A Study of Thoughtful Literacy and the Motivation to Read

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By teaching thoughtful literacy, teachers can foster reading motivation and engagement.

t would be difficult to imagine a group of individuals more vitally interested in a child's literacy motivation than elementary school reading teachers. As a group, they are intensely and intimately familiar with the array of personal and academic rewards that a high level of reading motivation can bring about in the life of a child. However, the fact remains that teachers may have a wealth of knowledge and experience and a full repertoire of proven teaching strategies at their disposal, but if a child cannot or will not muster the motivational resources to respond, then there is virtually nothing that teachers can do.

Given those circumstances, it is not surprising that motivation to read has evolved into one of the most intensely studied of the factors contributing to overall success or failure in the elementary school. In fact, reading teachers identified *creating interest in reading* as the research issue they most cared about in a survey of members of the International Reading Association (O'Flahavan et al., 1992). But motivation to read also has deep roots in classic motivation theory, specifically what has come to be known as the expectancy-value theory (Eccles, 1983).

Expectancy-value theory suggests that motivation is dependent on two key factors:

- 1. The extent to which an individual expects success or failure in an undertaking
- 2. The value or overall appeal that an individual ascribes to the task

Research has also suggested that these two qualities are possessed in abundance by individuals who are *engaged readers*—those ideal readers who are

intrinsically motivated, and who read regularly and enthusiastically for a variety of their own purposes (Guthrie & Anderson, 1999). Research into engaged and motivated readers has found that they read more than their less enthusiastic counterparts (Guthrie, Wigfield, Metsala, & Cox, 1999; Wigfield & Guthrie, 1997), attain higher levels of achievement in reading (Cunningham & Stanovich, 1997; Guthrie, Schafer, & Huang, 2001), perform better on standardized tests of reading (Gottfried, 1990), and receive higher grades in school (Sweet, Guthrie, & Ng, 1998).

In our review of the literature on engaged reading, we found one particularly intriguing line of research into the link between motivation and achievement. Schiefele (1991) found that university students who regarded the topic of a text as intrinsically motivating and interesting outperformed their less-interested classmates in an assessment of comprehension. However, it was not the recall of factual information that distinguished interested and less-interested readers. Instead, it was responses to questions that required deep and complex comprehension, the detection of relationships between and among ideas, or the application of ideas to new situations.

We wondered whether this effect of interest on higher level comprehension was reciprocal. In other words, if interest level is related to the inclination to think deeply about text, would this tendency toward thoughtful response to text also be related to motivation to read? Specifically, would children who achieved higher scores on a measure of thoughtful literacy be more motivated to read than their lower scoring counterparts? And would that relationship hold true for children of elementary school age?

Consequently, we set out to identify two distinct groups of elementary school children:

- Those who could recall what they read and who demonstrated the inclination to think deeply about it
- Those who could recall what they read but who did not demonstrate the inclination to respond thoughtfully to the text

Our straightforward research question was whether these two groups would differ with respect to their overall motivation to read, the value that they ascribed to reading, and their perceived self-efficacy as readers.

Gender and Age Differences in Motivation to Read

Of course, very little is straightforward when we attempt to address an issue as overwhelmingly complex as human motivation. For example, research has found that the reading motivation levels of females are consistently and significantly higher than those of males (Durik, Vida, & Eccles, 2006; Gambrell & Marinak, 2010; Kush & Watkins, 1996; McKenna, Kear, & Ellsworth, 1995; Merisuo-Storm, 2006). To complicate matters even further, several researchers have found that there were no gender differences with respect to self-efficacy as readers, but only for the value assigned to reading (Durik et al., 2006; Gambrell & Marinak, 2010; McKenna et al., 1995; Pečjak & Peklaj, 2006). Clearly, our inquiry would be incomplete if we did not also examine the links between gender and motivation and attempt to determine if motivation levels for males would be lower than those of females, even if those males demon-

strated an inclination to react thoughtfully to text.

At the same time we needed to be mindful of the fact that researchers have also found that motivation

PAUSE AND PONDER

- Differences in reading motivation related to gender may disappear if all children are challenged to respond thoughtfully to text. How could you and your colleagues test this idea and how could you monitor the progress of all children as they engage in thoughtful response to text?
- The authors believe that it is the inclination and not the ability to think about text that characterizes the thoughtfully literate child. What strategies could you use to promote children's ability to think about text in the same ways that they think about life? What are some practices used in your school or district that might orient children to regard reading as an exercise in the Three Rs (Recall, Recognition, and Recitation)?
- Teacher voices can make valuable contributions to the national dialogue about curriculum standards. How can you and your colleagues find your voices to promote thoughtful literacy in your schools and districts? How can you branch out into local professional organizations? What organizations at the state, national, and international levels could serve as outlets for your ideas about thoughtful literacy education?

to read decreases with age, even among elementary school children. Several researchers have suggested that the decline begins at or about the fourth-grade year (Durik et al., 2006; Kush & Watkins, 1996; McKenna et al., 1995). Consequently, we needed to investigate whether this relationship might be linked to the inclination to respond thoughtfully to text.

