were used, the quality of the adaptations was rated as minimally thoughtful. Hence, there appears to be a relationship between the openness of

the task and the quantity and quality of the adaptations. However, these case studies were limited to one semester, student engagement data was not collected across all three studies, and levels of thoughtfulness of the adaptations were not coded in two of the studies. Therefore, there is no empirical evidence whether there is a relationship between teaching adaptations, openness of the literacy tasks, and student outcomes as measured by engaged time on task.

Summary of research on tasks. Previous studies have shown that students prefer open tasks and are more engaged with the lessons when there are more challenging tasks (Miller & Meece, 1999; Thornburg, 2005; Turner, 1995). Descriptors have been used to determine the challenge level of tasks, such as high- and low-challenge (Miller & Meece, 1999), Thornburg's (2005) addition of medium-challenge to Miller and Meece's (1999) work, and open and closed (Turner, 1995). Parsons (2008) borrowed from previous research on tasks (Duke et al., 2006/2007; Miller & Meece, 1999; Thornburg, 2005) to create an academic task rubric. This study uses Parson's (2008a) task rubric to rate tasks as open, moderately open, and closed (see Appendix B).

Findings from separate case studies on adaptive teaching suggest that open tasks result in different types of teaching adaptations and more student engagement than classrooms where closed tasks are the norm (Kear, in progress; Parsons, 2008a; Scales, in progress). In one of the studies, it was found that the openness of the task corresponded with the quality of the adaptation. Hence, an adaptation made during an open task typically was rated as more thoughtful than when closed tasks were used (Parsons, 2008a). However, these studies were limited to one semester each, were small in scale,

and data collection and coding procedures varied across studies. Thus, there is little empirical evidence whether there is a relationship between the teaching adaptations made during literacy instruction, the openness of the academic tasks students are asked to complete, and student outcomes as measured by engaged time on task.

Research on Student Engagement

While the research on different aspects of student engagement is vast, this study narrowly defines student engagement as students' percentage of time-on-task (Anderson et al., 1979; Guthrie, 2004; Pressley et al., 2001; Woolfolk, 2007) while completing the academic tasks as measured by Thornburg's (2005) Student Engagement Log (see Appendix A).

In studies of elementary school teaching and learning, researchers have repeatedly found that students engaged in learning with high rates of time-on-task have higher achievement levels than those who have lower rates of time-on-task (Allington & Johnston, 2002; Anderson et al., 1979; Blair, Rupley, & Nichols, 2007; Pressley et al., 2001; Taylor, Pearson, Clark, & Walpole, 2000; Taylor, Pressley, & Pearson, 2002). Indeed, students actively engaged in practicing what is taught have increased opportunities for achieving proficiency (Allington, 2006; Guthrie, 2003; Guthrie, 2004; Pressley et al., 2001).

Providing students with opportunities for practice requires tasks to be assigned and completed. Researchers claim that students are most engaged when the tasks are for authentic purposes that extend beyond school learning (Duke et al., 2006/07; Guthrie, 2004; Mazzoni & Gambrell, 2003; Pressley, 2006; Teale & Gambrell, 2007), allow for

collaboration with others and allow for student choice (Allington & Johnston, 2002; Guthrie, 2003, 2004; Mazzoni & Gambrell, 2003; Miller & Meece, 1999; Pressley, 2006; Thornburg, 2005). When students persist at tasks (are engaged), it is assumed that they are motivated to learn (Mazzoni & Gambrell, 2003; Pressley et al., 2001; Turner, 1995; Woolfolk, 2007). Thus, Thornburg (2005) designed a student engagement log (see Appendix A), which was used in this study, as a means for determining students' motivation during tasks. On-task behavior is defined as students' active participation in working toward task completion without distraction.

The use of time-on-task as a student measure in educational research has a long and distinguished history. In 1976 Bell and Davidson reported that their study was the first to study the relationship between student on-task behaviors and student achievement. Their study was conducted in 23 classrooms in grades four, five, and six in four different elementary schools. Percentage of time spent on a task was used to measure the on-task behaviors after three observations and achievement was measured by a standardized intelligence test and teacher-made tests. Bell and Davidson (1976) found that on-task behavior did not indicate higher achievement on teacher-made tests. Instead, teachers' behaviors influenced students' on-task behaviors, which resulted in student performance in the classroom (Bell & Davidson, 1976).

While reviewing her previous research from the mid to late 1970s on academic learning time, Stallings (1980) noted that time spent on tasks was related to achievement in reading and math. Indeed, student-engaged time (time-on-task) was found to be positively associated with achievement tests. Further, in their study of effective teaching

in first-grade reading groups, Anderson and her colleagues (1979) found that time-on-task in follow-up activities (tasks) is important for student achievement. Students in their first grade studies who worked on their seatwork achieved more than those who did not.

Brophy and Good (1986) reviewed the literature on teacher behaviors linked to student achievement. They found that the teachers who had the highest achievement were task-oriented. Further, students achieved more when they had high engagement in academic activities (tasks) (Brophy & Good, 1986). Indeed, the research findings suggested that the most learning occurred when students worked at a brisk pace but in small steps for continuous progress. Not only did students achieve when they were on-task, but they had higher achievement when they were successful with the tasks (Brophy & Good, 1986).

In an experimental study of teaching in the Netherlands, it was found that when teachers increased the amount of instructional time and time spent on tasks, student achievement improved (Houtveen, Booij, de Jong, & van de Grift, 1999). However, this improvement could be the result of extensive professional development on instructional strategies provided as part of this study. Nevertheless, students' time-on-task was connected to increased student achievement in this study and has been connected to student achievement in a large number of research studies (Walberg & Wang, 1986, as cited in Houtveen et al., 1999).

In their studies of exemplary first-grade teachers, Pressley and his colleagues (2001) found that in classrooms with high reading and writing achievement most of the students were engaged in literacy tasks for most of the time. Indeed, the teachers in their

case studies deemed most effective had high rates of students on task for most of the time. These findings support previous findings that students' time-on-task is a contributing factor to student achievement.

A large study of teacher education programs indicated that the graduates from quality teacher education programs rated "excellent" by their principals had higher levels of engagement (time-on-task) with text than those that did not (IRA, 2003). Not only were these students on-task more, they also demonstrated greater understanding of texts during interviews (Hoffman et al., 2005). Once again, students' levels of engagement (time-on-task) indicated student understanding.

In a small study of a fourth grade classroom, Thornburg (2005) found that students' percentages of time-on-task were related to the openness of the task. Thus, students were on-task more when the task was more challenging and students had lower rates of time-on-task when the task was lower in challenge.

In sum, nearly thirty years of research in classrooms indicate that time-on-task is associated with student achievement and engagement. While other contextual factors also contribute to student achievement, studies have found time-on-task an important and valid measure. However, there is no empirical evidence as to whether there is a relationship between teaching adaptations, openness of literacy tasks, and student motivation as measured by engaged time on task.

Summary of Related Literature

In this section, I described how this study of teachers' adaptations as they are related to academic task and students' engagement addresses gaps in the research

literature. I have established from previous research that: (1) teachers appear to adapt their instruction to meet their students' learning needs; (2) open tasks seem to lead to more student engagement; and (3) student engagement as measured by time on task is an important outcome for achievement.

Conclusion

This chapter provided the background for this study. I discussed the problem that this research explores and the research questions that guide the study. Next, I discussed the significance of this study and defined terms used throughout this research. Finally, I reviewed the literature which provides a foundation for this research.

CHAPTER II

METHODOLOGY

Researchers claim that effective teachers are responsive to students' learning needs by adapting their teaching on the spot. Additionally, it has been suggested that effective teachers adapt in ways that benefit students' engagement and learning. Further, researchers have repeatedly found that students engaged in learning with high rates of time-on-task have higher achievement levels than those who are not engaged and have lower rates of time-on-task. However, there is little research about the relationship between teaching adaptations as they are related to academic task and student engagement. Thus, this study explored the possibility that there is a relationship between the adaptations, academic tasks and student engagement.

In this chapter, I describe the methods used in this study. First, I explain the research design. Next, I describe the setting and participants. Then, I explain data collection and analysis procedures. I then discuss how I ensure trustworthiness in this research. Finally, I discuss the limitations.

Methods

Design

This study used a mixed-method multiple case study design (Creswell, 2005) to study six teachers' literacy instruction in each of the six elementary grade levels. While observing literacy instruction, I examined the openness of the tasks assigned and the

extent of student engagement while completing these tasks, the teaching adaptations, and the relationship among these phenomena. Collective case study methodology was used because describing and comparing multiple cases allows for in-depth understanding (Barone, 2004; Creswell, 2005) of the phenomena under study and allows patterns to emerge across cases while predicting similar results in replications (Barone, 2004). Indeed, Yin (2003) asserts that multiple cases are "likely to be stronger than single-case designs" (p. 19). According to Barone (2004), case study methodology is "particularly effective when studying complex phenomena in real-life situations" (p. 14). Classrooms are definitely complex, real-life situations. In this multiple case study, data collection methods included qualitative data (e.g., interviews and observations) and quantitative data (e.g., task rubric and student engagement log). Since both qualitative and quantitative data were collected simultaneously, the triangulation mixed methods design (Creswell, 2005) seemed the most appropriate fit for this study. Using multiple sources of evidence increases the construct validity when triangulated (Maxwell, 2005; Yin, 2003).

School Setting

This study occurred at Green Meadows Elementary (pseudonym), a Title 1 school in a southeastern city. During the study, Green Meadows served approximately 565 students in grades pre-kindergarten through fifth grade. Class size ranged from approximately 13 students in each kindergarten through second grade class, to 18 in each third grade class, and up to 24 in each fourth- and fifth-grade class. Approximately 78% of students received free or reduced priced lunch. The student population was approximately 56% African American, 16 % Caucasian, 12% Hispanic, 6% Multiracial,

3% Asian, 0.3% Native American, and 6.7% Other (D. Paul, personal communication, October 2008). Further, 55% of the students were male and 45% were female (D. Paul, personal communication, October 2008).

This was Green Meadows' first year serving as a Professional Development School (PDS). As a PDS, 25 junior interns from the University of North Carolina at Greensboro (UNCG) elementary education program were there all day on Wednesdays and Friday mornings for a total of ten hours each week. My role as UNCG faculty included supervising the interns as well as teaching classes. Additionally, high school students enrolled in the Teacher Cadet program observed during the school day and other local universities placed student teachers with Green Meadows' special subject teachers (PE, Music, Art, etc.). Thus, the teachers and students at Green Meadows became accustomed to having interns in their classrooms and university supervisors observing.

Since Green Meadows agreed to serve as a PDS, it was also agreed that the school would partner with UNCG faculty members to promote collaboration in improving teaching and learning through research and professional development. Thus, the principal granted permission for me to work with the teachers to pursue research while providing them with professional development.

Gaining Entrance

I acknowledge that my roles as university faculty and supervisor set me apart from the school, resulting in being perceived as an outsider and having power. However, I did not promote myself as an outside expert. Following suggestions for qualitative research (Creswell, 2005), I developed positive, professional relationships with the Green

Meadows administrators, teachers, and students prior to beginning my research. For example, I met with the principal, assistant principal, and both curriculum facilitators before the start of the school year in order to introduce myself and discuss the university interns' placements and roles in the classroom. We met formally and informally throughout the school year to discuss interns' progress, teaching methods, curriculum issues, etc. At the start of the fall semester, I met with the Green Meadows teachers to introduce myself and talk with them about the UNCG program, their roles as mentor teachers, their interns' roles in the classroom, as well as to answer any questions. To build relationships with the Green Meadows teachers, I attended grade level meetings throughout the school year and briefly talked with them individually before or after school each day. Each day the interns were at Green Meadows, I observed their classrooms for approximately 20 minutes. Further, I established a tutoring/service learning program, participated in special celebration days, such as Dr. Seuss Day and Community Day, and mentored teachers pursuing National Board certification to demonstrate my level of commitment to teaching and learning at Green Meadows. Thus, I attempted to position myself as a supporter for the school, teachers, and administrators, where I held the role of collaborator instead of expert to promote teaching and learning at Green Meadows.

After meeting with the principal to get recommendations for teachers who he thought used a variety of tasks in their literacy instruction, I met individually with those teachers about my research. I shared the task rubric (see Appendix B) with them and briefly discussed the research behind it. We discussed what each of the task ratings meant

and would look like in the classroom. Next, I briefly shared the student engagement log (see Appendix A) with them and briefly discussed the research on how students who are engaged, or on task, are learning. I explained that I would make a copy of their lesson plans and then observe their literacy instruction to note what I perceived as adaptations they made in their teaching. Further, I shared the teacher interview protocol (see Appendix F) with them to explain that I would meet with them during non-instructional times (e.g., planning time or after school) for an interview where they would share whether or not they were adaptations and the rationales for their adaptations.

Participants

Teacher Participants

The principal recommended six teachers that he believed used a variety of tasks in their literacy instruction to participate in this study, one from each grade level in kindergarten through the fifth grade. Since the fifth-grade teacher taught only math, she recommended her teaching partner, who taught reading and writing. Thus, it was a convenience sample (Mertens, 1998), as the participants teach in the PDS where I supervised university interns. The six participating teachers in this study represented each of the elementary grade levels and had different types of teaching experiences.

Ms. Macy (all names are pseudonyms) was a white woman who taught kindergarten at Green Meadows. This was her eleventh year teaching, but her third year teaching kindergarten. Previously, she taught the fifth grade for eight years. Ms. Macy was pursuing National Board certification during the study. Patient and enthusiastic, Ms.

Macy knew her students' strengths and areas needing improvement, both socially and academically. Her literacy instruction followed the state-adopted basal materials.

Ms. Jones was a black woman who taught first grade. This was her fifth year of teaching first grade. Ms. Jones was pursuing National Board certification during the study and talked about enrolling in a master's degree program part time for the following year. She maintained a brisk pace in her teaching and ensured that students followed the routines and procedures. Ms. Jones' literacy instruction followed the state-adopted basal materials.

Ms. Smith was a black woman who taught second grade. This was her fifth year of teaching second grade. Ms. Smith was pursuing National Board certification during the study. As grade level chair, Ms. Smith made sure the second grade teachers attended their planning sessions and that their lessons were well organized for the following week. Each of the second grade teachers was responsible for planning a specific subject for the following week and provided handouts and copies for the other teachers. Ms. Smith enjoys teaching. She kept a brisk pace in her classroom and kept students on task at all times. Her literacy instruction tended to follow state-adopted basal materials.

Ms. Akers was a white woman in her 27th year of teaching. She taught in a private school for eleven years and switched to public school for better benefits. As grade level chair, Ms. Akers coordinated the third grade teachers so they had the same lesson plans and materials. Calm and patient, Ms. Akers kept her class running smoothly by maintaining a brisk pace. She had clear expectations and her students responded accordingly. Literacy instruction in Ms. Akers' class followed the state-adopted basal

materials and incorporated daily practice tests that resembled the state-mandated End-of-Grade (EOG) test.

Ms. Rogers was a black woman in her ninth year of teaching. Prior to teaching fourth grade at Green Meadows, Ms. Rogers taught seventh grade language arts. She was completing her master's degree in education during the study. The fourth grade at Green Meadows changes classes for math and literacy. Thus, Ms. Rogers taught the same literacy plans to two groups of students each day. Ms. Rogers had a relaxed classroom atmosphere that could be interpreted as chaotic and she often played a soothing jazz CD in the background. She was a patient teacher who did not have established routines or expectations. Ms. Rogers' students frequently tested boundaries through misbehavior. Literacy instruction in Ms. Rogers' class followed the state-adopted basal materials.

Ms. Brown was a white woman in her first year of teaching. She was a graduate of the UNCG teacher education program and took my children's literature methods course as an undergraduate. The fifth grade at Green Meadows changed classes for math and literacy. Ms. Brown taught the same literacy plans to two groups of students each day. She was a patient teacher who cared about her students. Ms. Brown's routines and expectations were clear. Literacy instruction in Ms. Brown's class followed the state-adopted basal materials and incorporated daily practice tests that resembled the state-mandated End-of-Grade (EOG) test.

Student Participants

Following Thornburg's (2005) procedures for selecting participants, the teachers identified students of high, average, and low ability according to their classroom grades,

participation in discussions, and completion of homework. I then selected two students per ability level as target students in each classroom. When given the choice, I selected a male and female for each ability level, preferably from different ethnicities. While I attempted to observe the same student participants each time, absences and transiency interfered with that plan. Parents of all students in participating teachers' classrooms were informed of the study and asked to provide permission for their child to participate. Since students did not participate in interviews, their assent was not sought.

Intervention

As part of the PDS agreement, Green Meadows allowed UNCG faculty members to conduct research in their school with the understanding that there would be a true partnership in improving teaching and learning. Collaboration with teachers and UNCG faculty was important for fostering a partnership. Thus, I provided individualized professional development for my participants.

While individualized professional development was part of the study, it was part of the context rather than part of the research. During the first post-observation teacher interview, each participating teacher was given a copy of the task rubric (see Appendix B) and further explanations of what makes a task open, moderately open, or closed. From the second post-observation interview until the last, I asked the teachers if they still had their copy of the task rubric after I interviewed them about adaptations and rationales. If they did not, I provided an additional copy for them. I then reviewed each of the literacy tasks with them from that day's lessons and the rating criteria for each.

