

Educating the Young Child 9

Advances in Theory and Research, Implications for Practice

Louise Boyle Swiniarski *Editor*

World Class Initiatives and Practices in Early Education

Moving Forward in a Global Age



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World Class Initiatives and Practices in Early Education

EDUCATING THE YOUNG CHILD

VOLUME 9

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Moving Forward in a Global Age

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Foreword

The landscape for early years and primary education has undergone a vast amount of change since Margaret McMillan, the founder of nursery school education, exasperated by the British state education practices of the early twentieth century, opined:

The state compels the children to work [in school]. It makes the demand for sustenance urgent, intolerable. But it does not compel parents to feed their children. Hence it is certain to some of these hungry little ones, free education is less of a boon than an outrage. Mansbridge (1932, pp. 41–42)

But what would McMillan find if she returned to early twenty-first century early years education? Certainly, she would be unlikely to walk into a classroom full of sleepy, infested, hungry children! However, she would find state education systems that are still immersed within cultures that are geared more to the perceived needs of government and state than to those of the developing child. When nations' education systems are compared, the focus on conditioning citizens to fit into a particular conception of society rather than providing a flexible learning environment for developing human beings is a particularly prevalent characteristic of the education systems within nations; this will become increasingly clear to the reader who reads through the chapters in this book.

The “global village” of the twenty-first century has created a situation that would be beyond McMillan's frame of reference, but which is becoming increasingly prevalent within early years settings worldwide as exemplified by the need to address multicultural aspects of education and care. Such exemplars are discussed in Part II of the book, *Curriculum Initiatives for Early Childhood Programs in a Global Age*, by Michelle Pierce in her chapter on dual language education in Chile, on gender education in science classrooms for primary children in Wales by Cleiti Cervoni, on early language development in Britain by Avril Brock, and early education innovative approaches in China by Yaoying Xu and Bin Liu. Within some nations, early years education may initially have to defend its very existence in a debate which encompasses “the polarizing positions for and against preschool education,” explored by Louise Swiniarski in the very first chapter of this book and discussed in

different frames throughout the chapters which follow Part I, *The Evolution of Universal Preschool Education in a Global Age*. But it is only when the case for early years education is finally accepted by national governments that the more intricate battle may subsequently emerge. This endeavor is clearly articulated by Pat Broadhead in her account of quite heated discussions between early years educators and politicians in England alongside Mary-Lou Breitborde's examination of new partnerships for early education as developed in the Readiness Centers of Massachusetts in Part III, *Beyond the Walls of the School and Center*.

The machine of governance, particularly in periods of austerity, is prone to operate on the basis that its tax money should be paying teachers and other early years practitioners to be "doing something," most particularly something that can be clearly demonstrated to immediately benefit the state. The chapters in this book highlight differences between nations rooted in the extent to which policy makers have listened to early years researchers, theorists, and educators and the emergent results. For example, a vast difference can be viewed between the Reggio Emilia program in Northern Italy, developed in the aftermath of World War II on a platform of education for freedom and democracy, and the English Early Years Foundation Stage, which emerged from a narrow set of government-sponsored initiatives undertaken since 1997 as noted in Chap. 1. This book therefore emerges onto the world stage at a highly opportune moment, to provide some "food for thought" to all cultures and nations.

In conclusion, although more than a century has passed since Margaret McMillan blazed her reforming trail through nursery education, twenty-first-century early educators could very easily update her plea to policy makers to provide an education based on what educators know about human development. Children are born not only willing to learn but programmed to actively seek out learning opportunities. The role of adults in this, as consciousness of "self" and meta-cognition begin to flower in young children, is to support children in their joyful explorations, giving their thoughts and imagination wings to fly, rather than firmly tying them to the economic and political agenda of the government of the day. This book contains so many useful ideas for readers from all nations engaged in this endeavor. As such, I am delighted to have this opportunity to heartily recommend it to the reader.

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Pamela Jarvis

Reference

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Part I
Antecedents and Present Developments
in Universal Preschool Education

Chapter 1

The Evolution of Universal Preschool Education in a Global Age

Louise Boyle Swiniarski

Abstract This chapter introduces the notion of universal preschool education as an equitable option for public schools in a global age. Discussions around six essential questions identify the various definitions of universal preschool education, examine its genesis and historical antecedents, present current international trendsetting models, and consider challenges in promoting governmental support for furthering the goal of preschool for all in the United States. This chapter serves as an international and national overview of Part I Section of the book, which focuses on two states' efforts to further universal preschool education in the United States. The chapter also touches on international and national organizations, agencies, mandates, and concepts developed in the subsequent chapters of Parts II and III. The chapter seeks to address issues in early childhood practices, while it provides pathways to move early education forward in a global age.

Keywords Universal preschool education • Historical genesis • Organisation for Economic Co-operation and Development (OECD) • Kindergarten education • Froebel • Elizabeth Peabody • Mandates • Collaboration and alliances • No Child Left Behind • Race to the Top • Nordic nations • Great Britain • Germany • France • United States

What Is Universal Preschool Education?

Globally, universal preschool education (UPE) is a pressing topic in educational policies and practices. Many countries have had long-term commitments to the institution of early preschool education in both their public and private

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sectors. In some countries, preschool education is seen as an entitlement (Swiniarski 2007). Others are still entertaining notions of implementation of programs that are inclusive of all preschoolers. Generally agreed upon however is the definition that universal preschool education provides governmentally provided programs for all young children to age 6.

The research and findings of the Organisation for Economic Co-operation and Development (OECD), whose member nations represent the most highly successful economies in the world, have endorsed the UPE movement (Swiniarski 2006). OECD member nations are competing to offer the best educational opportunities for their citizens as insurance for future economic growth. The multiple editions of the OECD *Starting Strong* 2001 and *Starting Strong II* 2006 publications offer an analysis of international policies and issues that note the progress made by OECD recommendations. The recent 2012 version, *Starting Strong III*, provides a “toolbox” of practical information for promoting quality practices and programs to participating nations (OECD 2012, retrieved 12/31/12). Factors such as the world marketplace, international political alliance, trade agreements, and global corporate transactions have motivated governments to revamp their educational systems to include a comprehensive early education in their school systems as necessary for a viable education in the twenty-first century. OECD’s seminal report of 1996, *Lifelong Learning for All*, set these goals for an education in the twenty-first century as it stipulates:

It is widely recognized that the early years of education play a decisive role in the a child’s future, for they shape attitudes to learning and provide basic social skills that come into place in later school years...In OECD countries early education has increasingly become a public provision and thus an integral part of the service society. (OECD 1996, pp. 113–114)

The question then arises when is the best time to begin preschool or, in other words, at what age are governments responsible for funding the education of their young children. The age range for state-supported early education differs around the globe. It can begin at birth and extend to age 6 or 8. Some member countries boast a *Birth to Five*, a *Birth to Eight*, or a *Zero to Three* model beginning at birth or toddlerhood. The majority of the OECD member nations’ children start preschool education at age 2 or 3. Interestingly, the OECD report centers not on the importance of age entrance but on the kind of provisions made for young children to ensure quality programs that meet the challenges of this global age.

It is argued that better educational use could be made of the receptivity in very young children, and that certain elementary skills such as reading, singing and playing musical instruments can be fostered much earlier. The question is not whether provision should be organized for 2 to 6 year olds, but rather, what kind of provision would ensure school readiness. (OECD 1996, p. 114)

What Is the Genesis of Universal Preschool Education?

The antecedents for universal preschool education can be traced back to the writings of Plato’s work, *Laws*. In Book V11 Plato explicitly defined the roles of UPE, which he called a sanctuary, as the responsibility of public supervision. The sanctuary’s

lessons were to begin with prenatal care of the mother and continue with support of a nurse for parents to attend the child's development from birth. Plato further recommends that each community establish this sanctuary for children, ranging in age from 3 to 6, where children can interact with each other in organized and superintended play to promote not only cognitive growth but social and emotional development (Swinarski 1976). So the tradition of early education as a public commitment has an early genesis that can be traced to the glory days of Athens and tracked throughout history. It is Plato who is often credited with the quote, "As the tree is bent, so grows the tree," which has echoed through the ages.

