PRE-SCHOOL TEACHER’S KNOWLEDGE OF EARLY LANGUAGE AND LITERACY AND ITS RELATIONSHIP TO TEACHING PRACTICES AND CLASSROOM ENVIRONMENTS

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PRESCHOOL TEACHER’S KNOWLEDGE OF EARLY LANGUAGE AND LITERACY AND ITS RELATIONSHIP TO TEACHING PRACTICES AND CLASSROOM ENVIRONMENTS

A Thesis

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Abstract

of

PRESCHOOL TEACHER’S KNOWLEDGE OF EARLY LANGUAGE AND LITERACY AND ITS RELATIONSHIP TO TEACHING PRACTICES AND CLASSROOM ENVIRONMENTS

by

Jennifer Suzanne Gonzalez

Early childhood educators (ECEs) play an important role in fostering children’s literacy. This study examined the literacy knowledge and practices of early childhood educators as well as relationships between knowledge, practices and classroom environment. Sixty-seven ECEs were surveyed about their literacy knowledge and practices. Descriptive statistics yielded a description of teachers’ knowledge and practices. Correlations identified possible relationships between knowledge, practices and environment. Participants’ knowledge base was varied, with the highest percentages in storybook reading and the lowest in alphabet. In contrast, participants frequently engaged in many literacy practices. Correlation analyses found no relationship between knowledge and either classroom practices or environment. The only significant positive relationship was between practices and environment.

_______________________
Dr. Susan Gomez
Committee Chair

_______________________
Date
DEDICATION

To my Father, the first person to suggest that I take on this endeavor. I only wish he could be here to see the realization of his dream for me.
ACKNOWLEDGMENTS

I would like to express my deepest appreciation to my sponsor, Dr. Susan Gomez. Without her support, encouragement, understanding, and fabulous editing this thesis would certainly not have been possible. I will be forever grateful to have had the opportunity to work with such a dedicated professor who clearly loves what she does. It is truly inspiring. I would like to thank my second reader, Dr. Kristen Alexander, whose willingness to come on board so close to the end of this project was amazing and much appreciated. Thank you, thank you, thank you.

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Chapter 1

INTRODUCTION

Academic success in elementary school, particularly in the areas of reading and writing, is often predicated upon the early literacy foundation that children develop in the preschool years. Research has consistently shown that the language and literacy skills children acquire in the preschool years have an effect on their reading and writing success in kindergarten and elementary school (Jackson et al., 2006; Justice, Chow, Capellini, Flanigan, & Colton, 2003; Molfese et al., 2006; Roberts, 2003). The early childhood educator plays an important role in fostering children’s literacy by designing learning environments and employing effective teaching practices that support the development of early language and literacy skills.

The body of research related to effective teaching is extensive and includes many studies of teachers’ knowledge, beliefs, and practices. In recent decades, studies of teacher knowledge and its relationship to beliefs and practices have shifted from the behavioristic models common in the early literature to more complex studies grounded in cognitive psychology and situated in real life classroom contexts (Guerrero, 2005). According to Guerrero, “knowledge and beliefs . . . are major determinants of what they [teachers] do in the classroom” (p. 251). With respect to literacy development, studies have indicated that teachers’ knowledge base affects their teaching practices and classroom environment (Jackson et al., 2006). Because most of these studies have been conducted in elementary school classrooms, it is important to examine the role of the
early childhood educator in the preschool setting, a critical period in children’s emerging literacy development.

Statement of the Problem

The early childhood years are a period of important development in children’s language and early literacy skills. As more children spend these years in preschool programs (Early et al., 2007; Sacks & Ruzzi, 2005), the role of the early educator in supporting this early language and literacy has become increasingly important. A teacher’s ability to provide this support depends in large part upon her knowledge and understanding about how language and literacy develop in the early childhood period. Furthermore, the question of whether an adequate knowledge base translates into effective classroom practices remains unanswered. This is particularly true in relation to early childhood settings, because previous studies of teacher knowledge and classroom practices related to language and literacy have focused largely on K-12 teachers (McCutchen, Abbot et al., 2002; McCutchen, Harry et al., 2002; Spear-Swerling, Brucker, & Alfano, 2005).
Purpose of the Study

The purpose of this study was to examine the knowledge and classroom practices of early childhood educators (ECEs) in relation to early language and literacy, and to determine whether there was a relationship between ECEs’ knowledge about early literacy and their classroom practices, including in particular the classroom environment. Specifically, the study attempted to answer four questions:

1. What is the knowledge base of early childhood educators regarding young children’s early language and literacy development?
2. What are the classroom practices, including the classroom environment, of early childhood educators related to early language and literacy?
3. Is there a relationship between early childhood educators’ knowledge of early language and literacy and their classroom practices related to literacy?
4. Is there a relationship between early childhood educators’ knowledge of early language and literacy and their practices related to the classroom environment?

Significance of the Study

In the field of early childhood education, there is increasing attention focused on school readiness, which often means readiness to read and write. According to a joint position statement of the International Reading Association (IRA) and the National
Association for the Education of Young Children (NAEYC, 1998), “learning to read and write is critical to a child’s success in school” (p. 1), and early childhood is a crucial time for literacy development. The challenge for ECEs is to understand the development of literacy skills so that they may assist children in becoming successful reader and writers. This requires ECEs to have a knowledge base in early literacy development.

Preparation programs for teachers in K-12 classrooms now universally provide rigorous training in instructional methods for supporting literacy development. However, educational requirements for ECEs vary greatly from state to state so that they may not all have received a thorough grounding in the knowledge necessary to support the early development of literacy in preschoolers (Bellm, Whitebook, Cohen, & Stevenson, 2004; Maxwell, Lim, & Early, 2006; Sacks & Ruzzi, 2005). An additional question is whether possession of this knowledge base translates into effective practices in the classroom. Although there are previous studies that have examined the relationship between teacher knowledge and classroom practices, these have focused almost exclusively on K-12 teachers and have not examined the relationship between knowledge and practices in preschool settings (McCutchen, Abbot et al., 2002; McCutchen, Harry et al., 2002; Spear-Swerling et al., 2005).

Furthermore, very few studies have examined the relationship between teacher knowledge and the design of early childhood classrooms that support children’s emerging language and literacy. Current research on language and literacy development indicates that learning to read and write should be seen as a developmental continuum (Gambrell & Mazzoni, 1999) rather than an “all-or-nothing” phenomenon. This view claims that
experiences throughout the early childhood years affect the development of literacy and that reading, writing and oral language are connected and develop together as young children engage in a wide range of activities that promote both verbal and written language (Gambrell & Mazzoni). From this perspective, it is clear that ECEs need to design early learning environments that provide children with a variety of rich literacy experiences. Several classroom-based literacy practices have been shown to help children acquire skills that are related to their later reading ability, including environmental print experiences, supportive classroom environments, and storybook reading (Gambrell & Mazzoni).

**Methods**

This study employed a quantitative design to examine the relationship between the early language and literacy knowledge base of ECEs and their teaching practices and classroom environments. A sample of 67 ECEs across a range of program types were given a survey eliciting information about their knowledge and practices related to early language and literacy. Participants were recruited through classes in the School Readiness series offered by the Center for Excellence in Child Development (CECD), a division of The Center for Human Services at U.C. Davis Extension. These classes serve a wide variety of early educators from across California.

The survey used in this study, *Early Educators’ Knowledge and Practices Related to Early Literacy* (Appendix A), was an adaptation and combination of three instruments:
(a) the *Project Great Start Professional Development Initiative Questionnaire* (Project Great Start, 2005), which assesses preschool teachers’ knowledge about early literacy; (b) the *Preschool Literacy Practices Checklist* (Burgess, Lundgren, Lloyd, & Pianta, 2001), in which teachers rate the frequency of the classroom literacy practices; and (c) the *Early Language and Literacy Classroom Observation Toolkit* (ELLCO; Smith, Dickinson, Sangeorge, & Anastasopoulos, 2002), which is used to examine aspects of the early childhood classroom environment.

The survey included four sections: (a) demographic information, (b) early childhood educator knowledge related to early language and literacy, (c) classroom practices related to supporting the development of language and literacy, and (d) literacy in the classroom environment. The knowledge section was comprised of items across four areas of early literacy learning: storybook knowledge, alphabet letter knowledge, print awareness, and emergent writing. The practices and environment sections included items across the same four areas.

Data from the survey were analyzed in two phases. First, a description of the teachers’ knowledge, practices and environment was compiled using descriptive statistics. Second, correlations were computed to determine if there was any relationship between ECEs’ overall scores for knowledge and their overall scores for classroom practices and environment.
Definition of Terms

*Teacher Knowledge* is defined as “factual propositions and the understandings that inform skillful action” (Carter, 1990, as cited in Guerrero, 2005, p. 251). Two types of knowledge important in this study are subject matter content knowledge and pedagogical content knowledge. Subject matter content knowledge refers to the amount of knowledge a teacher has about a particular subject, including its concepts, principles, and facts. Pedagogical content knowledge refers to a teachers’ knowledge of how to best teach the content (Cutter, 2002; Shulman, 1986). *Teacher Practices* refer to what a teacher does in the classroom. For the purposes of this study, this includes how a teacher designs the early learning environment. In this study, the optimal early learning environment is one that provides children with many and varied literacy experiences (Smith, 2001) including alphabet and word puzzles, books, templates to form letters, paper to write on, and writing tools.

*Literacy* is defined as the ability to read and write. This study focuses on four areas of early literacy development. *Storybook Reading* refers to a child reading or looking at a book on his or her own, or an adult reading a book to a child. Adult-child shared storybook reading includes dialogic reading which is a style of book reading in which adults “(a) encourage the child to participate, (b) provide feedback to the child, and (c) adapt [their] reading style to the child’s growing linguistic abilities” (Hargrave & Sénéchal, 2000, p. 76). *Alphabet Letter Knowledge* refers to a child’s “ability to identify letters and understand that letters of the alphabet are a special category of visual graphics
that can be individually named” (Hawken, Johnston, & McDonnell, 2005, p. 232). Print Awareness is defined as a child’s “knowledge of the forms and functions of written language” (Pullen & Justice, 2003, p. 89). Two important aspects of print awareness are Print Concepts and Environmental Print. Print concepts include the notions that print is read from left-to-right and top-to-bottom, that print is different than pictures, and that the print, rather than the pictures, conveys meaning (Hawken et al., 2005; Kaderavek & Justice, 2004; Pullen & Justice, 2003). Environmental print is defined as “print encountered in the context of everyday life” (Epstein, 2007, p. 33). Lastly, emergent writing refers to a child’s unconventional writing. It is “often classified in a hierarchy that includes (a) drawing, (b) scribbles, (c), and letter-like forms or letter strings” (Kaderavek & Justice, 2004, p. 218).