I offered to serve as a coach for each of the participating teachers in both designing and implementing tasks that were moderately open and open. Further, additional meetings were not required of the participating teachers as a group. Instead, they received this year-long professional development and coaching on an individual basis during the post-observation teacher interview and were based on their interests in the openness of tasks and how to implement them. This type of professional development followed Duffy's (2005) recommendation that professional developers spend time in the field coaching teachers in their classrooms, based on what the teachers need. In this study, I consulted with the teachers about designing and implementing moderately open and open tasks and support their efforts, but did not directly tell them to use the information (Duffy, 2005).

Data Collection

Data Sources

This study examined teachers' adaptations and their relationship to the openness tasks and students' engagement while completing tasks. Data sources included field notes of observations of teachers during literacy instruction, teacher interviews, an academic task rubric, a student engagement log, and participating teachers' lesson plans.

Field notes were taken on notebook paper and contained my perceptions of teachers' adaptations made during literacy instruction. I quickly wrote what the teachers did and/or said that seemed to be a change from what I saw in the copy of their lesson plans. I recorded the date, time, teacher's name, and lesson context at the top of the page.

During the post-observation interview I used the teacher interview protocol as found in Appendix F. I recorded the date, time, and teacher's name at the top of the page. The teacher interview protocol was a single sheet of paper containing three questions. The first question asked, "When I saw you _____ during the lesson, was that a spontaneous change, something you had not planned?" If it was a spontaneous change, I asked why they made that change in order to collect their rationales. Next, I asked them to, "Tell me what you thought of the six target students' levels of engagement during the task completion. Was it typical? Why or why not?" Finally, I asked them, "How long will the task take before it is complete? Will the task take place for one sitting, one or two days, or will it span over three or more days?"

I used an academic task rubric (see Appendix B) to rate the openness of tasks. The task rubric and its rating process were described in Chapter 1 and the procedures for rating tasks is described more thoroughly later in this chapter. As I took field notes, I kept several copies of the task rubric at hand because some literacy lessons contained more tasks than others. While I took digital pictures of a representative sample of students' tasks, the pictures were not used as a data source. Instead, they served two purposes. First, they were part of my audit trail. Second, they were used to validate my ratings.

The student engagement log (see Appendix A) was a single sheet of paper containing a chart. At the top I recorded the date, time, lesson context, and teacher's name. Spaces for the time and task were included on the chart, as were boxes to note whether students were on or off task. Procedures for recording student engagement are described more thoroughly in the data procedures section of this chapter. I kept several

copies of the student engagement log on hand for two reasons. First, additional logs were needed when I ran out of space. Second, I needed a copy of the student engagement log for each lesson in order to keep my documentation well organized.

Teachers' lesson plans took many different formats and were not required to follow a set structure. Typically the plans were handwritten procedures for teaching each subject during the school day. They tended to be written in spiral bound teachers' lesson plan books purchased from an office supply store. One teacher typed her plans and another created a template where she jotted notes on the schedule for the day.

Using multiple sources of evidence increases the construct validity when triangulated, because they provide multiple measures of the same phenomenon (Creswell, 2005; Maxwell, 2005; Yin, 2003).

Sources of evidence to determine adaptations included field notes of observations, lesson plans, and teacher interviews about adaptations. For instance, during the observation, I used a copy of the lesson plan as a guide to note adaptations. Whether they were adaptations or not was confirmed by the teacher during the post-observation interview. Thus, each data source for determining adaptations supported findings from the other two sources.

Although rationales were not part of the research questions, they are reasons for the adaptations. The source of evidence to determine the rationales for teaching adaptations was a probe about rationales during the teacher interviews.

Sources of evidence to determine the openness of tasks included field notes of observations, lesson plans, and teacher interviews. Each data source for determining the openness of tasks supported the findings from the two other sources.

In this study, sources of evidence to determine student engagement included field notes of observations, the results of the Student Engagement Log (see Appendix A), and teacher interviews (see Appendix F) about the target students' engagement levels (see Appendix A). Thus, each data source for determining student engagement supported findings from the other two sources.

For the three variables in the study there were three data sources to support the findings. Table 1 indicates sources of evidence for triangulation in this study.

Table 1. *Sources of Evidence*

Variable	Data 1	Data 2	Data 3
Adaptations	Field notes of observations	Lesson plans	Teacher interviews
Openness of Task	Field notes of observations	Lesson plans	Teacher interviews
Engagement	Field notes of observations	Results of Student Engagement Log	Teacher interviews

Data Collection Schedule

Participating teachers' literacy instruction was observed approximately every three weeks (see Table 2), with most of the interviews conducted the day of the observation. All interviews occurred during non-instructional time, such as during planning time and after school. Data collection occurred in participating teachers' classrooms between September 25 and April 30. Holidays, teacher workdays, and

conference days were taken into consideration when determining the data collection schedule. Primary data collection days were Tuesdays and Thursdays in the fall and Mondays through Wednesdays in the spring. The observation schedule changed with the changes in my university teaching schedule at the start of the spring semester. Other changes in the schedule occurred when participating teachers requested I come on certain days and avoid practice testing days. Make-up days were scheduled when possible when teacher participants were absent, going on field trips, etc. Scheduled observation days that could not be made up are noted in Table 2.

Some teachers had complementary schedules so I could observe two teachers on the same day. This occurred most frequently with first and second grade. For example, Ms. Smith's literacy instruction was from 8:10 – 9:55 and 12:55 – 1:25 and Ms. Jones' was from 10:10 – 11:00, 12:00 – 12:45, and 1:45 – 2:15. Another pair of teachers whose schedules were complementary was fourth and fifth grade. Ms. Brown's fifth grade literacy block was from 9:00 – 11:00 and Ms. Rogers' was from 11:45 – 2:00. When my university obligations (teaching, meetings, and supervision duties) and the teachers' schedules allowed, I spent the observation date split between two classes.

The estimated total number of hours I spent in each classroom ranges from 15 (fifth grade) to 25 hours (fourth grade). Table 2 illustrates the estimated number of hours I spent in each classroom. I spent whole days in some classrooms and approximately two hours in others because of differences in teachers' literacy instruction schedules. Some teachers planned 90 minutes each day for literacy instruction to occur in that block of time, whereas others spread out literacy instruction so that it occurred throughout the day.

I spent the most time in fourth grade because the fourth graders changed classrooms midway through the day and literacy instruction for both groups was quite different. Thus, I observed both groups. Although fifth grade also changed classrooms midway through the day, I observed both blocks of instruction and determined the morning group received the most literacy instruction. Thus, I observed only the fifth grade teacher's morning group.

Another reason why the total number of hours I spent in each class differs is because of the nature of instruction. If there was rarely a task involved or if the teacher frequently omitted that lesson, I began to ask upon my arrival if there would be a task or if a task would be included. For instance, I did not always observe Ms. Macy's kindergarten guided reading group because most of the time there was no task. I would ask upon my arrival in the morning if there would be a guided reading task before the observation began. Additionally, teachers often planned grammar and writing instruction, yet I never saw that instruction. For instance, Ms. Brown's fifth grade schedule and lesson plans included time for grammar and writing instruction during the afternoon. However, the class tended to be outside for recess or packing up at that time. I asked upon my arrival in the morning if grammar and writing would be part of the day's lessons. If it was not, then I did not observe during that time. Across all six classrooms, writing tended to be the lesson that teachers skipped when pressed for time.

Table 2 below illustrates the data collection schedule for six participating teachers. Table 3 illustrates the number of hours per observation per teacher.

Table 2. *Data Collection Schedule for Participating Teachers and Total Hours Observed*

Teacher	Observation Dates								Hours
K	09/27	*	11/08	12/13	01/28	03/11	04/01	**	19
1	09/25	10/16	***	12/11	01/08	02/04	03/03	04/29	18
2	10/04	10/25	11/15	12/13	01/08	02/04	03/03	04/28	19
3	10/11	11/01	12/06	01/16	02/06	02/27	04/09	04/30	18
4	10/02	10/23	11/13	01/14	02/11	02/26	****	04/22	25
5	10/09	11/13	12/11	01/10	01/30	02/20	04/02	04/23	15
Total observed hours									**114**

*Teacher K's 10/18 observation was cancelled due to my research team meetings.
**Teacher K's 04/29 observation was cancelled due to the teacher's eye injury.
***Teacher 1's 11/06 observation was cancelled due to a teacher workday.
****Teacher 4's 03/18 observation was cancelled due to teacher's absence.

Table 3. *Number of Hours of Observation per Teacher*

Obs. Grade	1	2	3	4	5	6	7	8
K	2 hours 15 min.	*	3 hours 10 min.	40 min.	5 hours	4 hours 40 min.	3 hours 15 min.	**
1	2 hours 5 min.	2 hours 5 min.	***	1 hour 30 min.	2 hours 15 min.	2 hours 15 min.	2 hours 15 min.	5 hours 35 min.
2	2 hours 20 min.	2 hours 30min.	1 hour 50min.	3 hours 30 min.	1 hour 30 min.	2 hours 30 min.	2 hours 15 min.	2 hours 35 min.
3	2 hours 30 min.	2 hours 30 min	2 hours	2 hours	2 hours 30 min.	2 hours	2 hours 30 min.	2 hours
4	2 hours 15 min.	2 hours 15 min	2 hours 15 min.	3 hours 30 min.	4 hours 15 min.	4 hours 15 min.	****	6 hours 15 min.
5	3 hours 15 min.	2 hours	1 hour 30 min.	1 hour 45 min.	1 hour 35 min.	1 hour 50 min.	1 hour 35 min.	1 hour 30 min.

Data Collection Procedures

Literacy instruction at the school typically lasted two hours each day. A typical

observation began with my arrival at least ten minutes before literacy instruction began in

order to copy and look over the lesson plans for literacy instruction and identify the target

students. First, I greeted the teacher upon arrival and made small talk if students had not yet arrived for the day. Second, I located the lesson plans and copied them in the main office. The teachers used different lesson plan formats and, at times, helped me locate the plans. Next, I drew a map of the seating arrangement on notebook paper with students' names, ability levels, and a defining characteristic (such as "red T-shirt") so I could keep track of students as they moved to different areas of the classroom. Then, I transferred the participants' names to the student engagement log (see Appendix A) to prepare for each literacy lesson as outlined in the teacher's plans. Last, I arranged my data collection forms so the copy of the teacher's lesson plan was on top, followed by the seating arrangement map, then my blank notebook paper, the task rubric (Appendix B), and the student engagement log (Appendix A).

I assumed that each literacy lesson would have a task, so I made notes of perceived adaptations throughout the observations. Thus, during the entirety of the observations, what I perceived as adaptations from the teacher's lesson plans were noted on notebook paper in order to jog my memory during the post-observation interview (see Appendix F) as to what the adaptation was and when it occurred during the lesson. Then, when the teacher explained the task to the students, I wrote that explanation at the top of the task rubric (see Appendix B). Next, I circled the rating for the authenticity of the task, the level of collaboration, the challenge of the task, and how student directed it was (see Appendix B). To address sustainability of the task, I asked the teacher in the post-observation interview how long the task would take for completion if it was incomplete. If the task was complete by the end of the observation, I confirmed that it was indeed

complete with the teacher during the post-observation interview. I jotted the teacher's answers about sustainability on the interview protocol form (see Appendix F) and transferred that information over to the task rubric. This was also recorded and transcribed. Once each of the five task rubric categories were rated for the task, I added the numbers to come up with a total score for each task. Tasks with a total of 5-8 points were considered closed, 9-11 points were moderately open, and 12-15 points were open. When there was no task, the observation did not count as part of my data collection.

Once students were assigned a literacy task, I recorded the six target students' engagement using Thornburg's (2005) Student Engagement Log (see Appendix A) by scanning the room every three minutes as they completed the task. When students were in center activities, only the students working with the teacher at the teacher's center were observed. This scan allowed me to note whether the six target students were on-task or if they were off-task. Following Thornburg's (2005) criteria, on-task behavior was defined as students' active participation in working toward task completion without distraction. Off-task behaviors included doing such things as playing with pencils, talking, sleeping, drawing, walking around, looking around, etc. (Thornburg, 2005). Finally, I took one digital picture of each task to assist with maintaining an audit trail. Pictures were taken of the tasks that were representative of the six target students or the groups they worked with and were not used as a data source. Pictures were not taken while students were present. Rather, this occurred after the class transitioned to another lesson and during times when it would not cause interruptions of teaching and learning, such as recess or snack.

Post-observation, face-to-face, semi-structured teacher interviews about teaching adaptations, rationales, task sustainability, and students' engagement (see Appendix F) were scheduled to occur the same day as the observation. All teacher interviews occurred in their classrooms during non-instructional times, such as during planning times or after school. These interviews were audio-taped and transcribed. A semi-structured interview protocol (see Appendix F) guided these interviews. During the interview I asked about the instances where I perceived adaptations from the lesson plans. If the teacher responded that it was indeed an adaptation, I probed for the rationale behind that adaptation. I probed as needed, encouraging teachers to share to get the most elaborate response possible to each question (Creswell, 2005).

Task ratings were not immediately shared with the teachers because the research team first needed to establish interrater reliability, which occurred in October. Thus, the research team first had to collect task rubrics before rating them. Once interrater reliability was established among the research team members, the task ratings from each observation were shared with the teachers during the post-observation interviews. This portion of the interview was not audio-taped because I wanted it to be more relaxed, as the tape recorder seemed to make my participants nervous. Once the tape recorder was turned off, the teachers were more talkative and their body language suggested they were more at ease.

After talking about the adaptations and rationales, I asked the teachers if they still had their copy of the task rubric. If they did not, I provided an additional copy for them. I then reviewed each of the literacy tasks with them from that day's lessons and the rating

criteria for each. I asked them how they could have altered the tasks to increase the openness. In each instance, the teachers knew exactly how they would increase the openness of their tasks by looking at each of the five categories on the task rubric (see Appendix B). I affirmed their suggestions and offered to help them plan future lessons and tasks.

Other data collection measures and results were shared when teachers asked about them. However, since their ongoing professional development was about designing and implementing more open tasks, the main focus was coaching each teacher about tasks to support their efforts.

Data Analysis

Organization of data was important for data analysis to go smoothly. I obtained a three ring binder for each teacher before the data collection began to help me organize the data. Each observation was tabbed with a dated sticky note. The lesson plans were first, followed by my map of the classroom. Next were the task rubric, student engagement log, and notebook paper on which I indicated what I perceived as adaptations to the lesson. Each lesson during that observation date followed that pattern of task rubric, student engagement log, and perceived adaptations. Last were the teacher interview notes, transcripts from the interview, and researcher notes. This system helped me readily locate the task for each teacher per observation and identify adaptations associated with the tasks so the research team could analyze only those associated with tasks.

Data Coding/Rating

Coding Teacher Data

A research team analyzed adaptations, rationales, and task quality on five related research studies. Since the three senior researchers (Kathryn Kear, Seth Parsons, and I) collected data on these variables using the same data collection instruments for our dissertations, we coded adaptations, and rationales together, as well as establishing interrater reliability for coding tasks. The two junior research team members (Stephanie Davis and Baxter Williams) examined adaptations and rationales in their pilot studies and were part of the coding process for those two areas only. When coding adaptations and rationales, we agreed as a research team that we should have at least three of the five members present for coding adaptations and rationales, and that all must agree on a rating.

Meetings were scheduled once interviews had been transcribed. Since there were five research team members, our data collection and coding sessions overlapped at times. We established whose data would be coded on our meeting dates. Data for dissertations were coded before pilot study data in each meeting. Often, two or three researchers had data to code at each meeting. We gathered around a large table in an office, meeting room or empty classroom at the university and reviewed our definition of an adaptation and the rubric for rating the thoughtfulness of the adaptations and rationales. Additionally, we made sure everyone had a copy of the codes for adaptations and rationales. Data was coded one teacher at a time. For example, I would read aloud what I perceived as an adaptation that had been verified as such by the teacher. The research team would discuss

the code for the adaptation or whether it qualified as a reactive response. We all had to agree on the label before proceeding. If it received a code as an adaptation, we then determined the level of thoughtfulness using the rubric we created (see Appendix E). Again, we had to agree on the code before it was official. I then read aloud the teacher's rationale for making that adaptation. As a team, we determined whether it qualified as a rationale and, if so, assigned a code. We all had to agree on our determination before proceeding. Next, we determined the level of thoughtfulness for the rationale by using the thoughtfulness rubric (see Appendix E). Again, we all had to agree on the code before proceeding. Once we completed the coding for that teacher's adaptations and rationales, we moved on to my next teacher until my data were coded, then moved on to the next researcher.

Coding Task Data

Reliability of the task rubric was established by the three senior members of the research team, Seth Parsons, Kathryn Kear, and I, with the statistical assistance from W. David Scales. Seth, Kathryn, and I independently rated 30 tasks from across our studies. Then we used Spearman's Rho to determine the interrater reliability of the task rubric across those 30 ratings. The results indicated an interrater reliability of .832, establishing high reliability in using the rubric to rate the openness of the tasks.