What Are the Antecedents of the Universal Preschool Education Movement?

Froebel and the German Kindergarten

Plato's message has been carried on for centuries through educational discourse. His writings influenced Frederick Froebel's establishment of the nineteenth-century kindergarten movement. Between Plato and Froebel (1782–1852), there were many utopian writers who linked early education as the foundation stone of state-supported education. The Roman Orator, Quintilian (935–97 A.D.) promoted early education with hiring articulate nurses who modeled language development to keep a child from becoming accustomed to incorrect language patterns that in later years have to be unlearned (Power 1970). Noted scholar and clergyman, John Amos Comenius (1592–1670), wrote a guide for mothers, *The School of Infancy* (Power 1970). While his work had a limited readership of women educated sufficiently to read, it still became a classic reference that highlighted the important role of parenthood in a child's education, the significance of play as a cornerstone for teaching and learning, and the need to universally educate all children from birth before elementary school entrance at 7.

Undoubtedly, the German Kindergarten Movement, framed by Frederick Froebel, is the prototype for universal preschool education. Although influenced by German Idealism in his basic premise, that all children are naturally good, he identifies the role of education is to unfold that goodness and knowledge innate in all. Yet, Froebel preached caution. In his work, *The Education of Man*, he created a pedagogy that put play at the center of the curriculum with *prescribed* activities and materials. He contended that children need guidance to grow and develop. He placed children under the supervision of trained guides, who, in turn, would move children along in a progressive process before error diverted the good natural tendencies. Although he respected parental influence on a child's education, he wrote books to further assist families, particularly mothers, in the education of their young. In addition to home schooling in the early years, he wanted the children from ages 3 to 7 to be also under the care of educators trained in his methods. He developed a teacher education program exclusively for women to be the professionals in his *garden of children*,

the kindergarten. He felt women were naturally suited to guide the young and trained his staff of women to be these guides. His kindergarten ideals were disseminated internationally particularly by his followers who immigrated to the United States.

Elizabeth Palmer Peabody: The American Kindergarten Model

Much can be said of Elizabeth Palmer Peabody (1804–1894). She was an educator, activist, social reformer, writer, poet, publisher, and philosopher. By the time she became acquainted with the kindergarten movement, she brought to its cause not only a rich lifetime of experiences from these diverse roles but also a cadre of family members, friends, and colleagues whose ideas, ideals, and expertise influenced her role in pioneering early education throughout America.

As a young woman Elizabeth Peabody began a 20-year correspondence with William Wordsworth, Poet Laureate of Great Britain. His poetry shaped her notions of childhood and the philosophical assumptions upon which she implemented in the American kindergarten model. She was also influenced by others such as David Thoreau, Ralph Waldo Emerson, and Margaret Fuller, fellow Transcendentalists, the Bronson Alcott family and her own Peabody family who included her sisters, Mary and Sophia, and their husbands, Horace Mann and Nathaniel Hawthorne. Peabody's network provided vast connections that promoted the kindergarten movement beyond the doors of private schools to the public school arena.

In 1860, she established the first English-speaking American Kindergarten as a private school venture in Boston. Previous kindergartens were primarily in German-speaking enclaves for recent immigrant families settled throughout the United States. With her network in place, Elizabeth actively reformed American public education to include the kindergarten as the entrance class to public schooling. Along with Susan Blow and William Torrey Harris, then the Superintendent of Schools in St. Louis, Missouri, she campaigned successfully for tax-supported public kindergartens as established in 1873 for the St. Louis Public Schools. Funding included training kindergarten teachers to staff the classes and ensure the quality of education. These early kindergartens were for children from ages 3 to 7. The centers included parenting education as well as teacher training programs. The kindergarten programs evolved into community service providers when they later partnered with Settlement Houses to outreach all children and their families in needy urban communities and immigrant neighborhoods.

Along with Mary Mann, her sister and wife of Horace Mann, the founder of The Common Schools in Massachusetts, Elizabeth Peabody spread the word about the benefits and best practices for early education. Together, the sisters authored books, edited professional journals, and wrote parenting materials and early education texts. Promoting professionalism among practitioners, Elizabeth worked with William Torrey Harris to establish the American Kindergarten Union, based on the International Kindergarten Union (later to be known as the Association for Childhood Education International). An accomplished linguist, Elizabeth, translated Froebel and other relevant German

kindergarten theorists to network the kindergarten movement globally. She traveled across America and abroad in Europe to lecture on the movement and advocate for the education of the young child.

Keeping to Froebel's optimistic view of childhood and his universal principles for early education, Elizabeth placed her pupils under the skillful supervision of Froebelian-trained teachers that she named *kindergarteners*, whom she personally recruited to be her trainees. While she failed to persuade the famed author, Louisa May Alcott, to join the movement, she did enlist Kate Douglas Wiggin, a writer of children's literature; Lucy Wheelock, who would later found her own training college, Wheelock College; and Mary Garland, who established Garland College for women in Boston. A resourceful reformer, Peabody's ideas became embedded in early education practices that still resonate today. She promoted the extended day, multiage classes, parenting programs, professional development, and community outreach. Her kindergarten prefigured today's Full-Service School model.

Where Are International Trend Setting Models?

Great Britain

In the twentieth century, many European school systems established early education programs in their national schools. In Great Britain, building on the groundwork of Robert Owens' Infant Schools for urban children, ages 5–7, Margaret and Rachel McMillan opened nursery schools for toddlers to 4-year-olds in two of the most industrialized cities of England, London, and Bradford. The McMillan nursery schools initially were concerned with curtailing the high mortality rates of young children in Britain's cities during the Industrial Revolution of the early twentieth century. The initial centers provided basic physical care but gradually expanded their mission to promote cognitive and social development in nursery education. Gradually as a time-honored tradition, nursery schools became embedded in the English state local authority schools and beyond to those in its Commonwealth Nations such as Australia and New Zealand. However throughout Great Britain, the offerings remained sketchy and unequal. Around the end of the twentieth century, only an estimated 20 % of 4-year-olds in the United Kingdom attended local authority state nursery schools (Swiniarski 2007):

Nursery school expansion had been slow since the beginning of the century when Margaret McMillan in particular had campaigned for it and since local authorities were empowered to provide it under the 1918 Act. Some authorities made generous provision; others made none. (Lawson and Silver 1973, p. 459)

To continue this trend in 1997, Great Britain's Labour Party pushed through their Parliament provisions for universal education for all 3- and 4-year-olds. Since each young child has a right to preprimary education, grants are awarded to accredited state or private schools (Swiniarski 2007). The money follows the child. Parents

have the choice to place their child where there are openings (Swiniarski 2007). Subsequent chapters of this book will review the outcomes of this mandate, its successes and perceived failings.

France

France boasts a long tradition for providing universal preschool education in its *ecole maternelle*. Each municipality offers this schooling to all children beginning at age 3 to age 6, including 2-year-olds, who turn three within the academic year. Each *ecole maternelle* is available to children in their local community and in most neighborhoods. There is some choice for parents to send their children outside of their district, but they must petition their local authority to find or transfer to a suitable placement elsewhere. In small villages or towns, there is typically one *ecole maternelle*, while cities' offerings are dotted about community districts, wards, or *arrondissements*. Indeed, much like American families, many French parents select where to live based on the schools in their districts (L. Swiniarski, personal interview, March, 2011).

