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An Exploratory Case Study of Teachers' Literacy Orientations and Early Literacy Curricula Preferences

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AN EXPLORATORY CASE STUDY OF TEACHERS' LITERACY ORIENTATIONS AND EARLY LITERACY CURRICULA PREFERENCES

by

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ABSTRACT

In this exploratory case study of two Florida charter schools, early literacy teachers' (prekindergarten through third grade; *N*=9) instructional literacy orientations were explored. The *Literacy Orientation Survey* (Lenski et al., 1998) was viewed through the lens of early literacy teachers' curricular preferences and practical use of curriculum. Descriptive results were analyzed, indicating that most teachers identified as preferring an eclectic rather than traditional or constructivist approach to instruction. However, one-third of teachers' literacy orientation beliefs and practices were not aligned, meaning what they believed about literacy and what they practiced as teachers (when choice was an option) were incongruent. Additionally, most teachers surveyed responded with higher than expected levels of agreement to each statement regarding preferences for three types of curricula (e.g. knowledge-based, skills-based, and combination), obscuring the true nature of their preferences. Further research with a larger sample size is suggested in order to obtain the correlation between teachers' literacy orientations and their curricular preferences.

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INTRODUCTION

Effective approaches to early literacy instruction (Thompson & Sonnenschein, 2016; Foorman & Torgesen, 2001; Lenski et al., 1998) correlate with students' later reading achievement (Cunningham & Stanovich, 1997; Duff et. al., 2015; Ross et. al., 2015; Stanovich, 1986), overall academic achievement (Denti & Guerin, 1999; Chall et. al., 1990), educational attainment (Gray et al., 2017; Magnuson et al., 2016), and lifelong well-being (Lyon, 1998a; Reynolds et. al., 2018; Magnuson et al., 2016; Mortenson, 2007; Mačerinskienė & Vaikšnoraitė, 2006; Smith et al., 2013). Since students' academic achievement is heavily impacted by the quality of their teachers (Terhart, 2011; Hattie, 2009), teacher decisions regarding reading instruction, research-based or not (Lyon, 1998a), could influence the trajectory of a student's academic and lifelong success. Teachers' decisions about early literacy instruction are impacted by their literacy orientations, which are composed of their beliefs and practices in regard to teaching reading (Lenski et al., 1998; Wham et al., 2001). Teachers' literacy orientations may also impact which curricula they choose to implement most frequently (Singleton, 2013). In order for educational stakeholders to support teachers in selecting early literacy curricula that will most positively impact student achievement (Denton et al., 2003), investigating why teachers choose to implement specific types of curricula is a priority. Charter schools may provide a particularly appropriate context to study teachers' curricular preferences, since charter school teachers may have more autonomy in selecting curricula than their public school counterparts, who may be required to comply with district-wide curriculum policies. This study will investigate the nature of two Florida schools' teachers' literacy orientations as determined by the *Literacy Orientation Survey* (LOS; Lenski et al., 1998; Wham et al., 2001), the types of

curriculum they prefer to implement most frequently (knowledge-based, skills-based, or an equal combination of the two; Hirsch, 2016; Thompson & Sonnenschein, 2016; Vitale & Romance, 2007), along with the curricula they actually implement, in order to aid instructional coaches, school administrators, and district personnel in supporting teachers as they make curricular decisions.

Impact of Early Literacy Instruction

Early literacy instruction in prekindergarten through third grade acts as the cornerstone for future reading ability (Ross et. al., 2015; Cunningham & Stanovich, 1997). Those who do not achieve grade-level reading ability by third grade often fall farther behind their peers during each subsequent year of schooling (Duff et. al., 2015). This reality, part of the Matthew Effect in reading (Stanovich, 1986), highlights the cruciality of early literacy instruction. Not only does reading instruction in prekindergarten through third grade greatly impact a child's ability to read in later grades, but it influences the likelihood that they will succeed in any academic venture, including graduating from high school and earning undergraduate and graduate degrees (Gray et al., 2017). Higher levels of educational attainment correlate with lifelong economic (Mortenson, 2007; Mačerinskienė & Vaikšnoraitė, 2006), societal (Mačerinskienė & Vaikšnoraitė, 2006), and health-related (Reynolds et. al., 2018) advantages, increasing a person's chance at overall success in life (Magnuson et al., 2016). Developing the ability to decode and comprehend text at an early age often results in the continuation of reading comprehension development, a precursor to high school graduation and higher degree fulfillment; thus, early literacy may contribute to a lifetime of well-being.

Since a good teacher is the most influential factor in a child's education (Terhart, 2011; Hattie, 2009), the manner in which a teacher teaches reading may be the most important aspect of a student's entire educational career. For example, early elementary teachers have differing levels of autonomy in choosing how to approach literacy instruction. Those given the autonomy to choose among various curricular options may choose to approach literacy instruction in a variety of ways, such as by using knowledge-based curricula, skills-based curricula, or a combination of both types (Thompson & Sonnenschein, 2016). While each of these types of curricula has its pros and cons, school and district culture along with administrative support will partly determine the effectiveness of a teachers' curricular choices (Foorman & Torgesen, 2001; Lenski et al., 1998). Teachers not granted autonomy to choose curricula will implement the official designated curriculum with varying degrees of fidelity (Century et al., 2010; Chapman et al., 2018) due to their underlying beliefs and preferences about reading instruction. These variations in fidelity of implementation will yield different results in terms of student achievement.

Teachers' Literacy Orientations

A teacher's literacy orientation is constructed from his or her beliefs and self-reported practices surrounding reading (Lenski et al., 1998), and can be used to concisely summarize their approach to instruction. As such, several instruments have been developed to determine teachers' literacy orientations, such as the *Propositions about Reading Instruction Inventory* (Duffy & Metheny, 1978) and the *Theoretical Orientation to Reading Profile* (DeFord, 1985).
The *Literacy Orientation Survey (LOS)*, the instrument chosen for use in this study, has been shown to accurately predict how a teacher approaches reading instruction in their classroom, be

it a *traditional*, *constructivist,* or *eclectic* approach (Lenski et al., 1998). According to Lenski and colleagues (1998), teachers with a traditional approach to literacy instruction teach as though learning to read is a sequential process of learning independent reading skills. Lenski and colleagues (1998) noted that teachers with a constructivist approach to literacy instruction teach as though learning to read requires being immersed into the world of text. They further described teachers with an eclectic approach as blending methods from both of the aforementioned orientations.

Categories of Reading Curricula

Just as teachers take various approaches to teaching reading, reading curricula can be developed by teams adhering to different philosophies. One way to categorize reading curricula is by determining whether the curriculum treats reading comprehension as a general skill or as an ability that varies depending on text content (Hirsch, 2016; Thompson & Sonnenschein, 2016; Vitale & Romance, 2007). "*Knowledge-Based"* reading curricula (Vitale & Romance, 2007, p. 77), such as *Core Knowledge Language Arts* (Core Knowledge Foundation, 2020) and *Science IDEAS* (Romance & Vitale, 1992), are based on the finding that reading ability varies based on the alignment between a particular text's topic and a student's background knowledge, as well as between that text's verbiage and a student's personal vocabulary. Knowledge-based reading curricula teach decoding skills alongside content knowledge and domain-specific vocabulary to enhance comprehension (Center for Early Reading, Amplify, 2018). Conversely, "*skills-based"* reading curricula (Vitale & Romance, 2007, p. 80), such as *Ready Florida English LAFS* (Curriculum Associates, 2020), are based on the assumption that reading ability transfers readily from topic to topic (Hirsch, 2016). Skills-based reading curricula assume that if students

read on grade level, they will perform well on grade-level text, regardless of the topic or vocabulary, because they can use grade-level reading skills and strategies as they encounter unfamiliar subject matter and vocabulary (Hirsch, 2016).

In this study, the *Literacy Orientation Survey* was completed by teachers of prekindergarten through third grade students at two east coast Florida charter schools to investigate the nature of those teachers' literacy orientations; their self-reported preferences for knowledge-based curricula, skills-based curricula, or an equal distribution of both; and their self-reported curricular use. Results from the study will inform stakeholders in curriculum selection, curriculum implementation, and teacher professional development so they can support teachers in making research-based curricular decisions that will positively impact student achievement in early literacy and beyond.

LITERATURE REVIEW

Early Literacy as a Foundation

The Matthew Effect

There is a reciprocal relationship between reading ability and cognitive development, termed by Stanovich (1986) as the Matthew Effect in reading, wherein those who read well develop cognitively as they read, which, in turn, causes them to be better readers at an accelerating rate. He concluded that the initial differences in young children's reading abilities may be due to passive organism-environment correlations, meaning, the quality of a child's environment positively correlates with the children's natural cognitive abilities. Children less cognitively predisposed to learning how to read receive worse reading instruction than their more cognitively predisposed peers. Further, Stanovich (1986), citing Allington's (1984) finding that some first graders skilled in reading were reading almost three times as many words per week as their peers who were less skilled in reading, asserted that the difference in the amount of words read by students of differing reading abilities results in a multiplying expansion of vocabulary for the already skilled readers. As skilled readers become more skilled, they leave limited readers relatively poorer, the gap between them widening with every passing grade (Stanovich, 1986).

Educational Attainment

According to the Matthew Effect, the advantages of excellent early literacy instruction reach far beyond a child's first few years of schooling. The ability to read well, nearly always established in the primary grades (Denti & Guerin, 1999), correlates with better overall academic achievement (Chall et al., 1990) and higher educational attainment later in life (Steinberg &

Almeida, 2004). Those students who learn to read well by the end of third grade are more likely to go on to graduate high school (Hernandez, 2011). High school graduation correlates with a host of other benefits (Messacar & Oreopoulos, 2013; Oshio & Kobayashi, 2010), which only increase with every successive level of educational attainment (Ma et al., 2016).