Study Limitations

This study was designed to provide some insights into ECE teachers’ understanding of children’s literacy development, their practices related to literacy, and the relationship between their knowledge base and practices. However, findings of the study must be considered in light of the limitations of this research. One such limitation was the methodology used to collect the data, which included only a self report survey. Because the researcher did not conduct any classroom observations, it was not possible to verify whether the practices the ECEs reported in the survey were actually taking place in the classroom, or taking place at the levels of frequency reported. An additional problem
with utilizing a survey was that some of the respondents may have answered in a manner in which they thought the researcher would expect or that is socially desirable.

Another point to consider is that the quality of the teaching practices reported here could have been quite varied. For example, while a high percentage of participants (79%) reported engaging in whole group book reading daily, it is unclear whether these experiences were interactive or passive on the part of the children. Research indicates that while children do see some benefits from both types of storybook reading experiences, the gains are significantly higher when the experiences are interactive (Hargrave & Sénéchal, 2000). Further variation may have been due to the nature of the teachers who responded to the survey. For instance, it may have been that those teachers who chose to respond were already using more literacy related practices, and those teachers using fewer literacy practices may have chosen not to participate.

Demographic factors in the design of the study also limit the generalizability of the results. Because the primary focus of the study was on the role of the early childhood educator in early education settings, findings in the study would not be generalizable to settings with K-12 teachers or with older students. Finally, the research questions in this study did not include an examination of whether and how factors such as teaching experience, education, or program type influence ECE teachers’ early literacy knowledge and practices.
Organization of the Study

Chapter One provided an overview of this study that examined the knowledge and classroom practices of ECEs in relation to early language and literacy development. Chapter Two provides an overview of the literature pertaining to teacher knowledge, teacher practices, early language and literacy development, and classroom environments. Chapter Three explains in detail the methodology used to conduct the study. Chapter Four reports the results of the analyses. Chapter Five provides a discussion of the results as well as implications for future research. The Early Educators’ Knowledge and Practices Related to Early Literacy survey instrument is included in Appendix A.
Chapter 2
LITERATURE REVIEW

In the United States, a rising number of preschool age children are attending early childhood programs (Early et al., 2007). As a result, early childhood educators (ECEs) have become an increasingly important resource for supporting young children’s development (Epstein, 2007). The experiences children have in early childhood programs play a crucial role in laying the foundation for their later school success. Research has consistently shown that a strong foundation of early language and literacy skills are a key component of school readiness. Therefore, ECEs need to be prepared to promote the development of such skills. This preparation must include a strong knowledge base regarding the components of early literacy development as well as an understanding of how to foster early literacy in their classrooms.

This chapter presents a review of the literature pertaining to ECEs’ knowledge and practices related to early literacy development. The first section begins with a discussion of the theoretical framework guiding this study and a review of research and theory related to the major components of children’s early language and literacy development including storybook reading, alphabet letter knowledge, print awareness, and emergent writing. The chapter continues with an examination of the early childhood classroom as a context for language and literacy development. Finally, an overview of the research regarding teacher knowledge about children’s early literacy development is presented.
Theoretical Framework

The study of teacher knowledge and its relation to children’s early literacy development has its roots in the theoretical perspectives of cognitive development and social interactionism (Gambrell & Mazzoni, 1999). Among the more influential theorists in these two fields are Jean Piaget and Lev Vygotsky (Miller, 2002). These theories provide a foundation for studying teacher practices, children’s literacy acquisition, and the nexus of these processes within the environment of the classroom.

**Literacy Development**

The most current research into how children develop literacy in the early childhood years has affirmed that this process is founded upon both constructivist and social interactionist views of development and learning (Gambrell & Mazzoni, 1999). According to Piaget (1955), cognitive growth and language development are closely related. Specifically, his stage theory of development proposes that “language is acquired as cognitive competencies develop” (Otto, 2002, p. 26). Unlike other theories of development, which suggest that the ability to use language is what allows for the emergence of representational thought (Miller, 2002), Piaget (1961) argues that for language to exist, children must already be able to think about and conceptualize information. While the ability to think is not dependent on language, language does facilitate the advance of cognitive development by providing children a new way to interact with the environment.
Piaget’s cognitive theory also posits that in order to learn, children need to participate actively in the environment. It also suggests that children do not require outside motivation to do this; rather, they have an innate drive to explore and interact with their surroundings (Miller, 2002). Additionally, as children construct knowledge, they do so without adult assistance. As “little scientists,” they will investigate, hypothesize about, and experiment with the materials available to them (Miller). This view of children’s cognition has important implications for classroom practices related to children’s early literacy development, and for the design of early childhood classrooms that support language and literacy development. For example, within this theoretical perspective, children would benefit from exposure to a wide variety of literacy materials and practices in an environment which encourages their exploration and experimentation with literacy.

Unlike Piaget, who saw development as more of an individually constructed activity the foundation of Vygotsky’s theory is social interaction (Miller, 2002). Vygotsky recognized the vital role that adults and peers play in children’s development and posited that learning takes place within the context of relationships. In contrast to Piaget, Vygotsky (1978) viewed language development as a critical process in development, and he posited that language development and use helps to drive cognitive development and thinking. A major concept in social interactionist theory is the zone of proximal development, which can be defined as the difference between what children can accomplish on their own and what they can achieve with adult assistance and guidance (Vygotsky). The idea of scaffolding has often been used to help illustrate this concept
As a scaffold extends the work of a builder or a painter, adults can extend the growth and learning of children. By providing scaffolded experiences within the zone of proximal development, early childhood educators can facilitate children’s language and literacy skills through modeling, discussion, and verbal prompts.

The substantial body of recent research related to literacy development and learning is grounded primarily in these cognitive and social interactionist perspectives of language and literacy development. Though many of these studies have been situated in K-12 classrooms, there have been some studies of literacy in the early education setting. The following sections provide a more in depth discussion of children’s literacy development, including a specific focus on the early childhood years.

Children’s Early Language and Literacy Development

Current research on language and literacy development indicates that learning to read and write should be seen as a developmental continuum rather than an “all-or-nothing” phenomenon (Whitehurst & Lonigan, 1998). However, this has not always been the case. Before the 1960’s, researchers believed that there was a clear distinction between reading and pre-reading. This view, referred to as “reading readiness,” posits that until children reach a certain level of physical, social, emotional, and cognitive maturity (Gambrell & Mazzoni, 1999), exposure to reading and writing is not useful to them. Research over the last few decades has led to a much different view of literacy development, and today researchers are now advocating for what is called “emergent
literacy.” This new view claims that experiences throughout the early childhood years affect the development of literacy and that reading, writing, and oral language are connected and develop together as young children engage in a wide range of activities that support both verbal and written language (Burgess et al., 2001; Gambrell & Mazzoni; Whitehurst & Lonigan).

Additionally, research has consistently shown that the language and literacy skills children acquire in the preschool years have an effect on their reading and writing success in kindergarten and elementary school (Jackson et al., 2006; Justice et al., 2003; Molfese et al., 2006; Roberts, 2003). For this reason, researchers have investigated the skills that are most important for preschool children to develop before entering kindergarten. According to Whitehurst and Lonigan (2001) these skills can be grouped into four categories including phonological processing skills, print principles, emergent writing, and oral language. These categories encompass several different skills that are beneficial for young children to develop including phonological awareness, phonological sensitivity, understanding of the alphabetic principle, alphabet letter knowledge, print awareness, knowledge of vocabulary, reading comprehension, listening comprehension and writing skills (Gambrell & Mazzoni, 1999; Hoover & Gough, 1990; Roberts & Neal, 2004; Whitehurst & Lonigan).

Whitehurst and Lonigan (1998, 2001) further divide these skills into two domains: “outside-in” skills and “inside-out” skills. These two sets of skills are interdependent. Outside-in skills are defined as “sources of information from outside the printed word that directly support children’s understanding of the meaning of print” (Whitehurst &
Lonigan, 2001, p. 13). Included within this domain are conceptual knowledge and vocabulary. Inside-out skills are identified as “sources of information within the printed word that support children’s ability to translate print into sounds and sounds into print” (Whitehurst & Lonigan, 2001, p. 13). Alphabet letter knowledge and phonemic awareness are examples of this type of skill.

There are two main types of instruction that teachers can use to enhance the development of the aforementioned skills in young children. These two methods are explicit instruction and implicit instruction (Jackson et al., 2006; Morrison, Connor, & Bachman, 2006). Explicit instruction is outcome specific and employs adult-directed teaching. This is the optimal approach to use when trying to increase a child’s skill in areas such as phonemic awareness and print concepts like alphabet letter knowledge. Implicit instruction, also referred to as the embedded approach (Jackson et al.), is based on the idea that children learn through self-initiated play experiences with literacy materials and activities throughout the day within the social context of the classroom. This approach fosters the development of children’s emerging literacy skills by allowing them opportunities to engage in shared storybook reading experiences, exposing them to environmental print, and providing them with the materials needed to engage in emergent writing.

As noted by Justice and Kaderavek (2004), many studies have examined the impact of either the explicit instruction approach or the embedded approach on children’s developing literacy skills. However, they assert that an integrated approach, one that combines the use of both explicit and implicit teaching strategies, is optimal for
supporting young children’s acquisition of early language and literacy skills (Kaderavek & Justice, 2004). Therefore, the current study utilized this integrated approach and the survey instrument assessed both explicit instruction practices and implicit instruction practices. The early literacy skills included in the survey were storybook reading, alphabet letter knowledge, print awareness, and emergent writing.

*Storybook Reading*

According to researchers, storybook reading has a significant impact on emergent literacy development (Dickinson & Smith, 1994; Hargrave & Sénéchal, 2000; Grambrell & Mazzoni, 1999; Justice & Pullen, 2003; Whitehurst et al., 1994). Adult-child shared storybook reading provides children with experiences with new vocabulary, exposure to the structure of stories and language, and the concept that printed words have sounds. What children gain from these experiences is story comprehension skills, an increase in their vocabulary, and an understanding that written language is different from oral language (Dickinson & Smith; Grambrell & Mazzoni).

Most educators would agree that an important goal is for children to comprehend the meaning of what they are reading. Gambrell and Mazzoni (1999) noted that for the past 20 years, researchers have shown an ever-increasing interest in how to enhance children’s comprehension skills. According to the National Assessment of Educational Progress, in order to build comprehension skills, reading instruction must introduce and develop higher-level thinking skills and strategies. Some of these strategies include problem solving, summarizing, interpreting, making inferences, evaluating, and creative thinking (Gambrell & Mazzoni). Results from a study conducted by Roberts and Neal
(2004) suggest that one way to foster growth in these areas is through interactive book reading.