In France, the tradition of the *ecole maternelle* is distinct from the *crèche*, nursery or childcare center. The *ecole maternelle* is the entry level to school. It offers an academic curriculum beginning with 3-year-olds. One parent, who attended its equivalent in Belgium as a child, found the French *ecole* to be more demanding than what she remembers as a child. It has less playtime but does provide informal experiences in the extended day option for children of working parents. This mother selected the location of their home based on her assessment of its district's school. She expressed in a personal interview that her choice was a good one. She contended that her children appear very content in its setting, staffed by highly competent professional educators (L. Swiniarski, personal interview, March, 2011).

Italy

Italy gets many international raves for its early education opportunities in both its public model of the *Reggio Emilia Preschool* and its private Montessori *Casa dei Bambini*. The Reggio model is being replicated throughout the United States with National Association of Young Children endorsement. Like many European preschools, social constructivism is the pedagogy at center of the *Reggio Emilia* curriculum (Whitehead and Bingham 2011). Rebecca New (2001) recommended that "U.S. policy makers ...consider the widespread Italian option [as] high-quality early childhood programs.... desirable in an increasing pluralistic democratic society." Exemplary preschools have adopted Reggio's emphasis on art as the basis for successful project-based teaching/learning practices. However outside of Italy, many of these schools are in the private sector.

Montessori Schools were established universally in the private sector of early education since the early twentieth century. Today the Montessori Method has spread the movement's philosophy to public settings as well. In the United States, the Montessori Method was influential in the early development of Head Start models. Maria Montessori's work continues to influence emerging charter schools and urban public preschools with its promotion of a comprehensive methodology, her notion of children as autonomous learners, and her insistence on the involvement of families in the educational process of their children:

The model of the school in Montessori education...seems more like a miniature and eclectic university research laboratory. Montessori children pursue their own projects... choose what they want to learn... get lessons across the curriculum... pass on the fruits of their labors...[so]the child can be seen as a motivated doer. (Lillard 2005, pp. 28–29)

Nordic Nations

Generally, the Nordic nations provide preschool education under the umbrella of childcare from infancy through age 6. The nations include Denmark, Norway, Sweden, Finland, and Iceland. Each nation has its own regulations, curriculum, practices, and governmental support policies.

Finland

Finland is recognized as “the first country in the world where every child has the right to enter day care” (Swiniarski and Breitborde 2003, p. 68). In recent years the Finns have decentralized their administration of early education. Centers can be found in comprehensive schools or in purpose-designed centers under each municipality's management. All children have equal opportunity to attend a childcare program or preschool before entering the comprehensive school at age 7. Because of the Finnish children's success on comparative international assessments, educators around the world have flocked to Finland to uncover the reasons for its children's high levels of test scores on international assessments. The Finns link the test successes of their students in adolescence with their quality early education offerings.

The OECD Programme for International Student Assessment 2009 (PISA) results indicate that “fifteen year old students who had attended pre-primary education perform better on PISA than those who did not, even after accounting for their social-economic backgrounds” (PISA IN FOCUS 2011). Finland sustained consistently top scores in mathematics, science, and literacy on the OECD's PISA study of learning skills for 15-year-olds. The OECD assessment of 15-year-olds' achievement in reading, mathematics, and science is administered worldwide in OECD member and nonmember nations to determine the quality of educational systems internationally. The tests were first administrated in 2000 and again in 2009–2010.

Often Finnish educators are questioned on how their students maintain this level of success. They reply that the reasons are many. Finns typically cite that their teachers are highly qualified professionals in their fields, their students are not subjected to high-stakes testing, and children begin *formal* schooling at age 7 in their *mother tongue*. Furthermore, Finland has maintained a long tradition of equity in access to early education and care where play, language, and the arts are the basis of the early curriculum and balanced by goals of social and cognitive development. Academic instruction begins later at age 7 with the entrance into the comprehensive school level. Like all Nordic nations, Finland has a core curriculum that includes and guides preschool standards. The core curriculum and standards begin at the preschool level. The Finnish Core Pre-School Curriculum's pedagogy states the following:

Pre-school education shall build on the basic values of society....The role of pre-school education shall be to promote children's growth into humane individuals and ethically responsible membership of society by guiding them towards responsible action and compliance with generally accepted rules and towards the appreciation for other people. The core role of pre-school education shall be to promote children's favorable growth, development and learning opportunities...Preschool education shall guarantee equal opportunities for children to learn and start school. (National Board of Education in Finland 2001, p. 7)

Iceland

Iceland, while not situated on the European continent, is a member of the Nordic nations. Once under the rule of Denmark, it gained its independence and established its own educational system of four levels starting with nursery and preschool education and including Compulsory Schools, Upper Secondary Schools, and Higher Education. The Icelandic Preschool Act of 1994 set the policy for preschools and identified its aims as the following:

- To provide children with care, a good environment and safe facilities for play
- To give the opportunity of participating in games and activities under the guidance of preschool teachers
- To collaborate with the home to stimulate all-round development
- To encourage tolerance and broad-mindedness
- To cultivate expressive and creative powers
- To strengthen self-esteem, security and ability to solve their disagreements peacefully (Adapted from Act No. 78 of 1994, Ministry of Education, Science and Culture in Iceland, retrieved 5/2/2006)

A subsequent act that revised the educational system of Iceland is the Pre-Schools Act No/2008. For continuity and consistency, this updated mandate defines preschools as the first level of the educational system for all children before entry into a Compulsory Education at age 6. Compulsory Education is organized in a single system for the primary and lower secondary levels in which children usually attend

the same school through age 15 (Compulsory School Act No 91/2008, retrieved 3/24/2012) ([European Agency for Development in Special Needs Review-Iceland](#), retrieved 12/31/12).

One exemplar of an Icelandic preschool and kindergarten education is the community of Dalur's Preschool/Kindergarten School. The school's staff visited Boston, Massachusetts, in 2012 to study Early Education and Child Care in Massachusetts and to exchange practices and policies of its institution with collaborating professionals in Boston, Massachusetts. The exchange uncovered many cross-cultural similarities. Both countries base their programs on child developmental theories to provide social development, communication skills, lifelong learning skills, and personal independence.

The Icelandic program casts play as central to all learning as "a key element in all child development programs" (Jorundsdottir and Halldorsdottir [n.d.](#)). The Icelandic delegation shared information about their school for comparative purposes. The school serves up to 94 students, 1–5 years old, operating as a full-day facility from 7:30 am to 5 pm. Hot meals are prepared on site for all of the children, namely, breakfast, lunch, and afternoon refreshments, and included in the parents' fees. The center, while open year round, does close for a 4-week summer vacation, an interesting factor noted by their American counterparts.

What Are the Challenges in Moving Universal Preschool Education Forward?

John Dewey noted that to grow and move forward in any educational reform, change is inevitable. Change brings challenges. The universal preschool education movement has its challenges. Not all early educators agree on who should determine the policies and administer the programs, what the curriculum should be, and what pedagogy promotes best practices.

The Patchwork Quilt Phenomenon

In many countries, educators talk about the *patchwork quilt* view of universal preschool education. The United States is a case in point. While there is a national model for early education in *Head Start*, it is restricted to low-income families for its services. Likewise, there is a federal mandate to provide early screening of children for identification of special needs and placement for services; yet, there is no overarching mandate at the national level to provide for public-supported preschools. Federal government incentives have spurred some states to establish universal preschool policies and programs, but the recent economic decline of 2008 has limited sufficient funding throughout all states. Openings in most states that offer preschool financial support require the families to be means tested. Much of early

education, particularly preschools, remains in the private domain. Some preschools are nonprofit, while others are for profit organizations. Tuitions are paid by families, vouchers, charities, or public funding. Preschools are housed in a variety of settings: homes, schools, centers, churches, community buildings, businesses, or hospitals in purpose built or reconfigured environments.

American preschools are administered by different bodies of governmental agencies, at the national, state, and local levels. Some states have designated early childhood mandated boards for administrating and regulating public and private programs. In other states, early education is under the state's department of education or split among various agencies. Needless to say, there are many discrepancies across the country.