The calculation of interrater reliability (Spearman's rho, or) was accomplished by W. David Scales through a multistage process using Microsoft Excel™ and SPSS for Windows™. Once the definitions of each category of the task rubric were agreed upon, individual codes for the openness of tasks for a given rater were put into an Excel

spreadsheet for easy manipulability. Subtotals for each of the three categories were

calculated, as was a grand total. This process was repeated for the other two raters using

separate worksheets within the same Excel spreadsheet.

Spearman's rho could only be calculated using pairs of raters. As there were three

raters, this process had to be repeated three times to cover all possible pair-wise

comparisons of raters. A correlation matrix for all ratings for Rater 1 and Rater 2 was

calculated using SPSS. This matrix was then copied and pasted into Excel. Once there, all

Rater 1 columns were deleted, as were all rows for Rater 2. Extraneous information such

as the rows of p-values and sample size were removed easily as well. The diagonal

elements of the remaining matrix were the interrater reliability coefficients for Raters 1

and 2. This information was saved as a single column of information in Excel. The same

process for calculating interrater reliability was repeated to generate reliability

coefficients for Rater 1 and Rater 3, and once again for Rater 2 and Rater 3. This process

yielded three columns of values for each pair of raters. The average of the rows was then

taken to yield a single average interrater reliability coefficient for each variable, both

subtotals and the instrument as a whole. The results indicated an interrater reliability of

.832, establishing high reliability in using the rubric to rate the openness of tasks.

Additionally, Kathryn Kear and I reviewed each other's task ratings at the

completion of the studies.

"Coding" Student Data

I was the only researcher in the group who collected student engagement data.

Whereas other data could be checked by other researchers in the group and reliability

could be established or complete agreement was reached when coding together, coding student engagement data occurred in the moment and could not be verified by other researchers at a later date. However, this was the same way I kept track of student data in my pilot study. In that study, Kathryn Kear and I established consistency with coding students' on and off task behaviors.

When there was a task for students to complete, I used the Student Engagement Log (Thornburg, 2005) (see Appendix A) to code students' on and off task behaviors. Every three minutes I noted a plus sign (+) if the student was focused on the task or a zero (0) if they were not. After each lesson observation, I determined the percentage of on-task behaviors per lesson. I added up the plus signs for each ability group observed. Since there were two high ability students, I counted all of their plus signs and divided by the combined total of plus signs and zeros to calculate the percentage. I then performed the same procedure for the two average ability students, and then for the two low ability students.

During the post-observation interview I asked the teacher whether the target students' level of engagement was typical during the lessons and tasks.

Teacher by Teacher Analysis

Once the data for teachers, tasks, and students were coded, I answered both of my research questions for one teacher before moving on to the next teacher. Thus, I analyzed Ms. Macy's data for each question before analyzing Ms. Jones' data for each question, and so forth. Next, I looked for trends across all of their data using the chart in Appendix G.

Methods for Question 1: Is there a Relationship between Teaching Adaptations and the

Openness of Literacy Tasks?

To answer Question 1 about whether there is a relationship between teaching adaptations and the openness of literacy tasks, two steps were necessary. First, the openness of the academic task was determined according to criteria from the task rubric (see Appendix B). This was accomplished after each teacher's observation by rating each task per observed literacy lesson and showed whether the task was open, moderately open, or closed. Using the task rubric, tasks were considered open if the total score was 12-15, moderately open was 9-11, and closed was 5-8.

After each observation, I examined the task directions and viewed the digital picture to make sure I rated each task correctly. At the conclusion of my study, I asked a member of the research team, Kathryn Kear, to check over my ratings of each task for accuracy.

Second, I noted perceived teaching adaptations during the literacy lessons on notebook paper during the observation. Noted adaptations were confirmed in a post-observation interview with the teacher, and then coded by the research team according to categories developed in previous research of teacher adaptations (Duffy et al., 2008). Quality ratings for adaptations were assigned during research team coding meetings. Later, I revisited the transcripts and student work samples for adaptations associated with the literacy tasks.

For each teacher's observation, tasks were identified and rated, and adaptations were identified and coded.

Finally, I looked for themes and patterns about the openness of literacy tasks and teaching adaptations within and across participants. In order to answer the question "yes," two steps were necessary. It was expected that if the task was moderately open or open, then I would expect the quality rating for the adaptation to be thoughtful or considerably thoughtful. For instance, if the task was rated as open, then I expected the quality rating for the adaptation to be considerably thoughtful (a high to high relationship). If the task was rated as moderately open, then I expected the quality rating for the adaptation to be thoughtful (a medium to medium relationship). If the task was rated as closed, then I expected the quality rating for the adaptation to be minimally thoughtful (a low to low relationship).

A table was created (see Table 4) to illustrate adaptations made in association with tasks and the openness of those tasks. There was a relationship if there were corresponding quality ratings for adaptations and the openness of literacy tasks. For instance, it was expected that a considerably thoughtful adaptation would occur during an open task.

Table 4. *Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task

Methods for Question 2: If there is a Relationship between Adaptations and the

Openness of Literacy Tasks, is there a Corresponding Relationship with Student

Motivation as Measured by Engaged Time on Task?

Data analysis for teaching adaptations was described for question 1 and was the

same for Question 2. To determine whether there was a corresponding relationship with

student motivation as measured by engaged time on task, a table was created (see Table

5). To be answered "yes," first there had to be a relationship between the adaptations and

the openness of the tasks, as determined in the above question. Next, I determined the

percentage of on-task behaviors for students as described in the data coding section.

Finally, I looked to see if the percentage of student engagement matched the adaptation

and task data. For instance, if there was a low to low relationship between adaptations

and the openness of tasks, then it was expected that there would be a low percentage of

on-task behaviors. If there was a high to high relationship, then it was expected that there

would be a high percentage of on-task behaviors.

Table 5. *Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task	Percentage of Student Engagement		
				High	Ave.	Low

Credibility, Dependability, and Trustworthiness

Maintaining a chain of evidence increased the overall reliability of this study (Anfara, Brown, & Mangione, 2002; Merriam, 2002; Yin, 2003). Periodic peer reviews with other researchers helped assess whether the findings made sense based on the data collected (Merriam, 2002). Researcher notes taken before, during, and after each data collection time served as a valuable audit trail where I described decisions made throughout the study about data collection, coding, and other issues that arose (Anfara et al., 2002; Merriam, 2002). Pictures of tasks assisted with the audit trail because they provided more information than a written description would. Using multiple data sources, peer reviews, and an audit trail helped establish dependability and overall trustworthiness of this study (Anfara et al., 2002; Merriam, 2002).

Assumptions and Limitations

Assumptions were made in developing this study. It was assumed that teaching adaptations would be made in association with tasks and that there would be tasks associated with literacy lessons. Since it was found in previous studies that teachers used more and different types of adaptations in their teaching when using open tasks and were less adaptive when using closed tasks (Kear, in progress; Scales, in progress), it was assumed that an intervention would increase task quality. Additionally, it was assumed that teachers would vary tasks used during literacy instruction or use moderately open and/or open tasks as they became familiar with criteria for open, moderately open, and closed tasks and received coaching about designing and implementing these tasks. Next, it was assumed that teachers would accurately place students in appropriate ability levels

(high, average, low). It was also assumed that the target students selected from each ability level would represent all students of that specific ability level in the classroom. Further, it was assumed that students would be more engaged in literacy instruction when academic tasks were open or moderately open.

Limitations exist in this study. First, this small study included teachers at the same school, with data collected by one researcher. Thus, analyzed data are not generalizable to all classrooms or schools. Participants engaged in grade level planning and consistency among the grade level was valued. This is a limitation because the teachers strive to teach the same subjects the same way as their colleagues. Second, the depth of the lesson plans posed difficulties. While some teachers wrote out lesson plans in depth, others wrote pages to cover in the reading series and lacked details. This is a limitation because it was difficult to determine spontaneous deviations from the plan when the plan was lacking. Further, there was not always a task assigned during observations, which limited the amount of data collected. Adaptations were often unrelated to the task, which also limited the amount of data reported. Additionally, tasks were at times exclusively closed, despite the professional development. These instances were noted as they arose. Next, the observations were scheduled around the researcher's university teaching obligations and according to participants' literacy instruction times. This was a limitation because there was little flexibility in scheduling observations. Interviews occurred after each observation during teachers' planning times or after school. Optimal post-observation interviews would occur directly after the observation while the lesson was still fresh in the teacher's mind. Additionally, rationales for adaptations were not collected until

January. Teachers often offered a rationale during the interview prior to January, but rationales were not part of my interview protocol until that time. Rationales are not part of my research questions, but others in the larger research group asked for them to fit with the group's larger goals. Finally, another limitation was the Hawthorne Effect or "reactivity" (Maxwell, 2005), where participating teachers could share information they think the researcher wants to hear during interviews or teachers and students change their behaviors to perform better because they are a participant in a study (Mertens, 1998). Nonetheless, these issues were noted as they arose.

Summary

This chapter provided the methodology for this study. I described the design, setting, participants, and intervention. Next, I discussed data collection, analysis, and coding. Then, I described the overall reliability of the study and the assumptions and limitations. Finally, I explained how I would answer my research questions.

CHAPTER III

RESULTS

Summary of the Study

Researchers claim that effective teachers adapt their instruction to meet their students' learning needs (Bransford, Darling-Hammond, et al., 2005; Duffy, 2005; Pressley et al., 2001). Little research has examined how teachers adapt their instruction or their reasons for doing so. While more open tasks lead to more student engagement and learning in different studies (Miller & Meece, 1999; Thornburg, 2005; Turner, 1995), there is no empirical evidence to show how teaching adaptations are related to the openness of literacy tasks and student engagement. In this study, I used a mixed-method multiple case study design (Creswell, 2005) to study six teachers' literacy instruction in each of the six elementary grade levels. Specifically, I explored the teaching adaptations as they are related to academic tasks and student motivation as measured by engaged time on task. I observed each teacher's literacy instruction approximately every three weeks over one school year to identify the teaching adaptations and rationales for those adaptations, the openness of literacy tasks and student motivation as measured by engaged time on task. After each observation I interviewed the teacher to verify that adaptations were changes on-the-fly and to collect their rationales for adapting.

In this chapter, I answer the two questions guiding this study. However, I report each case for each question before describing what I found across all cases. For each case

I will report the total number of adaptations, rationales, and tasks, before answering the research questions.

Kindergarten, Ms. Macy

First I will report all of Ms. Macy's adaptations, rationales, and tasks. Ms. Macy taught literacy throughout the day, sometimes called guided reading, sometimes teacher directed reading, and sometimes writing.

Ms. Macy had six adaptations across six observations totaling approximately 19 hours. Table 6 shows the adaptations and their quality ratings.

Table 6. *Ms. Macy's Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0		
2. Changes means by which objectives are met	2	2		
3. Invents an example or analogy	2	2		
4. Inserts a mini-lesson	0	0		
5. Suggests a different perspective to students	1	1		
6. Omits a planned activity or assignment	1	1		
7. Changes the planned order of instruction	0	0		
Total	6	6		

Ms. Macy's rationales for her adaptations and the quality ratings for those rationales are shown in Table 7. Ms. Macy does not have a rationale for each adaptation because I did not ask for the rationales until January. Although rationales are not part of the research questions, they are reasons for the adaptations. Thus, they are reported here.

Table 7. *Ms. Macy's Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	0	0		
2. To challenge or elaborate	0	0		
3. To teach a specific strategy or skill	0	0		
4. To help students make connections	0	0		
5. Uses knowledge of student(s) to alter instruction	1	1		
6. To check students' understanding	0	0		
7. Anticipation of upcoming difficulty	0	0		
8. To manage behavior	0	0		
9. To manage time	1	1		
10. To promote student engagement	2	2		
Total	4	4		

Ms. Macy had 11 observed tasks across six observations of her literacy instruction. All 11 tasks were rated as closed.

In sum, Ms. Macy made six adaptations, had four rationales for those adaptations, and implemented 11 tasks across six observations of her literacy instruction.

Question 1 for Ms. Macy

The first research question guiding this study was, "Is there a relationship between teaching adaptations and the openness of literacy tasks?" Only three of Ms. Macy's adaptations were made in association with tasks (see Table 8), and those three tasks were coded as closed. Table 8 (below) illustrates Ms. Macy's teaching adaptations and quality ratings made in association with the three tasks.

Table 8. *Ms. Macy's Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task
Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 2	Closed
Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 3	Closed
Invents an example or analogy.	Minimally thoughtful	Graphic organizer	Closed

For Ms. Macy, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." All of Ms. Macy's adaptations were minimally thoughtful and were made in association with closed tasks. Thus, there is a low to low pattern across the variables (adaptation and openness of task) in Ms. Macy's data.

The two following vignettes are illustrative of Ms. Macy's adaptations and tasks. The first vignette illustrates Ms. Macy's adaptation that was coded as "changes means by which the objective is met" and the corresponding rationale was coded as "promote engagement." The second vignette illustrates Ms. Macy's adaptation that was coded as "invents an example or analogy" with the corresponding rationale coded as "knows students."

Ms. Macy adapted her instruction during guided reading sessions involving a phoneme tree task. This closed task required students to move laminated paper leaves on a laminated paper tree so that each leaf represented a sound in a word. For example, for the word cat there would be three leaves, one each for /c/, /a/, /t/. This task was

performed once each with three leveled groups as they rotated through reading, phonics, and writing during their guided reading block. However, Ms. Macy adapted her instruction only with groups two and three. After Ms. Macy generated a few words (*cat, sip, it, my, we*) for students to determine how many sounds were in the words, one student said, "Let's do *turtles*!" Ms. Macy agreed and together they moved the laminated paper leaves to represent the phonemes in the word *turtles*. This adaptation was coded as "changing the means by which the objective is met" and was coded as a minimally thoughtful adaptation. Later in the interview, Ms. Macy said she adapted her instruction because "…I went ahead and tried it because they were so excited about it. They love turtles" (November 8, 2007). Thus, the rationale for the adaptation was coded as "promote engagement." This rationale was coded as minimally thoughtful because it required minimal thought.

During the graphic organizer task with the whole class, Ms. Macy adapted her instruction to "invent an example or an analogy" and was coded as a minimally thoughtful adaptation. Students were to draw a picture of and then write the word for the bus, train, boat, plane, subway, and bicycle from the story the teacher read aloud. As students worked on the task, Ms. Macy asked, "Should a bus and a boat look the same? A bus needs wheels and a boat needs water." Thus, Ms. Macy's adaptation was coded as inventing an example or analogy. The adaptation was coded as minimally thoughtful because it required minimal thought. Ms. Macy's rationale for this adaptation was, ". . . I hadn't planned it but the reason I brought it up was because we're getting awfully sloppy in our work habits. They just want to scribble down any old thing and …it's not going to

work. They need to take their time and be more detailed" (March 11, 2008). Ms. Macy's rationale for that adaptation was because she "knows students" and was coded as a minimally thoughtful rationale.

Question 2 for Ms. Macy

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in question 1, there was a relationship between the adaptations that occurred in conjunction with tasks, and the openness of those tasks. It was a low to low relationship. Relative to question 2 and as shown in Table 9 below, students' time on task per lesson was relatively high in all but one instance. The only exception was during the graphic organizer, which was completed during a whole group lesson.

Table 9. *Ms. Macy's Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 2	Closed	91.6	NA	NA
Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 3	Closed	NA	100	NA
Invents an example or analogy.	Minimally thoughtful	Graphic organizer	Closed	66.6	50	66.6

All three adaptations made in association with tasks were minimally thoughtful. However, students' engaged time on task was high in two of these three tasks. To illustrate anecdotally the differences in student motivation as measured by engaged time on task, two examples are provided.

During the phoneme tree lesson with group two, Ms. Macy only worked with the high ability students. Four students were in that group and they were all observed as they completed the task. They were on-task 91.6% of the time.

During the graphic organizer task, two high ability students were observed, one average ability student was observed, and two low ability students were observed. Only one average ability student was observed due to attendance issues. Other average ability students with returned parental permission slips to participate in the study were absent that day. The high ability students were on-task 66.6% of the time, the average students were on-task 50% of the time, and the low ability students were on-task 66.6% of the time.

Summary of Findings for Ms. Macy

Ms. Macy did not frequently adapt her instruction during tasks. Indeed, she only adapted her instruction during three of the eleven observed tasks. Additionally, there is a low-to-low relationship between Ms. Macy's teaching adaptations and the openness of literacy tasks. All adaptations made during closed tasks were rated as minimally thoughtful. While there is a relationship between the quality ratings of adaptations and the openness of literacy tasks, there is not a corresponding relationship with student motivation as measured by engaged time on task. That is, given previous scholarly

thought on thoughtfully adaptive teaching and previous research on the openness of tasks, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in Ms. Macy's class engaged time on task was high despite the fact that the tasks were overwhelmingly closed.

First Grade, Ms. Jones

First I will report all of Ms. Jones' adaptations, rationales, and tasks. Ms. Jones taught a literacy block in the morning, which typically included guided reading, teacher directed reading, and word work. Ms. Jones taught writing in the afternoon.

Ms. Jones had 29 adaptations across seven observations totaling approximately 18 hours. Table 10 shows the adaptations and their quality ratings.