And so with two potential complications factored into the study, we arrived at a threefold research question:

- 1. Would the inclination to respond thoughtfully to narrative text be related to the overall motivation, the value ascribed to reading, and the reading self-efficacy of elementary school children?
- 2. Would motivation thus assessed be systematically related to gender and the inclination to respond thoughtfully to text?
- 3. Would the value ascribed to reading decrease in relation to grade level and the inclination to respond thoughtfully to text?

Assessment of Motivation and Thoughtful Response

To carry out the study, we needed to identify a measure of reading motivation and a perfect fit was the Motivation to Read Profile (MRP; Gambrell, Palmer, Codling, & Mazzoni, 1996). Because the MRP is modeled on the basis of expectancy-value theory, it yields measures of both reading self-efficacy and value ascribed to reading. And it

does so with adequate reliability (Cronbach's α = 0.75 for self-efficacy and 0.82 for value), no small feat for the assessment of a construct as complex as human

motivation. All children in this study were given the reading survey of the MRP, a 20-item Likert scale instrument, with half of the items dedicated to the assessment of self-efficacy and the other half to value of reading.

To assess the inclination of children to respond thoughtfully to text, we chose the Critical Reading Inventory (CRI; Applegate, Quinn, & Applegate, 2008). The CRI is modeled on the 2007 Framework of the National Assessment of Educational Progress (National Assessment Governing Board, 2006), and allocates 60% of its comprehension items to assessment of the reader's inclination to respond thoughtfully to the ideas and issues embedded in text. Thoughtful comprehension in the CRI involves both the ability to link experience with text to arrive at a logical conclusion and the ability to grasp the larger significance of text and to use the text to support a stand that the reader has taken. The remaining 40% of the items in the CRI are directed to the measurement of text-based comprehension.

Sample Characteristics

The sample for this study consisted of 443 children (202 males and 241 females) ranging from grade 2 through grade 6 and residing in Pennsylvania, New Jersey, and Delaware (see Table 1). Eighty-six percent of the children were Caucasian and 14% were members of minority groups. Public school students accounted for 63% of the sample, while parochial students (26%), private school students (10%), and home-schooled children (1%) accounted for the

Table 1
Study Sample Characteristics by Grade Level and Gender

Grade	n	Males	Females
2	91	46	45
3	60	30	30
4	90	45	45
5	105	38	67
6	97	43	54
Total 2–6	443	202	241

remainder. More than 80 different schools in the tristate area were represented in the final sample.

The children in the study were tested between 2006 and 2009 at their current grade level on two narrative passages from the CRI (one was read orally and the other silently). Comprehension of the two passages was assessed by means of open-ended questions, with a total of 8 text-based and 12 higher order items. Testing was carried out by graduate or undergraduate students as part of their coursework in education. All examiners were trained in the administration and scoring of the CRI via classroom demonstrations and Web-based tutorials for the scoring of comprehension items, miscues, and retellings. Scoring for each of the responses was cross-checked by two experienced CRI users, and any differences were resolved by discussion.

On the basis of their comprehension items scores, all students were assigned to either the Red Group or the Blue Group. To qualify for inclusion in the study, all students had to score at least 81% in textbased comprehension. The mean text-based comprehension score for the Red Group was 88.2%, but their mean higher order comprehension score was only 44.9%. Thus, the Red Group consisted of children strong in text-based but weak in higher order comprehension. The mean text-based comprehension score in the Blue Group was 91.9%, and their mean higher order score was 85.1%. Thus, the Blue Group consisted of children strong in both text-based and higher order comprehension. On average, both groups scored at an independent level with respect to text-based comprehension. However, only the Blue Group was also independent in thoughtful response; the Red Group tested at a frustration level in thoughtful response to narrative text.