Economic Advantages

Increased employment opportunities and higher wages generally follow the conferral of each degree a person earns in their lifetime (U.S. Bureau of Labor Statics, 2019; Torpey, 2018). For example, during the years between 1992 and 2017, unemployment rates among Americans aged 25 and older were consistently lowest for those with at least a bachelor's degree and highest for those who had not earned a high school diploma, throughout each peak and trough of the national economic climate (Cunningham, 2018). As the cost of living in the United States changes from year to year, those with university degrees experience raises that disproportionately increase their already higher salaries, allowing them to not only keep pace with inflation, but also increase their own relative quality of life (Mortenson, 2007). Meanwhile, raises for those without university degrees lag behind the rise in cost of living, resulting in a decrease in relative quality of life (Mortenson, 2007). Generally, workers with more years of formal education benefit from more economic advantages than their less-educated peers.

Societal Advantages

Educational attainment also correlates with meaningful employment (Brown & Lent, 2016), civic engagement (Dee, 2020; Hemer, 2018), and lawful behavior (Kopak et al, 2016). Students who graduate high school and beyond have more skills, are more employable, and are more likely to engage in a career they consider fulfilling and purposeful employment (Brown &

Lent, 2016), possibly increasing their levels of self-reported happiness (Oshio & Kobayashi, 2010). Those with more degrees, participate more actively in democracy, voting during elections with more frequency than those with fewer degrees (Lal Goel, 1970). Additionally, graduates of high school are less likely to be incarcerated than their counterparts and their chances of being incarcerated drop with every additional degree earned (Franklin, 2017). Overall, individuals who attain more formal education experience the many benefits that stem from being functioning members of society.

Health-Related Advantages

Higher educational attainment correlates with better overall physical health (Friis et al., 2016). More specifically, low educational attainment correlates with increased instances of the seven preventable risk factors for heart disease as identified by the American Heart Association (Reynolds et al., 2018), namely high blood pressure, high cholesterol, high blood sugar, a sedentary lifestyle, poor diet, excess weight, and cigarette smoking (AHA, 2018). Heart disease was deemed the leading cause of death in the United States for 2017 by the National Center for Health Statistics (Heron, 2019) and is currently listed as such on the Centers for Disease Control and Prevention's website (CDC, 2019). Heart disease takes about 647,000 American lives and costs the United States hundreds of billions of dollars in medical costs and lost productivity every year (CDC, 2019). The health-related advantages of high levels of educational attainment not only impact the individual, possibly empowering people to prevent their own untimely death, but society at large, reducing the financial burden that preventable illness and death has on taxpayers.

The Critical Aim

Early literacy instruction sets the foundation for academic success (Chall et al., 1990), contributing to a lifetime of benefits, economic, societal, and health-related, for the individual and society. Children who learn to read by the end of third grade fare far better throughout their years in school than their peers who close the year reading below grade level (Denti & Guerin, 1999). Good early readers are better prepared to graduate high school and undergraduate programs and are more likely to earn additional graduate degrees within their lifetimes (Magnuson et al., 2016). As such, student achievement in early literacy should be a critical aim of early childhood education and a national priority.

Teacher Curricular Choices

Teachers have varying degrees of autonomy over the official curriculum in their classrooms (Johnson, 2016). Often the official curriculum is adopted at the district level, supposedly giving teachers little choice in how they approach instruction (Allen & Seaman, 2017). However, teacher fidelity to the official curriculum varies widely in practice, as teachers often choose to adapt the official curriculum with other resources (Century et al., 2010). Some districts and schools give teachers more autonomy in choosing the curriculum they implement in their literacy classroom. Charter schools in particular may offer teachers more autonomy in this area (Gawlik, 2007). The administration at the particular charter schools in which this study was conducted gives teachers and grade level teams a relatively large degree of autonomy in choosing from a variety of curricular resources that the schools have purchased over the years, including both knowledge-based and skills-based curricula.

The Role of Reflection

Teachers are professionals who must make decisions about their practice constantly from day to day. Novice teachers may have a mindset of survival, making decisions largely on-the-fly (Öztürk, 2008), while master teachers are conversely characterized by their reasoned approach to novel problems based on reflecting upon and generalizing about their prior experiences (Guberman & Greenfield, 1991). Reflective teachers often transition from novice to master much more quickly than their counterparts who do not take the time to reflect on their choices as practitioners (Smith, 2005). Reflection assists teachers in making future decisions about classroom management (Deaton, 2013), lesson implementation (Sibbald, 2010), and curricula options (Boote, 2006). The LOS is partly a reflective tool, assisting teachers in thinking about their own beliefs and practices as well as the alignment (or misalignment) between them (Lenski et al., 1998).

How Do Students Learn to Read?

While researchers have yet to come to a consensus about what exactly constitutes excellent literacy instruction, they do agree that students are more likely to learn skills that they are taught (Crawford-Lange & Lange, 1987). While any moderately adequate instruction is certainly better than no instruction, some approaches to instruction are more effective than others.

Components of Reading

There are five well-established components of reading: phonemic awareness, phonics, vocabulary, fluency, and comprehension (Lyon, 1998b; NRP, 2000). Good reading instruction balances each of these five components (Denton et al., 2003; Lyon, 1998b). Phonemic awareness

is the most basic of the five components (Lyon, 1998a). Students who develop the sense that words are made of sounds that can be segmented, transposed, and blended back together so they form new words are ready learners of reading (Suggate, 2016). Students who develop this intuition about the sounds of their native language usually have an easier time learning to read (Johnston & Watson, 2004).

While phonemic awareness acts as the foundation of reading, phonics and vocabulary together make the cornerstone. Phonics, or the ability to decode written words, allows students to sound out words on a page and speak them aloud (Suggate, 2016). Once a child begins to speak the word aloud, their vocabulary knowledge can provide clues as to how to finish decoding the word (Ouellette, 2006). Early readers are more likely to accurately decode words they have already incorporated into their oral vocabulary, but strong decoding ability enables a child to not have to "guess" at words (Verhoeven et al., 2011).

If a child has mastered the phonics of a text and understood its vocabulary, they can decode with fluency (Pikulski & Chard, 2005). Fluency is the quality of reading smoothly, without stopping, at an understandable pace and with accurate intonation and expression (Rasinski, 2004). If a child can read a text fluently, and if they deeply understand the words in the text, they are on the road to comprehension (Tannenbaum et al., 2006).

Reading comprehension, or understanding what one reads, is the goal of the activity of reading (Tannenbaum et al., 2006). While it is possible for a child to read fluently and still have difficulty with comprehension, it is nearly impossible for a child who cannot read fluently to adequately comprehend what they read (Hirsch, 2003; Pikulski & Chard, 2005). A child who stops, starts, and stumbles over words will direct so much attention to decoding the words on the page that they will not reserve any attention for the meaning of those words, especially for the

meaning of sentences and paragraphs as a whole (Pikulski & Chard, 2005). However, comprehension is more than fluency. Comprehension strategies, like checking for understanding, summarizing, visualizing, and questioning, enable students to keep track of the message of a text, which enables them to think more deeply about what they read (Woolley, 2011).

While certain components act as prerequisites for others and should be the main focus of reading instruction in the early grades, quality early literacy instruction devotes *some* time to *every* component, so that readers develop holistically (Denton et al., 2003; Lyon, 1998b). Neither knowledge-based or skills-based curricula are necessarily inclusive or exclusive of this well-rounded approach.

Comprehension and Far Transfer

One of the greatest challenges in teaching reading is teaching so that the comprehension skills students learn in one context transfer to other contexts. Given texts of disparate content, students will be required to engage in *far transfer* (i.e. transferring skills between contexts that are superficially different) and the less likely their comprehension skills will transfer (Ormrod, 2016). The difficulties of far transfer are dealt with differently according to different approaches to literacy instruction. Knowledge-based instruction takes the problem of far transfer at face value and attempts to prevent students from encountering far transfer reading tasks entirely by exposing them to many different domains of knowledge. Skills-based instruction addresses the problem of far transfer by teaching reading strategies that can be applied in any unfamiliar context. Students of skills-based instruction are often given reading passages of various topics purposefully using unfamiliar vocabulary so that they can practice applying comprehension strategies with unfamiliar texts.

Three Literacy Orientations

Teachers vary in their beliefs and practices surrounding literacy. According to Lenski and colleagues (1998), there are three possible orientations toward literacy instruction.

Traditional Orientation

The traditional orientation, a vague term that is likely to change in definition with passing decades, utilizes established methods to teach early literacy. Lenski and colleagues (1998), in defining the traditional orientation, utilized terms and examples congruent with what has also been termed instructionism (Johnson, 2004) and instructivism (Gerstein, 2014). The traditional orientation, according to Lenski et al. (1998), aligns with a teacher-focused model (Trigwell & Prosser, 2004) of education, in which whole-group lessons and basal readers are utilized, both of which make teaching a more "efficient" experience for the instructor.

A notable method of the traditional approach is to teach reading primarily through *synthetic phonics*, in which the instructor teaches the smallest phonetic units first (letter sounds) and builds up to blending those sounds into whole words (Baumann et al., 2000). Teachers with the traditional orientation often teach the way they themselves were taught. While this approach may not always align with their beliefs about how students learn best, many teachers, particularly novice teachers, default to this style of teaching as it is natural from a human psychology perspective to engage in behaviors one has seen modeled consistently by authority (such as one's own teachers; Ormrod, 2016).

Traditional literacy instruction, i.e. "explicit, systematic instruction" (Lyon, 1998b), has been shown to be more effective than other methods for students with learning disabilities and those who are at risk for reading failure (Torgesen, 2002). However, traditional practices in early

literacy instruction can tend to be demotivating for some students, especially gifted and talented students (Reis & Renzulli, 1989). Additionally, teachers with a traditional orientation may tend to stigmatize mistakes in reading and writing, overcorrecting students as they read aloud and abusing use of the "red pen" on written work.

Constructivist Orientation

The traditional orientation contrasts with the more progressive constructivist orientation, which is a student-focused model of education (Trigwell & Prosser, 2004). The constructivist theory, having its roots in cognitivism, asserts that student learning is a mental rather than behavioral process in which an individual's *schemas*, interconnected, categorized understandings, are either challenged and altered or confirmed and strengthened (National Academies of Sciences, Engineering, and Medicine, 2018; Ormrod, 2016; Piaget, 1962). Distinct from other cognitivist theories, constructivism assumes the student is an active participant in editing his or her own schema, rather than a passive recipient of new knowledge. According to constructivism, a student must pay attention to and make meaning of what he or she learns in order to truly learn it. As such, student affect and motivation is seen as an important component of the learning process under this orientation (Piaget, 1962).