There are states that require public kindergarten in each school district, while other states maintain voluntary kindergartens in their communities. Kindergartens can be a half-day experience or a full school day. Some communities charge families tuitions for extended full-day kindergartens. Since preschool and kindergarten education are inequitable and not freely open to all American children, early educators cite the need for consistency in providing early year's education at the preschool and kindergarten levels for all children prior to entrance into grade one as a national goal for equity.

The Debate for the Need of Preschool Education

A second challenge is the still prevailing negative perception of preschool education as being unnecessary. Often critics of early education point to their own successes in life without the benefit of preschool. Others note the literacy gains of children from countries that do not mandate reading instruction until the elementary grades, without noting the socialization and cognitive development promoted in these nations' preschools. Families point to the cookie-cutter approaches in the institutionalized early education programs. Educators fear the *schooling phenomenon* of today's preschools and kindergartens, i.e., the emphasis on academics – which all preschoolers must read, write, and do arithmetic. Bruce Fuller (2007) in his book, *Standardized Childhood: The Political and Cultural Struggle over Early Education*, investigates the polarizing positions for and against preschool education. A sociologist, Fuller traveled across the nation, interviewed representatives on all sides of the issues, sat in many centers and classrooms, and attempted to balance the political with the social aspects of the Universal Preschool movement. He concludes:

Much is at stake in this unfolding debate over universal preschool-differing pathways for how Americans choose to raise their youngsters, the settings in which they grow up, and even for how we understand a young child's human potential. (Fuller 2007, p. 296)

The evidence from research is overwhelming supportive of the benefits of early education. Head Start serves as a standard bearer with its longitudinal studies for the past 40+ years in identifying the impact Early Education has made on people's

lives. This long-term research evidence is clearly in favor of successful practices that emerged from years of Head Start models implemented during the President Johnson's *War on Poverty* in the 1960s across the United States and later replicated around the world (Breitborde and Swiniarski 2006). Another more recent study that backs the OECD findings on the value of early education and care is the work of the former Harvard Graduate of Education Dean, now President of Smith College, Kathleen McCartney, with colleagues Eric Dearing of Boston University and Beck Taylor of Samford University. Their study shows long-term benefits as well. They were able to ascertain that "high-quality child care may provide poor kids with an academic boost that influences their learning through fifth grade" (McCartney 2009/11, retrieved 4/8/11).

The most compelling evidence for supporting universal preschool education comes from the sciences. Brain theory research studies agree that 85 % of the human brain is developed by age 5. Indeed, *Science*, the journal for the American Association for the Advancement of Science (AAAS), continually promotes early education. In its 29 September 2012 issue, the association featured an article describing how "very young children's learning and thinking are strikingly similar to much learning and thinking in science [and] early learning is remarkably similar to scientific induction...it could be that much of this knowledge is not learned but innate" (Gopnik 2012, p. 1623). Since such documentation questions Piaget's theory that young children could not engage in scientific inquiry and thought, the implications of this featured study go on to promote early learning that is open and not structured:

These discoveries have implications for early childhood education and policy. In particular, they suggest that early childhood experience is extremely important and that the trend toward more structured and academic early childhood programs is misguided. (Gopnik 2012, p. 1623)

In an earlier issue of *Science*, the Institute of Child Development and Human Capital Research Collaborative of the University of Minnesota stated that "the effects of educational enrichment in the early years of life are a central focus of developmental science and are increasingly used to prioritize social programs and policies... preschool or 'prekindergarten'...programs enhance well-being in many domains and can promote economic benefits to society" (Reynolds et al. 2011, p. 36).

Additionally the National Association of Elementary School Principals (2005) supports the scientists' findings. Their publication, *Leading Early Childhood Learning Communities: What Principals Should Know and Be Able To Do*, agrees with the scientific findings in its major theme that learning is enhanced by early education experiences. British educators reinforce the American associations' conclusions as well with their research studies that found children who finish pre-k programs are less likely to need special education services in later grades. A similar conclusion was arrived by the UK National Trust Project in 2003 (Swiniarski 2007):

Overall ...a child's duration in months at preschool was related to their intellectual gains at school entry and again at the end of Key stage 1 [age 7]. In particular, an early start at preschool (between [ages] 2 and 3) was linked with better attainment and being more sociable with other children. (Swiniarski 2007, p. 24)

What Are the Exemplars for UPE Support?

State Policies and National Program Support

The arguments for and against universal preschool education cut across the divide of federal governmental rights versus state rights in Education. While funding can come from the national governmental coffers as well as from those of the states, the final decisions for preschool education funding and implementation remain in the realm of each state. Fortunately, many states are committed to endorsement.

Teach for America has extended its scope and sequence to include preschool education as it now outreaches for quality early education candidates to join in their cause to improve underperforming schools, particularly in urban and rural schools throughout America. *Teach for America* cites the Nobel Laureate of Economics James Heckman's finding that half of the 12th grade achievement gap of African American and white students are evident before kindergarten (Slayton 2010). The new goal of *Teach for America* is to breach the achievement gap of poor young children to a successful transition into the mainstreamed elementary schools (Slayton 2010). Further studies in 2007 of *Early Education for All* follow a similar suit: Low-income children who participate in high-quality early childhood education are 40 % less likely to need special education or held back a grade, 30 % more likely to graduate from high school, and twice as likely to go to college (Slayton 2010).

These endorsements speak to the need for universal preschool opportunities that enhance the childhood of every child regardless of family circumstances. The endorsements of universal preschool education outweigh its criticisms. Yet, even supportive states' mandates reflect the model to leave the decision to the family by providing voluntary preschool options. To provide the equity in education that a nation such as Finland portrays, Americans need to promote equal access to early education which is taught by highly qualified professionals who implement a curriculum predicated on developmental needs and proven practices as defined in consistent research studies.

Early Childhood Education Professionals Voice Support at International Conferences

United Kingdom

Discourse around the notions of *Readiness* in preschools, kindergartens, and child-care programs concerns early educators. In November 2011, the noted British association for the professional development of Early Year's educators, *Training Advancement and Co-operation in Teaching Young Children* (TACTYC), presented their Second Biennial Research into Practice Conference on the "questionable label of school readiness." This association brought together a range of research studies

and speakers from many corners of the globe to York, England. These educators, scholars, and researchers presented divergent ideas, debated opposing positions, and identified consensus agreements.

The conference debates looked at the multitude of definitions for readiness. Different sides of the debate considered programs that helped preschool children get *ready for school*. The presentations reported on School Readiness Parenting Programs that enhance children's academics, the need for Vygotsky's view of social play and constructivism in preschool, and John Dewey's stand against defining education as a preparation for life rather than life itself. The *Occasional Paper No. 2*, written for and presented at the conference, proposed the key position, "the significant question is not *whether* a child is ready to learn, but *what* a child is ready to learn" (Whitehead and Bingham 2011).

The TACTYC conference participants' consensus was that you can teach skills, concepts, and attitudes through a multitude of experiences that have lasting effects rather than relying on scripted curricula that drill intensely on basic skills that have a short shelf life. The conference confirmed that children need to process, create, experiment, and test limits. It supported theorists who believe the brain is a flexible functioning organ, changing through developmental experiences.

There are many ways for a young child to explore knowledge. The learning process is a journey that encourages children to engage in experiences that stimulate active minds and bodies. For example, one conference presentation demonstrated that teaching literacy skills with the long-held traditional alphabet book can still be innovatively used to provide a structure to the literacy process that enriches the child's immediate reading life and produces lasting results. When teachers allow children's voices to be heard by having them create their own alphabet books, children contextualize purposeful language proficiencies in connection to their daily lives and new found concepts. When children later share their personally authored alphabet books, they exhibit a sense of accomplishment along with their new found skills. The point of the presentation was to demonstrate how personalized learning triumphs over scripted teaching of literacy and language (Swiniarski 2011).