Interactive book reading provides an opportunity for adults to foster literacy development by building on children’s comments about the story, posing questions to extend discussions about the story, encouraging personal reactions to the story, and drawing attention to the letters and words in the story (Gambrell & Mazzoni, 1999). This type of shared book reading is also known as dialogic reading (Whitehurst & Lonigan, 1998). In addition to gains in story comprehension skills, studies have found that participation in dialogic reading helps to foster children’s vocabulary growth because it allows for the discussion of the meaning of the story as well as the meanings of words used in the story (Dickinson & Smith, 1994; Whitehurst et al., 1994).

In one particular study, Hargrave and Sénéchal (2000) examined the effects of two types of storybook reading on the vocabulary development of 36 preschool children with poor vocabulary skills. The aim of the researchers was to understand if the benefits of storybook reading, specifically an increase in vocabulary, would be greater when children actively participated in the experience (dialogic reading), as compared to when they had a more passive role (regular shared storybook reading). Over a four-week period, teachers read ten books, two times each, using either dialogic reading or regular shared reading. To assess vocabulary, children were given three pre- and post-tests. The Peabody Picture Vocabulary Test-Revised was used to measure receptive vocabulary. The Expressive One Word Picture Vocabulary Test-Revised was used to measure expressive vocabulary and finally, the Book Vocabulary test was used to assess children’s
knowledge of new words introduced in the ten books they were read. Results of the study indicated that while children were able to learn new vocabulary from both types of shared storybook reading experiences, children who participated in dialogic reading learned a significantly greater amount of vocabulary.

*Alphabet Letter Knowledge*

In order for children to become readers, it is important that they develop alphabetic understanding. Alphabetic understanding is the concept that letters correspond to sounds and that words are made-up of these sounds (Gambrell & Mazzoni, 1999). In order for children to gain this understanding, they need to have alphabet letter knowledge. In fact, research on children’s reading achievement has found that the best predictor of children’s reading success in school is their knowledge of letter names (Roberts, 2003; Whitehurst & Lonigan, 1998). Roberts and Neal (2004) noted that one reason for this is that preschool children are able to use a letter’s name as a tool to help them in learning the letter’s sound. This eventually helps them to make connections between graphemes, (any set of written letters that represent a sound), phonemes (the small units of speech that go with the letters of the alphabet) and word pronunciations.

According to Ehri (2005), there are phases of reading development that children pass through. The first one is the pre-alphabetic phase. Children in this stage do not yet possess alphabetic understanding and therefore are not able to make grapheme-phoneme connections (Bowman & Treiman, 2002). Instead of using letter-sound connections to read words, they focus on the visible details of print, for example the humps on the *m* of *mom*. However, this only allows for the identification of a limited number of words.
During the next phase, the alphabetic phase, children start to connect letters with sounds. Alphabet letter knowledge in this phase is critical because if a child does not know the letters of the alphabet, she will not be able to connect the letters with their corresponding sounds (Whitehurst & Lonigan, 1998).

Despite the research indicating the importance of alphabet letter knowledge, Ehri (1989) found that some children begin kindergarten only knowing a few letters of the alphabet. Because of this, researchers have investigated what methods are most effective for teaching children the letters of the alphabet. In a study of 33 preschoolers, Roberts (2003) found that letter-name instruction, including signing the alphabet song, finding target letters in children’s names, “reading” alphabet books, and finding target letters amongst a bag of letter shapes, was beneficial in helping children gain alphabet letter knowledge. In another study, Aram (2006), found that having children practice letter-name correspondence with the letters in their own name did improve their alphabet letter knowledge.

**Print Awareness**

Most children develop an awareness of print during the preschool years. As with alphabet letter knowledge, print awareness helps lay the foundation for later reading success. Two important aspects of print awareness are print concepts and environmental print (Pullen & Justice, 2003). Print concepts refer to a child’s understanding of the forms and functions of print (Kaderavak & Justice, 2004). This includes the fact that print is read from left-to-right and top-to-bottom, that print is different than pictures, and that the print, rather than the pictures, conveys meaning (Hawken et al., 2005; Kaderavek &
Justice; Pullen & Justice). Strategies that have been shown to be effective in improving children’s understanding of print concepts include referencing or pointing to the print while reading aloud, engaging in discussion about print, and taking dictation as a way to demonstrate the purpose and use of print (Hawken, et al; Pullen & Justice).

Environmental print is another important aspect of print awareness. Epstein (2007) defines environmental print as “print encountered in the context of everyday life” (p. 33). Some examples of this include logos, traffic signs, menus, newspapers, product labels, storefronts, and printed recipes. As noted by Snow, Burns, and Griffin (1998), preschool children in the prereading stage are able to “read” logos. For example, a child can look at the logo on a familiar package and know what it is. Researchers believe that reading environmental print helps children to begin to understand the concept that written words are comprised of individual letters that correspond to speech sounds (Pullen & Justice, 2003). This awareness is critical to later understanding of the alphabetic principle.

Although the frequency of environmental print allows children to come across it on their own throughout the day, teachers can foster a child’s development in this area by calling a child’s attention to it. Opportunities to help children learn about this type of print can include reading the words on various containers in the dramatic play area, reading the words on a flyer posted in the classroom, writing a list of ingredients for a cooking activity, writing a child’s name on their artwork, or writing a letter to a child. In print-rich environments where teachers engage in such activities, children are able to explore the purpose and function of reading and writing. Research has supported this
notion by showing that children’s reading motivation is in fact related to the amount that children participate in these types of activities (Gambrell & Mazzoni, 1999).

**Emergent Writing**

Research indicates that emergent writing develops over time and proceeds through several stages (Sulzby, 1990). The earliest writing of very young children includes scribbles and drawings that only carry meaning for them (Whitehurst & Lonigan, 1998). Between the ages of three and five, children start to understand that print can be used to convey meaning to others. At this stage, they create imitation letters and messages. These markings do begin to take on letter-like forms (Vukelich, Christie, & Enz, 2008; Whitehurst & Lonigan). While children are unable to formally print at this stage, they believe their marks have meaning.

Eventually, children begin to produce alphabet letters and invented spelling of words. In using invented spelling, children are demonstrating their increasing awareness of phonemes by creating their own spelling using letter-sound relationships (Vukelich et al., 2008). This can include using only one letter to represent a word or using one letter for every sound they hear in the word. With support, children will ultimately employ conventional spelling. Adults can facilitate emergent writing by providing children with multiple opportunities to practice their developing skills. Hawken et al. (2005) report that some of the successful strategies used by teachers to support children’s emergent writing include providing opportunities for children to use a variety if writing tools, having children practice writing their own name, and providing children with templates to help them form letters. One of the most important ways in which teachers can support
children’s early literacy development is to provide an environment rich in print and literacy related materials. Elements of a supportive literacy environment are discussed in the following section.

The Early Childhood Classroom as a Context for Literacy Development

The early childhood classroom is an important context for children’s literacy learning. Research has demonstrated that early literacy environments have an important influence on children’s developing language and literacy skills. As discussed earlier in this chapter, Piaget’s cognitive theory of development posits that children need to actively participate in the environment in order to learn (Miller, 2002). The most important curricular implication of Piaget’s theory is that teachers need to design environments that capitalize on the intrinsic motivation that children have to explore and interact with the world around them. Teachers need to create spaces that invoke and invite discovery. Additionally, from an emergent literacy perspective, it is clear that teachers need to design early learning environments that provide children with many and varied literacy experiences (Smith, 2001). As discussed by Farran, Aydogan, Kang, and Lipsey (2006), several studies have found that play environments which include plenty of literacy materials do result in children’s increased literacy behaviors and subsequent literacy development.

One assessment measure available for teachers to use in evaluating their classroom language and literacy environment is the *Early Language and Literacy*
Classroom Observation Toolkit (ELLCO, Smith et al., 2002). The ELLCO is designed to identify practices and environmental supports that help cultivate children’s early language and literacy development (Van Asselt, Anastasopoulas, & Kraemer-Cook, 2002). There are three components of the ELLCO: the literacy environment checklist, the classroom observation, and the literacy activities rating scale. The environment section of the survey used in the current study was based on the items included in the first component of the ELLCO, the literacy environment checklist. This checklist examines environmental components in three main categories: books, literacy materials, and writing.

The survey administered in the current study was designed to examine the diversity, availability, and content of the reading, writing, and literacy materials available for children’s use, in others words, how much exposure children have to different elements of literacy. In particular, the survey looked at the accessibility of alphabet and word puzzles, books, templates to form letters, paper to write on, and writing tools. Previous research supports the notion that access to these materials provides children with important opportunities to experience reading and writing which helps to promote the language and literacy development that is important for later school success (Morrow & Rand, 1991). For example, Morrow (1991, as cited in Farran, et al., 2006) reported finding correlations between the presence of certain literacy materials in the classroom and the frequency of children’s literacy behaviors during their play time. In particular, results of the study indicated that children were likely to engage in reading and writing
more frequently in classroom environments with a higher quantity and variety of literacy materials (for example, books, pencils, paper).

In addition to considering children’s access to the language and literacy materials listed above, the survey used in the current study examined the placement of the items in the environment. In keeping with the Piagetian perspective that children are natural explorers who construct knowledge and meaning from hands-on learning experiences, it is important that children are in environments where they are surrounded by opportunities to write and to see concepts of print (Miller, 2002). Therefore, language and literacy materials should be available in multiple areas of the room rather than just in one or two. This allows children to encounter literacy in all domains of their play.

Studies also indicate that enhancements to the classroom literacy environment can result in positive changes in children’s literacy behaviors. In one study of 170 children, Morrow (1990) investigated the effects of environmental changes in the early childhood classroom on a range of unprompted literacy behaviors during free play times. Specifically, the researcher was interested in learning if changes to the environment would result in an increase in unprompted literacy behaviors such as tracing, writing, pretend reading, or book browsing. Results of the study indicated that changes in the physical design of the environment did influence children’s literacy behaviors. For example, children took part in more literacy activities in the dramatic play and block area when literacy materials, such as books, pencils, markers, and paper, were available to them in those areas.
Providing instruction that supports the development of children’s early literacy skills and designing a rich classroom literacy environment depend upon the knowledge and practices of the teacher. The following section discusses the research related to teachers’ knowledge of early literacy and its relationship to their classroom practices.