In the literacy classroom, the constructivist orientation often presents as whole-language instruction, whereby teachers immerse students in meaningful print, in the form of labels on concrete objects in the classroom as well as real books, preferably quality children's literature. If teachers of the constructivist orientation emphasize phonics at all, they will probably do so in the style of analytic phonics, by breaking apart already known words into their constituent phonemes. Writing instruction, seen as a component of, rather than an addition to, reading

instruction is often integrated into the literacy block in constructivist classrooms as a vehicle for helping students make meaning of print (Lenski et al., 1998). For constructivists, student mistakes are considered a natural, developmental step in learning how to read and write and are often left uncorrected, such as when using developmental spelling (Gentry, 1981) or replacing words with their synonyms during oral reading.

A teacher with a constructivist orientation can facilitate rather than instruct, resulting in a classroom of highly motivated students of reading. Because students are expected to be active participants in their learning, and so little time is spent correcting students, constructivist instruction can result in a buzzing classroom full of energetic and excited learners. However, students with learning disabilities or those at risk for reading failure may suffer from the dearth of explicit and systematic instruction in constructivist classrooms (Lyon, 1998b; Torgesen, 2002).

Eclectic Orientation

The eclectic orientation, sometimes called a balanced approach (Denton et al., 2003), is defined as a blend of the traditional and constructivist orientations (Lenski et al., 1998). In combining traditional and constructivist orientations, teachers tend to "basalize" literature and use it to focus on discrete reading skills and strategies. Although a form of writer's workshop may be instituted, students are often told to work independently rather than in groups and teachers tend to direct student writing in the form of particular prompts.

Some researchers assert that an eclectic approach can allow teachers to incorporate the best aspects of traditional and constructivist instruction, resulting in children who not only read well, but also enjoy reading frequently (Rayner et al., 2002). The eclectic approach blends skills

instruction with a focus on the authentic meaning of text, creating a positive feedback loop, wherein one reinforces the other (Johnson, 2009). However, other researchers argue that an eclectic approach results in disjointed instruction that is less effective than either of the other two approaches alone (Lenski et al., 1998).

Curricular Approaches to Literacy Instruction

As there are various literacy orientations among early reading teachers, there are also various approaches to early reading curricula. Hardly ever does a curriculum completely fall into one of the two following dichotomies because, in practice, curricula often borrow from both approaches. However, the following archetypes are helpful for understanding which direction a particular curriculum may lean toward.

Knowledge-Based Approach

Knowledge-based literacy curricula rely on the assumption that reading comprehension ability inherently varies from text to text due to varying topics and vocabulary (Center for Early Reading, Amplify, 2018). Because reading is an interactive process between author and audience, the student attempting to read and understand a text about a particular topic will need to know some things about that topic in order to pick up on the message the author tried to convey. Knowledge-based instruction attempts to improve comprehension by building content knowledge step-by-step. The more broad and deep knowledge a student gains about the world, the more likely they are to understand what they read, no matter the topic (Center for Early Reading, Amplify, 2018).

For example, Core Knowledge Language Arts (CKLA) organizes instruction into content-rich units of study focused on science topics like the human body, social studies topics

like ancient and modern Asia, and literature-based topics like *The Wind in the Willows*. The goal of these units is not just to teach reading strategies through interesting themes, but instead to actually increase student content knowledge through text read (both by the teacher and individually) and discussed, thereby increasing students' chances at comprehending text they read in the future.

Skills-Based Approach

Skills-based literacy curricula are based on the assumption that reading comprehension is a general skill that, if taught as such, will transfer between contexts. Teachers who engage in skills-based instruction often use disjointed texts on a multitude of varying subjects, hoping to teach their students strategies that apply to any context. Skills-based curricula aim to improve reading comprehension by teaching students strategies to employ before, during, and after reading, such as predicting what a text will be about based on its text features, using context clues to define unfamiliar words, and summarizing what they read after each section or chapter. The more comprehension strategies a student assimilates into their repertoire and utilizes on a regular basis, the better chance they will have at comprehending any text they encounter, whether or not they know much about the topic and vocabulary.

For example, Ready Florida LAFS organizes instruction primarily by standards. One week-long unit focuses on identifying the main idea of a text while another focuses on the role of illustrations in a text. Each daily lesson within the unit contains a short piece of text to be read in one sitting, along with prompts and questions to help students think about and apply the skill being taught. While the texts within each unit may congregate around a particular topic, the focus of the unit is not on the content of the texts, but on applying the central skill of the unit.

Purpose of the Study

The purpose of the study is to investigate the nature of teachers' literacy orientations, their tendencies to primarily use either knowledge-based curricula (e.g. CKLA or Science IDEAS), skills-based curricula (e.g. Ready Florida LAFS), or a combination of both, and their actual self-reported curricular practices in order to inform educational stakeholders (e.g. administrative and district personnel, instructional coaches, curriculum specialists). By gathering more data on the connection between early literacy teachers' approaches to instruction and their curricular preferences and practices, educational stakeholders can better support teachers in making research-based curricular decisions. The more educational stakeholders can encourage teachers toward making research-based curricular choices and implementing them with fidelity (Century, 2010), the more gains will be made in terms of student achievement.

Research Question 1: What are the overall literacy orientations (i. e. traditional, eclectic, constructivist) of prekindergarten through third grade teachers at two charter schools on the east coast of Florida?

Research Question 2: How do the literacy orientations of these teachers relate to their curricular preferences (i.e. knowledge-based, skills-based, or combination)?

Research Question 3: What are the most used and least used curricula as self-reported by prekindergarten through third grade teachers at two charter schools on the east coast of Florida?

METHODOLOGY

Introduction

As there was no information found related to charter school teachers and their literacy orientations, an exploratory study was designed to understand what the literacy orientations are for teachers who make their own decisions related to literacy instruction. A case study was conducted of two related charter schools. The exploratory case study was determined to be the best means to understand a complex social phenomena of teachers choosing reading curriculums at charter schools and how their literacy beliefs and practices inform their decision. The following chapter explains the methodology of this study.

Participants

The LOS (Lenski et al., 1998) was distributed to early literacy teachers (prekindergarten through third grade) at two select elementary charter schools on the east coast of Florida, totaling 7 teachers at School A and 2 teachers at School B. School A has been in operation since 1999 and School B has been in operation since 2014. While the school cultures vary, they were founded by the same person, are run by the same management organization, and are supervised by the same head of schools and site administrator, so many similarities are expected. The schools were both founded on Montessori philosophy, and while teachers are not required to be Montessori certified, they are required to take online introductory Montessori classes. School A is comprised of over 50% minority students and over 80% economically disadvantaged students. School B is comprised of nearly 60% minority students and 100% economically disadvantaged students. In 2019, the schools were evaluated by the Florida Department of Education as an A school and a B school, respectively. The teachers surveyed range in experience level in terms of

total years teaching, years teaching in their current grade level, and years teaching at their current school. According to the schools' staff listings on their websites, 6% of the prekindergarten through third grade teaching staff had their reading endorsement at the time of this study.

Table 1. Participant Demographics

Characteristic	Frequency	
	n	%
Current Grade Level		
Prekindergarten	1	11
Kindergarten	0	0
First Grade	4	44
Second Grade	2	22
Third Grade	2	22
Primary ELA Planner		
Yes	5	56
No	4	44
Total Years Teaching		
0-4	2	22
5-9	4	44
10-14	2	22
15-19	0	0
20+	1	11
Years at Current School		
0-4	5	56
5-9	4	44
Years in Current Grade Level		
0-4	7	78
5-9	1	11
10-14	1	11

Process

For this study the *Literacy Orientation Survey* (LOS) developed by Lenski et al. (1998) was distributed through two separate Qualtrics survey links in order to keep track of which respondents are from School A vs. School B. The survey links were distributed via email to all prekindergarten through third grade instructional staff. The survey remained open for the

minimal period of five days, at which point saturation was met due to the circumstances further discussed in the limitations section.

Literacy Orientation Survey

The Literacy Orientation Survey by Lenski et al. (1998) was developed by first defining literacy in constructivist classrooms. Ten principles emerged, from which the developers of the instrument crafted survey items to test for the 10 principles, 50% of the items focusing on beliefs and 50% focusing on practices. The team then polled twenty literacy education experts to judge the items and principles. Items were kept if at least 80% of the experts agreed that the item was valid. The survey was then conducted with 110 elementary teachers. Items were kept if they scored at the .80 level or higher in a confirmatory factor analysis. From this process, 30 items (half centered on beliefs and half centered on practice) were drafted into the LOS.

The reliability of the original version of the LOS was determined through a test-retest analysis conducted over two consecutive days with 30 graduate students who were also practicing teachers. The survey was determined to be reliable and comments from the participants were taken into account to revise test items for clarity.

Next, the LOS was then administered in a pilot study to test the underlying assumption that teacher beliefs and practices may be misaligned. The study included 95 teachers in graduate school classes who self-reported on their teaching styles using a 4-point scale ranging from traditional to holistic. The pilot study confirmed that, while beliefs and practices are positively correlated, they are indeed sometimes misaligned.

The LOS was then validated externally through a process verification protocol that identified 42 teachers as traditional, constructivist, or eclectic through interviews. The teacher's

scores on the LOS were compared to the results of their interviews. Through this validation process, the final version of the LOS was shown to actually predict classroom practice.

Instrument Amendment

For the purposes of this study, the LOS was amended to include two additional questions regarding teachers' ELA curricula preferences and usage as well as a few demographic questions. The first additional questions asked teachers to self-report on their preferences for either knowledge-based, skills-based, or a blend of both types of curricula using affirmative statements and a 7-point Likert scale of agreement. The second set of additional questions asked teachers to self-report on the curricula they actually use during literacy instruction and to estimate the percentage of their literacy instructional time devoted to each curricula. Options included: (a) CKLA, (b) Spalding, (c) Fundations, (d) Wilson Phonics, (e) teacher-created materials from other teachers they know, (f) teacher-created materials from an online marketplace such as Teachers Pay Teachers, (g) self-created materials, (h) computer-based supplemental programs (e.g. Study Island , iReady, Reflex Math, MyOn), (i) student-selected trade books, (j) other texts provided by the school (e.g. science textbooks and readers, studies weekly, scholastic news),and (k) other. If teachers selected "other," they were prompted to identify what other curricula they use that were not listed. The preceding options were identified through the researcher's personal knowledge of the curricular resources at the particular charter school where the survey was conducted and through communication with the school's administrative staff to ensure the curricula options were current and reflected the actual resources available to the teachers.