Table 10. *Ms. Jones' Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	6	6	0	
3. Invents an example or analogy	15	12	3	
4. Inserts a mini-lesson	2	0	2	
5. Suggests a different perspective to students	3	3	0	
6. Omits a planned activity or assignment	2	2	0	
7. Changes the planned order of instruction	1	1	0	
Total	29	24	5	

Ms. Jones' rationales for her adaptations and the quality ratings for those rationales are shown in Table 11. Ms. Jones does not have a rationale for each adaptation

because I did not ask for the rationales until January. However, Ms. Jones often provided

unsolicited rationales. Although rationales are not part of the research questions, they are

reasons for the adaptations. Thus, they are reported here.

Table 11. *Ms. Jones' Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	4	3	1	
2. To challenge or elaborate	1	1	0	
3. To teach a specific strategy or skill	5	2	3	
4. To help students make connections	10	7	3	
5. Uses knowledge of student(s) to alter instruction	4	2	2	
6. To check students' understanding	0	0	0	
7. Anticipation of upcoming difficulty	1	0	1	
8. To manage behavior	0	0	0	
9. To manage time	0	0	0	
10. To promote student engagement	1	1	0	
Total	26	16	10	

Ms. Jones had a total of 37 observed tasks. Four were moderately open and 33

were closed.

In sum, Ms. Jones made 29 adaptations, had 26 rationales for those adaptations,

and implemented 37 tasks across seven observations of her literacy instruction.

Question 1 for Ms. Jones

The first research question guiding this study was, "Is there a relationship

between teaching adaptations and the openness of literacy tasks?" Only ten of Ms. Jones'

adaptations were made in association with tasks (see Table 12). Nine of those tasks were

coded as closed and one was coded as moderately open.

Table 12 (below) illustrates Ms. Jones' teaching adaptations and quality ratings

made in association with the ten tasks.

Table 12. *Ms. Jones' Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Tasks
Invents an example or analogy	Minimally thoughtful	Read sentence & circle yes/no	Closed
Changes means by which the objective is met	Minimally thoughtful	Write words, group 1	Closed
Suggests different ways of handling situations.	Minimally thoughtful	Choose the correct word	Closed
Invents an example or analogy	Minimally thoughtful	Circle the correct word	Closed
Inserts mini-lesson	Thoughtful	Fill in the blanks	Closed
Invents an example or analogy	Minimally thoughtful	Vocabulary word sentence, group 2	Closed
Changes means by which the objective is met	Minimally thoughtful	Write about an emergency	Moderately open
Inserts mini-lesson	Thoughtful	Sorting words, group 1	Closed
Invents an example or analogy	Minimally thoughtful	Sorting words, group 2	Closed
Invents an example or analogy	Minimally thoughtful	Write vocabulary words	Closed

For Ms. Jones, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." Nine of Ms. Jones' adaptations were associated with closed tasks. Of those nine, two adaptations were thoughtful, but both were made in association with closed tasks. One task was moderately open but the associated adaptation was minimally thoughtful. In sum, the relationship between adaptations and tasks was predominately low to low.

The following two vignettes are typical of Ms. Jones' adaptations, rationales, and tasks. The first vignette illustrates Ms. Jones' adaptation coded as "suggests different ways of handling situations." The second vignette illustrates Ms. Jones' adaptation "inserts mini-lesson."

Ms. Jones' adaptation coded as "suggests different ways of handling situations" occurred during a whole class activity. Ms. Jones had a large chart on the board containing several sentences with a word missing in each. Students were to select a word in parentheses below the blank to supply the missing word. Ms. Jones asked one student about the sentence "The dog sit or sits on the rock." The student was confused, so Ms. Jones asked her again, "Which one? Sit or sits?" The student was still confused, so Ms. Jones then said the sentence with each word in the blank. Ms. Jones asked the class to vote on the word they thought belonged in the blank. She then asked the student which one the class thought it was and the student said, "Sit." This minimally thoughtful adaptation was coded as "suggests different ways of handling situations" and was associated with a closed task. The following rationale was coded as minimally thoughtful because it required little thought. Ms. Jones' rationale for this adaptation was:

I just wanted to make sure all the kids feel successful because you're not always going to be right, but at least tell me what you think. I always try to give them a chance to get the right answer, so by getting the kids to help her out…it didn't make her feel embarrassed. At first she said the right answer, but then she said the wrong one and I wanted to clear it up. The way I got the other kids to help her made her feel like she got the right answer on her own. (October 16, 2007)

Ms. Jones' adaptation coded as "inserts mini-lesson" occurred as students filled in blanks in sentences from their word banks. One student was confused. Ms. Jones told him, "Let's see which words make sense. Read the sentence and then try each word in the blank." Ms. Jones did this for him to help him. This thoughtful adaptation was coded as "inserts a mini-lesson" and was associated with a closed task. Later, Ms. Jones said she adapted her instruction because ". . . I try to give them strategies that they can use. If you don't know which word it is, try other words to see which one makes the best sense . . . process of elimination. Just trying to teach other strategies that they can use when you're not sure what the answer is" (February 4, 2008). This rationale was coded as thoughtful because it was tied to a larger goal the teacher wanted to develop.

Question 2 for Ms. Jones

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in question 1, there was a relationship between the adaptations that occurred in conjunction with tasks and the openness of those tasks. It was a low to low relationship. Relative to question 2 and as shown in Table 13 below, the amount of time on task per

lesson where there was an adaptation was relatively high in all but one instance. The only

exception was during the moderately open task.

Table 13. *Ms. Jones' Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Invents an example or analogy	Minimally thoughtful	Read sentence & circle yes/no	Closed	100	100	NA
Changes means by which the objective is met	Minimally thoughtful	Write words, group 1	Closed	NA	100	100
Suggests different ways of handling situations.	Minimally thoughtful	Choose the correct word	Closed	91.67	66.67	91.67
Invents an example or analogy	Minimally thoughtful	Circle the correct word	Closed	100	100	100
Inserts mini-lesson	Thoughtful	Fill in the blanks	Closed	NA	100	100
Invents an example or analogy	Minimally thoughtful	Vocabulary word sentence, group 2	Closed	100	100	NA
Changes means by which the objective is met	Minimally thoughtful	Write about an emergency	Mod. open	50	16.67	16.67
Inserts mini-lesson	Thoughtful	Sorting words, group 1	Closed	NA	100	100
Invents an example or analogy	Minimally thoughtful	Sorting words, group 2	Closed	100	100	NA
Invents an example or analogy	Minimally thoughtful	Write vocabulary words	Closed	90	93.33	NA

To illustrate anecdotally the differences in student motivation as measured by engaged time on task, two examples are provided.

In a whole class lesson students took turns choosing either the singular or plural word to complete each sentence on a chart posted on the board. Six students were observed, two each from high, average, and low ability groups. The high ability and low ability students were on task 91.67% of the time. The average ability students were on task 66.67% of the time.

During another whole class lesson, students were told to write about an emergency. Six students were observed, two each from high, average, and low ability groups. The high ability students were on task 50% of the time, while the average and low ability students were on-task 16.67% of the time.

Summary of Findings for Ms. Jones

Ms. Jones did not frequently adapt her instruction during literacy tasks. Indeed, she only adapted her instruction during ten of the 37 observed tasks. Of these, there is a low-to-low relationship between Ms. Jones' teaching adaptations and openness of tasks in seven instances. Two adaptations were thoughtful, but they occurred during a closed task. Hence, there is a medium-to-low relationship in these two instances. Another adaptation was minimally thoughtful, but it was made during a moderately open task. Thus, it was a low-to-medium relationship.

While there is a low to low relationship between the quality ratings of adaptations and the openness of tasks in most instances, there is not a corresponding relationship with student motivation as measured by engaged time on task. That is, given previous

scholarly thought on thoughtfully adaptive teaching and previous research on the openness of tasks, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in Ms. Jones' class engaged time on task was high despite the fact that the tasks were overwhelmingly closed.

Second Grade, Ms. Smith

First I will report all of Ms. Smith's adaptations and rationales, regardless of task. Ms. Smith taught literacy during different times of the day. An hour in the morning was reserved for guided reading. Later in the morning there was 45 minutes for either teacher directed reading or word work. Ms. Smith taught writing for 30 minutes in the afternoon.

Ms. Smith had 15 adaptations across eight observations totaling approximately 19 hours. Table 14 shows the adaptations and their quality ratings.

Table 14. *Ms. Smith's Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	3	2	1	
3. Invents an example or analogy	7	6	1	
4. Inserts a mini-lesson	0	0	0	
5. Suggests a different perspective to students	2	2	0	
6. Omits a planned activity or assignment	2	2	0	
7. Changes the planned order of instruction	1	1	0	
Total	15	13	2	

Ms. Smith's rationales for her adaptations and the quality ratings for those
rationales are shown in Table 15. Ms. Smith does not have a rationale for each adaptation
because I did not ask for the rationales until January. Although rationales are not part of
the research questions, they are reasons for the adaptations. Thus, they are reported here.

Table 15. *Ms. Smith's Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	1	1	0	
2. To challenge or elaborate	0	0	0	
3. To teach a specific strategy or skill	1	1	0	
4. To help students make connections	4	3	1	
5. Uses knowledge of student(s) to alter instruction	0	0	0	
6. To check students' understanding	1	0	1	
7. Anticipation of upcoming difficulty	3	2	1	
8. To manage behavior	0	0	0	
9. To manage time	2	2	0	
10. To promote student engagement	0	0	0	
Total	12	9	3	

In sum, Ms. Smith made 15 adaptations across eight observations of her literacy
instruction.

Question 1 for Ms. Smith

The first research question guiding this study was, "Is there a relationship
between teaching adaptations and the openness of literacy tasks?"

During the school year, Ms. Smith was observed eight times. Only four of Ms. Smith's adaptations were made in association with tasks. All four of those tasks were coded as closed. Table 16 (below) illustrates Ms. Smith's teaching adaptations and quality ratings and the openness of tasks.

Table 16. *Ms. Smith's Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task
Changes means by which objective is met	Minimally thoughtful	Find long I words	Closed
Invents an example or analogy	Minimally thoughtful	Find facts & opinions	Closed
Invents an example or analogy	Minimally thoughtful	Favorite food sentence	Closed
Invents an example or analogy	Minimally thoughtful	Sequence sentences	Closed

For Ms. Smith, the answer to Question 1 regarding the relationship between adaptations and tasks is "yes." All of Ms. Smith's adaptations were associated with closed tasks. Thus, there is a low to low pattern across the variables (adaptation and openness of task) in Ms. Smith's data.

The two following vignettes are illustrative of Ms. Smith's adaptations, rationales, and tasks. The first vignette illustrates Ms. Smith's adaptation that was coded as "changes means by which the objective is met" and the corresponding rationale was coded as "anticipates student learning needs." The second vignette illustrates Ms. Smith's adaptation that was coded as "invents an example or analogy" with the corresponding rationale coded as "make connections."

During word work, students were competing as a class to see who could cut out and glue down the most words from the newspaper that had the long /I/ sound. The spelling pattern could include /i/, /ie/, /y/, or /igh/. As students were working on this closed task, Ms. Smith told two students to work together instead of independently. Thus, this adaptation was coded as "changes means by which the objective is met." The adaptation was coded as minimally thoughtful because it required minimal thought. In the interview, Ms. Smith said she adapted because ". . . when I planned I didn't think about Frank, but he's just so, so low that I thought it wouldn't be fair for him to have to compete on his own . . ." (January 8, 2008). This rationale was coded as "anticipates student learning needs" because she changed her instruction in anticipation of future difficulty.

During a guided reading group students were to fill in the blanks for the sentence, "My favorite food is _____ because _____." As students completed this closed task, one student was writing about Sloppy Joe. Ms. Smith told the student that Joe was spelled like the name and that it is really Manwich, but we call it Sloppy Joe because it is messy to eat. This adaptation was coded as "invents an example or analogy" and was coded as minimally thoughtful. Ms. Smith's rationale for this adaptation was ". . . I had no idea he was going to say Sloppy Joe . . . I kind of thought that a lot of them had eaten Manwich before . . . so I wanted to make that real world connection so they could understand it better" (April 28, 2008). This rationale was coded as "makes connections" and the quality rating was minimally thoughtful because it required minimal thought.

Question 2 for Ms. Smith

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in Question 1, there was a relationship between the adaptations that occurred in conjunction with tasks and the openness of those tasks. It was a low to low relationship. Relative to Question 2 and as shown in Table 17 below, the amount of time on task per lesson where there was an adaptation was relatively high in all but one instance. The only exception was during the fact or opinion task, which was completed during a whole group lesson.

Table 17. *Ms. Smith's Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Changes means by which the objective is met.	Minimally thoughtful	Find long I words	Closed	100	83.33	100
Invents an example or analogy.	Minimally thoughtful	Fact or opinion	Closed	83.33	50	66.67
Invents an example or analogy.	Minimally thoughtful	Favorite food	Closed	NA	100	100
Invents an example or analogy.	Minimally thoughtful	Sequence sentences	Closed	100	100	75

To illustrate anecdotally the differences in student motivation as measured by engaged time on task, two examples are provided.

The long I task was completed in groups during a whole class lesson. I observed two high ability students, two average ability students, and two low ability students. The high and low ability students were on task 100% of the time and the average ability students were on task 83.33% of the time.

During the fact or opinion task, students worked in groups during this whole-class lesson. I observed two high ability and two average ability students. Due to attendance issues, I observed one low ability student during this task. The high ability students were on task 83.33% of the time, the average ability students were on task 50% of the time, and the low ability student was on task 66.67% of the time.

Summary of Findings for Ms. Smith

Ms. Smith did not frequently adapt her instruction during tasks. Indeed, she only adapted her instruction during four of the 27 tasks. Additionally, there is a low-to-low relationship between Ms. Smith's teaching adaptations and the openness of literacy tasks because all adaptations were made during closed tasks and were rated as minimally thoughtful. While there is a low to low relationship between the quality ratings of adaptations and the openness of tasks, there is not a corresponding relationship with student motivation as measured by engaged time on task. That is, given previous scholarly thought on thoughtfully adaptive teaching and previous research on the openness of tasks, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in Ms. Smith's class, engaged time on task was high despite the fact that the tasks were closed.

Third Grade, Ms. Akers

First I will report all of Ms. Akers' adaptations, regardless of task. Ms. Akers taught literacy in the morning during a 90 minute block of time. Her instruction included teacher directed reading, guided reading, word work, and reading strategy lessons or writing.

Ms. Akers had 24 adaptations across eight observations totaling approximately 18 hours. Table 18 shows the adaptations and their quality ratings.

Table 18. *Ms. Akers' Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	4	3	1	
3. Invents an example or analogy	13	10	3	
4. Inserts a mini-lesson	0	0	0	
5. Suggests a different perspective to students	2	1	1	
6. Omits a planned activity or assignment	2	2	0	
7. Changes the planned order of instruction	3	3	0	
Total	24	19	5	

Ms. Akers' rationales for her adaptations and the quality ratings for those rationales are shown in Table 19. Ms. Akers does not have a rationale for each adaptation because I did not ask for the rationales until January. Although rationales are not part of the research questions, they are reasons for the adaptations. Thus, they are reported here.

Table 19. *Ms. Akers' Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	2	1	1	
2. To challenge or elaborate	2	2	0	
3. To teach a specific strategy or skill	0	0	0	
4. To help students make connections	1	0	1	
5. Uses knowledge of student(s) to alter instruction	1	1	0	
6. To check students' understanding	0	0	0	
7. Anticipation of upcoming difficulty	2	2	0	
8. To manage behavior	0	0	0	
9. To manage time	8	8	0	
10. To promote student engagement	2	2	0	
Total	18	16	2	

In sum, Ms. Akers made 24 adaptations across eight observations of her literacy instruction, of which all but five were minimally thoughtful.

Question 1 for Ms. Akers

The first research question guiding this study was, "Is there a relationship between teaching adaptations and the openness of literacy tasks?"

During the school year, Ms. Akers was observed eight times. Of the sample, Ms. Akers is an outlier in that she had only one adaptation made in association with a task, and it was a moderately open task and a thoughtful adaptation. Table 20 below illustrates Ms. Akers' teaching adaptation and quality rating and openness of task.

Table 20. *Ms. Akers' Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task
Invents an example or analogy	Thoughtful	Compare/ Contrast	Moderately open

For Ms. Akers, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." Ms. Akers' adaptation was associated with a moderately open task. Similarly, her rationale was thoughtful. Thus, there is a medium to medium pattern across the variables (adaptation and openness of task) in Ms. Akers' data.

The following vignette illustrates Ms. Akers' adaptation, rationale, and task. Ms. Akers' adaptation was coded as "invents an example or analogy" and the corresponding rationale was coded as "objective not met."

Ms. Akers adapted her instruction during writing involving a graphic organizer. Students were to choose either "grandma's TV and my TV" or "TV today and TV long ago" for comparing and contrasting. They were to refer back to the story in their reading textbook to complete the graphic organizer. Everyone was talking about how TVs were cheaper in the olden days and Ms. Akers explained that the value of the dollar is much different today. She said, "Even though it didn't cost as much, it was harder back then to come up with twenty dollars and people make more money today" (February 27, 2008). This adaptation was coded as "invents an example or analogy" and was associated with a moderately open task. During the interview, Ms. Akers said that she adapted her instruction "…as a result of Nate mentioning the value of money because some children didn't quite understand his comment when he mentioned money related to the story, so I

used that as an example to explain more or less about what Nate meant with his comment" (February 27, 2008). This rationale was coded as thoughtful because it was tied to a larger goal the teacher wanted to develop.