Teacher Knowledge

In recent decades, the study of teacher knowledge and its relationship to classroom practices has shifted from the behaviorist models common in the early literature to more complex studies grounded in cognitive psychology and situated in real life classroom contexts (Guerrero, 2005). The focus is no longer on the sequence of teachers’ behaviors but rather on their work and thought processes. When considering issues related to teacher practice, this cognitive perspective assumes that knowledge and beliefs are important factors in how teachers teach as well as what they teach (Guerrero).

It is a common belief that a teacher’s knowledge base will affect what he or she does in the classroom. As a result, numerous studies have sought to understand if in fact a relationship does exist between teacher knowledge and teacher practice (Waters-Adams, 2006). Many of these studies have focused on the interaction between teacher knowledge, beliefs and practices without making a clear distinction between the concepts of knowledge and beliefs (Guerrero, 2005). For the purpose of the present study, which focused only on teacher knowledge and its relationship to teaching practices and classroom environments, this is an important distinction to make. When researchers are
able to separate beliefs, defined as “suppositions, commitments and ideologies,” from knowledge, defined as “factual propositions and the understandings that inform skillful action” (Guerrero, p. 251), they are able to gain a better understanding of what teachers know and how they use their knowledge to inform their teaching practices.

Another issue related to the study of teacher knowledge concerns the different categories of knowledge that exist (Cutter, 2002; Guerrero, 2005; Shulman, 1986). Shulman (1987) identified seven categories: subject matter content knowledge, general pedagogical knowledge, pedagogical content knowledge, curriculum knowledge, knowledge of educational contexts, knowledge of the learners and their characteristics, and knowledge of educational ends, purposes, and values and their philosophical and historical grounds. Shulman (1986) argued that among the most important of these are subject matter content knowledge and pedagogical content knowledge. Subject matter content knowledge refers to the amount of knowledge a teacher has about a particular subject, including its concepts, principles, and facts. Pedagogical content knowledge refers to a teachers’ knowledge of how to best teach the content.

These two categories of knowledge are significant because they represent the substance of what teachers combine as academic content with effective teaching practices (Shulman, 1987). According to Grossman (1995), “the content knowledge that teachers possess has a major impact on . . . what teachers teach and how they teach it” (p. 21). This can mean that teachers might place a greater emphasis on subjects where they are more knowledgeable and not as much of an emphasis on subjects where they have comparatively less knowledge. Although many would agree with the assertion that
teacher knowledge is a major determinant of classroom practices, most of the literature related to teacher knowledge has been conducted in K-12 settings (Guerrero, 2005; McCutchen, Abbot et al., 2002; McCutchen, Harry et al., 2002; Spear-Swerling et al., 2005; Waters-Adams, 2006). The current study sought to understand if this relationship between teacher knowledge and practice was also present for early childhood educators.

*Teachers’ Knowledge of Early Literacy Development*

In the field of early childhood education, there is increasing attention focused on school readiness. According to a joint position statement of the International Reading Association (IRA) and the National Association for the Education of Young Children (NAEYC, 1998), early childhood is a crucial time for children to acquire the early literacy skills needed for their later success in reading and writing during the school age years. The challenge for ECEs is to understand the development of early literacy skills so that they may assist children in becoming successful reader and writers. This requires that ECEs have a knowledge base in early literacy development.

As is true with many domains of knowledge (including math and science), numerous researchers have examined the association between teachers’ knowledge related to early literacy and their teaching practices. While there have been a few studies that examined this relationship in the context of early childhood programs (Islam, 1999; Jackson et al., 2006), most of them have been carried out with teachers working in K-12 classrooms (Cunningham, Perry, Stanovich, & Stanovich, 2004; Mather, Bos, & Babur, 2001; McCutchen, Abbott, et al., 2002; McCutchen, Harry, et al., 2002; Spear-Swerling et al., 2005). Results of one study involving elementary school teachers indicated that
there was a relationship between reading-related content knowledge and classroom instruction (McCutchen, Harry et al.). In particular, teachers who had a strong knowledge base in phonological development made use of more explicit instructional practices shown to support children’s developing reading skills. The current study aimed to discover if this was a similar trend among ECEs.

Present day models of teacher preparation and training are based on the assumption that both education and experience help to build a teacher’s knowledge base for teaching. However, some studies have demonstrated that despite education level and experience, many K-12 teachers lack significant knowledge of the extensive skills important for literacy development (Cunningham et al., 2004; Mather et al., 2001; Spear-Swerling et al., 2005). This assumption has been further examined in studies comparing the practices and knowledge base of experienced versus inexperienced teachers.

In one study, researchers examined the perceptions and knowledge of early literacy instruction in inexperienced and experienced general education teachers (Mather et al., 2001). One aim of the study was to determine if the two groups had differing amounts of knowledge about the concepts of language. Participants included 293 preservice teachers and 131 inservice teachers employed in kindergarten through third-grade classrooms for at least three years. Data were collected using the Teacher Knowledge Assessment: Structure of Language (TKA: SL), a measure that assesses “knowledge of the structure of the English language at both word and sound levels” (p. 474). Results of the study indicated that both groups lacked sufficient knowledge regarding the elements of the English language. As noted by the authors, this study
confirmed previous findings that despite experience and training, many teachers do not possess the knowledge base they need to explicitly teach reading skills to children who are struggling.

Similar findings regarding insufficient knowledge about early literacy may extend to ECEs. The studies discussed above (Cunningham et al., 2004; Mather et al., 2001; Spear-Swerling et al., 2005) demonstrated that despite the rigorous training in instructional methods for supporting literacy development now universally provided in preparation programs, K-12 teachers still display a lack of sufficient knowledge in this area. Because educational requirements for ECEs vary greatly from state to state, these teachers may be at a greater disadvantage since they may not all have received a thorough grounding in the knowledge necessary to support early literacy development in preschoolers (Bellm et al., 2004; Maxwell, et al., 2006; Sacks & Ruzzi, 2005).

In some states, researchers have developed successful training programs designed to provide ECEs with this kind of information about early literacy. One such program is HeadsUp! Reading. In an evaluation study of the program, researchers (Jackson et al., 2006) examined the effects of the HeadsUp! Reading (HUR) training on children’s early language and literacy learning. The participants included 39 ECEs and the 143 children in their classrooms who ranged in age from 2.8 to 6.5 years old.

At the beginning of the study, Jackson et al observed and evaluated classrooms using two assessments, the *Early Language and Literacy Classroom Observation Toolkit* (ELLCO) and the *Early Childhood Environments Rating Scale-Revised* (ECERS-R). The researchers also completed child assessments using four different measures. Teachers
involved in the study participated in 44 hours of training over a 15 week period. The training consisted of a live satellite broadcast of research-based professional development aimed at promoting early literacy practices. Upon completion of the study, researchers found that participation in the HUR training did result in positive improvements in teachers’ classroom practices. Scores on both the ELLCO and the ECERS-R improved for those teachers who participated in the training. Researchers also found that children in the treatment group improved their scores on two of the assessment measures. These results indicate that training programs can help to build ECEs’ knowledge base and as a result, positively alter their teaching practices, including the design of their classroom environment. These findings also suggest that quality learning environments are related to better literacy outcomes in children and that the quality of teachers’ literacy practices has an effect on children’s language and literacy abilities.

Implications for the Present Study

In summary, research has shown that children’s literacy learning begins in the early childhood years and encompasses understanding in the critical areas of storybook, alphabet, print and writing knowledge. Research has also clearly indicated that children’s literacy development is best supported with effective teaching practices provided in the context of a literacy rich supportive early childhood classroom environment. An ECE’s ability to employ effective teaching practices related to early literacy depends in large part upon the knowledge base that he or she possesses about early literacy development.
In addition, elements of the classroom environment are also important in promoting children’s engagement with literacy. Because very few studies have examined the knowledge and practices of ECEs in relation to early literacy, the current study was designed to determine the knowledge base of ECEs, and whether that knowledge was related to their literacy practices, including in particular the classroom environment.
Chapter 3

METHODS

This study examined the relationship between early childhood educators’ knowledge of early language and literacy development and their classroom practices related to literacy, including in particular the classroom environment. This chapter describes the methods used in the study.

Design and Research Questions

To understand the relationship that exists between early childhood educators’ literacy knowledge, classroom practices, and classroom environments, a survey was conducted of early childhood educators from a range of programs in the Sacramento, California region. The survey instrument elicited information related to the following specific research questions.

1. What is the knowledge base of early childhood educators regarding young children’s early language and literacy development?

2. What are the classroom practices, including the classroom environment, of early childhood educators related to early language and literacy?

3. Is there a relationship between early childhood educators’ knowledge of early language and literacy and their classroom practices related to literacy?
4. Is there a relationship between early childhood educators’ knowledge of early language and literacy and their practices related to classroom environments?

It was hypothesized that early childhood educators who have a greater knowledge base in early language and literacy would engage in more teaching practices that support early language and literacy development than those teachers that have a lesser knowledge base. In addition, it was expected that the early childhood educators with a greater knowledge base would have classrooms with more environmental supports for children’s emerging language and literacy development. Data from the survey were analyzed using descriptive statistics and correlation analyses.

Participants

A total of 250 surveys were distributed to early childhood educators enrolled in School Readiness classes through the Center for Excellence in Child Development (CECD), which is a division of The Center for Human Services at UC, Davis Extension. These classes serve a wide variety of early educators from across California including home child care providers and center-based teachers. Of the 250 surveys distributed, 72 were returned to the researcher (a 29% return rate). Five of these surveys were not included in the final analyses (three were incomplete, one was missing a signed consent letter, and one was filled out by someone who reported that she did not work with children). The remaining 67 surveys comprised the total completed and returned to the
researcher by the end of the data collection period. Table 1 summarizes the demographic information for these 67 participants.

Table 1

Demographic Data for Participants

<table>
<thead>
<tr>
<th>Demographic Category</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Program Type</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Head Start</td>
<td>10</td>
<td>14.9</td>
</tr>
<tr>
<td>Child Care Center</td>
<td>28</td>
<td>41.8</td>
</tr>
<tr>
<td>Family Child Care</td>
<td>25</td>
<td>37.3</td>
</tr>
<tr>
<td>Other</td>
<td>4</td>
<td>6.0</td>
</tr>
<tr>
<td><strong>Ethnicity</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>African American</td>
<td>7</td>
<td>10.4</td>
</tr>
<tr>
<td>Native American</td>
<td>2</td>
<td>3.0</td>
</tr>
<tr>
<td>Asian American</td>
<td>11</td>
<td>16.4</td>
</tr>
<tr>
<td>Caucasian</td>
<td>31</td>
<td>46.3</td>
</tr>
<tr>
<td>Hispanic</td>
<td>13</td>
<td>19.4</td>
</tr>
<tr>
<td>Other</td>
<td>3</td>
<td>4.5</td>
</tr>
</tbody>
</table>

The 67 early childhood educators were employed in a range of program types, including Head Start, child care centers, and family child care programs. All but one of the participants was female. Nearly half of the educators were Caucasian. The remaining participants described their ethnicity as Hispanic, African American, Native American or
Asian American. The early childhood educators were also asked about their education level and years of teaching experience. Table 2 presents this information.