The survey also included a few demographic questions such as which grade level the participants are teaching this academic year, whether or not they are primarily responsible for planning the ELA block (as the schools utilize a co-teaching model), how many total years they have been teaching, how many total years they have been teaching at their current school, and how many total years they have been teaching their current grade level.

Analysis

Once the survey was closed, the results were cleaned and the results for each test item as well as for each respondent's total score, beliefs score, and practice score were descriptively analyzed from the scoring of the LOS. Descriptive analysis for curricular preference and practice as they related to literacy orientation scores were determined. The means were calculated for teachers' overall literacy orientation scores as they relate to the teachers' years of experience and current grade level. Both Google Sheets and SPSS were used to calculate the means and other relevant statistics.

Conclusion

In this chapter the methodology of this exploratory case study was described. The research study was conducted to investigate the literacy orientations and curriculum preferences and practices of early literacy teachers at two charter schools on the east coast of Florida. The next chapter contains the results of the survey response analysis.

RESULTS

Introduction

This study was conducted in order to explore the nature of teachers' literacy orientations, their curricular preferences, and self-reported curricular use. The Literacy Orientation Survey (Lenski et al., 1998) amended with questions pertaining to curricular preferences to early literacy teachers at two Florida charter schools was distributed through Qualtrics, and there were nine respondents. The findings are detailed below.

Research Question 1

In regard to research question one, "What are the overall literacy orientations (i. e. traditional, eclectic, constructivist) of prekindergarten through third grade teachers at two charter schools on the east coast of Florida?" the results are as follows:

The Literacy Orientation Survey questions were divided into 15 questions regarding beliefs and 15 questions regarding practices. Thus, a beliefs score and practices score were obtained for each participant. The separate scores were then added to determine their overall literacy orientation score.

Beliefs Subscores

In regard to beliefs scores, out of the $N = 9$ survey respondents, three participants scored within the traditional continuum, four participants scored solidly within the eclectic continuum, one participant scored on the border between eclectic and constructivist, and one participant scored within the constructivist continuum. Since eclectic beliefs are comprised of a blend of both traditional and constructivist beliefs, for the purposes of this study, the participant scoring

on the border between eclectic and constructivist was considered to have an eclectic belief system. This reclassification resulted in a total of five eclectic beliefs participants.

Practices Subscores

Regarding practices scores, one participant scored within the traditional continuum, five participants scored within the eclectic continuum, and three scores within the constructivist continuum.

Overall Literacy Orientations

When the beliefs and practices scores were added together to obtain an overall score, two participants scored within the traditional continuum, six participants scored within the eclectic continuum, and one participant scored within the constructivist continuum.

Table 2. Literacy Orientation Results

Literacy Orientation	Frequency	
	n	%
Beliefs		
Traditional	3	33
Eclectic	5	56
Constructivist	1	11
Practices		
Traditional	1	11
Eclectic	5	56
Constructivist	3	33
Overall		
Traditional	2	22
Eclectic	6	67
Constructivist	1	11

The more years of personal teaching experience the teachers had, the higher their overall literacy orientation score. The lowest scores were indicative of a traditional orientation while the highest scores were indicative of a constructivist orientation. According to the LOS scoring

guide, scores in the middle were considered eclectic. Thus, the more years of personal teaching experience the teachers had, the more likely they were to take a constructivist approach to literacy instruction overall.

Table 3. Overall Literacy Orientation Scores by Years of Experience

Years of Teaching Experience	M	*n*	SD
0-4	101.5	2	21.92
5-9	115.5	4	10.214
10-14	118	2	2.828
20+	144	1	-

Generally, the lower the teacher's current grade level, the higher their overall literacy orientation score. The prekindergarten teacher had the highest, most constructivist-leaning score, and third grade teachers had the lowest, most traditional-leaning mean score. The first grade and second grade mean scores were similar to each other and in the middle of the spectrum.

Table 4. Overall Literacy Orientation Scores by Grade Level

Current Grade Level	M	*n*	SD
Prekindergarten	125	1	-
First Grade	116.25	4	23.726
Second Grade	119	2	1.414
Third Grade	108.5	2	10.607

Research Question 2

In regard to the second research question, "How do the literacy orientations of these teachers relate to their curricular preferences (i.e. knowledge-based, skills-based, or combination)?" the results are as follows:

To rate their curricular preferences respondents were asked to offer a Likert scale rating from one to seven in response to three statements, where a rating of one indicated the highest

level of disagreement and a rating of seven indicating the highest level of agreement. To determine each respondent's curricular preference the researcher took the statement with the highest rating of agreement. In the single case of no highest curricular preference rating due to a tie of two responses, the response was designated as unclear and did not factor it into the rest of the analysis. One participant indicated a preference for knowledge-based curricula, three participants indicated a preference for skills-based curricula, and four participants indicated a preference for combining both knowledge-based and skills-based curricula in roughly equal measure.

Answers of Agreement

Most participants indicated a level of agreement with every statement regarding curricular preference. Only one respondent indicated a level of disagreement (mild) with any of the statements, rating the statement "I usually prefer to teach reading through content-rich thematic units to build student knowledge." Two respondents also indicated indifference towards two of the curricular preference statements, both of them rating both statements "I usually prefer to teach reading through content-rich thematic units to build student knowledge" and "I usually prefer to teach reading through skills-focused units of study to build students' repertoire of reading comprehension strategies," with fours, or "neither agree nor disagree." Every other response from every participant indicated some level of agreement.

Average Ratings

On average, taking into account all nine participants' responses, the statement associated with a preference for knowledge-based curricula, "I usually prefer to teach reading through content-rich thematic units to build student knowledge," received a 5.0 rating, indicating on

average that participants “mildly agree.” On average, the statement associated with a preference for skills-based curricula, “I usually prefer to teach reading through skills-focused units of study to build students’ repertoire of reading comprehension strategies,” received a 5.7 rating, indicating on average that participants “mildly” to “moderately agree.” On average, the statement associated with a preference for combining both types of curricula, “I usually prefer to teach reading through a roughly equal combination of content-rich thematic units to build student knowledge and skills-focused units of study to build students’ repertoire of reading comprehension strategies,” received a 6.0 rating, indicating on average that participants “moderately agree.”

By Literacy Orientations

Table 5 shows each participants’ scores for overall literacy orientations, along with their beliefs and practices subscores in order to associate these scores with teachers’ curricular preferences.

Table 5. Responses by Participant

Participant	Curricular Preference	Overall Orientation	Beliefs Subscore	Practices Subscore
1	Knowledge-Based	Eclectic	Eclectic/Constructivist	Constructivist
2	Skills-Based	Eclectic	Traditional	Constructivist
3	Skills-Based	Eclectic	Eclectic	Eclectic
4	Skills-Based	Constructivist	Constructivist	Constructivist
5	Combination	Traditional	Traditional	Traditional
6	Combination	Traditional	Traditional	Eclectic
7	Combination	Eclectic	Eclectic	Eclectic
8	Combination	Eclectic	Eclectic	Eclectic
9	N/A	Eclectic	Eclectic	Eclectic

Figure 1 shows teachers' curricular preference breakdown by overall literacy orientation score. The eclectic teachers showed the most variance. This result was unsurprising as eclectic teachers borrow from both traditional and constructivist approaches.

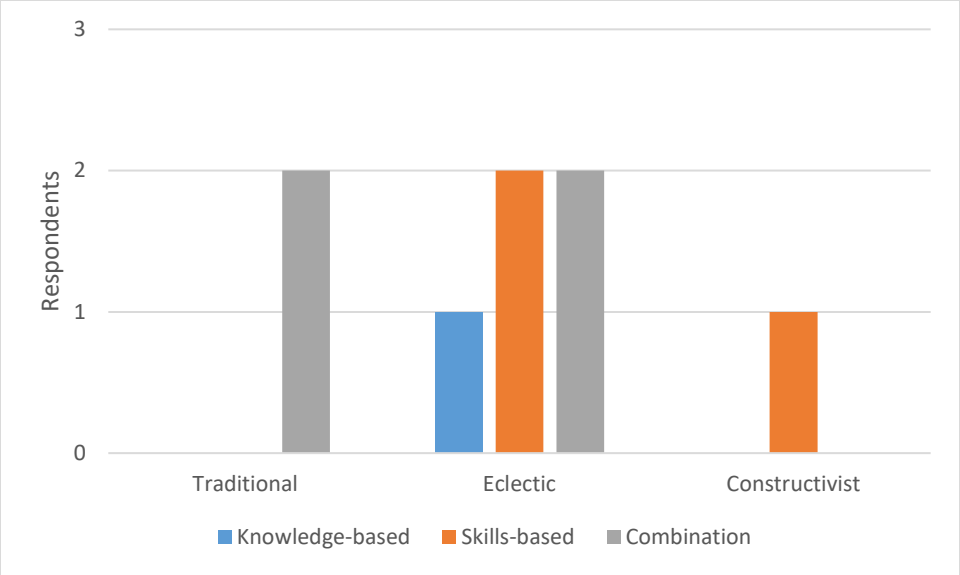


Figure 1. Curricula Preferences by Overall Literacy Orientation Score

Figure 2 shows teachers' curricular preference breakdown by literacy orientation beliefs subscore, showing that the teacher with constructivist beliefs preferred a skills-based curriculum. The eclectic beliefs teachers still showed the greatest amount of variance.