Question 2 for Ms. Akers

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in question 1, there was a relationship between the adaptation that occurred in conjunction with the task and the openness of that task. It was a medium to medium relationship. Relative to Question 2 and as shown in Table 21 below, the amount of time on task was high.

Table 21. *Ms. Akers' Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality rating for Adaptation	Task	Openness of Task	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Invents an example or analogy	Thoughtful	Compare /contrast	Moderately open	100	100	100

During the whole class compare/contrast task, two high ability students were observed, two average ability students were observed, and one low-ability student was observed. The other low ability students with returned parental permission slips to participate in the study were absent that day. All of the participating students were on-task 100% of the time.

Summary of Findings for Ms. Akers

Ms. Akers did not frequently adapt her instruction during tasks. Indeed, she only adapted her instruction during one of the 39 observed tasks. This single adaptation was made during a moderately open task and was rated as thoughtful.

In this one instance in which she adapted, there is a medium to medium relationship between the quality ratings of the adaptation and the openness of the task. Further, there is a corresponding relationship with student motivation as measured by engaged time on task. That is, given previous scholarly thought on thoughtfully adaptive teaching and previous research on the openness of tasks, one would expect that a moderately open task would result in high percentages of engaged time on task. Indeed, Ms. Akers' students were on-task 100% of the time.

Fourth Grade, Ms. Rogers

First I will report all of Ms. Rogers' adaptations, regardless of task. Ms. Rogers taught literacy throughout the day, often integrating teacher directed reading and word work with social studies. Additionally, Ms. Rogers taught two different groups of students. There was a designated guided reading time in the afternoon for the entire fourth grade.

Ms. Rogers had five adaptations across seven observations totaling approximately 25 hours. Table 22 shows the adaptations and their quality ratings.

Ms. Rogers' rationales for her adaptations and the quality ratings for those rationales are shown in Table 23. Although rationales are not part of the research questions, they are reasons for the adaptations. Thus, they are reported here.

Table 22. *Ms. Rogers' Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	3	3	0	
3. Invents an example or analogy	1	1	0	
4. Inserts a mini-lesson	0	0	0	
5. Suggests a different perspective to students	0	0	0	
6. Omits a planned activity or assignment	1	0	1	
7. Changes the planned order of instruction	0	0	0	
Total	5	4	1	

Table 23. *Ms. Rogers' Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	1	1	0	
2. To challenge or elaborate	1	1	0	
3. To teach a specific strategy or skill	0	0	0	
4. To help students make connections	0	0	0	
5. Uses knowledge of student(s) to alter instruction	0	0	0	
6. To check students' understanding	1	0	1	
7. Anticipation of upcoming difficulty	0	0	0	
8. To manage behavior	1	1	0	
9. To manage time	0	0	0	
10. To promote student engagement	1	1	0	
Total	5	4	1	

In sum, Ms. Rogers made five adaptations across seven observations of her literacy instruction.

Question 1 for Ms. Rogers

The first research question guiding this study was, "Is there a relationship between teaching adaptations and the openness of literacy tasks?"

During the school year, Ms. Rogers was observed seven times. Only two of Ms. Rogers' adaptations were made in association with tasks. Both of those tasks were coded as closed. Table 24 below illustrates Ms. Rogers' teaching adaptations and quality ratings and the openness of tasks.

Table 24. *Ms. Rogers' Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Tasks
Invents an example or analogy	Minimally thoughtful	Copying overhead	Closed
Changes means by which the objective is met	Minimally thoughtful	Graphic organizer	Closed

For Ms. Rogers, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." All of Ms. Rogers' adaptations were associated with closed tasks. Thus, there is a low to low pattern across the variables (adaptation and openness of task) in Ms. Rogers' data.

The two following vignettes are illustrative of Ms. Rogers' adaptations, rationales, and tasks. The first vignette illustrates Ms. Rogers' adaptation that was coded as "invents an example or analogy" and the corresponding rationale was coded as "challenge or elaborate." The second vignette illustrates Ms. Rogers' adaptation that was

coded as "changes means by which the objective is met" with the corresponding rationale coded as "manage behavior."

During the whole class task where students were copying the overhead, Ms. Rogers adapted her instruction to "invent an example or analogy" and was coded as a minimally thoughtful adaptation because it required minimal thought. Ms. Rogers asked a question and one student offered a brief response that farmers specialized. Ms. Rogers asked, "In what? What do they specialize in? Be specific" (October 2, 2007). The student explained further. Ms. Rogers clarified the ideas and explained about the farmers and the main idea a little more in depth. Ms. Roger's rationale for this adaptation was, "I was just trying to get him to dig a little deeper and elaborate more in his response. He was on target but he needed to elaborate a little bit more and be more specific on what I was looking for. But he was there. I was just trying to get him to pull out some more information" (October 2, 1007). Thus, the rationale was coded as "challenge or elaborate." This rationale was coded as minimally thoughtful because it required minimal thought.

During the graphic organizer task with the whole class, Ms. Rogers adapted her instruction to "change means by which the objective is met" and was coded as a minimally thoughtful adaptation because it required minimal thought. While explaining the graphic organizer with the students, Ms. Rogers told them they would work independently, then with partners. After she got them started on the graphic organizer, she then told them that she changed her mind and that they would work independently.

The following rationale was coded as minimally thoughtful because it required little

thought. Ms. Rogers' rationale for this adaptation was as follows:

> I think I get vibes from the students. If I see they want to be a little noisy and off
> task because it was in my plans for them to get into centers as well, but if I don't
> get accomplished what I need to get accomplished with them due to not following
> directions, wanting to be socializing or just staying on task with their work, I just
> adapt as they adjust and so I always go by the vibes in the classroom and what
> they're giving me. I have to do that for my sanity. (February 11, 2008)

Question 2 for Ms. Rogers

The second research question guiding this study was, "If there is a relationship

between adaptations and the openness of literacy tasks, is there a corresponding

relationship with student motivation as measured by engaged time on task?" As shown

above in question 1, there was a relationship between the adaptations that occurred in

conjunction with tasks and the openness of those tasks. It was a low to low relationship.

Relative to question 2 and as shown in Table 25 below, the amount of time on task was

relatively high in the first lesson, but low in the second lesson.

Table 25. *Ms. Rogers' Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Task	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Invents an example or analogy	Minimally thoughtful	Copy overhead	Closed	66.67	100	100
Changes means by which objective is met	Minimally thoughtful	Graphic organizer	Closed	42.86	35.71	21.43

To illustrate anecdotally the differences in student motivation as measured by engaged time on task, two examples are provided.

During the whole class copying the overhead task, one high ability student was observed, two average ability students were observed, and two low ability students were observed. Only one high ability student was observed due to attendance issues. Other high ability students with returned parental permission slips to participate in the study were absent that day. The high ability student was on-task 66.67% of the time and the average ability and low ability students were on-task 100 percent of the time.

During the whole class graphic organizer task, two high ability students were observed, two average ability students were observed, and two low ability students were observed. The high ability students were on-task 42.86% of the time, the average ability students were on-task 35.71% of the time, and the low ability students were on-task 21.43% of the time.

Summary of Findings for Ms. Rogers

Ms. Rogers did not frequently adapt her instruction during tasks. Indeed, she only adapted her instruction during two of the 25 tasks. Both of these adaptations occurred during closed tasks and were rated as minimally thoughtful. While there is a low to low relationship between the quality ratings of adaptations and the openness of tasks, the expected low relationship with student motivation as measured by engaged time on task did not occur. That is, given previous scholarly thought on thoughtfully adaptive teaching and previous research on open tasks, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in Ms. Rogers' class, engaged time

on task was high in one instance despite the fact that the tasks were closed. In another instance, engaged time on task was low during a closed task.

Fifth Grade, Ms. Brown

First I will report all of Ms. Brown's adaptations, regardless of task. Ms. Brown taught literacy in 90 minute blocks to two classes of students, the morning class and the afternoon class. Her literacy instruction included teacher directed reading and word work. There was a designated time for guided reading for fifth grade in the morning.

Ms. Brown had 21 adaptations across seven observations totaling approximately 15 hours. Table 26 shows the adaptations and their quality ratings.

Table 26. *Ms. Brown's Teaching Adaptations and Their Quality Ratings*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	3	3	0	
3. Invents an example or analogy	14	11	3	
4. Inserts a mini-lesson	0	0	0	
5. Suggests a different perspective to students	3	3	0	
6. Omits a planned activity or assignment	1	1	0	
7. Changes the planned order of instruction	0	0	0	
Total	21	18	3	

Ms. Brown's rationales for her adaptations and the quality ratings for those rationales are shown in Table 27. Ms. Brown does not have a rationale for each adaptation because I did not ask for the rationales until January. Although rationales are

not part of the research questions, they are reasons for the adaptations. Thus, they are

reported here.

Table 27. *Ms. Brown's Rationales for Adapting and Their Quality Ratings*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	8	7	1	
2. To challenge or elaborate	0	0	0	
3. To teach a specific strategy or skill	1	1	0	
4. To help students make connections	1	1	0	
5. Uses knowledge of student(s) to alter instruction	3	2	1	
6. To check students' understanding	0	0	0	
7. Anticipation of upcoming difficulty	0	0	0	
8. To manage behavior	1	1	0	
9. To manage time	0	0	0	
10. To promote student engagement	0	0	0	
Total	14	12	2	

In sum, Ms. Brown made 21 adaptations across eight observations of her literacy

instruction.

Question 1 for Ms. Brown

The first research question guiding this study was, "Is there a relationship

between teaching adaptations and the openness of literacy tasks?"

During the school year, Ms. Brown was observed eight times. Only eight of Ms.

Brown's adaptations were made in association with tasks. Table 28 below illustrates Ms.

Brown's teaching adaptations and quality ratings and the openness of tasks.

Table 28. *Ms. Brown's Adaptations Made in Association with Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Tasks
Suggests different ways of handling situations	Minimally thoughtful	Graphic organizer	Closed
Invents an example or analogy	Minimally thoughtful	Circle errors	Closed
Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed
Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed
Invents an example or analogy	Minimally thoughtful	Study guide	Closed
Invents an example or analogy	Minimally thoughtful	Study guide	Closed
Changes means by which objective is met	Minimally thoughtful	Study guide	Closed
Invents an example or analogy	Minimally thoughtful	Graphic organizer	Closed

For Ms. Brown, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." All of Ms. Brown's adaptations were associated with closed tasks. Thus, there is a low to low pattern across the variables (adaptation and openness of tasks) in Ms. Brown's data.

The two following vignettes are illustrative of Ms. Brown's adaptations, rationales, and tasks. The first vignette illustrates Ms. Brown's adaptation that was coded as "invents an example or analogy" and the corresponding rationale was coded as "give strategies." The second vignette illustrates Ms. Brown's adaptation that was coded as "suggests different ways students could handle situations" with the corresponding rationale coded as "knows students."

During a whole class spelling lesson, Ms. Brown told the class that when they take a multiple choice test, there may be two answers that make sense. Ms. Brown pointed out the words *dequalify* and *disqualify* on the worksheet, stating that they both have prefixes. Students said that disqualify was the correct choice and Ms. Brown said, "Yes, *disqualify* is not only one of our spelling words, but it also makes sense" (January 10, 2008). This adaptation was coded as "invents an example or analogy" and further coded as minimally thoughtful because it required minimal thought. Later in the interview, Ms. Brown said that she adapted her instruction because "I just wanted to let them know that they need to recognize which one is actually a word; which one actually makes sense . . . they could try to trick you and give you two different prefixes, but one of them makes sense and the other doesn't" (January 11, 2008). This rationale was coded as minimally thoughtful because it required minimal thought.

While students were working in partners to complete a study guide, Ms. Brown stopped the class and told them, "You might know a lot of these words already, so it might be quicker just to write from the top of your head" (January 10, 2008). This adaptation was coded as "suggests different ways students could handle situations" and coded as minimally thoughtful because it required minimal thought. Later in the interview, Ms. Brown said that she adapted her instruction because "I noticed a lot of them spent a lot of time looking up the definition when, number one, they don't necessarily understand the definition and number two, they know the meaning right off the top of their head, so they should write what they know" (January 11, 2008). This

corresponding rationale coded as "knows students" and coded as minimally thoughtful because it required minimal thought.

Question 2 for Ms. Brown

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in Question 1, there was a relationship between the adaptations that occurred in conjunction with tasks and the openness of those tasks. It was a low to low relationship. Relative to Question 2 and as shown in Table 29 below, the amount of time on task per lesson was high.

To illustrate anecdotally student motivation as measured by engaged time on task, two examples are provided. During the first whole class graphic organizer task, two high ability students were observed, one average ability student was observed, and two low ability students were observed. Only one average ability student was observed because other average ability students with signed participant permission slips were absent. The high ability students were on-task 71.43% of the time and the average and low ability students were on-task 100% of the time.

During the last whole group graphic organizer task, two high ability students were observed, two average ability students were observed, and two low ability students were observed. All observed students were on-task 100% of the time.

Table 29. *Ms. Brown's Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Adaptation	Quality ratings for Adaptations	Task	Openness of Tasks	Percentage of Student Engagement		
				High Students	Average Students	Low Students
Suggests different ways of handling situations	Minimally thoughtful	Graphic organizer	Closed	71.43	100	100
Invents an example or analogy	Minimally thoughtful	Circle errors	Closed	100	83.33	100
Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed	100	100	100
Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed	100	100	100
Invents an example or analogy	Minimally thoughtful	Study guide	Closed	100	100	100
Invents an example or analogy	Minimally thoughtful	Study guide	Closed	100	100	100
Changes means by which objective is met	Minimally thoughtful	Study guide	Closed	100	100	100
Invents an example or analogy	Minimally thoughtful	Graphic organizer	Closed	100	100	100

Summary of Findings for Ms. Brown

Ms. Brown did not frequently adapt her instruction during tasks. Indeed, she only adapted her instruction during eight of the 20 tasks. All eight adaptations were made during closed tasks and were rated as minimally thoughtful. While there is a low to low relationship between the quality ratings of adaptations and the openness of tasks, the expected relationship with student motivation as measured by engaged time on task did

not occur. That is, given previous scholarly thought on thoughtfully adaptive teaching and previous research on open tasks, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in Ms. Brown's class, engaged time on task was high despite the fact that the tasks were closed.

Findings across Participants

First I will report all the participating teachers' adaptations, regardless of task. Literacy instruction was structured in different ways across the grade levels. However, all teachers included teacher directed reading, guided reading, and spelling in their literacy instruction. Some teachers included writing on a regular basis.

The participating teachers had 100 adaptations across 44 lesson observations totaling approximately 114 hours. Table 30 shows the adaptations and their quality ratings.

Table 30. *Teaching Adaptations and Their Quality Ratings across Participants*

Adaptation	N	Min	Thought	Consid
1. Modifies the lesson objective	0	0	0	
2. Changes means by which objectives are met	21	19	2	
3. Invents an example or analogy	52	42	10	
4. Inserts a mini-lesson	2	0	2	
5. Suggests a different perspective to students	11	10	1	
6. Omits a planned activity or assignment	9	8	1	
7. Changes the planned order of instruction	5	5	0	
Total	100	84	16	

The participating teachers' rationales for their adaptations and the quality ratings for those rationales are shown in Table 31. The teachers do not have rationales for each adaptation because I did not ask for the rationales until January. Although rationales are not part of the research questions, they are reasons for the adaptations. Thus, they are reported here.

Table 31. *Rationales for Adapting and Their Quality Ratings across Teachers*

Rationale	N	Min	Thought	Consid
1. Because the objectives are not met	16	13	3	
2. To challenge or elaborate	4	4	0	
3. To teach a specific strategy or skill	7	4	3	
4. To help students make connections	16	11	5	
5. Uses knowledge of student(s) to alter instruction	9	6	3	
6. To check students' understanding	2	0	2	
7. Anticipation of upcoming difficulty	6	4	2	
8. To manage behavior	2	2	0	
9. To manage time	11	11	0	
10. To promote student engagement	6	6	0	
Total	79	61	18	

In sum, the teachers made 100 adaptations across 44 lesson observations of their literacy instruction.

Question 1 across Participants

The first research question guiding this study was, "Is there a relationship between teaching adaptations and the openness of literacy tasks?"

During the school year, the participating teachers were observed 44 times. Only 28 of the participating teachers' adaptations were made in association with tasks. Table 32 illustrates the participating teachers' teaching adaptations and quality ratings and the openness of tasks.

Across participating teachers, the answer to question 1 regarding the relationship between adaptations and tasks is "yes." Twenty-six of 28 adaptations were associated with closed tasks and all but three adaptations were rated as minimally thoughtful. Two adaptations were made in association with moderately open tasks and were rated as minimally thoughtful. One adaptation made during a moderately open task was rated as minimally thoughtful. One adaptation was made during a moderately open task and was rated as thoughtful. Thus, there is a low to low pattern across the variables (adaptation and openness of tasks) in the participating teachers' data.

Question 2 across Participants

The second research question guiding this study was, "If there is a relationship between adaptations and the openness of literacy tasks, is there a corresponding relationship with student motivation as measured by engaged time on task?" As shown above in Question 1, there was a relationship between the adaptations that occurred in conjunction with tasks and the openness of those tasks. It was a low to low relationship. Relative to Question 2 and as shown in Table 33, the amount of time on task was relatively high across participants.