Table 2

*Education and Experience of Participants*

<table>
<thead>
<tr>
<th>Education and Experience</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Education Level</strong></td>
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<td></td>
</tr>
<tr>
<td>Some College CD</td>
<td>14</td>
<td>20.9</td>
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<tr>
<td>Some College ECE or EDTE</td>
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<td>22.4</td>
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<tr>
<td>Associate Program</td>
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<tr>
<td>Other ECE</td>
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<tr>
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<td>6.0</td>
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<tr>
<td><strong>Related Coursework</strong></td>
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<tr>
<td>College Courses</td>
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<tr>
<td>Prof. Development</td>
<td>44</td>
<td>65.7</td>
</tr>
<tr>
<td><strong>Years Teaching</strong></td>
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<td></td>
</tr>
<tr>
<td>0-5 years</td>
<td>25</td>
<td>37.3</td>
</tr>
<tr>
<td>6-10 years</td>
<td>14</td>
<td>20.9</td>
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<tr>
<td>11-15 years</td>
<td>7</td>
<td>10.4</td>
</tr>
<tr>
<td>16-20 years</td>
<td>9</td>
<td>13.4</td>
</tr>
<tr>
<td>20 or more years</td>
<td>10</td>
<td>14.9</td>
</tr>
<tr>
<td>no response</td>
<td>2</td>
<td>3.0</td>
</tr>
</tbody>
</table>
The mean years spent teaching children aged 3-5 years was 11.44, with a little more than half of the early childhood educators reporting teaching for 10 years or less. Nineteen of the educators reported having 16 or more years of experience. Almost all of the participants indicated that they had at least some college level education. However, for most of the participants this consisted only of course work in college level Child Development or Early Child Education college level courses without actual completion of a degree. A small percentage of the educators reported having either a Bachelors or a Master’s Degree. Over half of the early childhood educators reported having taken classes or attending workshops related to early literacy, language development or reading and language arts.

Survey Instrument

The survey used in this study, *Early Educators’ Knowledge and Practices Related to Early Literacy* (Appendix A), was an adaptation and combination of three instruments. The first instrument, the *Project Great Start Professional Development Initiative Questionnaire* (Project Great Start, 2005), is a 67 item assessment that measures teachers’ knowledge in the areas of language, literacy, and numeracy. The second instrument, the *Preschool Literacy Practices Checklist* (Burgess, et al., 2001), measures preschool teachers’ beliefs and self-reported practices related to early literacy development. The third instrument was the *Early Language and Literacy Classroom Observation Toolkit* (ELLCO, Smith, et al., 2002), which is used to examine aspects of the early childhood
classroom environment. There are three components of the ELLCO: the literacy environment checklist, the classroom observation, and the literacy activities rating scale.

The adapted survey used in this study included four sections. The first section included six questions regarding demographic information. The second section of the survey included 20 items that assessed early educators’ knowledge regarding early language and literacy. All of these items were taken from the literacy knowledge section of the Project Great Start Professional Development Initiative Questionnaire (Project Great Start, 2005). The items in this section focused on teachers’ knowledge related to four areas of early literacy development: writing, print awareness, storybook knowledge, and alphabet knowledge. The 16 items in the third section, which were selected from the Preschool Literacy Practices Checklist (Burgess et al., 2001), were designed to ascertain how frequently the early educators engaged in specific teaching practices related to language and literacy. Respondents were asked to rate frequencies for literacy practices on a four-point scale (none to daily). The items in this section addressed the same four areas of early literacy as in the first section.

The last section of the survey contained 18 items that pertained to the classroom literacy environment. These items were adapted from the first component of the ELLCO, the literacy environment checklist, which includes 24 items that examine environmental components in three main categories: books, literacy materials, and writing (Smith et al., 2002). For the environment items, participants were given a series of statements describing literacy elements in the classroom environment, and were instructed to answer “yes” or “no” as to whether these elements appeared in their classroom environment.
Again, these items addressed the same four areas of early literacy as in the other survey sections.

**Procedures**

At the beginning of this study, the researcher met with the Director of the Center for Excellence in Child Development (CECD), which is a division of The Center for Human Services at UC, Davis Extension, and obtained consent to recruit participants from classes offered in the School Readiness series offered by CECD. These classes serve a wide variety of early educators from across California including home child care providers and center-based teachers. They were created to help ensure that early childhood educators have the knowledge and skills to prepare young children for later school success. (It should be noted that the researcher is an instructor for the CECD).

There are five classes offered in the School Readiness series including Exploring Language and Literacy, Child Observation, Social-Emotional Development and Classroom Management, Supporting Young Bilinguals, and Math and Science for Young Children. The sample for this study was recruited from this population because it gave the researcher access to a large number of early childhood educators as each class can have up to 25 participants. The researcher was not an instructor for any of these five classes. In order to obtain informed consent from participants, the researcher also prepared a consent letter describing the purpose and nature of the study which was attached to the top of each survey.
Surveys were distributed over an eight-week period to individual respondents by the instructors of the CECD classes participating in the study. The surveys were included in the box of materials mailed to each instructor prior to the beginning of the class. Because enrollment in the classes varied, surveys were sent to ten different instructors, each teaching one of the five classes. Also included in the box was a letter written by the Director of the CECD asking instructors to pass out the survey to class participants, allow them 20 minutes fill it out, collect the completed surveys, and then return them to the CECD. They were then given to the researcher. Upon receipt of the completed surveys, the signed consent letters were separated from the survey ensuring that survey responses were kept anonymous and confidential.

Data Analysis

In the first phase of the data analysis, descriptive statistics were computed to provide a description of the early childhood educators’ early literacy knowledge and classroom practices, including practices related to the classroom literacy environment. Next, the relationship between overall knowledge and literacy practices, including practices related to the classroom environment, was examined through correlational analyses. Responses in each of the three sections of the survey were collapsed to yield overall score variables for knowledge, practices and classroom environment. For the knowledge section, the overall score for each participant consisted of the total number of correct responses to the knowledge items. For the practices section, each participant’s
overall score was computed as their mean score for rated frequency of use of each practice across all of the items on that section of the survey (Cronbach α = .842). The overall score for the environment section of the survey was computed by summing the total number of “yes” responses for each participant. Two-tailed bivariate correlations were then computed between: (a) the summed score of early childhood educators’ overall knowledge and their overall mean practices score; and (b) the early childhood educators’ overall knowledge score and their summed classroom environment score.

Summary

This chapter has described the methods used to conduct a study of early childhood educators’ knowledge of early literacy and its relationship to their classroom practices. The results of these analyses are reported in the following chapter.
This chapter reports the results of a survey study designed to examine early childhood educators’ knowledge, classroom practices, and classroom environments related to early literacy development. The research questions that guided the analyses focused on: (a) the knowledge base of early childhood educators regarding young children’s language and literacy development; (b) the classroom practices, including the classroom environment, of early childhood educators related to early language and literacy; (c) the relationship between early childhood educator’s knowledge of early language and literacy and their classroom practices; and (d) the relationship between early childhood educator’s knowledge of early language and literacy and their classroom environment.

Knowledge and Practices Related to Early Literacy

In the first phase of analysis, descriptive statistics were computed for items in each of the three main sections of the survey – knowledge, classroom practices, and environment.
Knowledge Related to Early Literacy

Table 3 reports the results for the items in the literacy knowledge section of the survey grouped by the four categories of early literacy described in Chapter Three. For each item, there were four possible answers, of which only one was the correct response. The table figures represent the percent of correct responses for each item. The mean percent correct for each category is also reported.

Examination of the responses revealed that participants had the highest percentages of correct responses in the area of storybook reading. This is not surprising because storybook reading is a very common literacy practice in early childhood classrooms. With the exception of one item related to writing attempts, the percentages of correct responses were also high in the category of early writing. Although the percentage of correct responses was high for several items in the print category, fewer than half of the participants responded correctly for items related to using print in everyday activities and concepts of print. Given that writing development has not traditionally been an area of focus in preschool classrooms, this result is also not surprising.
Table 3

*Literacy Knowledge – Percent of Correct Responses*

<table>
<thead>
<tr>
<th>Category</th>
<th>Item Concepts</th>
<th>Percent Correct</th>
</tr>
</thead>
<tbody>
<tr>
<td>writing</td>
<td>mean percent correct for category</td>
<td>65.4</td>
</tr>
<tr>
<td></td>
<td>early writing attempts</td>
<td>44.4</td>
</tr>
<tr>
<td></td>
<td>exploring uses of writing</td>
<td>81.5</td>
</tr>
<tr>
<td></td>
<td>symbols represent meaning</td>
<td>62.1</td>
</tr>
<tr>
<td></td>
<td>ways to encourage early writing</td>
<td>67.2</td>
</tr>
<tr>
<td></td>
<td>beginning writing attempts</td>
<td>71.6</td>
</tr>
<tr>
<td>print</td>
<td>mean percent correct for category</td>
<td>54.9</td>
</tr>
<tr>
<td></td>
<td>functions of print</td>
<td>67.2</td>
</tr>
<tr>
<td></td>
<td>rel between oral and written language</td>
<td>74.2</td>
</tr>
<tr>
<td></td>
<td>understand how print works</td>
<td>57.6</td>
</tr>
<tr>
<td></td>
<td>using print in everyday activities</td>
<td>40.6</td>
</tr>
<tr>
<td></td>
<td>print concepts</td>
<td>34.8</td>
</tr>
<tr>
<td>storybook</td>
<td>mean percent correct for category</td>
<td>72.9</td>
</tr>
<tr>
<td></td>
<td>reading as every day activity</td>
<td>86.4</td>
</tr>
<tr>
<td></td>
<td>importance of book corner</td>
<td>86.4</td>
</tr>
<tr>
<td></td>
<td>interactive story reading</td>
<td>58.1</td>
</tr>
<tr>
<td></td>
<td>vocabulary development</td>
<td>53.0</td>
</tr>
<tr>
<td></td>
<td>vocabulary and reading</td>
<td>80.6</td>
</tr>
<tr>
<td>alphabet</td>
<td>mean percent correct for category</td>
<td>53.6</td>
</tr>
<tr>
<td></td>
<td>alphabetic principle</td>
<td>87.7</td>
</tr>
<tr>
<td></td>
<td>letter knowledge activities</td>
<td>47.0</td>
</tr>
<tr>
<td></td>
<td>rel between letters &amp; names</td>
<td>47.0</td>
</tr>
<tr>
<td></td>
<td>age of letter name knowledge</td>
<td>83.6</td>
</tr>
<tr>
<td></td>
<td>identify letters by sound features</td>
<td>32.8</td>
</tr>
</tbody>
</table>

The area where the early childhood educators demonstrated the lowest percentages of correct responses was in alphabetic understanding, where there was also
the widest range of correct responses across the items. A high percentage of participants responded correctly on items related to the alphabetic principle and letter names, but fewer than half answered correctly on items related to letter knowledge activities and the relationship between letters and letter names. This variance in alphabet knowledge is somewhat surprising because exposure to the alphabet and alphabet related activities are also common activities in preschool classrooms. This finding suggests that even in areas of early literacy which have traditionally been emphasized in early education, teachers may still be in need of further knowledge and understanding about supporting that literacy development.