All the early childhood education conference participants agreed that play was the essential medium through which children learn. Play permits engagement. Through play activities, children can make choices and communicate and socialize with each other while using all of their sense modalities. Sensory play, problem-solving situations, pretend and goal-oriented symbolic play are still regarded as the core of the early childhood curriculum. Play's effectiveness is documented by years of research. Yet, by many mandated curricula, play is relegated to the playground. Its role as a means for learning has been diminished in a bureaucratic maze of scripted teaching and dogmatic assessments.

The "one size fits all" assessment tools continue to dominate curriculum reform at the elementary and secondary levels, despite professional criticisms. Testing is seeping into preschool education with codified results used as longitudinal records. The open-ended values of play identified in research findings have little regard in these accountability schemes. The conference participants proposed advocacy for more tenable choices (TACTYC 2011).

The outcomes of the conference disputed the feasibility of readiness programs that place emphasis on the academics at the sacrifice of play, the arts and social development. The attendees questioned the wisdom of a mandated readiness program which emphasizes basic skills to read, write, and do math through a standardized and often scripted preschool curriculum. While most national or state curricula are prescribing such an approach, the conference's goals sought a balanced curriculum that brought *childhood* back into the field of Early Education and Care (TACTYC 2011).

United States

On the other side of the Atlantic, the Association for Childhood Education International (ACEI) sponsored a similar conference the following spring in March of 2012 entitled the *Global Summit on Childhood: Exploring the Experience of Childhood Worldwide*. The goal of the summit held in Washington, DC was to focus on the state of childhood. Like the TACTYC conference, the delegates, also concerned about the status of childhood in the twenty-first century, arrived at similar conclusions. The summit introduced the *Decade for Childhood* as a joint multiyear initiative of ACEI and the Alliance for Childhood. The initiative's overarching theme:

Every child in every nation deserves a childhood full of hope, joy, freedom and promise for future (ACEI 2012, p. 1)

ACEI conference presenters considered drill and direct teaching of academics in early childhood education as having an erosive effect. Educators globally noted that the increasing use of scripted academic schooling for children aged 3–6 produced limited language proficiencies. They ascertained behavioral regulatory skills are not benefitting children in preschool and are problematic for success in subsequent years. ACEI has partnered with the Alliance for Children to rethink early educational practices and make recommendations.

In its report, *Crisis in the Kindergarten: Why Children Need to Play in School*, the Alliance for Childhood argues for restoring play to the curriculum for all children (Miller and Almon 2009, p. 1). The authors, Miller and Almon (p. 1), question the value of “didactic teaching of discrete skills in phonics, decoding and word recognition” [in which there are] “short term gains in test scores” but there are little gains in later years. Their report highlighted the failed *Reading First*, program cited in *No Child Left Behind*, for improving reading and literacy skills in children throughout the United States.

Reading First, the \$6 billion federal program designed to help children from low-income families, greatly increased the amount of time children spent being taught discrete pre-reading skills in kindergarten and the early grades but failed to improve reading comprehension. (Miller and Almon 2009, p. 2)

The Alliance for Childhood promotes the idea of having children initiate play under the guidance of the teacher who can “differentiate the teaching methods to meet individual needs” (Miller and Almon 2009, p. 5). Effective teachers with

a fundamental knowledge of child developmental needs are critical for insuring school success. The Alliance for Childhood contends current governmental mandated approaches have created a crisis in early childhood education with the disappearance of play (Miller and Almon 2009, p. 7). Teachers and families need to join together to restore appropriate curriculum practices and policies documented by research and time-proven traditions. The alliance has issued a Call to Action on the Education of Young Children which can be found on its website along with the prominent list of signers: www.allianceforchildhood.org (Miller and Almon 2009, p. 7).

Summary and Conclusions

There is an agreement among educators around the globe that universal preschool education is a viable choice for the education of young children. Research concurs with their conclusions. Research studies have consistently found that play-based programs, project-based learning experiences, and hands-on activities have long-term successful effects over narrowly scripted academic approaches to teaching young children. Qualitative assessments are sometimes preferable to quantitative testing. Not all learning can be data driven. Historically in the United States, early childhood education was grounded in play as the medium for teaching and learning as postulated by Frederick Froebel and pioneered by Elizabeth Palmer Peabody. Originally, kindergartens were open to children from ages 3 to 7 but eventually became a voluntary entrance into the public school systems for 5-year-olds.

Kindergartens are now required in most school districts in some states. In many public school districts, kindergarten is a full-day school experience. In others, it is a half-day experience, with the option for parents to pay for an extended daily session. There are also areas unfortunately with no public kindergartens at all. Since the mandatory age for school attendance is 6 years old in most states, attending kindergarten is a voluntary choice. Unlike the original models of the nineteenth century, kindergartens are no longer focused on the developmental needs of young children. Prescribed programs, mandated standards, and direct teaching of content areas frame its current curriculum.

Young children have a few opportunities to attend public preschools in their communities. Most of preschool education is privately supported by fees and tuitions. The federal government supports a number of placements for children from low-income families in Head Start and for children with special needs in community programs. Some states are offering preschool education to families who are means tested or to children on Individual Education Plans (IEP) in innovative integrated special needs public preschools. Individual states have begun to legislate and establish universal preschool education in the public sector as a voluntary option. What is needed in American education is a cohesive, equitable preschool opportunity for all children. To achieve the goal of universal preschool education, public

action and advocacy are necessary. President Obama promised universal preschool education in his 2008 campaign (Education Week Guide 2009). His message was embedded in his educational policy issued later from the White House:

a high quality education for all children is critical to America's future....committed to providing access to a complete and competitive education from cradle through career.
(www.whitehouse.gov/issues/education/)

Opportunity for including prekindergarten education support in states has been awarded through *Race to the Top* funding under the American Recovery and Reinvestment Act of 2009, Public Law 111-5. For example, The Commonwealth of Massachusetts is providing professional development for early educators to improve the quality of early education and care through Readiness Centers, established in regional state districts. The Massachusetts Department of Early Education and Care is working on mandates for a new professional licensure of Early Childhood Educators who work with children from birth to age 8. Hope prevails that President Obama's second term will shine the spotlight on universal preschool education to ensure equity and equality for all of American youngsters.

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Chapter 2

Climbing the Mountains: The Journey to Quality Prekindergarten in Tennessee

Rebecca Isbell

Abstract The state of Tennessee was the ideal place to implement Pre-K programs because of the number of children living in poverty, health-care issues, and student's poor performances on academic measures. This chapter will explore the development of Pre-K, the use of pilot programs, the major expansions, and the period of sustainment. The final section will identify lessons learned and recommendations for expansion of quality Pre-K programs for all young children.

Keywords Early childhood education • Prekindergarten • Rural education • Young children

Climbing the Mountains: The Journey to Quality Prekindergarten in Tennessee

For over 50 years researchers and scholars have studied the amazing development of children during the first 5 years of their lives. Recently, advances in neuroscience have brought new understanding to the field related to early brain development. Neuroscience has discovered that 85 % of an individual's intellect, personality, and skills are cultivated during the early years. Both long-term studies and new scientific findings agree that the first years of a child's life are critical and set the stage for lifelong development (Edie and Schmid 2007).

During the early years, there is a window of opportunity when a child's experiences will have a real and lasting impact. But it is important to realize that both positive and negative experiences have a tremendous impact on the developing child.

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These experiences will influence a child's learning, social development, and future accomplishments. Many children who live in poverty have experiences that negatively impact their development and learning during these important years. For instance, a young child may not receive adequate nutrition, or may not be exposed to books and reading, or may not have a caring relationship with an adult. In contrast, young children, who experience quality early childhood environments, will have nutritious meals and snacks, listen to stories read, and have a trained professional who interacts with them in appropriate ways. These learning experiences will enhance their development and enrich their literacy and math skills. They will also experience many opportunities to collaborate with peers and learn how to work with them. The development of these skills will not only impact their first years in school but will influence their participation in continued education, working environment, and their conforming to the rules of a society.