Table 32. *Participating Teachers' Adaptations Made in Association with Tasks*

Grade Level	Adaptation	Quality Ratings for Adaptations	Task	Openness of Task
K	Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 2	Closed
	Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 3	Closed
	Invents an example or analogy.	Minimally thoughtful	Graphic organizer	Closed
	Invents an example or analogy	Minimally thoughtful	Read sentence & circle yes/no	Closed
	Changes means by which the objective is met	Minimally thoughtful	Write words, group 1	Closed
	Suggests different ways of handling situations.	Minimally thoughtful	Choose the correct word	Closed
	Invents an example or analogy	Minimally thoughtful	Circle the correct word	Closed
1	Inserts mini-lesson	Thoughtful	Fill in the blanks	Closed
	Invents an example or analogy	Minimally thoughtful	Vocabulary word sentence, group 2	Closed
	Changes means by which the objective is met	Minimally thoughtful	Write about an emergency	Moderately open
	Inserts mini-lesson	Thoughtful	Sorting words, group 1	Closed
	Invents an example or analogy	Minimally thoughtful	Sorting words, group 2	Closed
	Invents an example or analogy	Minimally thoughtful	Write vocabulary words	Closed

Table 32. *Continued*

Grade Level	Adaptation	Quality Ratings for Adaptations	Task	Openness of Task
2	Changes means by which objective is met	Minimally thoughtful	Find long I words	Closed
	Invents an example or analogy	Minimally thoughtful	Find facts & opinions	Closed
	Invents an example or analogy	Minimally thoughtful	Favorite food sentence	Closed
	Invents an example or analogy	Minimally thoughtful	Sequence sentences	Closed
3	Invents an example or analogy	Thoughtful	Compare/ Contrast	Moderately open
4	Invents an example or analogy	Minimally thoughtful	Copying overhead	Closed
	Changes means by which the objective is met	Minimally thoughtful	Graphic organizer	Closed
5	Suggests different ways of handling situations	Minimally thoughtful	Graphic organizer	Closed
	Invents an example or analogy	Minimally thoughtful	Circle errors	Closed
	Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed
	Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed

Table 32. *Continued*

Grade Level	Adaptation	Quality Ratings for Adaptations	Task	Openness of Task
5	Invents an example or analogy	Minimally thoughtful	Study guide	Closed
	Invents an example or analogy	Minimally thoughtful	Study guide	Closed
	Changes means by which objective is met	Minimally thoughtful	Study guide	Closed
	Invents an example or analogy	Minimally thoughtful	Graphic organizer	Closed

Table 33. *Participating Teachers' Adaptations and Percentages of On-Task Behaviors for Students during Tasks*

Grade Level	Adaptation	Quality Rating for Adaptation	Task	Openness of Task	Percentage of Student Engagement		
					High Students	Average Students	Low Students
K	Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 2	Closed	91.6	NA	NA
	Changes means by which the objective is met.	Minimally thoughtful	Phoneme trees group 3	Closed	NA	100	NA
	Invents an example or analogy.	Minimally thoughtful	Graphic organizer	Closed	66.6	50	66.6
1	Invents an example or analogy	Minimally thoughtful	Read sentence & circle yes/no	Closed	100	100	NA
	Changes means by which the objective is met	Minimally thoughtful	Write words, group 1	Closed	NA	100	100
	Suggests different ways of handling situations.	Minimally thoughtful	Choose the correct word	Closed	91.67	66.67	91.67
	Invents an example or analogy	Minimally thoughtful	Circle the correct word	Closed	100	100	100
	Inserts mini-lesson	Thoughtful	Fill in the blanks	Closed	NA	100	100

Table 33. *Continued*

Grade Level	Adaptation	Quality Rating for Adaptation	Task	Openness of Task	Percentage of Student Engagement		
					High Students	Average Students	Low Students
1	Invents an example or analogy	Minimally thoughtful	Vocabulary word sentence, group 2	Closed	100	100	NA
	Changes means by which the objective is met	Minimally thoughtful	Write about an emergency	Mod. open	50	16.67	16.67
	Inserts mini-lesson	Thoughtful	Sorting words, group 1	Closed	NA	100	100
	Invents an example or analogy	Minimally thoughtful	Sorting words, group 2	Closed	100	100	NA
	Invents an example or analogy	Minimally thoughtful	Write vocabulary words	Closed	90	93.33	NA
	Changes means by which the objective is met.	Minimally thoughtful	Find long I words	Closed	100	83.33	100
2	Invents an example or analogy.	Minimally thoughtful	Fact or opinion	Closed	83.33	50	66.67

Table 33. *Continued*

Grade Level	Adaptation	Quality Rating for Adaptation	Task	Openness of Task	Percentage of Student Engagement		
					High Students	Average Students	Low Students
2	Invents an example or analogy.	Minimally thoughtful	Favorite food	Closed	NA	100	100
	Invents an example or analogy.	Minimally thoughtful	Sequence sentences	Closed	100	100	75
3	Invents an example or analogy	Thoughtful	Compare/ contrast	Moderately open	100	100	100
4	Invents an example or analogy	Minimally thoughtful	Copy overhead	Closed	66.67	100	100
	Changes means by which objective is met	Minimally thoughtful	Graphic organizer	Closed	42.86	35.71	21.43
5	Suggests different ways of handling situations	Minimally thoughtful	Graphic organizer	Closed	71.43	100	100
	Invents an example or analogy	Minimally thoughtful	Circle errors	Closed	100	83.33	100
	Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed	100	100	100

Table 33. *Continued*

Grade Level	Adaptation	Quality Rating for Adaptation	Task	Openness of Task	Percentage of Student Engagement		
					High Students	Average Students	Low Students
	Suggests different ways of handling situations	Minimally thoughtful	Study guide	Closed	100	100	100
	Invents an example or analogy	Minimally thoughtful	Study guide	Closed	100	100	100
5	Invents an example or analogy	Minimally thoughtful	Study guide	Closed	100	100	100
	Changes means by which objective is met	Minimally thoughtful	Study guide	Closed	100	100	100
	Invents an example or analogy	Minimally thoughtful	Graphic organizer	Closed	100	100	100

Summary of Findings across Participants

The participating teachers seldom adapted their instruction during tasks. Indeed, they only adapted their instruction during 28 of the 159 tasks. Additionally, across participants, there is an overall low to low relationship between the quality ratings of adaptations and the openness of tasks.

Regarding the corresponding relationship with student motivation as measured by engaged time on task, one would expect that closed tasks would result in lower percentages of engaged time on task. However, in most situations, engaged time on task was high despite the fact that the tasks were closed.

Summary of Results

This research explored the teaching adaptations as they are related to academic tasks and student motivation as measured by engaged time on task. Six case studies, one each from kindergarten to fifth grade, revealed that there is an overall low to low relationship between the quality ratings of adaptations and the openness of tasks. Thus, adaptations occurred most frequently during closed tasks and were rated overwhelmingly as minimally thoughtful. Counter to findings from previous research on tasks and motivation, this study found that engaged time on task was high despite the fact that the tasks were closed.

Throughout this year long study, I provided individualized professional development for each of the participating teachers in designing and implementing more open tasks during literacy instruction. However, closed tasks continued to be the norm.

CHAPTER IV

DISCUSSION

Researchers claim that effective teachers adapt their instruction to meet their students' learning needs (see for instance, Bransford, Darling-Hammond, et al., 2005; Duffy, 2005; Pressley et al., 2001). Little research has examined how teachers adapt their instruction or their reasons for doing so. While more open tasks lead to more student engagement and learning in different studies (Miller & Meece, 1999; Thornburg, 2005; Turner, 1995), there is little evidence to show how teaching adaptations are related to the openness of literacy tasks and student engagement. In this study, I used a mixed-method multiple case study design (Creswell, 2005) to study six teachers' literacy instruction in each of the six elementary grade levels. Specifically, I explored the teaching adaptations as they are related to academic tasks and student motivation as measured by engaged time on task. I observed each teacher's literacy instruction approximately every three weeks over one school year to identify the teaching adaptations and rationales for those adaptations, the openness of literacy tasks and student motivation as measured by engaged time on task. After each observation I interviewed the teacher to verify that adaptations were changes on-the-fly and to collect their rationales for adapting.

Summary of the Findings

Six case studies, one each from kindergarten to fifth grade, revealed that there is an overall low to low relationship between the quality ratings of adaptations and the

openness of tasks. Thus, adaptations occurred most frequently during closed tasks and were rated overwhelmingly as minimally thoughtful. Counter to findings from previous research on tasks and motivation, this study also found that engaged time on task was high despite the fact that the tasks were closed.

Throughout this year-long study, I provided individualized professional development for each of the participating teachers in designing and implementing more open tasks during literacy instruction. However, closed tasks continued to be the norm.

Immediate Implications

This research has immediate implications for the thoughtfully adaptive teaching research project and its future directions, especially in terms of context and how contextual issues influences methodological procedures. School contexts need to be considered before selecting a research site. Four examples of implications related to school context follow.

The first contextual issue relates to accountability concerns. Schools consumed by standardized test scores may have more instructional mandates which prevent teachers from making autonomous decisions or from creating and implementing open tasks. Data collected in this study were largely influenced by the school context, particularly the policy mandates within the school. Despite the principal's assurance that the participating teachers used a variety of tasks with different levels of openness, his leadership contaminated this study. Indeed, the principal told participating teachers that their literacy tasks had to look like the end-of-grade test so the students would be prepared to take the

test. Thus, studying thoughtfully adaptive teaching in a different setting where there are fewer constraints on literacy instruction and tasks may yield different results.

A second contextual issue involves the selection of participating teachers. Studying teachers implementing thematic units of instruction over time may yield different results. Instead of observing literacy instruction once every three weeks over the course of a school year, perhaps studying one or two teachers for two or three consecutive weeks would yield different results. Additionally, there was minimal variation in findings across the six grade levels. Thus, perhaps future studies should focus on teachers from a single grade levels instead of one teacher from each of the six elementary grades levels.

A third contextual issue relates to professional development. Perhaps offering professional development in small groups instead of individually would allow teachers to support each other's efforts through collaboration or the exchange of ideas. Parsons (2008) provided professional development on planning and implementing more open tasks to a single grade level during their common planning time. In that supportive context, teachers were willing and able to implement more open tasks (Parsons, 2008). Interactions between the contextual factors, thoughtfully adaptive teaching, and professional development should be examined closer for possible relationships.

A fourth contextual issue concerns sampling. Future studies should select participating teachers more carefully. Purposive sampling instead of convenience sampling would provide a richer data set. This study relied on the principal's recommendations of teachers who used a variety of open, moderately open, and closed

tasks in their classroom. Once I explained the purpose of my study to the principal, he selected the six participating teachers. I later realized that the principal told the teachers they would work with me over the course of the school year. Hence, they did not have a choice as to whether they would participate. Instead of relying on the principal's judgment, the potential participants should be observed beforehand to see if their participation would add to the research base. The optimal participating teachers need to have a vision for creating literate students and have the strength of mind to follow their vision, regardless of the mandates set before them.

In sum, contextual issues influenced my study and should be considered when replicating this study and when designing future studies of authentic classroom settings. The nature of instruction and the openness of tasks were heavily influenced in this study by the school principal's accountability concerns. Indeed, there was little variation in the openness of tasks across the six elementary grade levels. When there are district and school mandates that dictate the nature of literacy instruction, it is imperative that the future participating teachers are selected based on their ability to make autonomous decisions, regardless of contextual constraints. That is, participating teachers should be able to provide instruction and tasks that are more student-centered, authentic, and require higher cognitive demands instead of passively following set programs that advocate test preparation as an adequate substitute for literacy instruction. This would require teachers to have a clear vision for teaching literacy and the strength to enact their visions in their teaching. Perhaps the professional development component should include discussions of the teachers' visions and how they enact their visions in their

teaching. Professional development could be provided in small group format. This would allow teachers to support one another's ideas and share their experiences of creating and implementing more open tasks in their classrooms. While the teachers in my study could describe how to alter their tasks to make them more open and were well versed in how they would implement more open tasks in future lessons, the influence of the context and perhaps their lack of vision prevented them from following through with planning and implementing more open tasks. Therefore, greater attention to contextual issues and their influence on methodological procedures may strengthen future studies.

Long Term Implications

There are three long term implications for studying thoughtfully adaptive teaching as it relates to tasks, teachers, engagement, and rationales. Each of these implications is discussed below.

Tasks

There are three issues to consider when studying thoughtfully adaptive teaching as it relates to tasks. These three issues are discussed below.

First, this research indicates that thoughtfully adaptive teaching does not always happen with a task. Indeed, of the 100 adaptations I recorded in this study, only 28 of those adaptations were made in association with tasks. Other studies from the larger research group collected task data and noted adaptations. However, this was the only study of adaptations that were made in association with tasks. For instance, Parsons (2008) recorded 111 adaptations made during literacy instruction in four teachers' classrooms in 36 observations. Parsons (2008) found that two of his four teachers had

more thoughtful adaptations when they implemented more open tasks in their classrooms while Kear (in progress) recorded 89 adaptations during literacy instruction in four classrooms and found that teachers in unscripted schools made more adaptations than their scripted counterparts. However, in Parson's (2008) and Kear's (in progress) studies the adaptations were recorded while observing literacy instruction, not just when there was a task involved. If the three studies combined data on adaptations made in association with tasks, there would be a richer data set. This would allow us to see how the different contexts influenced not only the openness of tasks, but also the specific adaptations made in association with tasks.

Second, future studies should reconsider the way tasks are defined and rated. Currently, tasks are defined as tangible work products assigned by the teacher that students complete. Academic tasks included any tangible student response to task prompts that were completed in a physical form, such as drawings, paintings, models, writings, and computer-generated student work. These tasks were rated from a single day once every three weeks across the school year. Perhaps tasks could be defined in a broader sense where they are gathered in a portfolio over time to see how they are related to specific learning objectives. Thus, tasks could be defined so that they encompass work toward a larger goal instead of individual work products. The task rubric used in this study (see Appendix B) does not fit students' work products outside of writing. Indeed, students' discussions when working together, oral reports, and physical products without writing (such as dioramas) cannot be rated on the existing task rubric. Hence, an

alternative rubric should be created to rate the openness of tasks that do not involve written work products.

Third, students' voices should be heard in future studies to get at their interpretation and understanding of tasks used during literacy instruction. Students' interviews could add more depth to the data set and their responses could have implications for teachers' planning of future tasks. For instance, if teachers knew that students did not understand the purpose of their literacy tasks, would the teachers then make the tasks more open? Or would they continue to create and implement the same kinds of tasks? However, researchers need to consider students' developmental levels when creating and implementing interview protocols. If students from different grade levels are interviewed, appropriate protocols need to be used.

In sum, these three issues should be considered when studying thoughtfully adaptive teaching as it relates to tasks: limitations of focusing solely on adaptations as they relate to tasks; the task definition; and students' voices regarding the purposes of tasks.

Teachers

There are two issues to consider when studying thoughtfully adaptive teaching as it relates to teachers. These two issues are discussed below.

First, why are some teachers more adaptive than others? When studying thoughtfully adaptive teaching, teacher differences should be noted. In Parsons' (2008) study of four third grade teachers in a Title 1 school, two of the four teachers implemented more open tasks and had more thoughtful adaptations than the other two

teachers. What made those two teachers different? The professional development was the same for all four of Parsons' (2008) teachers and it was delivered during their grade level meetings. In my study, one teacher (Ms. Akers, third grade) had more open tasks and more thoughtful adaptations than the other five. What made that teacher different? Could the difference be related to teacher development? Could it be related to years of teaching experience?

Second, how do we ensure integrity of the intervention? Future studies with interventions need to have full support of both the administration and teachers for the interventions to have a chance of working. I provided individualized professional development and all six of my participating teachers were well versed in how to make their tasks more open. At the start of the study, the teacher in her first year of teaching asked if I could help her plan and implement more open tasks and instruction that followed what she learned in the university. When I arrived at our meeting time, she pointed to the materials provided by the curriculum facilitator and stated that she was told to follow those materials if she wanted to continue to teach in that school. While she decided to follow the materials, she did attempt to make the tasks more open by providing more time for students to work in groups and providing choices in tasks. In January, one of the teachers told me that while my ideas were good ones, the testing program no longer allowed for teachers to be creative in their teaching or to allow for open tasks. She went on to tell me that the principal told the staff that if a task does not look like the end-of-grade test that they are not to do it. While the principal encouraged me to provide this professional development and told me the selected teachers were

implementing a variety of tasks and with varying degrees of openness, he in fact sent the teachers a contradictory message by insisting on closed tasks that mimicked the testing format. Additionally, it may be unrealistic to expect to see immediate change when there is an intervention. Instead, change should be monitored over time.

In sum, two issues should be considered when studying thoughtfully adaptive teaching as it relates to teachers: differences across teachers and ensuring integrity of the intervention.

Engagement

This research examined the openness and tasks and students' motivation as measured by engaged time-on-task. Two issues should be considered when studying thoughtfully adaptive teaching as it relates to engagement. These two issues are discussed below.