We should note at this time that we have and will continue to take pains throughout this article to describe our findings as the *inclination* to think deeply about text, and not as the *ability* to do so. We believe that all children engage in their real lives in the kind of thoughtful analysis that enables them to size up people, situations, and life events with often disconcerting accuracy and insight. Many of these children have simply not yet encountered a situation that demands that they do the same type of thinking about what they read. Consequently there is a disconnect between their world of ideas and their world of text, a disconnect that we hope can be mended at least in part by the discussion of the results of this study.

Results

Our first research question was whether the inclination to respond thoughtfully to text would affect the reading motivation of elementary school children. The data in Table 2 suggests that the answer is a resounding "yes." In terms of total motivation (t = -11.11, p < 0.0001), value ascribed to reading (t = -10.02, p < 0.0001), and self-efficacy as a reader (t = -9.10, p < 0.0001), children with high inclination to respond thoughtfully to text were significantly more motivated to read than children who excelled only in text-based comprehension.

In our attempt to address our second research question (Would motivation be systematically related to gender and group membership?), we broke down the data on the basis of gender (see Table 3) and first examined the Red Group. As had been noted by several previous researchers, we found that females were significantly more motivated to read in terms of total motivation (t = -3.28, p < 0.001) and value ascribed to reading (t = -4.23, t = 0.0001), but not so in terms of self-efficacy as a reader (t = -1.47, t = 1.47, t = 1.47,

motivation (t = -1.69, p = not significant), self-efficacy (t = -1.22, p = not significant), or value of reading (t = -1.02, p = not significant).

To address our third research question (Would the value ascribed to reading decrease in relation to grade level and group membership?), we examined grade-level motivation figures in the Red Group and the Blue Group in turn. As can be seen in Table 4, the decrease in value of reading was pronounced and significant in the Red Group, for females even more so than males. However, for males in the Blue Group, the decrease from 2nd to 6th grade was only 42% of the decrease seen in the Red Group. In the case of females, the decrease in the Blue Group was only 21% of what it had been for the Red Group.

Discussion

Question One: Will the Inclination to Respond Thoughtfully to Narrative Text Be Related to the Reading Motivation of Elementary School Children?

In many respects, this question is a classic no-brainer. If the inclination to think deeply about text is related to reading engagement, then it stands to reason

Table 2
Motivation to Read as a Function of Group Membership

Measure	Group	Mean score	t value	Significance
Total motivation to read	Red group	73.59		
	Blue group	83.06		
	Difference	9.47	-11.11	p < .0001
Value of reading	Red group	70.95		
	Blue group	81.19		
	Difference	10.24	-10.02	p < .0001
Self-concept as a reader	Red group	76.38		
	Blue group	84.95		
	Difference	8.57	-9.10	p < .0001

Table 3
Gender by Group Membership Differences in Motivation to Read

Measure	Group	Males mean	Females mean	t value	Significance
Value of reading	Red group	68.01	71.56	-4.23	p < .0001
	Blue group	80.32	81.69	-1.02	n.s.
	Combined	73.13	78.85	-5.19	p < .0001
Self-concept as a reader	Red group	75.42	77.57	-1.47	n.s.
	Blue group	83.23	85.94	-1.22	n.s.
	Combined	78.66	82.61	-3.90	p < .0001
Motivation to read	Red group	71.69	75.92	-3.28	p < .001
	Blue group	81.86	83.77	-1.69	n.s.
	Combined	75.92	80.64	-5.02	p < .0001

Table 4
Group Mean Score on Value of Reading by Grade Level and Gender

Grade level	Red group females	Red group males	Blue group females	Blue group males
2	80.47	73.96	82.93	83.27
3	78.06	67.10	88.08	84.89
4	76.05	70.59	81.12	76.69
5	71.96	65.95	81.02	77.75
6	66.20	61.92	79.90	78.26
Difference: Grade 2–6	-14.27	-12.04	-3.03	-5.01

that those who think about what they read will find their reading more rewarding and valuable. But prior to this study, little or no empirical evidence existed to support the link between thoughtful response and motivation to read. Perhaps even more important, we must caution against the interpretation of these findings as causal. This study has not established that the inclination to respond thoughtfully to text will have an effect on motivation, but only that the two factors appear to be related.

That is not to say that there is not a certain intuitive logic involved: Engagement in reading and the

motivation to read seem instinctively to go hand in hand. However, the field of literacy research is replete with examples of correlational data that have been interpreted as causal. We are of no mind to participate in another instance of a rush to judgment. But that said, these findings open the door on many more issues, issues unlikely to be resolved without the intellectual inquiry and action research carried out by classroom reading teachers.