Quality programs for young children focus on the "whole child." This means that programs not only work on cognitive and language development but also building character skills. These important character skills include attentiveness, impulse control, persistence, and teamwork. Together cognition and social skills will influence education, career, and life success. In addition, James Heckman, professor of economics, believes that investing in early childhood education is a cost-effective strategy for promoting economic growth. The US economy needs an educated and skilled workforce, and early childhood education is the most effective way to accomplish these goals (Heckman 2010).

Background on Pre-K in the United States

The expanded understanding of the benefits of early childhood development in the past several decades has led to renewed interest in the early years. This has resulted in the expansion of prekindergarten (Pre-K) programs throughout the United States. Support for these Pre-K programs has come from a variety of sources including educators, governors, legislators, parents, economic experts, and business leaders. The Partnership for America's Economic Success published a position paper addressing the positive impact of Pre-K programs in the United States. They concluded that the high levels of return, on an investment in early childhood education, provide evidence that the education of young children should become an economic priority for the nation. The report also cited the calculated return on investment from the Perry Preschools—with every \$1 spent there was a \$17 return. The longitudinal study of participants in the Perry Preschool found that adults who attended this quality preschool program were more likely to stay in school, be working, less involved in crime, and feel more positive about education. Children who attended Perry Preschool program were more likely to graduate from high school (65 %), while similar children who did not attend the program have only a 45 % graduation rate (Schweinhart et al. 2004).

The latest research report, published on quality Pre-K, was conducted as part of the Chicago Child-Parent Center. This was a follow-up study of the children who had attended quality early childhood programs. The study tracked for 25 years, more than 1,000 low-income children who had attended the Chicago Child-Parent Center. They were compared with similar low-income Chicago children, who did not attend a program. A summary of the results indicates that 80 % of the children who attended preschool graduated from high school, they were more likely to have skilled jobs, fewer had abused drugs, and fewer had been incarcerated. Researchers also concluded that these early childhood experiences built intellectual skills, social adjustment, and motivation that helped children better navigate their high-risk environments. The study's lead investigator of the University of Minnesota suggested that the differences between the two groups were very meaningful—and translated into big savings to society for children who attend preschool (Associated Press 2011).

A number of states began establishing Pre-K programs that were designed to provide quality learning environments for young children during their critical period of development. State-funded prekindergarten programs grew steadily with increased participation of young children in these public programs. Georgia, Oklahoma, and Florida offered Pre-K for all 4-year-old children and most of them attended. These programs, open to all children, are identified as universal Pre-K. Other states, including Illinois, New York, and West Virginia, have Pre-K availability to low-income or at-risk 4-year-old children (Barnett 2010). Participation in Pre-K continued to rise until mid-1990 when over 70 % of children attended a preschool program at least the year prior to kindergarten (Barnett 2010). These preschool programs varied in quality with some being very appropriate, while others only offer custodial care. Therefore, the benefits from the programs and the experiences of the children varied greatly.

The Journey Begins

Tennessee was the ideal place to begin to provide quality Pre-K programs because of the poverty, educational, and health problems that existed in this state. For example, Tennessee ranks 44 out of 51 states in percent of babies born at low birth weight with a high instance of infant mortality. A high percentage of children live in poverty (23 %) and an additional 11 % live in extreme poverty. In Tennessee the number of students on free or reduced lunch is 49.3 %. Education in Tennessee is not well supported ranking 47th of the states with an annual expenditure of \$7,004 per child in public school. This expenditure per child can be compared to the cost of keeping a prisoner in confinement for a year at the cost to the state of \$14,827. The evaluations of Tennessee's children in public schools also indicated that 72 % of fourth-grade students are unable to read at grade level or do math at grade level. The graduation rate for students attending Tennessee schools is dismal with 70 % of

white students, 58 % African American, and 52 % of Hispanic students completing their high school education (Editorial Projects in Education Research Center 2011). These indicators, and many others, support the need to increase the availability of early childhood programs to Tennessee's young children. The research clearly supports the benefits of quality early childhood programs showing that this early involvement can positively impact health issues, academic achievement, and graduation rates and improve the skills of the workforce (Children's Defense Fund 2011).

In 1990 a resolution was passed in the Tennessee legislature that directed the State Board of Education and the Department of Education to create a task force "for the purpose of developing a state plan to establish a comprehensive system of state-funded early childhood programs for at-risk children and their parents." The creation of this task force was the first step in the long journey toward the development of quality programs for Pre-K children who were low-income or at risk for academic failure. Members of this task force were from various fields and interests and included early childhood professionals.

This plan for the development of state supported early childhood education was approved by the Tennessee State Board of Education. This plan established the rules and guidelines for Pre-K programs that would serve at-risk 3- and 4-year-old children. This proposal was viewed as a way to assist families in local communities by preparing children for school success and coordinating support services for their families. Pre-K was also viewed as a way to help at-risk children to be more prepared for school and support their academic and social development. Soon after, the legislature approved the creation of pilot programs across the state for economically disadvantaged 3- and 4-year-olds. Governor Sundquist proposed to phase in universal Pre-K, beginning with the most economically disadvantaged children.

Pilot Programs

Ten pilot centers were established to field test the operation and guidelines of these programs. These pilot sites were selected from competitive grant applications that were submitted by public schools, institutes of higher education, Head Start agencies, private childcare agencies, and public housing authorities. The focus was on 4-year-olds who were living in families with incomes below the poverty line. Other children could be included who were at risk such as having a history of abuse or neglect, being in state custody, and having an Individual Education Plan or English Language Learner status. Pilots were located throughout the state and across the three regions of the state that range from urban to rural. Each pilot site was required to have a community advisory council that would assist the local program in being responsive to community needs. This group could also identify local risk factors that could negatively impact young children such as low education level of parents, teen parents, siblings with problems, or parent in active military duty. If space was available in the local program, these at-risk

children could be included. During this pilot period, 3-year-olds could be included if they were identified at risk and space existed in the local program. Later, the number of children in pilot programs was expanded because of a change of the eligibility requirements to include 3- and 4-year-olds who were eligible for free or reduced lunch (Offices of Research and Education Accountability 2009).

National Quality Standards

The National Institute for Early Education Research (NIEER) developed standards that research had shown impacted the quality in Pre-K programs. These standards provided the guidelines for developing a quality program that would have maximum impact on the learning and development of young children. These included teacher qualifications with the recommendations of a bachelor's degree with specialized training in early childhood and for an assistant a minimum of a Child Development Associate (CDA) and continual in-service training provided throughout the year. Another standard was the adult-child ratio with a 1:10 relationship between staff and children. Related to health the standard indicated there should be an intensive screening and referral for children in the program in the areas of vision, hearing, health, and support services. In addition it was suggested that programs should be monitored through site visits. Another aspect considered in the standards was average expenditure per child in the program with the national average of Pre-K students being \$4,711 (Ackerman et al. 2009).

Expansion of Pre-K

In 2005 Governor Phil Bredesen, with support from the Tennessee General Assembly, successfully passed the Voluntary Pre-Kindergarten (VPT) Act and the establishment of an Office of Early Learning (OEL) in the Tennessee Department of Education. This legislation increased Tennessee financial investment in early childhood education from \$10 million to \$35 million. This additional funding partially supported a significant increase in the number of classrooms growing from 148 to 448 and tripled the number of students served increasing from 3,000 to 9,000 low-income and at-risk children. A portion of this increase was financed by \$25 million in excess lottery revenues which was combined with \$10 million state-appropriated money (Offices of Research and Education Accountability 2009; Tennessee Department of Education Office of Early Learning 2010).

Guidelines for the state of Tennessee for their Pre-K programs included an adult-child ratio of 1:10, teacher certification with Pre-K endorsement, a teacher assistant with CDA, and a curriculum that is developmentally appropriate and aligned with Tennessee Early Childhood Education—Early Learning Development Standards

(TN-ELDS). The program requires 5½h of instructional time per day for 5 days a week. These requirements were included because of the well-documented evidence of their impact on the quality of the early childhood programs. Participating school systems were also required to financially support the programs by matching the state funding with local monies.