Classroom Practices Related to Early Literacy

Table 4 reports the results for the items in the classroom practices section of the survey, grouped by category as described in Chapter Three. For each item, respondents were asked to rate how often they used that literacy practice in their classroom. There were four possible choices for each item, from “none” (1) to “daily” (4). The table figures represent the mean frequency rating for each item, as well as the mean rating score for each category of items.
Table 4

*Classroom Practices – Mean Frequency Rating*

<table>
<thead>
<tr>
<th>Category</th>
<th>Item Topic</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Storybook</td>
<td>draw pictures and tell story</td>
<td>2.84</td>
</tr>
<tr>
<td></td>
<td>retell familiar story</td>
<td>3.21</td>
</tr>
<tr>
<td></td>
<td>discuss words' meanings</td>
<td>2.96</td>
</tr>
<tr>
<td></td>
<td>read books independently</td>
<td>3.85</td>
</tr>
<tr>
<td></td>
<td>whole group book reading</td>
<td>3.78</td>
</tr>
<tr>
<td></td>
<td>one-one or small group read</td>
<td>3.64</td>
</tr>
<tr>
<td></td>
<td>mean score for category</td>
<td>3.38</td>
</tr>
<tr>
<td>Print</td>
<td>find letters in words</td>
<td>2.78</td>
</tr>
<tr>
<td></td>
<td>point to print as you read</td>
<td>3.55</td>
</tr>
<tr>
<td></td>
<td>take dictation</td>
<td>2.90</td>
</tr>
<tr>
<td></td>
<td>mean score for category</td>
<td>3.07</td>
</tr>
<tr>
<td>Alphabet</td>
<td>name letters</td>
<td>3.28</td>
</tr>
<tr>
<td></td>
<td>sing alphabet song</td>
<td>3.25</td>
</tr>
<tr>
<td></td>
<td>demonstrate letter forms</td>
<td>2.79</td>
</tr>
<tr>
<td></td>
<td>point out letters in books</td>
<td>3.36</td>
</tr>
<tr>
<td></td>
<td>mean score for category</td>
<td>3.17</td>
</tr>
<tr>
<td>Writing</td>
<td>write letters or words</td>
<td>3.09</td>
</tr>
<tr>
<td></td>
<td>help a child write</td>
<td>2.77</td>
</tr>
<tr>
<td></td>
<td>model writing</td>
<td>3.12</td>
</tr>
<tr>
<td></td>
<td>mean score for category</td>
<td>2.99</td>
</tr>
</tbody>
</table>

In all four areas of practice, the mean scores of the items indicate that participants engage in many practices known to support early language and literacy development from several times a month to one-to-two times per week. As with the knowledge items above, the highest practice frequencies were reported in the area of storybook reading, particularly for items that reflected traditional activities such as reading or looking at
books independently every day (86%) or daily whole-group book reading (79%). These were the only practices that a large majority of participants reported using daily. The percentages of participants reporting daily use were lower for items related to storytelling (26.9%), retelling (43%) or discussing word meanings (31.3%), despite the fact that research supports the importance of these strategies in children’s developing literacy knowledge. The means for practices in the category of writing were the lowest, though even for these items participants, on average, reported using these practices one-to-two times per month or more. These results indicate that the teachers were using a range of literacy practices on a regular basis, though the most frequently used strategies were still related to traditional early literacy behaviors such as story reading.

Elements of Classroom Environments Related to Early Literacy

Table 5 reports the results for the items in the classroom environment section of the survey, grouped by category as described in Chapter 3. For each item, respondents were asked to indicate either “yes” (1) or “no” (2) as to whether that particular aspect of literacy was present in their classroom environment. The table figures represent the percent of “yes” responses for each item as well as the mean percent “yes” for each category.
Table 5

*Classroom Environment – Percent of Yes Responses*

<table>
<thead>
<tr>
<th>Scale</th>
<th>Item Topic</th>
<th>yes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Storybook</td>
<td>area just for book reading</td>
<td>91.0</td>
</tr>
<tr>
<td></td>
<td>books range in difficulty</td>
<td>88.1</td>
</tr>
<tr>
<td></td>
<td>more than 25 books</td>
<td>94.0</td>
</tr>
<tr>
<td></td>
<td>some factual books</td>
<td>95.5</td>
</tr>
<tr>
<td></td>
<td>books in all areas</td>
<td>56.7</td>
</tr>
<tr>
<td></td>
<td>recorded books or stories</td>
<td>68.7</td>
</tr>
<tr>
<td></td>
<td>mean percent “yes” for category</td>
<td>82.3</td>
</tr>
<tr>
<td>Print</td>
<td>cards with familiar words</td>
<td>82.1</td>
</tr>
<tr>
<td></td>
<td>examples of environmental print</td>
<td>79.1</td>
</tr>
<tr>
<td></td>
<td>examples of dictated writing</td>
<td>71.6</td>
</tr>
<tr>
<td></td>
<td>puzzles with words</td>
<td>73.1</td>
</tr>
<tr>
<td></td>
<td>mean percent “yes” for category</td>
<td>76.5</td>
</tr>
<tr>
<td>Alphabet</td>
<td>alphabet visible in room</td>
<td>86.6</td>
</tr>
<tr>
<td></td>
<td>alphabet letter shapes</td>
<td>88.1</td>
</tr>
<tr>
<td></td>
<td>alphabet puzzles</td>
<td>92.5</td>
</tr>
<tr>
<td></td>
<td>mean percent “yes” for category</td>
<td>89.1</td>
</tr>
<tr>
<td>Writing</td>
<td>templates for letters</td>
<td>76.1</td>
</tr>
<tr>
<td></td>
<td>variety of paper and writing tools</td>
<td>100.0</td>
</tr>
<tr>
<td></td>
<td>area for writing</td>
<td>84.8</td>
</tr>
<tr>
<td></td>
<td>examples of children's own writing</td>
<td>82.1</td>
</tr>
<tr>
<td></td>
<td>writing tools in other centers</td>
<td>77.6</td>
</tr>
<tr>
<td></td>
<td>mean percent “yes” for category</td>
<td>84.1</td>
</tr>
</tbody>
</table>

Examination of the results in Table 5 revealed a slightly different pattern in environment items than what was found in the knowledge and practices items. While the scores for storybook knowledge and story practices were the highest areas in knowledge and practices, in the environment category, the “yes” responses were the highest for items
pertaining to the alphabet. Except for the item related to “variety of writing tools,” the percentages of “yes” responses were lowest for items in the writing category. However it should be noted that across all the items, with one exception, the lowest percentage of “yes” responses for any item was 68%. As these results illustrate, a majority of the ECEs have classrooms where all of these important aspects of early language and literacy development are represented in the environment. It is interesting to note that the item with the lowest percentage of “yes” responses was in the storybook category, with only 57% of participants indicating that they have books in all areas of the classroom.

In summary, most ECE participants in this study reported frequent use of a variety of classroom practices related to early literacy, though these tended to be higher in traditional areas of early literacy such as alphabet and story reading. A similar pattern was found with respect to elements of literacy in the classroom environment.

Relationship between Literacy Knowledge and Classroom Practices

In the second phase of analysis, correlations were computed to examine the relationship between ECE teachers’ early literacy knowledge and: (a) their classroom practices and (b) their classroom literacy environment. First, overall score variables were derived for knowledge, practices, and environment. For knowledge, overall scores for respondents were derived by summing the number of correct responses for each respondent across all the items in that section of the survey. For practices, overall scores were computed as a mean of the responses across all the items in that section of the
survey. For environment, overall scores for respondents were derived by summing the number of “yes” responses for each respondent across all the items in that section of the survey. Two-tailed bivariate correlations were then computed between these overall score variables; these are reported in Table 6.

**Table 6**

*Correlations - Literacy Knowledge, Classroom Practices and Environment*

<table>
<thead>
<tr>
<th>Pair</th>
<th>Correlation</th>
<th>Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>knowledge – practices</td>
<td>0.02</td>
<td>0.85</td>
</tr>
<tr>
<td>knowledge – environment</td>
<td>-0.11</td>
<td>0.37</td>
</tr>
<tr>
<td>practices – environment</td>
<td>0.46</td>
<td>&lt; 0.001</td>
</tr>
</tbody>
</table>

Of the three correlations computed, only one reached significance. As illustrated above, there was a significant positive correlation between the ECEs’ classroom practices and their classroom literacy environments. It is perhaps not surprising that teachers who make frequent use of practices that support early literacy also provide a high number of environmental supports for early literacy. What is somewhat surprising is the lack of relationship between teachers’ knowledge level and either their practices or their environment. Because in this study both practices and environment scores were relatively high regardless of the teachers’ knowledge level, it remains unclear whether and how
ECE teachers’ knowledge affects their practices. The following chapter provides a further discussion of these results.
This study investigated early childhood educators’ knowledge, classroom practices, and classroom environments related to early literacy development. The following chapter presents a discussion of the findings pertaining to the four research questions of interest: (a) the knowledge base of early childhood educators regarding young children’s language and literacy development; (b) the classroom practices, including the classroom environment, of early childhood educators related to early language and literacy; (c) the relationship between early childhood educator’s knowledge of early language and literacy and their classroom practices; and (d) the relationship between early childhood educator’s knowledge of early language and literacy and their classroom environments. Finally, directions for further research and recommendations for practice are discussed.

Knowledge and Practices Related to Early Literacy

Two primary goals of this study were to (a) gain a better understanding of the knowledge base of early childhood educators (ECEs) regarding the development of early language and literacy skills in young children and (b) determine what classroom practices ECEs engaged in to support the development of these skills. As discussed previously in the review of the literature, research clearly indicates children’s early experiences with
language and literacy lay the foundation for their future success in school (Burgess et al., 2001; Gambrell & Mazzoni, 1999; Whitehurst & Lonigan, 1998). In light of the fact that many young children do spend at least some time in an early childhood program (Early et al., 2007) it is important that ECEs learn how to promote the development of such skills. It would seem that doing so not only requires a strong knowledge base regarding the components of early literacy development but also the ability to translate this knowledge into classroom practices, including the design of the early learning environment.