Chief among these issues is classroom instruction that promotes thoughtful literacy. In this study, we had no way of knowing how some elementary school children became thoughtfully literate; we only knew that some had and some had not. We had no way of establishing whether it was past classroom instruction that made the difference in a significant number of these readers' lives. We have not even established that successful instruction in thoughtful literacy in the future will be able to transform children from lukewarm to engaged and enthusiastic readers.

However, it seems that widespread teacher involvement in instruction designed to engage and motivate young readers may position the field to arrive at an answer to some of these crucial questions long before traditional researchers can. For when we examine these data, it is difficult to avoid the conclusion that a disturbingly large number of elementary school children have little use for reading and a limited inclination to think deeply about what they read. That is a condition that literacy educators in this country can never make peace with.

Question Two: Is Motivation Systematically Related to Gender and the Inclination to Respond Thoughtfully to Text?

We were frankly startled to find that the oft-researched advantage in favor of females in the value ascribed to reading was so obviously present in the Red Group but so completely missing in the Blue Group. This finding was all the more surprising because in this study, we used narrative text exclusively, flying in the face of the conventional wisdom that identifies informational text as the odds-on favorite of elementary school males. But unlike many of the studies that preceded this one, we did not examine the direct effects of gender on reading motivation. Instead we examined gender effects through the lens of a mediating variable that we described as thoughtful response to text. And when we did that, we arrived at what is arguably our most important finding: that it may be the inclination to approach narratives as thoughtful links between human experience and text that determines whether children of either gender feel impelled to engage in the activity of reading.

Our findings also support the observation that it is not self-concept as a reader that distinguishes the motivation of males and females. In retrospect, we should not have been surprised. After all, our sample consisted of students with very high marks in word

recognition (Reading Accuracy Index = 98.62) and oral reading fluency (Mean CRI Fluency Score = 16.02 out of a possible 20), coupled with the ability to respond very effectively to text-based questions about the stories they had read. Such students are often singled out by their teachers for particularly high praise for their reading skill (Applegate, Applegate, & Modla, 2009). And given the primacy of text-based comprehension in the typical state accountability measure, and even the standard informal reading inventory (Applegate, Quinn, & Applegate, 2002), it is not difficult to imagine large numbers of students flying under our assessment radar who can reproduce but not effectively engage with the texts that they read. We were both surprised and dismayed by the number of children in our study who viewed themselves as "good readers" but who harbored such palpable disdain for reading itself and for the role that it might play in their lives.

The fact that there are significantly more boys than girls among these unfortunate students has led numerous educators and researchers to suggest adjustments in, for example, the subject matter, genre, or activities associated with literacy instruction for males. Our findings suggest, however, that it is just as likely that the level of intellectual challenge and the raising of expectations for deep thinking are the factors that can turn the tide and raise the motivation of readers of both genders.

Question Three: Would the Value Ascribed to Reading Decrease in Relation to Grade Level and the Inclination to Respond Thoughtfully to Text?

Our findings suggest that the inclination of children to think about what they read does not eliminate the attrition of motivation to read among elementary school children, but it may contribute to the slowing of the erosion. A brief overview of the nature of those individual MRP items that distinguished the Red Group and the Blue Group may shed some light on the nature of this finding.

Among those *Value of Reading* questions that distinguished groups at a very high level of statistical significance (p < 0.0001) were items related to the enjoyment of reading, a willingness to talk about one's reading with friends, and a respect for individuals

whom one regards as readers. Blue Group members were far more likely than their Red Group counterparts to express an appreciation of the value of libraries, to envision reading as an integral part of their future lives, and to express pleasure at the idea of receiving a book as a gift. Consequently, we did not find it particularly surprising that children inclined toward these sentiments about reading would continue to see reading as a valuable dimension of the landscapes of their lives, and would be more successful in resisting social forces that tend to devalue literacy achievement.

Implications

We acquired our professional preparation in an era when inquiry into literacy was regarded as collaboration between researchers and professional educators. It was a time of symbiosis when theoreticians could propose ideas with full confidence that basic educators would test those theories, put them through their paces, and provide invaluable feedback that enabled the expansion and clarification of theory. At some point that relationship was lost and research came to be viewed as a means of encouraging educators to move in the direction of rigid and often scripted literacy programs. It is our hope that these findings and others like them will help teachers to regain their voices and rejoin the dialogue that surrounds American literacy education.