Currently there are 934 Pre-K classes in the state with 99 % of the state school systems participating. The total number of young children attending these programs is 18,000. This is, however, only 21 % of the total number of 4-year-olds in the state. Since 2007 the number of students served has remained constant due to significant reduction of revenue for the state (Tennessee Alliance for Early Education 2011). The new governor, Bill Haslam, has supported the Pre-K programs seeing them as a way of improve Tennessee's workforce. This is the third Tennessee governor who has understood the positive impact Pre-K can have on young children who live in poverty by providing a quality year for them to grow intellectually and socially. This bipartisan support has allowed Tennessee to have a sustained interest in young children and the development of high-quality programs that will have a powerful impact on the children, community, and state. As economic indicators improve, Pre-K programs will again be expanded to include more young children who are at risk for academic failure (United States Chamber of Commerce 2010).

Support from Many Sources

There have been many different groups, organizations, and leaders who have supported the development of a quality program for young children. The law enforcement leaders and crime survivors created an organization to "Fight Crime: Invest in Kids." They believed that rigorous and tough law enforcement is not enough to curb crime in Tennessee. This group has provided strong support for Pre-K in Tennessee recognizing that high-quality programs have documented evidence that these programs increase graduation rates, cut crime, and save money that supports remediation. Throughout their summary of support, they cited research related to academic improvement of children but even more important for them was the development of social skills that would help children learn to get along with others and be able to persist on difficult tasks. They further explained that low graduation rates contribute to higher crime and a less productive workforce. Preventive steps should be taken so children do not become involve in crime, and Pre-K is an important early preventive measure ([Fight Crime: Invest in Kids n.d.](#)).

Recently, the Chamber of Commerce for Tennessee's largest cities sent a letter to the new governor, Bill Haslam, publicly acknowledging their support for state funding of Pre-K. They recognized that Pre-K plays a vital role in shaping our future workforce. The endorsement by this group of business leaders across the state added another large group of supporters for Pre-K (T. Wilson, M. Edwards, J. Moore, R. Schulz, personal communication, April 18, 2011).

Evaluation of Pre-K in Tennessee

The program quality standards for Pre-K programs were identified by the National Institute for Early Education Research. These criteria included early learning standards, teacher training with specialization in early childhood, and continuous training (at least 15 h per year). In relation to the classroom, the maximum class size was to be not more than 20 and adult-child ratio 1:10, screening/referral, meals, monitoring, and site visits. In their evaluation of all states, Tennessee meets nine of the ten Pre-K quality measures. This places Tennessee in the top group of states in the nation in meeting the guidelines for quality Pre-K programs (Barnett et al. 2009).

In 2008, evaluation and research was conducted on children who attend Pre-K. The results obtained at the beginning and ending of the Pre-K year found that children had made significant gains in reading, language arts, and math. At the end of kindergarten, similar results were found with Pre-K children continuing to outperform similar children who had not attended the state program.

By the 2nd grade, only limited gains were identified for the children who had attended Pre-K. At that time, there was little difference between children who had attended and those who had not been in Pre-K. Many have concluded that this study was flawed in several ways including the following: combining data from two Pre-K programs treating them as one, test data was used from a small and unrepresentative proportion of kindergarteners and first graders, and it provided posttest data only. These procedures limited the validity of the study (Strategic Research Group 2010).

Currently an additional study is being conducted by Vanderbilt University which will be continued for a longer period of time. These evaluations will include appropriate comparison groups, measuring academic and social skills, and following the children for longer periods of time through high school and into adulthood. The initial study individually assessed a randomly selected group of Pre-K students at the beginning and end of the year. Standardized instruments measured the children's early literacy, language, and math skills. These scores were compared to the gains made by children who did not attend Pre-K for the same period of time. The results from the first year of the study show that children who attended Pre-K improved their early literacy, language, and math skills significantly more than comparable children who did not attend. The largest gains of 82 % by Pre-K children were made in literacy and language, and strong gains were made in early math skills. Comparison studies will be conducted for children into third grade and hopefully continue to follow participants into their adult years (Brooks 2010).

Short-Term and Long-Term Benefits

In Tennessee, as in other states, the research supports the gains made by children who attend quality Pre-K programs during the initial years, kindergarten, and first grade. Often, by third grade these initial gains are less distinguishable. Some do not

understand how critically important it is for a child, who lives in poverty, to have a successful beginning to their education. During these first 3 years of school, at-risk children can come to believe that they can learn, they can be successful, and they can move forward. The true measure of the effectiveness of the program, however, is the long-term effects that begin in Pre-K with improved social and academic skills and lead to increased education, better work skills, and positive personal relationships. These results can only be measured in longitudinal research that follows the Pre-K children into adulthood. It can be anticipated that these long-lasting skills, acquired in Pre-K, will produce increased graduation rates, less retention, fewer referrals to special education, and decreased involvement in crime as many studies have found.

The Tough Climb: Funding

The proven academic and social benefits for young children have influenced more states to embrace the addition of Pre-K as the starting point for public education. To do this they need to identify funding strategies that can ensure quality, sustainability, and stability in early childhood programs. States have the possibility of funding Pre-K using different approaches: grant programs that are impacted by legislative appropriations, school funding formulas which are based on state per-pupil support, or other financial support such as lottery money. In states where funding is based on the school formula, the money flows from the state into school districts on a per-pupil basis and can be blended with other state, local, and federal funding. When Pre-K is supported as a part of the formula, the standards and supports are more likely to be available to early childhood programs. This can be seen in Oklahoma's Pre-K program where school districts are required to provide individual screening for vision and hearing. This provides the support for these services to be administered during children's first entrance into the school system. The resources the state contributes to Pre-K determine the number of children served as well as the quality of the program (Boylan and White 2010).

In 1995, Georgia's universal Pre-K was partially supported by state-generated lottery money. When the results from research of the benefits of Pre-K were published, many middle-class parents began asking their state representative to extend the program so their children could be enrolled. The governor later announced that Georgia's program would be open to all 4-year-olds regardless of family income and it would be funded by the state lottery.

In Tennessee, the funding for Pre-K has come from a variety of sources. Grants are submitted by school systems to the state department of education for funding to local districts. The school system can subcontract the service to other agencies such as university-based programs, Head Start, private childcare, or other agencies. The grants must meet the guidelines established by the state to provide quality programs for Pre-K children. The school district must match the amount of monies that the state provides for support of these programs for young children. In addition to state

appropriations, money from the state lottery may be allocated to provide additional fiscal support for the approved Pre-K programs. Both the state allocations and money from the lottery must be approved by the state legislature and are dependent on the economy of the state and the views of the current members of this political group. Most recently, Tennessee leaders voted to protect the funding for the state's voluntary Pre-K programs by paying for the majority of the program with general funds rather than from the dwindling lottery reserve. This is certainly a move that will make the program more sustainable (Dugger 2009).

Things Learned from Tennessee's Pre-K Experiences

It is essential that the development of Pre-K programs have support from a variety of groups, organizations, and businesses. This ensures that the importance of quality early childhood is seen as an issue for all citizens. This requires seeing the big picture by identifying all the groups that will be positively impacted by an appropriate early childhood program and enlisting their support by informing them of the research, studies, statistics, and local families who have benefited from Pre-K education. Parents of children who have attended Pre-K are often overlooked as potential advocates for this first year of education—but they can contribute many personal stories that are very powerful in demonstrating the positive outcomes on an individual level.

It is very important that governors and legislators, in all parties, are knowledgeable and supportive of the importance of quality education for young children who are at risk for academic failure, dropping out of school, and being involved in crime. They can recognize that investment during the early years pays off not only now but in the future when these children are adults contributing to the state economy by being skilled employees who work hard and are able to work effectively with other people. When early childhood programs are identified with one political group or person, it can have detrimental effects on the expansion and funding of Pre-K. The education of the most at-risk young children is not a party issue but rather a moral issue for all leaders, governmental bodies, and citizens of the state.