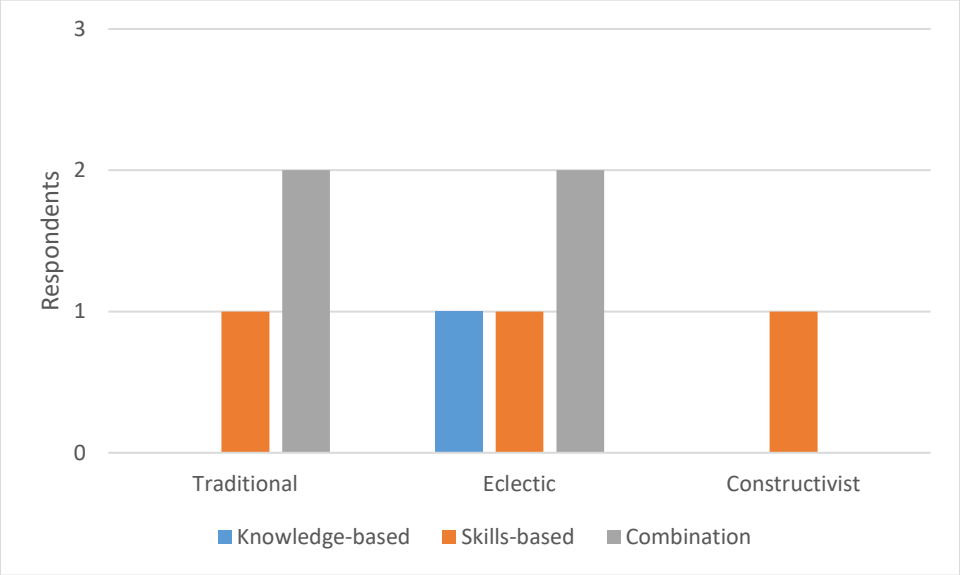


Figure 2. Curricula Preferences by Literacy Orientation Beliefs Score

Figure 3 shows teachers' curricular preference breakdown by the literacy orientation practices subscore. The teachers with eclectic practices not only showed the greatest amount of variance, but also preferred a combination of curricula most often.

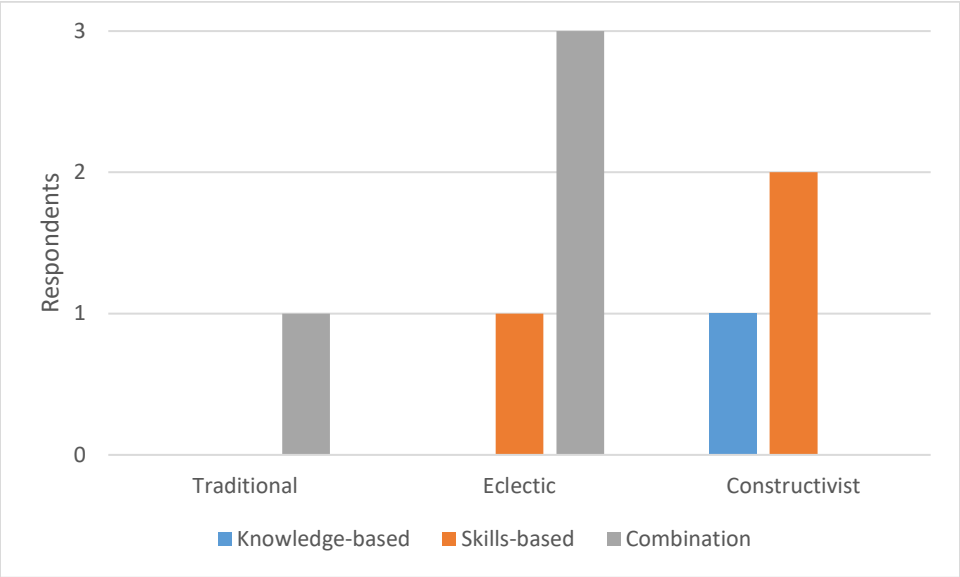


Figure 3. Curricula Preferences by Literacy Orientation Practices Score

Research Question 3

In regard to the third research question, "What are the most used and least used curricula as self-reported by prekindergarten through third grade teachers at two charter schools on the east coast of Florida?" the results are as follows:

In regard to the question that asked respondents to indicate the percentage of their ELA block devoted to several types of curricula, respondents were expected to give estimates totaling 100%. However, only two respondents gave answers that added up to 100%. Two respondents gave answers that added up to 99%. One respondent's answers added up to 110%, another's added up to 130%, and another's added up to 80%. The remaining two gave answers that

exceeded 100% substantially, with one adding up to 259% and the other adding up to 847%. On average, participants' answers added up to 202.7%.

The curriculum that received the lowest average percentage was Spalding (7.7% on average), while the curriculum that received the highest average percentage was self-created materials (29.9% on average).

The results were further analyzed for curricular use by associating curricular options used with overall literacy orientation, beliefs and practices scores, and curricular preferences. See Appendix A for further classifications of the curricula described below.

By Overall Literacy Orientation Score

Teachers with an overall traditional score rated self-created materials as their most-used curriculum on average (44.5%) and gave a unanimously 0% usage rating to Spalding, Wilson Phonics, student-selected and teacher-selected trade books. Teachers with an overall eclectic score rated content-based texts as their most used curriculum on average (34.2%) and Spalding as their least used curriculum on average (11.5%). The teacher with an overall constructivist score rated Core Knowledge Language Arts as their most used curriculum (30%) and gave a 0% usage rating to Spalding and Wilson Phonics.

By Beliefs Score

Teachers with a traditional beliefs score rated self-created materials as their most used curriculum on average (63.0%) and Wilson Phonics as their least used curriculum on average (17.7%). Teachers with an eclectic beliefs score rated Fundations as their most used curriculum on average (26.8%) and Spalding as their least used curriculum on average (0.0%). The teacher

with a constructivist beliefs score rated Core Knowledge as their most used curriculum (30%) and gave Spalding and Wilson Phonics a 0% usage rating.

By Practices Score

The teacher with a traditional practices score rated Fundations and "teacher-created materials from another teacher I know personally" as their most used curricula, giving both a 40% estimate. They gave Core Knowledge Language Arts and computer-based supplemental programs each a 10% estimate, leaving the rest of the curricula with 0% estimates. Teachers with eclectic practices score rated Fundations as their most used curriculum on average (25.0%) and gave Spalding a unanimously 0% usage estimate. Teachers with a constructivist practices score rated self-created materials as their most used curriculum on average (55.0%) and Wilson Phonics as their least used curriculum on average (17.7%).

By Curricular Preferences

The teacher who indicated a preference for knowledge-based curricula rated self-created materials as their most used curriculum (60%) and gave Spalding, Wilson Phonics, computer-based supplemental programs, and student-selected and teacher-select trade books each a 0% usage estimate. Teachers who indicated a preference for skills-based curricula rated content-based texts as their most used curriculum on average (58.3%) and Fundations as their least used curriculum on average (16.7%). Teachers with a preference for combining knowledge-based and skills-based curricula rated Fundations as their most used curriculum on average (33.8%) and gave Spalding, Wilson Phonics, and student-selected trade books a unanimously 0% usage estimate.

Conclusion

In this chapter, the descriptive results for the three research questions guiding this exploratory case study were provided. The research study was conducted to determine the literacy orientations and curriculum preferences and practices of prekindergarten through third grade teachers at two charter schools on the east coast of Florida in order to inform educational stakeholders who can make decisions regarding school curricula. The following chapter contains the discussion, limitations, and implications from the results provided in this chapter.

CONCLUSION

Introduction

This study was conducted for the purposes of exploring the connections between the three literacy orientations identified via the Literacy Orientation Survey (Lenski et al., 1998) and three self-reported curricular preferences (knowledge-based curricula, skills-based curricula, and a combination of both types of curricula) identified via questions amended onto the Literacy Orientation Survey (Lenski et al., 1998). The objective of the study was to inform educational stakeholders about the nature of teachers' literacy approaches and curricular choices so that they can better support teachers in making research-based curricular decisions.

The amended version of the Literacy Orientation Survey (Lenski et al., 1998) was distributed to 49 early literacy (PK-3) teachers at two Florida charter schools via the online survey host Qualtrics. After collecting nine survey responses, the results were descriptively analyzed.

Discussion

Research Question 1

The teachers in this study overall literacy orientation scores aligned mostly with the eclectic orientation with six out of nine participants scoring in this manner. Eclectic teachers utilize a blend of traditional and constructivist approaches (Lenski et al., 1998). Perhaps the eclectic orientation was more common at these schools because of their charter status and specific focus. More traditional teachers may tend toward traditional routes, such as public non-

charter schools, while more constructivist teachers may tend toward more alternative routes, such as fully Montessori schools. These public charter schools based on Montessori philosophy may attract teachers who wish to blend traditional and eclectic approaches to instruction.

In terms of beliefs and practices, teachers' literacy orientation scores sometimes did not align. One-third of teachers had beliefs scores that differed from their practices scores, while the remaining two-thirds of teachers had scores that did align. While the sample size was small, these findings contradict Ajzen's (1991) theory of planned behavior which indicates that teachers' beliefs are often mirrored in practice. Two of the respondents with incongruent beliefs and practices held traditional beliefs. One of them used eclectic practices and the other used constructivist practices. The other respondent with incongruent beliefs and practices was on the border between eclectic and constructivist beliefs while utilizing constructivist practices. This case is less extreme than the others, seeing that scoring just one more point toward constructivist beliefs would have changed this teacher from incongruent to aligned. One potential reason for the two more extreme misalignments between beliefs and practices may be that those teachers feel pressure to teach in a more eclectic or constructivist manner despite their own traditional beliefs.

While one may assume that newly graduated teachers would be more likely to hold constructivist orientations due to the shifting tide in teacher preparatory programs toward constructivist philosophies, this was not the case based on the findings of the survey. The result that teachers with more years of teaching experience generally scored higher on the *Literacy Orientation Survey* indicates that these teachers tended toward more constructivist orientations while newer teachers tended toward more traditional orientations. This surprising finding may be due to the additional stress associated with being a novice teacher and the survival mindset that

tends to result (Öztürk, 2008). Teachers in survival mode may fall back on teaching in the way they were taught (i.e. with a traditional approach). The finding that teachers of higher grade levels evidenced lower (more traditional) overall literacy orientation scores may also be connected to stress and survival. Higher grade levels face added performance pressure as testing preparations begin. It may be that as teachers experience more stress in their job that they revert to traditional approaches that appear "tried and true."