Teacher voices are particularly important because neither instruction nor assessment in literacy in the United States may be particularly conducive to addressing the issue of thoughtful literacy in the form of broad-based research projects. In the first place, comprehension is not consistently taught in the average American literacy classroom (Durkin, 1978; Pressley, Wharton-McDonald, Mistretta-Hampston, & Echevarria, 1998; Taylor, Pearson, Clark, & Walpole, 1999), despite the fact that it was named as one of the five pillars of reading by the National Reading Panel (National Institute of Child Health and Human Development, 2001). And when comprehension is taught directly, it is frequently treated as an exercise in memorization of details. Allington (2001) has cited a string of researchers who report that "in the typical classroom, assigned tasks overwhelmingly emphasize copying, remembering, and reciting with few tasks assigned that engage students in thinking about what they've read" (p. 94). Needless to say, this is not the stuff that sets children's hearts afire with enthusiasm and appreciation for the rewards of reading.

In the assessment arena, the proportion of children in the United States identified as proficient readers on state accountability measures is encouraging. However, when one compares these numbers to reading proficiency based on the National Assessment of Educational Progress (NAEP)—the "Nation's Report Card"—the disparity is huge (Wallis & Steptoe, 2007). On average, NAEP labels 40% fewer children as proficient readers, compared with state level tests. Much of this discrepancy is rooted in the huge difference between NAEP's emphasis on thoughtful literacy and the state assessments' focus on literal comprehension (Applegate, Applegate, McGeehan, Pinto, & Kong, 2009).

Thus it appears that neither widespread literacy instruction nor statewide literacy assessment is emphasizing the reader's ability to respond thoughtfully to text. Given that set of circumstances, it is both surprising and ironic to find that there is not a single fourth-grade state assessment framework that defines proficient reading as the mere ability to reproduce the factual information embedded in text. Instead, educational leaders throughout the entire country place a very high premium on the ability of children to think deeply about what they read (Applegate, Applegate, McGeehan, et al., 2009). Consequently, teachers with the will to extend the literacy horizons of their students, and show them how to think about text as they think about life, will never be without theoretical or practical support.

In fact, elementary classroom teachers have at their disposal a full repertoire of research-supported teaching strategies designed to engage and challenge their students to think about text (Block, Gambrell, & Pressley, 2002; Block & Pressley, 2002; Tierney & Readence, 2005). We have found that many teachers who enjoy some measure of curricular freedom seize the moment and opt for thoughtful literacy instruction in their classrooms. These are the individuals who are counted among the influential teachers (Ruddell, 1995) who stimulate the intellectual curiosity of their students, and motivate their desire to solve problems. They engage in meaningful progress monitoring of reading skills, encourage thoughtful response to text, and promote their students' motivation to read. Ultimately, we believe it is gifted teachers such as these who will answer the questions that our research has raised and who will determine whether

instruction in thoughtful literacy will promote children's motivation to read. It is our hope and expectation that the data they gather in their classrooms will position these teachers to add their findings and their voices to the articulation of higher level thinking goals in their communities and in the nation as a whole.

The fact remains that no other group in American education is in a better position to judge the effectiveness of their instruction than teachers. And no group is more acutely aware than literacy educators of the difference between lessons that engage and challenge thinking and those that stultify and deaden the mind. The widespread use of programs that encourage children to recall but not think about what they read may succeed in producing sizeable numbers of children who appear technically proficient in reading. But if the children who pass through these programs are not engaged in thoughtful response to what they read, we run the risk of producing huge numbers of children who see no use for reading in their lives. That illusion of educational success may come at a very high price indeed.

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Take ACTION!

Influential teachers engage students in the thoughtful exploration of text. The first step in that process is detecting significant underlying themes, or messages about the human condition, embedded in text. The second step is using those themes to develop questions that draw students into lively and engaging discussion. This is easier said than done, particularly for teachers who have learned reading as literal recall, as so many of us have.

We have challenged teachers to take up the pursuit of thoughtful literacy in their classrooms. In response, we have constructed a website (www.thoughtfulliteracy. com) for teachers who want to explore thoughtful literacy as part of their professional development plan. Included are samples of underlying themes from several classic children's books and practical tips for unearthing those themes. Users can compare and contrast children's responses to thought-provoking questions and explore criteria for distinguishing sound thinking from unsubstantiated links to personal experience.

The website features lesson plans and video demonstrations of their implementation, with commentary designed to focus the viewers' attention on key lesson elements and to promote independence in the development of similar plans. Teachers can explore additional reading via an annotated bibliography and an extended discussion of the nature of reflective reading. The site also includes practical advice for assessment and progress monitoring of growth in thoughtful response to text. Teaching to promote thoughtful responses to text is a challenge that promises rich rewards to those who take it up. Our hope is that we can contribute to the professional growth of these influential teachers.

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