**Teachers’ Early Literacy Knowledge**

Descriptive analyses provided an interesting picture of ECE teachers’ knowledge base in four categories of early literacy development: storybook knowledge, alphabet letter knowledge, print awareness, and emergent writing. Results indicate that across these four domains, the knowledge base of the participants was varied. This finding is consistent with previous studies of K-12 teachers in which researchers have found that despite their education level and teaching experience, many educators do not have a sufficient understanding of the skills that contribute to children’s emerging literacy development (Cunningham et al., 2004; Mather et al., 2001; Spear-Swerling et al., 2005).

In general, the area where participants seemed to have the most knowledge, based on the percentages of correct responses given, was in the area of storybook knowledge. This was the only area where at least 80% of the participants provided the correct response for the majority of the questions in the subscale, including the question related to the importance of reading being an everyday activity. Given the traditional importance of storybook reading in most preschool programs, this is not surprising. However,
knowledge in this area was not high for all items in this subscale. For example, only slightly more than half (58%) of the ECEs could define “interactive storybook reading.”

The lowest scores on the knowledge scale were seen in the area of alphabetic understanding. Despite the fact that exposure to the alphabet and alphabet related activities tend to be common in the early childhood classrooms, this finding suggests that ECEs still do not have a clear understanding of why these practices are important. This lack of understanding is troubling, because research indicates that the best predictor of children’s reading success in school is their knowledge of letter names (Grambrell & Mazzoni, 1999; Roberts, 2003; Whitehurst & Lonigan, 1998). As Roberts and Neal (2004) noted, once children start to connect letters with sounds, they need a foundation of alphabet letter knowledge. Children who lack this letter knowledge are less likely to make connections to the appropriate letter sounds (Whitehurst & Lonigan).

Although all of the teachers had some base of knowledge about early literacy, the variations in the percent correct across the knowledge items indicates that there were still gaps in their understanding. These gaps in knowledge may be due to their teacher preparation, since studies have shown that preschool teachers are in general less well prepared in the area of literacy than are K-12 teachers (Bellm et al., 2004; Maxwell, et al., 2006; Sacks & Ruzzi, 2005). Or it may be that preparation programs for preschool teachers are continuing to focus on the traditional areas of early literacy where teachers scored the highest and giving less attention to areas of literacy which the recent research has identified as important to children’s literacy development.
Teachers’ Early Literacy Practices

Despite the variations noted above in the ECE teachers’ knowledge about the four areas of early literacy development addressed in this study, their reported classroom practices related to literacy were generally high in all four areas. Not surprisingly, the most frequent practices were traditional ones such as naming letters or storybook reading. These activities are found in most preschool classrooms and are known to have a positive impact on children’s literacy skills (Dickinson & Smith, 1994; Whitehurst et al., 1994). The ECE teachers reported slightly lower frequencies for other, perhaps less traditional, practices such as discussing word meanings daily during story reading, or taking written dictation, even though the research confirms their efficacy in supporting children’s literacy development (Dickinson & Smith; Whitehurst et al.).

Literacy in the Classroom Environment

Previous research has shown that children engage in a higher number of literacy activities when literacy materials, such as books, paper, and writing implements, are readily available to them (Morrow, 1990). As with the literacy practices discussed above, despite variations in their knowledge base, ECE teachers reported a relatively high number of environmental supports in all four areas included in the study. Unlike practices, the highest percentages in the environment were seen for items pertaining to the alphabet. This is not surprising as it is common practice for preschool classrooms to have alphabet puzzles, alphabet posters, and other related materials.
Literacy Knowledge in Relation to Classroom Practices

Analyses in this study also examined whether there was a relationship between the ECE teachers’ knowledge of early literacy and the frequency of their literacy related classroom practices. It was hypothesized that early childhood educators who had a greater knowledge base in early language and literacy would engage in more frequent teaching practices that support early language and literacy development, and they would have classrooms with a greater number of environmental supports for children’s emerging language and literacy development. These hypotheses were not supported; no significant positive relationships were found. As has been noted in the discussion above, teachers’ knowledge base scores were somewhat lower and more varied than their reported frequencies for classroom practices and environment. Thus it remains unclear whether and how teachers’ knowledge affects their practices. Because the teachers’ classroom and environmental practices related to literacy were fairly frequent overall, it appears that a lack of knowledge does not prevent them from engaging in a range of practices that support language and literacy development.

Considering the overall high frequencies reported in the descriptive analyses for both classroom practices and environment, it is not surprising that a positive correlation was found between these two scales. Teachers who reported a high rate of classroom practices related to literacy also reported high frequencies of literacy related materials in their classroom environments. Because there was no relationship between these high rates of literacy practices and the teachers’ level of literacy knowledge, it cannot be assumed
that a teachers’ knowledge base in early literacy will determine her use (or lack of use) of supportive literacy practices. But the fact that these teachers were using a number of these practices leads to the question of where and how they acquired this “practice” knowledge. Although this was not a question considered in the current survey instrument, there are several interesting possibilities worth examining. Because a majority of the teachers had some college level coursework in early education or child development (69% below B.A. and 13% at B.A.), it can be postulated that they had received some exposure to topics related to early literacy. Results in this study, however, suggest that this exposure may have focused more on ideas for practice based activities rather than building teachers’ theoretical and developmental knowledge. Perhaps teachers received information about early literacy practices in workshops or inservice training. With the use of commercial curriculum materials becoming more widespread among early childhood programs, teachers may be simply implementing suggestions for practice included in these curricula without fully understanding why these practices are sound. These are questions to be considered further in future research.

Another interesting question that remains to be considered is whether teachers can engage effectively in practice without an understanding of the mechanisms behind those practices. In this study, teachers were only surveyed as to their self reported frequencies of identified early literacy practices; no data were collected as to the quality of those practices. Additional observational research is needed to determine whether levels of knowledge are related to quality, and not just quantity, of literacy practices. Do preschool teachers who report using these practices to support children’s early literacy understand
the importance, or the theoretical foundations, of the practices they are using? Are they able to make some connection between these practices and their understanding of early literacy development, or are they just implementing what they accept as common practices in a preschool classroom? Given the gaps identified in their knowledge base, the latter is perhaps more likely.

Recommendations for Practice

Findings in this study suggest two important directions for examining current practices related to early literacy in the ECE classroom, the first regarding teachers and the second regarding the curriculum. With respect to teachers, the results generated in this study of ECE teachers provide some guidance for expanding teachers’ knowledge base and improving their classroom practices. Because the teachers’ scores on the knowledge scale indicated some gaps in their understanding of children’s literacy development, one remedy would be to strengthen ECE teachers’ knowledge in this area, whether through expanded course work in their preparation programs or through quality inservice training focused on early literacy. In this study there was not clear evidence of links between teachers’ knowledge and their practices. Therefore an important element of this training or inservice would be a focus on helping teachers reflect on the links between their knowledge about early literacy and their choice of classroom practices. In other words, teachers need to become thoughtful practitioners, who understand how to
provide supportive classroom literacy practices as well as to understand why their
selected practices are supportive.

Although it was not a focus of this study, curriculum is an important factor in
determining the environment and practices in the preschool classroom, and thus remains
an area of focus for improving practice. This is particularly critical in preschool settings,
where curriculum can range from a developmental, play based model, to a more
academic, standards driven model, to a less formal model where the teacher is designing
the curriculum herself, or, in some cases, to no defined curriculum at all. Thus there is
little consistency as to whether and how early literacy is even a part of the ECE
curriculum. Therefore, attempts to improve practices related to literacy must also include
scrutiny of curriculum to insure that appropriate goals and practices for literacy practices
are included. For example, curriculum should set age appropriate learning outcomes for
children in all areas, not just in the traditional areas usually included. Second, these goals
should be supported by a range of practices which have been shown in the research to be
effective. Finally, curriculum must also incorporate newer strategies and understandings
from more recent early literacy research, which teachers and curriculum may not be as
aware of.

Directions for Future Research

Results in this study help to provide a more complete understanding of ECE
teachers’ early literacy knowledge and practices. As noted in the discussion above, the
limitations and design of this study and the findings herein raise additional questions for future research. These questions focus on two major areas to be examined: a) “how” and “why” questions about ECE teachers’ literacy knowledge and practices; and b) the role of other factors as an influence upon knowledge and/or practices.

A first question would be to examine how ECE teachers are using early literacy practices in their classrooms. Because this survey study did not involve classroom observation, it is not clear how the ECE teachers actually implemented the early literacy practices they reported. This is an important question, since research has noted that the quality of literacy experiences has an impact on children’s literacy knowledge (Hargrave & Sénéchal, 2000). Next, it is important to understand why ECE teachers are using the practices they reported. Do they understand the value of practices such as repeated story reading in building children’s literacy skills, or are they merely carrying out practices traditional to the early childhood classroom context? In other words, are there any connections between ECE teachers’ literacy knowledge and practices, subtler connections not uncovered in this type of study that might be identified in a study using, for example, in depth interviews with teachers about their knowledge, beliefs and practices?

Finally, future research must include an examination of what other factors may influence ECE teachers’ knowledge and practices related to early literacy. Although this study included ECE teachers in a variety of programs with a wide range of education and experience, these factors were not considered in either the research questions or the analyses in this research. But they may all play a critical role in shaping an ECE teacher’s practices and knowledge base. For example, do ECE teachers with a B.A. degree exhibit
differences in their early literacy knowledge and practices as compared with those teachers having a more limited set of college level courses? Similarly, do teachers with more years of experience have a stronger knowledge base, and do their classroom practices differ from teachers who are newer to the ECE classroom? Finally given the variation in program structure in the ECE field, and the differences in philosophy across programs, it would be important to include program type as a factor for study. Do ECE teachers in publicly funded programs approach early literacy in a different way as compared to ECE teachers in private programs? Are there differences between more traditional preschool programs and all day child care programs, or even family day care programs? Besides program philosophy, curriculum is another factor to be considered. Is there a commercial program that the ECE teacher is following? Does the ECE teacher design her own curriculum? This question is of particular interest given the gap seen in this study between ECE teachers’ mixed knowledge base and their use of practices that support literacy development.