Research Question 2

On the curricular preferences statements, such as "I usually prefer to teach reading through content-rich thematic units to build student knowledge," most participants' answers supported some level of agreement for all of the statements, making their distinct preference difficult to distinguish. There was little evidence of variability in the responses. In other words, the teachers seemed to like each type of curricula. This overwhelming amount of agreement may be due to the social desirability bias, meaning that they may have given the answers they believed the researcher wanted to hear (Grimm, 2010). Alternatively, teachers may not have understood the mutually exclusive nature of the statements (Oksenberg et al., 1991). In future iterations of this survey it may be advisable to use a rank order question type rather than a Likert scale to provide clarity to teacher preferences.

Research Question 3

In terms of usage estimates of specific curricula, Spalding was the least favored curriculum overall. Spalding, a phonics-based, direct instruction curriculum would most closely align with a traditional literacy orientation and skills-based curricular type (See Appendix A). All but one of the respondents indicated they used Spalding 0% of the time, while the one

respondent who indicated using Spalding estimated that they use Spalding for 69% of their instruction. While this particular teacher has an overall eclectic literacy orientation, they also held traditional beliefs and indicated a clear preference for skills-based curricula. While Spalding is a curriculum focused on phonics instruction, teachers at the schools have other options when it comes to teaching phonics. All teachers prekindergarten through second grade reported using at least one curriculum that included phonics instruction.

Limitations

There were several limitations to this study. Two limitations were due to the timing of the survey distribution, which occurred (a) during the early stages of the 2020 COVID-19 (coronavirus) outbreak in the US and (b) during the respondents' spring break. Because of the COVID-19 outbreak, emotional distress, and anxiety may have been elevated in the respondents during the time they took the survey. This potentially heightened preoccupation with health and safety could have skewed participants' responses to the survey. Additionally, because of the worldwide health crisis, some teachers may have neglected to respond to the survey at all whereas they might have prioritized the completion of the survey during a more normalized state. The survey was opened just before the participants' left school for spring break and closed a few days after the break ended, thus the majority of the time the survey was open were days off for the teachers. This could have resulted in a lower response rate, as well.

Only nine teachers responded to the survey out of a potential 49 teachers. Even if 100% of participants responded, this would have been a relatively small sample size. Perhaps with a larger sample size the results would have differed.

Additionally, the fact that teachers did not estimate their total curricular usage to be at or near 100% presents a limitation. Two teachers estimated their curricular usage in such a manner that the totals added up to significantly higher than 100% (i.e. 259% and 846%). Only two teachers estimated their usage to be 100% in total and two estimated their usage to be 99% in total. These estimations reflect either that the teachers misunderstood the survey question as posed or were not sufficiently self-aware as to how much of their instructional time is devoted to specific curricula. Future iterations of this study may wish to specify in the survey question that total curricular usage estimates should add up to 100%.

Implications

The results of this study indicate that teachers may not have a clear preference between knowledge-based and skills-based curricula. In this study, teachers' ambivalence for curricular choice may be due to the lack of training and exposure to these distinct ways of approaching literacy. Further, in this study the teachers may not have known these terms nor the significance of these literacy approaches when teaching children to read and comprehend. There were stated differences in the beliefs and practices of teachers, which could be attributed to not having the background knowledge needed to adequately answer these types of questions. Since matching curricula to a teacher's beliefs can have a positive impact on their fidelity of implementation (Century, 2010), school-based professional development initiatives can focus on informing teachers about the various types of curricula, including the knowledge-based and skills-based types and the varying approaches for instruction. Pre-service teacher training institutions such as teacher preparatory programs in higher education and alternative-certification programs could benefit from providing students with education on various curricular types. This would educate

teachers before they reach the field so that in the future they can make more informed choices about their instruction.

Based on the finding that literacy orientation evolves with more years of experience, schools could benefit from implementing more mentorship programs in which veteran teachers partner with novice teachers to help them develop professionally. Novice teachers could benefit from the more experienced perspective of veteran teachers who have grown to take on a more constructivist approach over the years.

Conclusion

In this exploratory case study of early literacy teachers in two east coast Florida charter schools the *Literacy Orientation Survey* (Lenski et al., 1998) was amended with curricular preference and practice questions in order to investigate the relationship between the variables. Results indicated that most of the nine teachers surveyed held eclectic literacy orientations, but that in one-third of the participants, beliefs were incongruent with practices. Overall literacy orientation varied with years of experience in the classroom as well as current grade level. Distinct curricular preferences were obscured due to the overwhelming amount of agreeance with the curricular preference statements. Spalding was the least used curriculum among the teachers and self-created materials were the most used.

Future research could focus on conducting the amended survey with a larger sample of teachers. Due to the timing of the study, the coronavirus impacted the amount of responses collected. Therefore, conducting the study again at a different time with more teachers could yield more statistically significant results. With more teachers it would be possible to calculate the nine Pearson's *r* coefficients for the correlation between each of the three overall literacy

orientations and each of the three curricular preferences. It may also be advisable to investigate teachers' curricular preferences related to their grade level as associated with the nature of the ELA standards for their grade level, particularly the foundational reading standards, which focus on decoding ability and early literacy. Lastly, while this survey was conducted with teachers at two charter schools due to the freedom given to them to make curricular decisions, the study should also be conducted in public non-charter schools among key curricular choice stakeholders.

APPENDIX A: CURRICULA DESCRIPTIONS

Table A1. Comprehensive Curricula Descriptions

Curriculum Name	Literacy Orientation Designation	Curricular Type Designation	Description
Core Knowledge Language Arts (CKLA)	Traditional	Knowledge-Based	CKLA builds literacy (reading, writing, listening and speaking) through content-rich thematic units based in social studies, science, and literary topics. Speaking and listening is more of a focus in CKLA than in many contemporary literacy curricula. The skills strand component of the curriculum emphasized decoding skills.
Spalding	Traditional	Skills-Based	Spalding Education International, the parent company for The Writing Road to Reading curriculum, focuses on explicit instruction in synthetic phonics and integrates spelling, writing, and reading. Spalding relies on the use of phoneme cards and student recitation of the sounds associated with each phoneme.
Fundations	Traditional	Skills-Based	Wilson Fundations is a comprehensive, systematic, direct instruction curriculum that addresses phonemic awareness, phonics/word study, high frequency word study, reading fluency, vocabulary, comprehension strategies, handwriting, and spelling. To give students a complete literacy education, Wilson recommends supplementing Fundations with a literary education.

Curriculum Name	Literacy Orientation Designation	Curricular Type Designation	Description
Wilson Phonics WILSON Reading System®	Traditional	Skills-Based	Wilson Reading System, referred to as Wilson Phonics in the schools where this study was conducted, is a tier 3 intervention curriculum that focuses on teaching students to decode and encode fluently using phonics. Wilson Phonics also instructs students in reading strategies such as recognizing text structure and self-monitoring comprehension.

Table A2. Other Curricular Category Descriptions

Curriculum Name	Examples	Description
Teacher-Created materials from other teachers I know personally	N/A	Teachers sometimes create their own materials for teaching literacy. This category describes borrowing materials created by other teachers within the respondent's personal social reach.
Teacher-Created materials from an online marketplace Teachers Pay Teachers	Teachers Pay Teachers	Teachers sometimes create their own materials for teaching literacy. This category describes downloading teacher-created materials from teachers online, sometimes paid and sometimes free.
Self-Created materials	N/A	Teachers sometimes create their own materials for teaching literacy. This category describes respondents who use the materials that they developed themselves.

Curriculum Name	Examples	Description
Computer-Based supplemental programs 	Study Island, iReady, MyOn	Computer-Based supplemental programs use technology to supplement the literacy instruction that happens in the classroom. These computer programs are sometimes adaptive, tailoring instruction to student ability in real time. At other times, teachers may be required to assign students to select lessons and practice problems.
Student-selected trade books	N/A	Teachers may build literacy by allowing students to choose their own texts to read. This is sometimes referred to as DEAR (Drop Everything and Read), SSR (Silent Sustained Reading), independent reading, etc.
Teacher-selected trade books	N/A	Teachers sometimes choose literature to assign to students. This can take on the form of a literature circle, be based on reading level, or sometimes result in a class wide discussion on the same book.
Content-Based texts 	Science textbooks and readers, Studies Weekly, Scholastic News	Usually nonfiction, content-based text can be used to build literacy through the integration of reading and writing with science and social studies.

APPENDIX B: IRB EXEMPTION

UNIVERSITY OF CENTRAL FLORIDA

Institutional Review Board
FWA00000351
IRB00001138, IRB00012110
Office of Research
12201 Research Parkway
Orlando, FL 32826-3246

EXEMPTION DETERMINATION

March 5, 2020

Dear Laurie Campbell:

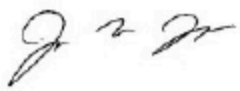
On 3/5/2020, the IRB determined the following submission to be human subjects research that is exempt from regulation:

Type of Review:	Initial Study, Category 2
Title:	Teachers' Literacy Orientations and Early Literacy Curricula Preferences
Investigator:	Laurie Campbell
IRB ID:	STUDY00001523
Funding:	None
Grant ID:	None
Documents Reviewed:	• Day 3 Email - Literacy Orientations and Curricula , Category: Recruitment Materials; • Day 7 Email - Literacy Orientations and Curricula , Category: Recruitment Materials; • Flyer - Literacy Orientations and Curricula , Category: Recruitment Materials; • IRB Explanation (HRP 254) for Literacy Orientations and Curriculua, Category: Consent Form; • IRB Protocol (HRP 255) for Literacy Orientations and Curriculua, Category: IRB Protocol; • Recruitment Email - Literacy Orientations and Curricula , Category: Recruitment Materials; • Survey - Literacy Orientations and Curricula , Category: Survey / Questionnaire;

This determination applies only to the activities described in the IRB submission and does not apply should any changes be made. If changes are made, and there are questions about whether these changes affect the exempt status of the human research, please submit a modification request to the IRB. Guidance on submitting Modifications and Administrative Check-in are detailed in the Investigator Manual (HRP-103), which can be found by navigating to the IRB Library within the IRB system. When you have completed your research, please submit a Study Closure request so that IRB records will be accurate.