First, students across grade levels had consistently high percentages of time-on-task in this study, even though tasks were overwhelmingly closed. Thus, other ways of measuring students' motivation should be explored. Percentages of on-task behaviors could be a direct result of the teachers' classroom management procedures rather than intrinsic motivation for learning. For instance, student interviews could capture a truer picture of motivation while also probing for understanding, relevance, and agency. Further, student motivation needs to include more than the percent of time-on-task. Motivation could include students' grades, self-regulation (Perry, 1998), persistence or effort towards tasks and how that relates to self-efficacy (Pintrich & Schunk, 1996) for literacy tasks, and their sense of agency.

Second, in this study, students' engagement was measured by one researcher in the field. It was difficult to keep track of students' engagement while also noting teachers' instructional adaptations. During the post-observation interview, teachers were asked whether it was a typical day for the target students. Other than that, there was no way another researcher could check to see whether the time-on-task measures were correct. Thus, the validity of the time-on-task measures in this study is limited. Future studies should have two researchers observing in the field at the same time or use videotaped lessons to so that external auditors could verify that the data were coded correctly. In order to increase validity of engagement measures, two researchers should simultaneously collect student engagement data and strive for complete agreement in their coding.

In sum, two issues should be considered when studying thoughtfully adaptive teaching as it relates to engagement: alternative ways of measuring students' motivation and validation of existing measures in replication studies or future studies in authentic classroom settings.

Summary of Long-Term Implications

In sum, there are three long term implications for studying thoughtfully adaptive teaching as it relates to tasks, teachers, and engagement. Replication studies and other future research on thoughtfully adaptive teaching should carefully note the insights gained from this study in order to strengthen future findings.

Where to From Here?

This study is part of a larger set of studies conducted by a research group studying thoughtfully adaptive teaching. Our separate studies combine to provide a richer picture of thoughtfully adaptive teaching. However, our combined efforts have left us with six major questions.

One of the major questions is whether the research group is studying the right thing, but with the wrong teachers. Is thoughtfully adaptive teaching associated with mainly effective teachers, but not all teachers? If we study effective teachers, how should they be selected and where do we find them? How do we define effective? Is the lack of variation across studies due to other factors? Perhaps protocols for selecting exemplary literacy teachers from the research literature could be used to help with participant selection criteria.

Our second major question is whether we are studying the right thing, but in the wrong places. All of the studies from the larger research group (three dissertations and two pilot studies) were conducted in Title 1 schools in the same school system. Is thoughtfully adaptive teaching associated with more middle class or affluent schools, but not with Title 1 schools? If we study schools in other school systems, how should they be selected? Is the lack of variation across our studies due to other factors?

Our third major question is whether adaptive teaching is desirable. If so, how many adaptations would be desirable in a lesson? If a lesson is carefully planned, would adaptations be necessary or wanted? Too many adaptations would be chaotic and unfocused.

The fourth major question is related to definitions used in the research. Perhaps there is a need to alter the definitions for "adaptation" and for "thoughtful." Teachers may adapt in more long-term ways instead of in the moment. Changes in definitions could account for such differences in the adaptations and when they are implemented. Another possibility is that thoughtfully adaptive teaching is driven by a larger goal or vision the teachers have for literacy and literate students. Additionally, tasks could be defined more broadly to encompass work developed over time toward a larger goal.

The fifth major question is about the teachers' visions, knowledge, and their adaptations. Do they have a vision that prompts them to adapt in pursuit of that vision? Do teachers use different kinds of knowledge when making adaptations? Do they learn as they teach and as they make adaptations? If so, what are they learning and how is that knowledge being used later? While rationales did not add insight to understanding the adaptations in this study, they could be used to further understand the kinds of knowledge that teachers access when making adaptations in their literacy instruction. This would be particularly helpful in understanding how or whether teacher education shapes adaptations made during literacy instruction.

The sixth major question relates to student outcomes. If thoughtfully adaptive teaching exists, how does it make a difference in students' outcomes? How could students profit from having a thoughtfully adaptive teacher? What measure could be used to validate the utility of being adaptive?

Beyond the six major questions, this study also has implications for teacher education practices and teacher development. While that was not part of my research, my

lens is shaped by my teacher educator perspective. What can teacher educators do to develop teachers who: (a) have a clear vision for teaching literacy, (b) use conditional knowledge to plan and implement literacy instruction, and (c) make thoughtful adaptations in their literacy instruction? From these questions, my next steps have been formed. My aim is to connect thoughtfully adaptive teaching, visioning, and teachers' conditional knowledge.

Summary

While the results were not what was expected, this study provides much needed insight into how to study thoughtfully adaptive teaching as it relates to academic tasks and student engagement. As a result of this study, there are immediate and long term implications for the thoughtfully adaptive teaching research project and its future directions. Immediate implications include considerations of school contexts and sampling issues. Long term implications include considerations for studying thoughtfully adaptive teaching as it relates to tasks, teachers, and engagement.

This study is part of a series of studies that have been conducted in phases over the past few years. While the data reveal more about thoughtfully adaptive teaching than we knew before, many questions remain unanswered.

BIBLIOGRAPHY

Allington, R. L. (2006). *What really matters for struggling readers: Designing research-based programs* (2nd ed.). Boston, MA: Pearson.

Allington, R. L., & Johnston, P. (2002). *Reading to learn: Lessons from exemplary fourth-grade classrooms*. New York: Guilford.

Anderson, L. M., Evertson, C. M., & Brophy, J. E. (1979). An experimental study of effective teaching in first-grade reading groups. *The Elementary School Journal*, *79*(4), 193-223.

Anfara, Jr., V. A., Brown, K. M., & Mangione, T. L. (2002). Qualitative analysis on stage: Making the research process more public. *Educational Researcher*, *31*(7), 28-38.

Barone, D. M. (2004). Case study research. In N. K. Duke & M. H. Mallette (Eds.), *Literacy research methodologies* (pp. 7-27). New York: Guilford Press.

Bell, M. L., & Davidson, C. W. (1976). Relationships between pupil-on-task performance and pupil achievement. *The Journal of Educational Research*, *69*(5), 172-176.

Blair, T. R., Rupley, W. H., & Nichols, W. D. (2007). The effective teacher of reading: Considering the "what" and "how" of instruction. *The Reading Teacher, 60*(5), 432-438.

Borko, H., & Shavelson, R. J. (1990). Teacher decision making. In B. F. Jones & L. Idol (Eds.) *Dimensions of thinking and cognitive instruction* (pp. 311-346). Hillsdale, NJ: Lawrence Erlbaum Associates, Publishers.

Bransford, J., Darling-Hammond, L., & LePage, P. (2005). Introduction. In L. Darling-Hammond & J. Bransford (Eds.), *Preparing teachers for a changing world: What teachers should learn and be able to do* (pp. 40-87). San Francisco, CA: Jossey-Bass.

Bransford, J., Derry, S., Berliner, D., Hammerness, K., & Beckett, K. L. (2005). Theories of learning and their roles in teaching. In L. Darling-Hammond & J. Bransford (Eds.), *Preparing teachers for a changing world: What teachers should learn and be able to do* (pp. 40-87). San Francisco, CA: Jossey-Bass.

Brophy, J., & Good, T. L. (1986). Teacher behavior and student achievement. In M. Wittrock (Ed.), *Handbook of research on teaching* (3rd ed., pp. 328-375). New York: MacMillan.

Calderhead, J. (1981). A psychological approach to research on teachers' classroom decision-making. *British Educational Research Journal, 7*(1), 51-57.

Clandinin, D. J., & Connelly, F. M. (1996). Teachers' professional knowledge landscapes: Teacher stories-Stories of teachers-School stories-Stories of schools. *Educational Researcher, 25*(3), 24-30.

Clark, C. M., & Peterson P. L. (1986). Teachers' thought processes. In M. Wittrock (Ed.), *Handbook of research on teaching* (3rd ed., pp. 255-296). New York: MacMillan.

Cochran-Smith, M. (2001). The outcomes question in teacher education. *Teaching and Teacher Education, 17*, 527-546.

Corno, L. (2008). On teaching adaptively. *Educational Psychologist, 43*(3), 161-173.

Corno, L., & Snow, R. E. (1986). Adapting teaching to individual differences among learners. In M. Wittrock (Ed.) *Handbook of research on teaching* (3rd ed., pp. 605-629). New York: MacMillan.

Creswell, J.W. (2005). *Educational research: Planning, conducting, and evaluating quantitative and qualitative research* (2nd ed.). Upper Saddle River, NJ: Pearson Education.

Dewey, J. (1933). *How we think: A restatement of the relation of reflective thinking to the educative process.* Boston, New York, Atlanta: D.C. Heath and Company.

Doyle, W. (1983). Academic work. *Review of Educational Research, 53*, 159-199.

Duffy, G. G. (1993). Rethinking strategy instruction: Four teachers' development and their low achievers' understandings. *The Elementary School Journal, 93*(3), 231-247.

Duffy, G. G. (2005). Developing metacognitive teachers: Visioning and the expert's changing role in teacher education and professional development. In C. Block, S. Israel, K. Kinnucan-Welsch, & K. Bauserman (Eds.), *Metacognition and literacy learning: Theory, assessment, instruction, and professional development* (pp. 299-314). Mahwah, NJ: Erlbaum.

Duffy, G. G., Miller, S. D., Kear, K. A., Parsons, S., Davis, S. & Williams, B. (2008). Teachers' instructional adaptations during literacy instruction. In Y. Kim, V. J.

Risko, D. L. Compton, D. K. Dickinson, M. K. Hundley, R. T. Jimenez, K. M. Leander, & D. W. Rowe (Eds.), *57th yearbook of the National Reading Conference.* Chicago: National Reading Conference. Oak Creek, WI: National Reading Conference, Inc.

Duffy, G. G. & Roehler, L. (1987). Improving reading instruction through the use of responsive elaboration. *The Reading Teacher*, *40*(6), 514-521.

Duffy, G. G., Roehler, L. R., & Putnam, J. (1987). Putting the teacher in control: Basal reading textbooks and instructional decision making. *The Elementary School Journal*, *87*(3), 357-366.

Duffy, G. G., Webb, S., & Davis, S. (in press). Literacy education at a crossroad: "Finger in the dike" strategies for countering the trend to marginalize quality teacher education. In J. Hoffman & Y. Goodman (Eds.), *Changing literacies for changing times*. New York: Routledge, Taylor & Francis.

Duffy, G. G., Webb, S., Kear, K., Leiphart, R., Parsons, S., & Miller, S. (2006, December). *Does thoughtfully adaptive teaching exist?* A paper presented at the National Reading Conference, Los Angeles.

Duke, N. K., Purcell-Gates, V., Hall, L. A., & Tower, C. (2006/2007). Authentic literacy activities for developing comprehension and writing. *The Reading Teacher, 60*(4), 344-355.

Glaser, B. J. & Strauss, A. L. (1967). *The discovery of grounded theory: Strategies for qualitative research.* Hawthorne, NY: Aldine de Gruyter.

Guthrie, J. T. (2004). Teaching for literacy engagement. *Journal of Literacy Research*, *36*(1), 1-29.

Guthrie, J. T. (2003). Concept-oriented reading instruction. In C. Sweet & C. Snow (Eds.), *Rethinking reading comprehension*. New York: Guilford.

Hammerness, K., Darling-Hammond, L., Bransford, J., Berliner, D., Cochran-Smith, M., McDonald, M., & Zeichner, K. (2005). How teachers learn and develop. In L. Darling-Hammond & J. Bransford (Eds.) *Preparing teachers for a changing world: What teachers should learn and be able to do* (pp. 358-389). San Francisco, CA: Jossey-Bass.

Hargreaves, D. H. (1977). A phenomenological approach to classroom decision-making. *Cambridge Journal of Education*, *7*(1), 12-20.

Hill, J., & Martin, W. R. (1971). Training for educational decision making. *Journal of Teacher Education*, *22*(4), 443-447.

Hoffman, J. V., Roller, C., Maloch, B., Sailors, M., Duffy, G., Beretvas, S. N., & National Commission on Excellence in Elementary Teacher Preparation for Reading Instruction. (2005). Teachers' preparation to teach reading and their experiences and practices in the first three years of teaching. *The Elementary School Journal, 105*(3), 267-287.

Houtveen, A. A. M., Booij, N., de Jong, R., & van de Grift, W. J. C. M. (1999). Adaptive instruction and pupil achievement. *School Effectiveness and School Improvement*, *10*(2), 172-192.

Howell, D. C. (2002). *Statistical methods for psychology* (5th ed.). Pacific Grove, CA: Duxbury.

International Reading Association. (2003). *Prepared to make a difference: An executive study of the National Commission on Excellence in Elementary Teacher Preparation for Reading Instruction*. Newark, DE: International Reading Association.

Joyce, B. R., & Harootunian, B. (1964). Teaching as problem solving. *Journal of Teacher Education*, *15*(4), 420-427.

Kear, K. A. (in progress). Beginning teachers' rationales for adaptive decisions about text use. Unpublished manuscript.

Lin, X., Schwartz, D. L., & Hatano, G. (2005). Toward teachers' adaptive metacognition. *Educational Psychologist*, *40*(4), 245-255.

Liston, D. P., & Zeichner, K. M. (1990). Reflective teaching and action research in preservice teacher education. *Journal of Education for Teaching*, *16*(3), 235-255.

Maxwell, J. A. (2005). *Qualitative research design: An interactive* approach (2nd ed.). Thousand Oaks, CA: Sage Publications.

Mazzoni, S. A. & Gambrell, L. B. (2003). Principles of best practice: Finding the common ground. In L.M. Morrow, L.B. Gambrell, & M. Pressley (Eds.) *Best practices in literacy instruction* (2nd ed., pp. 9-21). New York: Guilford.

Merriam, S.B. (2002). *Qualitative research in practice: Examples for discussion & analysis*. San Francisco, CA: Jossey-Bass.

Mertens, D. M. (1998). *Research methods in education and psychology: Integrating diversity with quantitative & qualitative approaches*. Thousand Oaks, CA: Sage.

Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis* (2nd ed.). Thousand Oaks, CA: Sage Publications.

Miller, S. D. (2003). How high- and low-challenge tasks affect motivation and learning: Implications for struggling learners. *Reading & Writing Quarterly, 19*, 39-57.

Miller, S. D., & Meece, J. L. (1997). Enhancing elementary students' motivation to read and write: A classroom intervention study. *The Journal of Educational Research, 90*(5), 286-299.

Miller, S. D., & Meece, J. L. (1999). Third graders' motivational preferences for reading and writing tasks. *The Elementary School Journal, 100*(1), 19-35.

National Research Council. (2000). *How people learn: Brain, mind, experience, and school* (Expanded ed.). Washington, DC: National Academies Press.

Paris, S. G., & Paris, A. H. (2001). Classroom applications of research on self-regulated learning. *Educational Psychologist, 36*(2), 89-101.

Paris, S. G., Byrnes, J. P., & Paris, A. H. (2001). Constructing theories, identities, and actions of self-regulated learners. In B. J. Zimmerman & D. H. Schunk (Eds.), *Self-regulated learning and academic achievement: Theoretical perspectives*. Mahwah, NJ: Erlbaum.

Parsons, S. A. (2008a). *Case studies of four teachers: The openness of the tasks they implement, the adaptations they make, and the rationales they offer for adapting.*

Unpublished doctoral dissertation, The University of North Carolina at Greensboro, NC.

Parsons, S. A. (2008b). Providing all students ACCESS to self-regulated literacy learning. *The Reading Teacher*, *61*(8), 628-635.

Perry, N. E. (1998). Young children's self-regulated learning and contexts that support it. *Journal of Educational Psychology, 90*(4), 715-729.

Pintrich, P., & Schunk, D. (1996). *Motivation in education*. Columbus, OH: Merrill, Prentice-Hall.

Pole, K. M. (2006). *Teacher decision-making during second-grade writing instruction.* Unpublished doctoral dissertation, Texas Woman's University, Denton, TX.

Pressley, M. (2006). *Reading instruction that works: The case for balanced teaching* (3rd ed.). New York: Guilford.

Pressley, M., Allington, R. L., Wharton-McDonald, R., Block, C. C., & Morrow, L. M. (2001). *Learning to read: Lessons from exemplary first-grade classrooms*. New York: Guilford.

Putnam, J., & Duffy, G. G. (1984). *A descriptive study of the preactive and interactive decision making of an expert classroom teacher*. (Research Series No. 148). East Lansing: Institute for Research on Teaching, Michigan State University.

Risko, V. J., Roskos, K., & Vukelich, C. (2005). Reflection and the self-analytic turn of mind: Toward more robust instruction in teacher education. In C. Block, S. Israel, K. Kinnucan-Welsch, & K. Bauserman (Eds.), *Metacognition and literacy*

learning: Theory, assessment, instruction, and professional development (pp. 315-349). Mahwah, NJ: Erlbaum.

Risko, V. J., Vukelich, C., & Roskos, K. (2002). Preparing teachers for reflective practice: Intentions, contradictions, and possibilities. *Language Arts, 80* (2), 134-144.

Romano, M.E. (2006). "Bumpy moments" in teaching: Reflections from practicing teachers. *Teaching and Teacher Education, 22*, 973-985.