Although the current study has provided encouraging evidence that ECE teachers are engaging in a variety of practices that support children’s early literacy development, the mixed findings with respect to their knowledge base about literacy suggest that the complex relationship between ECE teachers’ knowledge and practices requires further study. Developing a clearer understanding of these complex relationships and of other factors that shape ECE teachers’ knowledge and practices is critical to providing children with the ECE classroom environment and experiences that will best support their emerging literacy in the early childhood years.
APPENDIX A

Early Educators’ Knowledge and Practices Related to Early Literacy Questionnaire
Early Educators’ Knowledge and Practices Related to Early Literacy

The purpose of this survey is to help us understand the literacy knowledge and practices of early educators. The survey asks questions about your educational background, your classroom or home child care setting, your knowledge about early literacy and your teaching practices. Your answers to these questions are confidential and will not be shared with anyone. Thank you for your time.

PART I: PERSONAL INFORMATION

Please provide the following information about your background and preparation for teaching:

1. Please circle the item that best describes you:
   1. African-American
   2. Native-American
   3. Asian American
   4. Caucasian
   5. Hispanic/Latino
   6. Eastern European (e.g. Russian, Ukrainian)
   7. Other__________________________________

2. Number of years you have spent teaching children ages 3-5:_____________________

3. In what type of child care setting do you currently work? (circle one):
   1. Early Head Start
   2. Head Start
   3. Child care center (not head start)
   4. Family/group/home child care setting
   5. Other type of preschool (for example, church-based preschool)_____________

4. Circle the number in front of the highest level of education that you have completed (circle only one):
   1. Some college level child development courses
   2. Some college level early childhood or teacher education courses
   3. An Associate degree program in child-care or early childhood education
   4. Special non-degree program related to early childhood education (e.g., Montessori training)
   5. A four-year BA or BS program
   6. A master’s degree program
   7. Education specialist degree
   8. A Doctoral degree

5. Please list the names (be specific) of all the formal (semester-or quarter-long college classes) courses you have had in early literacy development, language development, reading or language arts:
   __________________________________________________________________________
   __________________________________________________________________________
6. Please list any professional development or continuing education workshops or classes you have taken related to early literacy development, language development, reading or language arts:
________________________________________________________________________
________________________________________________________________________

PART II: KNOWLEDGE BASE

Multiple Choice

DIRECTIONS: Please carefully read each of the following multiple choice questions. Circle only one answer from the choices provided to you for each question. If you are unsure of the right answer, please make your best guess. This is designed to assess the current knowledge base of teachers so please do not use other resources (such as books or colleagues) to answer the questions.

7. Encouraging children’s early writing attempts is important because:
   a. It improves children’s spelling skills.
   b. It helps children understand how sounds relate to letters.
   c. It improves children’s thinking skills.
   d. It helps them develop good handwriting skills.

8. Placing menus with pictures and print in the dramatic play center may support young children’s:
   a. Ability to identify sounds.
   b. Awareness of the functions of print.
   c. Letter knowledge.
   d. Ability to write words.

9. Ms. Jones, a preschool teacher, places a variety of books in all centers throughout her child care setting. For example, in the kitchen play area she has a selection of simple cookbooks. In the art center, she has several art books. She has some newspapers and magazines in the dramatic play center, and brings a basket of nature and insect books with her when she takes the children outdoors. In what way does this support early reading development for young children?
   a. It helps children learn to think about reading as an important part of their daily activities.
   b. It ensures that children will spend at least an hour each day reading.
   c. It gives children more situations in which they must read to do certain activities.
   d. It prevents children from becoming too dependent on Mr. Jones for information and guidance.
10. Children who are emergent writers benefit most from opportunities to:

   a. Explore the uses of writing for communicating with others.
   b. Learn how to form upper and lower-case letters.
   c. Copy the texts of favorite story books.
   d. Write letters on lined paper.

11. Between the ages of 1 and 5, children learn to use symbols like marks on paper and pictures in their play to:

   a. Manipulate objects and understand them.
   b. Create and communicate meaning.
   c. Learn to differentiate media.
   d. Describe the roles of a writer and reader.

12. Four-year-old Sarah has drawn a picture. As Sarah tells her about the picture, the teacher writes down her words, and then reads it back to her. This activity promotes literacy development by:

   a. Helping the child learn more about narratives and their structure.
   b. Reinforcing the child’s understanding of the parts of a story.
   c. Increasing the child’s awareness of the relationships between written and oral language.
   d. Expanding the child’s understanding that there are many ways to write letters.

13. The alphabetic principle is best described as the understanding that:

   a. Sounds in words can be represented by letters.
   b. Letters are formed from curved and straight lines.
   c. There are many different alphabets in the world.
   d. The sounds we speak are different from the letters we write.

14. Which of the following is the most effective way to encourage young children to go to a cozy corner book area more often during free choice time?

   a. Reward children who choose to go to the area during free choice time.
   b. Structure 20 minutes of independent reading time each morning.
   c. Create an attractive area with open faced bookshelves.
   d. Provide at least 50-100 books in the area.

15. All of the following activities are appropriate for promoting letter knowledge EXCEPT:

   a. Singing the alphabet song.
   b. Playing with alphabet puzzles.
   d. Handwriting.
16. All of the following are important ways to encourage preschoolers’ early writing EXCEPT:

a. Encouraging correct spelling.
b. Taking dictation for children unwilling to write.
c. Displaying children’s writing around the room.
d. Having a designated writing area equipped with crayons, pencils, stencils, and several types of paper.

17. Interactive storybook reading means that:

a. Children are encouraged to read along with their peers.
b. Children are encouraged to predict what comes next in a story.
c. Children have opportunities to read aloud.
d. Children get to act out the story.

18. Which of the following practices might best help children learn how letters are related to their letter names?

a. Matching pictures and beginning sounds.
b. Singing the alphabet song slowly and pointing to each letter.
c. Asking children to spell the letters of their name.
d. Saying the letters of the alphabet out of order.

19. During group time, Ms. Betty reads a book to her 5-year-olds. As she reads, she runs her finger along the text. Why does she do this?

a. To help children connect sounds and letters.
b. To keep children’s attention.
c. To help children understand how print works.
d. To improve children’s letter knowledge.

20. All of the following instructional activities improve children’s understanding of how we use print in daily activity EXCEPT:

a. Creating a print-rich environment.
b. Copying simple words.
c. Writing a menu.
d. Reading a recipe.

21. Which of the following activities best promotes vocabulary development?

a. Reading a story.
b. Writing.
c. Talking.
d. Watching television.
22. Which of the following statements best describes how print works in storybooks?

   a. Print is just like oral language.
   b. Print is written by people.
   c. Print is read from left to right and top to bottom.
   d. Print is supplementary to the pictures in conveying the story.

**True and False**

**DIRECTIONS:** Please carefully read each of the following statements. At the end of each statement, please indicate whether you think the statement is True or False by circling the correct choice. If you are unsure of the correct answer, please make your best guess. In these questions, “Children” refers to preschool age children.

**CIRCLE ONE**

23. Children’s beginning writing attempts often look like block letters. True False

24. It is common for children to have letter name knowledge by age 4. True False

25. Children learn to sort and identify letters by their sound features. True False

26. Children’s vocabulary in the early years is a strong predictor of their later reading achievement. True False

**PART III: PRACTICES**

**DIRECTIONS:** Circle the number indicating how much time you spend on each of the following teaching practices:

**CIRCLE ONE**

<table>
<thead>
<tr>
<th>How much time do you spend having children:</th>
<th>Lots (daily)</th>
<th>Some (1-2x’s a week)</th>
<th>A little (1-2x’s a month)</th>
<th>None</th>
</tr>
</thead>
<tbody>
<tr>
<td>27. Name letters?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>28. Find letters in words?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>29. Draw pictures and then tell a story to go with the pictures?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>
30. Retell a familiar storybook?  & 4 & 3 & 2 & 1  
31. Discuss word’s meanings? & 4 & 3 & 2 & 1  
32. Write letters or words? & 4 & 3 & 2 & 1  
33. Read or look at books independently? & 4 & 3 & 2 & 1  

**CIRCLE ONE**

**How often do you:**

<table>
<thead>
<tr>
<th>Activity</th>
<th>Lots (daily)</th>
<th>Some (1-2x’s a week)</th>
<th>A little (1-2x’s a month)</th>
<th>None</th>
</tr>
</thead>
<tbody>
<tr>
<td>34. Engage in whole-group book reading with the children?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>35. Engage in one-to-one or small group book reading with the children?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>36. Point to the print on the page as you read to children?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>37. Write down children’s dictation and read it back to them?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>38. Help a child write (e.g. you answer questions about how something is spelled or show a child how to form a specific letter)?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>39. Model writing (e.g. you draw attention to the act of writing by spelling out or sounding out each word or letter that you write)?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>40. Sing the alphabet song with children?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>41. Demonstrate how to form letters?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>42. Point out letters in books, stories, or other forms of print?</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>
PART IV: CLASSROOM OR HOME CARE SETTING LITERACY ENVIRONMENT

Directions: Please answer the following questions about your classroom or home care literacy environment.

43. Is there an area set aside just for book reading? Yes No
44. Do the books available to children provide a range of difficulty levels? Yes No
45. Are there 25 or more books available to children? Yes No
46. Do some of the books contain factual information (e.g. science or math related books, social studies books, books about other cultures, or health-related books)? Yes No
47. Are there books available in all areas of the room (e.g. the science, dramatic play, and block area)? Yes No
48. Is there a place for children to listen to recorded books/stories? Yes No
49. Is the alphabet visible? Yes No
50. Are there word cards with names or familiar words (e.g. cards with children’s names or cards with familiar words posted next to the writing area)? Yes No
51. Are there examples of environmental print in different areas of the classroom or home care environment (e.g. menus with print in the dramatic play area, maps in the block area)? Yes No
52. Are there templates available to help children form letters? Yes No
53. Are there a variety of paper and tools (3+ kinds each) available for writing (e.g. construction paper, white lined paper, tracing paper, pencils, markers, crayons, a chalkboard, a whiteboard, rubber stamps, etc.)? Yes No
54. Is a distinct area set up and functioning for writing? Yes No
55. Are there examples of children’s dictated writing on display in the classroom or home care setting? Yes No
56. Are there a variety of alphabet letter shapes available for children to experiment with (e.g. plastic magnets, play dough molds, sandpaper letters, etc.)? Yes  No

57. Are there examples of children’s own writing on display in the classroom or home care setting? Yes  No

58. Are there writing tools (e.g. pencils, paper, etc.) and props that prompt children to write (e.g. clipboards, telephones, menus, etc) in the dramatic play or block area? Yes  No

59. Are there alphabet puzzles available for children’s use? Yes  No

60. Are there puzzles with words available for children’s use? Yes  No

THANK YOU!
REFERENCES