If you have any questions, please contact the UCF IRB at 407-823-2901 or irb@ucf.edu. Please include your project title and IRB number in all correspondence with this office.

Sincerely,



Racine Jacques, Ph.D.
Designated Reviewer

APPENDIX C: IRB MEMORANDUM

UNIVERSITY OF CENTRAL FLORIDA

Institutional Review Board
FWA00000351
IRB00001138, IRB00012110
Office of Research
12201 Research Parkway
Orlando, FL 32826-3246

Memorandum

To: Stacy Watkins Escobedo

From: UCF Institutional Review Board (IRB)

CC: Laurie Campbell
Barbara Fritzsche
Nathalia Bauer

Date: April 14, 2020

Re: Request for IRB Determination

The IRB reviewed the information related to your thesis *An Exploratory Case Study of Teachers' Literacy Orientations and Early Literacy Curricula Preferences*.

Your project data is covered under the following protocol previously approved by the IRB. You are listed as a Co-Investigator on the study and your use of the data is consistent with the the protocol.

IRB study name (project title)	IRB Approval Number
Teachers' Literacy Orientations and Early Literacy Curricula Preferences	STUDY00001523

If you have any questions, please contact the UCF IRB irb@ucf.edu.

Sincerely,

Renea Carver
IRB Manager

LIST OF REFERENCES

Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes, 50*(2), 179-211. https://doi.org/10.1016/0749-5978(91)90020-T

Allen, I. E., & Seaman, J. (2017). *What we teach: K-12 school district curriculum adoption process, 2017*. Babson Survey Research Group. https://eric.ed.gov/?id=ED582435

Allington, R. L. (1984). Content coverage and contextual reading in reading groups. Journal of Reading Behavior, 16(2), 85-96. https://doi.org/10.1080/10862968409547506

American Heart Association [AHA]. (2018). *My life check | Life's simple 7*. https://www.heart.org/en/healthy-living/healthy-lifestyle/my-life-check--lifes-simple-7

Baumann, J., Hoffman, J. V., Duffy-Hester, A. M., & Ro, J. M. (2000). *The First R* yesterday and today: U.S. elementary reading instruction practices reported by teachers and administrators. *Reading Research Quarterly, 35*(3), 338-377. https://doi.org/10.1598/RRQ.35.3.2

Boote, D. N. (2006). Teachers' professional discretion and the curricula. *Teachers and Teaching, 12*(4), 461-478. https://doi.org/10.1080/13450600600644319

Brown, S. D., & Lent, R. W. (2016). Vocational psychology: Agency, equity, and well-being. *Annual Review of Psychology, 67*, 541-565. https://doi.org/10.1146/annurev-psych-122414-033237

Centers for Disease Control and Prevention [CDC]. (2019). *Heart disease facts.* https://www.cdc.gov/heartdisease/facts.htm

Center for Early Reading, Amplify. (2018). *Learning to read: A primer, part two*. Amplify. https://go.info.amplify.com/primer-pt2

Century, J., Rudnick, M., & Freeman C. (2010). A framework for measuring fidelity of implementation: A foundation for shared language and accumulation of knowledge. *American Journal of Evaluation, 31*(2), 199-218. https://doi.org/10.1177%2F1098214010366173

Chall, J. S., Jacobs, V. A., & Baldwin, L. E. (1990). *The reading crisis: Why poor children fall behind*. Harvard University Press. https://doi.org/10.2307/j.ctvjhzs0b

Chapman, J. W., Greaney, K. T., Arrow, A. W., & Tunmer, W. E. (2018). Teachers' use of phonics, knowledge of language constructs, and preferred word identification prompts in relation to beginning readers. *Australian Journal of Learning Difficulties, 23*(1), 87-104. https://doi.org/10.1080/19404158.2018.1467937

Core Knowledge Foundation. (2020). *Language Arts*. https://www.coreknowledge.org/curriculum/language-arts/

Crawford-Lange, L. M. & Lange, D. L. (1987). Integrating language and culture: How to do it. *Theory into Practice, 26*(4), 258-266. https://www.tandfonline.com/action/showCitFormats?doi=10.1080/00405848709543284

Cunningham, E. (2018). Great Recession, great recovery? Trends from the current population survey. *Monthly Labor Review, U.S. Bureau of Labor Statistics.* https://www.bls.gov/opub/mlr/2018/article/great-recession-great-recovery.htm

Cunningham, A. E., & Stanovich, K. E. (1997). Early reading acquisition and its relation to reading experience and ability 10 years later. *Developmental Psychology, 33*(6), 934–945. https://doi.org/10.1037/0012-1649.33.6.934

Curriculum Associates. (2020). *Ready Florida LAFS.* https://www.curriculumassociates.com/products/ready/reading-ela

Deaton, C. (2013). Teachers' reflections on effectively managing their classroom: A discussion of how two experienced science teachers examined their classroom management practices. *Reflective Practice, 14*(2), 240-257. https://doi.org/10.1080/14623943.2012.749229

Dee, T. S. (2020). Education and civic engagement. In S. Bradley & C. Green (Eds.), *The economics of education: A comprehensive overview* (2nd ed., pp. 103-108). Elsevier. https://doi.org/10.1016/B978-0-12-815391-8.00008-2

DeFord, D. E. (1985). Validating the construct of theoretical orientation in reading instruction. *Reading Research Quarterly, 20*(3), 351-367. https://doi.org/10.2307/748023

Denti, L. G., & Guerin, G. (1999). Dropout prevention: A case for enhanced early literacy efforts. *The Clearing House, 72*(4), 231-235. https://doi.org/10.1080/00098659909599399

Denton, C. A., Foorman, B. R., & Mathes, P. G. (2003). Perspective: Schools that "beat the odds." *Remedial and Special Education, 24*(5), 258-261. https://doi.org/10.1177%2F07419325030240050101

Duff, D., Tomblin, J. B., & Catts, H. (2015). The influence of reading on vocabulary growth: A case for a Matthew effect. *Journal of Speech, Language, and Hearing Research, 58*, 853-864. http://doi.org/10.1044/2015_JSLHR-L-13-0310

Duffy, G., & Metheny, W. (1978). The development of an instrument to measure teacher beliefs about reading. In M. Kamil & A. More (Eds.), *Twenty-eighth Yearbook of the National Reading Conference*. Clemson, SC.

Foorman, B. R., & Torgesen, J. (2001). Critical elements of classroom and small-group instruction promote reading success in all children. *Learning Disabilities Research & Practice, 16*(4), 203-212. https://doi.org/10.1111/0938-8982.00020

Franklin, T. W. (2017). Sentencing outcomes in U.S. district courts: Can offenders' educational attainment guard against prevalent criminal stereotypes? *Crime & Delinquency, 63*(2), 137-165. https://doi.org/10.1177/0011128715570627

Friis, K. (2016). Health literacy mediates the relationship between educational attainment and health behavior: A Danish population-based study. Journal of health Communication, 21(sup2), 54-60. https://doi.org/10.1080/10810730.2016.1201175f

Gawlik, M. A. (2007). Beyond the charter schoolhouse door: Teacher-Perceived autonomy. *Education and Urban Society, 39*(4), 524-553. https://doi.org/10.1177/0013124507304074

Gentry, J. R. (1981). Learning to spell developmentally. *The Reading Teacher, 34*(4), 378-381. https://www.jstor.org/stable/20195252

Gerstein, J. (2014). Moving from Education 1.0 through Education 2.0 towards Education 3.0. In L. M. Blaschke, C. Kenyon, & S. Hase (Eds.), *Experiences in self-determined learning* (pp. 83-98). CreateSpace Independent Publishing Platform. https://scholarworks.boisestate.edu/edtech_facpubs/104/

Gray, A., Goldsworthy, H., May, H., & Sirinides, P. (2017). Evidence for early literacy intervention: The impacts of Reading Recovery. *CPRE Policy Briefs*. https://doi.org/10.12698/cpre.2017.pb17-1

Grimm, P. (2010). Social desirability bias. In J. N. Sheth & N. Malhotra (Eds.), *Wiley International Encyclopedia of Marketing* (pp. 2:258-259). Wiley Blackwell. https://doi.org/10.1002/9781444316568.wiem02057

Guberman, S. R., & Greenfiled, P. M. (1991). Learning and transfer in everyday cognition. *Cognitive Development, 6*(3), 233-260. https://doi.org/10.1016/0885-2014(91)90038-F

Hattie, J. (2009). *Visible learning: A synthesis of over 800 meta-analyses relating to achievement*. Routledge.

Hemer, K. M. (2018). Civic engagement in young adulthood: Social capital and the mediating effects of postsecondary educational attainment (Publication No. 16591) [Master's thesis, Iowa State University]. Iowa State University digital repository. https://lib.dr.iastate.edu/etd/16591

Hernandez, D. J. (2011). Double jeopardy: How third-grade reading skills and poverty influence high school graduation. *Annie E. Casey Foundation*. https://eric.ed.gov/?id=ED518818

Heron, M. (2019). Deaths: Leading causes for 2017. *National Vital Statistics Reports, 68*(6), 1-76. https://www.cdc.gov/nchs/products/nvsr.htm

Hirsch, E. D. (2003). Reading comprehension requires knowledge—of words and the world. *American Educator, 27*(1), 10-13. https://www.aft.org/periodical/american-educator/spring-2003

Hirsch, E. D. (2016). *Why knowledge matters: Rescuing our children from failed educational theories*. Harvard Education Press.

Johnson, G. M. (2004). Constructivist remediation: Correction in context. *International Journal of Special Education, 19*(1), 72-88. https://eric.ed.gov/?id=EJ852045

Johnson, G. M. (2009). Instructionism and constructivism: Reconciling two very good ideas. *International Journal of Special Education, 24*(3), 90-98. https://eric.ed.gov/?id=EJ877941

Johnson, J. A. (2016). *Taking the "squeeze" off of social studies: A phenomenological study of teacher "curricular" autonomy and its effects on social studies instructional time* (Publication No. 76) [Doctoral dissertation, University of Missouri-St. Louis]. University of Missouri-St. Louis Institutional Repository Library.