Scales, R. Q. (in progress). *A study of text in three teachers' classrooms: Reasons teachers set up their text environment, how text is used during instruction, adaptive teaching while using text, and students' perceptions of and engagement with text.* Unpublished manuscript.

Schepens, A., Aelterman, A., & Keer, H. V. (2007). Studying learning processes of student teachers with stimulated recall interviews through changes in interactive cognitions. *Teaching and Teacher Education, 23*, 457-472.

Schon, D. A. (1983). *The reflective practitioner: How professionals think in action*. New York: Basic Books.

Shavelson, R. J. (1983). Review of research on teachers' pedagogical judgments, plans, and decisions. *The Elementary School Journal, 83*, 392-413.

Stallings, J. (1980). Allocated academic learning time revisited, or beyond time on task. *Educational Researcher, 9*(11), 11-16.

Stodolsky, S. S., & Grossman, P. L. (2000). Changing students, changing teaching. *Teachers College Record, 102*(1), 125-172.

Sutcliffe, J. & Whitfield, R. (1976). Decision making in the classroom: An initial report. *Research Intelligence, 2*(1), 14-19.

Taylor, B. M., Pearson, P. D., Clark, K., & Walpole, S. (2000). Effective schools and accomplished teachers: Lessons about primary-grade reading instruction in low-income schools. *Elementary School Journal, 101*(2), 121-166.

Taylor, B. M., Pressley, M., & Pearson, P. D. (2002). Research-supported characteristics of teachers and schools that promote reading achievement. In B. M. Taylor & P. D. Pearson (Eds.), *Teaching reading: effective schools, accomplished teachers* (pp. 361-373). Mahwah, NJ: Erlbaum.

Teale, W. H., & Gambrell, L. B. (2007). Raising urban students' literacy achievement by engaging in authentic, challenging work. *The Reading Teacher, 60*(8), 728-739.

Thornburg, A. W. (2005). *The effects academic tasks have on student motivation and understanding*. Unpublished doctoral dissertation, The University of North Carolina at Greensboro, NC.

Turner, J. C. (1995). The influence of classroom contexts on young children's motivation for literacy. *Reading Research Quarterly, 30*(3), 410-441.

Wharton-McDonald, R., & Hampston, J. M. (2006). Expert primary-level teaching of literacy is balanced teaching. In M. Pressley (Ed.), *Reading instruction that works: The case for balanced teaching* (3rd ed., pp. 240-292). New York: Guilford Press.

Wharton-McDonald, R., Pressley, M. & Hampston, J. (1998). Literacy instruction in nine

first grade classrooms: Teacher characteristics and student achievement.

Elementary School Journal, 99(2), 101-128.

Woolfolk, A. (2007). *Educational psychology* (10th ed.). Boston, MA: Allyn and Bacon.

Yin, R. K. (2003). *Case study research: Design and methods* (3rd ed.). Thousand Oaks,

CA: Sage Publications.

Zeichner, K.M. (2005). A research agenda for teacher education. In M. Cochran-Smith &

K. M. Zeichner (Eds.), *Studying teacher education: The report of the AERA Panel

on Research and Teacher Education* (pp. 737-759). Washington, DC: American

Educational Research Association.

Zeichner, K. M., & Liston, D. P. (1996). *Reflective teaching: An introduction*. Mahwah,

NJ: Lawrence Erlbaum Associates, Publishers.

Appendix A

Student Engagement Log

Student Engagement Log

Teacher: _____   Date: _____   Time: _____

Observation: _____

Indicators

+ = Focusing on teacher/On Task
0 = Discussing other things/off task

Time	Task	High		Average		Low	
		Student 1	**Student 2**	**Student 3**	**Student 4**	**Student 5**	**Student 6**

Appendix B

Academic Task Rubric

Academic Task Rubric

Teacher: Date:

Describe the task and its product:

Authenticity (adapted from Duke et al., 2006/7)

1 – The task is limited to tasks that are completed primarily in school.

2 – The task mimics outside-of-school tasks, but still has features of school-based activities.

3 – The task closely replicates tasks completed in people's day-to-day lives outside of school.

Collaboration (adapted from Miller & Meece, 1999)

1 – Students work alone on the task.

2 – Students collaborate minimally in the task.

3 – Students collaborate throughout the task.

Challenge (adapted from Miller & Meece, 1999)

1 – The task requires letter- or word-level reading or writing.

2 – The task requires sentence-level reading or writing.

3 – The task requires paragraph-level reading or writing.

Student Directed (adapted from Thornburg, 2005)

1 – The students have no input on the task.

2 – The students have input, but the choices have minimal influence on the task.

3 – Students have input into many substantial aspects of the task.

Sustained (adapted from Miller & Meece, 1999)

1 – The task takes place within one sitting.

2 – The task takes place within one or two day.

3 – The task spans over three or more days.

Appendix C

Codes and Examples for Adaptations

	Code for adaptation	Example
1	Teacher changes lesson objective	Change in instruction from development of writing to focus on interpersonal skills when working in a cooperative group
2	Teacher changes instructional materials, strategies, routines, procedures, or means by which the objective is met	Change of strategy to access prior knowledge from completing graphic organizer as individuals to completing the tool as partners
3	Teacher invents example, analogy, verbal or physical illustration	Student does not understand "sparkle", so teacher demonstrates meaning with hands and words
4	Teacher inserts a mini-lesson	When student does not remember how to write the main idea, teacher inserts mini-lesson into instruction
5	Teacher suggests different ways students could deal with situation or problem	In a group project, one student is not participating with the other on the creation of a poster. Teacher suggests to the group a different way of interacting so that all children are included in the work
6	Teacher omits planned activities (not for time reasons) or inserts something	Students finish early with assigned tasks, so teacher groups early finishers together and starts new instruction in a new text
7	Teacher changes planned order of instruction	Teacher reorders planned lessons since the writing lesson is an extension of the reading lesson, moving spelling to later

Appendix D

Codes, Definitions, and Examples for Rationales

Rationales	Definitions	Examples
Objective not met	Teacher adapts to repair student confusion or misunderstanding or suggests that her instructional goals are otherwise not met.	"That's when I asked him if he really understood what an inference was and he said no."
Challenge or elaborate	The teacher adapts to add to the planned lesson by exploiting a teachable moment where unplanned content is examined.	"I wanted to give her a task that maybe she would say, 'oh maybe I can add something else' or that kind of thing."
Give strategies	The teacher adapts to teach students a specific strategy.	"I figured when they are working on their vocabulary, sometimes they will just go straight to the dictionary. And I wanted them to work on context clues and I figured that was the best way to do it is show them in the book."
Make connections	The teacher adapts to help students make connections to their prior knowledge, their real lives, texts, or vocabulary.	"I thought seeing that and relating it to the text would make her understand it a little better."
Knows students	The teacher adapts using her knowledge of students to inform her instruction. The teacher adapts using her knowledge of the relationships among students and patterns of behavior of the classroom.	"she had finished reading early and I wanted to make sure that she was staying on task of because she tends to wander off easily" "I didn't want to necessarily call him out because he gets really upset when you do. So I try my very best not call him out in front of everybody. But I thought if he were to reread that they really wouldn't know what he was doing because they were doing something else."
Check student understanding	The teacher adapts to ascertain students' understanding of materials or processes.	
Anticipate student learning needs	The teacher changes instruction because she anticipates future difficulty.	
Manage behavior	The teacher adapts to prevent or to respond to misbehavior or off-task action.	"Then that would just let him know that I noticed that he wasn't being positive."

Rationales	Definitions	Examples
Manage time	The teacher adapts because of excess or limited time.	"I had extra time and I didn't want to continue to talk and waste time. I didn't know what else to do."
Promote engagement	The teacher adapts to engage the student by appealing to their interests or emotions.	"I just wanted . . . and I was very proud of James . . . I noticed toward the end that he had opened up more. I wondered how feedback from me causes him want to open up and want to talk and share…it makes him more confident in himself. Sometimes I can get stuff out of him but after that point he was like . . . he talked more it seemed like and he was more willing to share and not just sit there and say 'I don't know.'"

Appendix E

Rubric for Rating the Thoughtfulness of Adaptations and Rationales

Rubric for Rating the Thoughtfulness of Adaptations and Rationales

Considerably Thoughtful:

- The teacher makes exemplary or creative use of professional knowledge or shows exemplary or creative understanding of professional practices (i.e., we would be proud if it was our teacher education program student)
- The adaptation or rationale is clearly associated with a larger goal the teacher holds for literacy growth (i.e., the adaptation or rationale is motivated by a desire to develop a deep or broad understanding or a conceptual or attitudinal goal)

Thoughtful:

- The adaptation or rationale is tied to the specific lesson objective and/or to a larger goal the teacher wants to develop
- Does not meet any of the criteria for "minimally thoughtful"

Minimally Thoughtful:

- The adaptation or rationale requires minimal thought
- The teacher's use of professional knowledge or practices is fragmented, unclear, or incorrect (i.e., we would not be satisfied if this was our teacher education program student)
- The adaptation or rationale does not contribute to the development of either a larger goal or specific lesson objective

Appendix F

Teacher Interview Protocol

Teacher Interview Protocol

Teacher:

Date:

Time:

1. When I saw you _____ during the lesson, was that a spontaneous change, something you had not planned?

2. Tell me what you thought of the six target students' levels of engagement during the task completion. Was it typical? Why or why not?

3. How long will the task take before it is complete? Will the task take place for one sitting, one or two days, or will it span over three or more days?

Appendix G

Teachers' Lessons and Corresponding Task Ratings

Grade	Lesson Number	Date	Task Description	Task Rating	Openness
K	1	09-27-07	Picture web of book	6	Closed
	2	11-08-07	Phoneme tree, group 1	5	Closed
			Phoneme tree, group 2	5	Closed
			Phoneme tree, group 3	5	Closed
			Story sequence	5	Closed
	3	12-13-07	Venn Diagram	5	Closed
	4	01-28-08	Group writing	5	Closed
			Personal journal	8	Closed
	5	03-11-08	Graphic organizer – sequencing	6	Closed
			Graphic organizer – seasons	8	Closed
	6	04-01-08	Story map	8	Closed
1	1	09-25-07	Copy vocabulary words, group 1	5	Closed
			Copy vocabulary words, group 2	5	Closed
			Read sentence & circle yes/no	5	Closed
			Write about apples	9	Mod. open
	2	10-16-07	Write words on cards, group 1	5	Closed
			Write words on cards, group 2	5	Closed
			Add −s to base word	5	Closed
			Choose the correct word	5	Closed
			Write about favorite wild animal	9	Mod. open
	3	12-11-07	Fill in the blank	5	Closed
			Fill in the blank	5	Closed
			Circle the word & write it	5	Closed
			Write about Christmas	8	Closed
	4	01-08-08	Fill in the blank	5	Closed
			Draw your neighborhood, group 1	8	Closed
			Complete the sentence	5	Closed
			Draw your neighborhood, group 2	7	Closed
			Fill in the missing letter	5	Closed
			Circle the correct word	5	Closed
			Write about winter	10	Mod. open

Grade	Lesson Number	Date	Task Description	Task Rating	Openness
1	5	02-04-08	Fill in the blanks	5	Closed
			Circle & write your answers	5	Closed
			Punctuation & editing worksheet	5	Closed
			Write about your favorite TV show	8	Closed
	6	03-03-08	Vocabulary word sentence, group 1	7	Closed
			Compare/contrast sheet, group 1	6	Closed
			Vocabulary word sentence, group 2	7	Closed
			Compare/contrast, group 2	6	Closed
			Write about an emergency	9	Mod. open
	7	04-29-08	Morning activity	5	Closed
			Label turnip plant parts	5	Closed
			Sort word cards, group 1	7	Closed
			Write vocabulary words, group 1	5	Closed
			Sort word cards, group 2	6	Closed
			Write vocabulary words, group 2	5	Closed
			Reading workbook pages 34 & 35	5	Closed
			Writing about favorite meal	8	Closed
2	1	10-04-07	Find the digraph in groups	6	Closed
			Circling items in groups	6	Closed
			Write a sentence with a digraph in it	8	Closed
			Planning sheet for writing	9	Mod. open
	2	10-25-07	Find contractions as a group	7	Closed
			Vocabulary pictures & sentence	7	Closed
			Trace the words in your reader	5	Closed
			Peer editing	7	Closed
	3	11-15-07	Cut & glue word sort	5	Closed
			Explain steps of washing the dog	6	Closed
	4	12-13-07	Word sort in groups	6	Closed

Grade	Lesson Number	Date	Task Description	Task Rating	Openness
2	4	12-13-07	Making mini-book	7	Closed
	4	12-13-07	Making mini-book	5	Closed
	5	01-08-08	Find long I words	5	Closed
	5	01-08-08	Copy sentence & fill in the blank	7	Closed
	6	02-04-08	Groups find facts & opinions	8	Closed
			Write –at words, purple group	5	Closed
			Circle –at words, purple group	6	Closed
			Matching & fill in the blanks	5	Closed
	7	03-03-08	Dr. Seuss worksheet in groups	8	Closed
	7	03-03-08	ABC brainstorming for poem	8	Closed
			Word work – contractions	6	Closed
			Venn diagram in groups	8	Closed
			Fill in the blank sentence	7	Closed
	8	04-28-08	Write your name twice, green group	5	Closed
			Write 3 sentences, green group	7	Closed
			Sequence sentences in groups	8	Closed
3	1	10-11-07	Write vocabulary words	6	Closed
			Real/Fantasy list	5	Closed
			Test prep	5	Closed
			Test prep	5	Closed
			Pick a prompt & write	10	Mod. open
	2	11-01-07	Graphic organizer	7	Closed
			Find & write 8 vocabulary words	5	Closed
			Graphic organizer	7	Closed
			Write words 6 times each	5	Closed
			Vocabulary word activity	7	Closed
	3	12-06-07	Graphic organizer to review animals	7	Closed
			Study Guide/Review for test	5	Closed
			Test	5	Closed
			Write vocabulary words	5	Closed
			Write 4 sentences	7	Closed

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3	3	12-6-07	Character web	6	Closed
			Write a question & a sentence	7	Closed
			Write Q or S for question/statement	5	Closed
	4	01-16-08	KWL wild animals	8	Closed
			Venn Diagram	6	Closed
			Personification web in groups	6	Closed
	5	02-06-08	Write characters from the book	6	Closed
			Venn diagram/volcano & earthquake	5	Closed
			Listing nouns in groups	7	Closed
			Sequence sentences 1-2-3	5	Closed
			Story frame/fill in nouns	5	Closed
	6	02-27-08	Compare/contrast monsters & dog	9	Mod. open
			Wonders of the world web	7	Closed
			Graphic organizer, compare/contrast	10	Mod. open
	7	04-09-08	Vocabulary C-SPACE	5	Closed
			Alike & different	9	Mod. open
			Prediction chart	6	Closed
			Flow chart	7	Closed
	8	04-30-08	Answer story questions	5	Closed
			Graphic organizer	6	Closed
			Draw a conclusion	6	Closed
			Write A, B, or C	5	Closed
			Draw a conclusion	8	Closed
			Sticky note C-SPACE	6	Closed
4	1	10-02-08	Copying overhead	7	Closed
	2	10-23-07	Workbook p. 93	5	Closed
			Workbook pages 97 & 98	6	Closed
	3	11-13-07	Workbook p. 23	6	Closed

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4	3	11-13-07	Workbook pages 24 & 25; p. 66 text	5	Closed
			Copy from board & write 4th event	6	Closed
	4	01-14-08	Workbook p. 63 as a class	6	Closed
			Workbook p. 64 w/partner	7	Closed
			Vocabulary words & meanings	6	Closed
			Facts & details on index cards	7	Closed
			Copy states & capitols	5	Closed
			Copy challenge words	5	Closed
	5	02-11-08	Workbook pages 174 & 175	7	Closed
			Workbook p. 173 as a class	6	Closed
			Graphic organizer character traits	7	Closed
			Copy challenge words	5	Closed
			Workbook p. 173	6	Closed
	6	02-26-08	Grammar book pp. 179, 182-183	5	Closed
			Writing to a prompt	7	Closed
			Black history project	10	Mod. open
			Centers worksheets	7	Closed
			Describe the Lost City	6	Closed
	7	04-22-08	Write 12 questions	9	Mod. open
			List classifications in order	5	Closed
			Write a response	6	Closed
5	1	10-09-07	Compare/Contrast in groups	8	Closed
			Centers worksheets	5	Closed
	2	11-13-07	Spelling test	5	Closed
			Answer questions in groups	8	Closed
			Write alliteration on paper	5	Closed
			Workbook p. 103 in groups	8	Closed
			Write the purposes an author writes	5	Closed
	3	12-11-07	Graphic organizer, groups	7	Closed

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			Underline words as teacher reads	5	Closed
	4	01-10-08	Circle & correct spelling errors	5	Closed
			Study guide in partners	8	Closed
	5	01-30-08	Match base word to prefix	5	Closed
			Match word & definition in pairs	6	Closed
			Graphic organizer/generalizations	7	Closed
	6	02-20-08	Graphic organizer/conclusions	6	Closed
			Graphic organizer for read aloud	6	Closed
	7	04-02-08	Generalizations chart	10	Mod. open
	8	04-23-08	Venn diagram	5	Closed
			Group Venn diagram	8	Closed
			Fill in blanks – spelling	6	Closed