Johnston, R. S., & Watson, J. E. (2004). Accelerating the development of reading, spelling and phonemic awareness skills in initial readers. *Reading and Writing: An Interdisciplinary Journal, 17*, 327–357. https://doi.org/10.1023/B:READ.0000032666.66359.62

Kopak, A. M., Hoffmann, N. G., & Proctor, S. L. (2016). Key risk factors for relapse and rearrest among substance use treatment patients involved in the criminal justice system. *American Journal of Criminal Justice, 41*, 14-30. https://doi.org/10.1007/s12103-015-9330-6

Lal Goel, M. (1970). The relevance of education for political participation in a developing society. *Comparative Political Studies, 3*(3), 333-346. https://doi.org/10.1177/001041407000300304

Lenski, S. D., Wham, M. A., & Griffey, D. C. (1998). Literacy orientation survey: A survey to clarify teachers' beliefs and practices. *Reading Research and Instruction, 37*(3), 217-236. https://doi.org/10.1080/19388079809558266

Lyon, G. R. (1998a). Why reading is not a natural process. *Educational Leadership, 55*(6), 14-18. http://www.ascd.org/publications/educational-leadership/mar98/vol55/num06/Why-Reading-Is-Not-a-Natural-Process.aspx

Lyon, G. R. (1998b). *Overview of reading and literacy initiatives*. National Institute of Child Health and Human Development. https://eric.ed.gov/?id=ED444128

Ma, J., Pender, M., & Welch, M. (2016). Education pays 2016: The benefits of higher education for individuals and society. *College Board.* https://eric.ed.gov/?id=ED572548

Mačerinskienė, I., & Vaikšnoraitė, B. (2006). The role of higher education to economic development. *Vadyba, 11*(2), 82-90. https://etalpykla.lituanistikadb.lt/object/LT-LDB-0001:J.04~2006~1367165511319/

Magnuson, K., Duncan, G. J., Lee, K. T. H., & Metzger, M. W. (2016). Early school adjustment and educational attainment. *Educational Research Journal, 53*(4), 1198-1228. h ttps://doi.org/10.3102/0002831216634658

Messacar, D., & Oreopoulos, P. (2013). Staying in school: A proposal for raising high-school graduation rates. *Issues in Science and Technology, 29*(2), 55-61. https://www.jstor.org/stable/43315719

Mortenson, T. (2007). Consequences of the widening gap between reality and policy in opportunity for higher education. *New Directions for Student Services*, (118), 49–54. https://doi.org/10.1002/ss.240

National Academies of Sciences, Engineering, and Medicine. (2018). *How people learn II: Learners, contexts, and cultures*. The National Academies Press. https://doi.org/10.17226/24783

National Reading Panel (US), National Institute of Child Health, & Human Development (US) [NRP]. (2000). *Report of the national reading panel: Teaching children to read: An evidence-based assessment of the scientific research literature on reading and its*

implications for reading instruction: Reports of the subgroups. National Institute of Child Health and Human Development, National Institutes of Health.

Oksenberg, L., Cannell, C, & Kalton, G. (1991). New strategies for pretesting survey questions. *Journal of Official Statistics, 7*(3), 349-365. https://search.proquest.com/docview/1266806850?accountid=10003

Ormrod, J. E. (2016). *Human learning*. Pearson Higher Ed.

Oshio, T., & Kobayashi, M. (2010). Income inequality, perceived happiness, and self-rated health: Evidence from nationwide surveys in Japan. *Social Science & Medicine, 70*(9), 1358-1366. https://doi.org/10.1016/j.socscimed.2010.01.010

Ouellette, G. P. (2006). What's meaning got to do with it: The role of vocabulary in word reading and reading comprehension. *Journal of Educational Psychology, 98*(3), 554–566. https://doi.org/10.1037/0022-0663.98.3.554

Öztürk, M. (2008). *Induction into teaching: adaptation challenges of novice teachers* (Publication No. 12609585) [Master's thesis, Middle East Technical University]. Middle East Technical University Repository.

Piaget, J. (1962). The relation of affectivity to intelligence in the mental development of the child. *Bulletin of the Menninger Clinic, 26*(3), 129-137. https://search.proquest.com/openview/72b54b005a1882a4edc41e265b4aa287/1?pq-origsite=gscholar&cbl=1818298

Pikulski, J. J. & Chard, D. J. (2005). Fluency: Bridge between decoding and reading comprehension. *The Reading Teacher, 58*(6), 510-519. https://doi.org/10.1598/RT.58.6.2

Rasinski, T. (2004). Creating fluent readers. *Educational Leadership, 61*(6), 46-51. http://www.ascd.org/publications/educational-leadership/mar04/vol61/num06/toc.aspx

Rayner, K., Foorman, B. R., Perfetti, C. A., Pesetsky, D., & Seidenberg, M. S. (2002). How should reading be taught? *Scientific American, 286*(3), 84-91. https://www.jstor.org/stable/10.2307/26059605

Reis, S. M., & Renzulli, J. S. (1989). Providing challenging programs for gifted readers. *Roeper Review, 12*(2), 92-97. https://doi.org/10.1080/02783198909553243

Reynolds, A. J., Ou, S.-R., & Temple, J. A. (2018). A multicomponent, preschool to third grade preventive intervention and educational attainment at 35 years of age. *JAMA Pediatrics, 172*(3), 247-265. https://doi.org/10.1001/jamapediatrics.2017.4673

Romance, N. R., & Vitale, M. R. (1992). A curriculum strategy that expands time for in-depth elementary science instruction by using science-based reading strategies: Effects of a year-long study in grade 4. *Journal of Research in Science Teaching, 29*, 545-554. https://doi.org/10.1002/tea.3660290604

Ross, D., Pinder, G., & Coles-White, D. (2015). The impact of structural barriers and facilitators on early childhood literacy programs in elementary charter schools. *Equity & Excellence in Education, 48*(1), 118-136. https://doi.org/10.1080/10665684.2015.991550

Sibbald, T. (2010). The relationship between lesson study and self-efficacy. *School Science and Mathematics, 109*(8), 450-460. https://doi.org/10.1111/j.1949-8594.2009.tb18292.x

Singleton, J. J. (2013). *The impact of kindergarten teachers' theoretical orientation to reading on curricular planning and classroom practice in literacy* (Paper 1332) [Doctoral dissertation, University of Louisville]. ThinkIR: The University of Louisville's Institutional Repository. https://ir.library.louisville.edu/etd/1332/

Smith, C. A., Park, A., Ireland, T. O., Elwyn, L., & Thornberry, T. P. (2013). Long-term outcomes of young adults exposed to maltreatment: The role of educational experiences

in promoting resilience to crime and violence in early adulthood. *Journal of Interpersonal Violence, 28*(1), 121-156. https://doi.org/10.1177/0886260512448845

Smith, K. (2005). Teacher educators' expertise: What do novice teachers and teacher educators say? *Teaching and Teacher Education, 21*(2), 177-192. https://doi.org/10.1016/j.tate.2004.12.008

Stanovich, K. E. (1986). Matthew effects in reading: Some consequences of individual differences in the acquisition of literacy. *Reading Research Quarterly, 21*(4), 360-407. https://doi.org/10.1177%2F0022057409189001-204

Steinberg, A., & Almeida, C. (2004). The dropout crisis: Promising approaches in prevention and recovery. *Jobs for the Future.* https://eric.ed.gov/?id=ED497810

Suggate, S. P. (2016). A meta-analysis of the long-term effects of phonemic awareness, phonics, fluency, and reading comprehension interventions. *Journal of Learning Disabilities, 49*(1), 77-96. https://doi.org/10.1177/0022219414528540

Tannenbaum, K. R., Torgesen, J. K. & Wagner, R. K. (2006). Relationships between word knowledge and reading comprehension in third-grade children. *Scientific Studies of Reading, 10*(4), 381-398. https://doi.org/10.1207/s1532799xssr1004_3

Terhart, E. (2011). Has John Hattie really found the holy grail of research on teaching? An extended review of Visible Learning. *Journal of Curriculum Studies, 43*(3), 425-438. https://doi.org/10.1080/00220272.2011.576774

Thompson, J. A., & Sonnenschein, S. (2016). Full-day kindergarten and children's later reading: The role of early word reading. *Journal of Applied Developmental Psychology, 42*, 58-70. http://dx.doi.org/10.1016/j.appdev.2015.11.005

Torgesen, J. K. (2002). The prevention of reading difficulties. *Journal of School Psychology, 40*(1), 7-26. https://doi.org/10.1016/S0022-4405(01)00092-9

Torpey, E. (2018). Measuring the value of education. *Career Outlook, U.S. Bureau of Labor Statistics*. https://www.bls.gov/careeroutlook/2018/data-on-display/education-pays.htm

Trigwell, K., & Prosser, M. (2004). Development and use of the approaches to teaching inventory. *Educational Psychology Review, 16*(4), 409-424. https://doi.org/10.1007/s10648-004-0007-9

U.S. Bureau of Labor Statics, Office of Occupational Statistics and Employment Projections. (2019). *Employment projections: Unemployment rates and earnings by educational attainment.* https://www.bls.gov/emp/chart-unemployment-earnings-education.htm

Verhoeven, L., Leeuwe, J. & Vermeer, A. (2011). Vocabulary growth and reading development across the elementary school years. *Scientific Studies of Reading, 15*(1), 8-25. https://doi.org/10.1080/10888438.2011.536125

Vitale, M. R., & Romance, N. R. (2007). A knowledge-based framework for unifying content-area reading comprehension and reading comprehension strategies. In D. S. McNamara (Ed.), *Reading comprehension strategies: Theories, interventions, and technologies.* (1st ed., pp. 73-104). Psychology Press. https://doi.org/10.4324/9780203810033

Wham, M. A., Cook, G., & Lenski, S. D. (2001). A comparison of teachers whose literacy orientations reflect constructivist or traditional principles. *Journal of Reading Education, 26*(2), 1-8. https://eric.ed.gov/?id=EJ630657

Woolley, G. (2011). *Reading comprehension: assisting children with learning difficulties.* Springer, Dordrecht. https://doi.org/10.1007/978-94-007-1174-7