In the early years of development, Tennessee planned to provide universal Pre-K. The goal was for all children in Tennessee to be able to attend quality Pre-K programs. When the major expansion occurred in 2005, the voluntary Pre-K program was implemented. At the time, this was rationalized by suggesting this provided parents a choice rather than making it a requirement for all children. But what has occurred is that the existing Pre-K primarily serves low-income and at-risk children. New research has questioned this segregation of children and the inclusion of only low-income children in programs designed to raise skills and increase test scores. At-risk children need the opportunity to gain from interaction and collaboration with other children who may have more advanced skills. Higher-functioning young children will also benefit from being in groups composed of diverse children. Several studies have shown that disadvantaged children's achievement is raised

when they attend preschool programs with more advantaged peers (Schechter and Bye 2007; Sylvia et al. 2004). There is a belief, held by some, that educational problems are limited to children in poverty. However, Barnett states that in reality most of the children who enter kindergarten with low skill levels are from middle-income households (Barnett 2010). The peer effect on learning can produce positive benefits that will far exceed the additional cost of the inclusion of all children. For the past 50 years, the United States has targeted children in low-income families for early childhood education.

Making a commitment to quality at the beginning of the program will ensure that young children are in an environment that will support their learning. It will include trained teachers using appropriate curriculum and focusing on the “whole” child recognizing that cognitive, language, math, and social skills are essential to the developing child.

Conclusion

Most Americans agree that children’s success in school is important and support the idea of improving children’s educational outcomes through participation in Pre-K and early childhood programs. However, opinions differ on who is responsible for educating prekindergarten children and whether states should offer Pre-K to all 4-year-old children and their families. Other central issues that must be considered relate to the fiscal, political, and infrastructure needed to provide quality programs that have the maximum benefits.

Policy makers, educators, citizens, and businesses need to determine a way of expanding Pre-K programs and addressing the issues that must be considered for this expansion to occur. Early childhood leadership, stakeholders, advocacy groups, and business leaders must work together to move Pre-K in the public policy. Once the journey begins and throughout the travel, there must be a commitment for quality programs including trained teachers, appropriate curriculum, support for the health and nutrition, and involvement of parents and community into the process. It is essential that funding be sustained and evaluation of Pre-K students is continuous to ensure that both short-term and long-term results are obtained. Perhaps it is time for Tennessee and the nation to offer all children access to Pre-K programs recognizing that it will have a positive impact on all children’s development.

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Chapter 3

Florida's Voluntary Universal Prekindergarten: A Citizen's Initiative Meets Political and Policy Realities

Lynn Hartle and Alisa S. Ghazvini

Abstract This chapter includes original legislative language, timely news events, and documented events to chronicle a citizens' initiative which spearheaded the 2002 passing of the Florida Constitutional Amendment 8 for Voluntary (Universal) Prekindergarten (VPK) and then the implementation of children's programming in 2005. The research on quality Prekindergarten, key stakeholders personally engaged in the process as well as political and policy forces impacted the final child programming. The State Board of Education, with input from the Governor, appointed a VPK Advisory council to define quality indicators but legislative and funding issues impacted the actual implementation of those indicators to carry out the voters' wishes. VPK programs in Florida continue to serve children and families, while administrative parameters evolve with ongoing legislative and funding changes.

Keywords Citizen initiative • Grassroots advocacy • Kindergarten readiness • Prekindergarten • Referendum • Performance standards

Introduction

This is the story of how, in dawn of the new millennium, Florida voters and the tireless efforts of key leaders enacted Voluntary Prekindergarten (VPK – originally named “Universal Pre-K” or UPK) when their legislature would not (Hampton 2003a). While Florida statewide and local initiatives of the 1980s and 1990s had provided some early

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childhood programming, especially to serve low-income families, such as the Child Care Subsidy Program and the 1987 Prekindergarten Early Intervention Program for 3- and 4-year-olds, the VPK legislation would expand those earlier initiatives for all of Florida's families.

Inception of the Florida Constitutional Amendment 8 Voluntary Prekindergarten

The impetus began when in 1999, the Florida Legislature passed the School Readiness Act, which streamlined the state's early childcare, education, and early intervention programs, and also altered systems to manage the Federal Child Care Block Grant dollars for subsidized childcare in Florida. Later in 2000, the Florida Partnership for School Readiness, under the auspices of the Agency for Workforce Innovation (AWI), Florida's welfare-to-work agency, was formed to coordinate the state efforts. The Florida Partnership for School Readiness, 20-member board of six designated and 14 appointed citizens, oversaw local School Readiness Coalitions, which contracted programming through local public and private childcare providers.

While there were some meager initiatives in place for children, David Lawrence, a former newspaper editor from Miami-Dade County, realized after a trip to Paris that Florida could do more for its youngest citizens. After his retirement from the newspaper business, Lawrence dedicated his energy, powerful connections, and influence to early childhood issues. He, along with Alex Penelas, the Mayor of Miami-Dade County (the largest county government in the Southeastern United States), led the charge for the remarkable voter petition campaign that put the Universal Prekindergarten (UPK) Constitutional Amendment 8 on the 2002 ballot.

Penelas was himself a father of two young sons and was already an advocate for early education, even before Lawrence approached him. Penelas initiated some strategic events with key influential community leaders involved from the onset. In January 1999, Penelas proclaimed "1999 the Year of the Child" in Miami-Dade county. In May of 1999, he brought together a diverse group of delegates: early education advocates, the school superintendent, the state attorney, the chief juvenile judge, the county's chief health officer, ministers, and business people, including David Lawrence, to work through the issues for children and develop action plans. Later in September 1999, Penelas convened Miami-Dade County's first-ever "Mayor's Children's Summit." During both events, the topic and need for Universal Prekindergarten for all children surfaced as a top priority.

Lawrence attempted to initiate a bill for Universal Prekindergarten through the Florida Legislature, working with both Democrats and Republicans. When his efforts were not supported, this further fueled his passion to ensure children in Florida would benefit from early education. Penelas and Lawrence realized the opportunity that Florida and 23 other states afford their citizens – voters can put a Constitutional Amendment on the ballot by petition. This was no simple task, but both Penelas and Lawrence were in tune with key people who could systematically

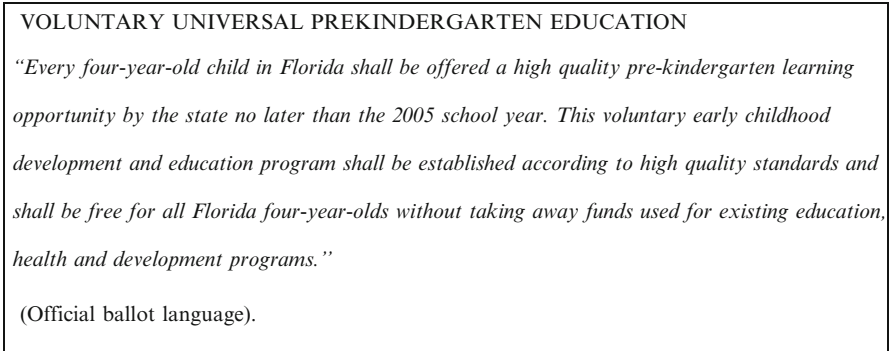


Fig. 3.1 2002 Ballot language to amend Florida's Constitution Amendment

initiate the steps to begin this citizen-initiative process for the November 2002 election – a pollster, lawyers familiar with the Florida Constitution, an experienced petition gatherer, and most importantly, potential private donors.

This citizen's initiative required more than donations at bake sales; they raised \$1.8 million with \$1.4 million spent on collecting 722,000 petitions (twice as many as the 488,722 required to ensure validity of at least that many). The other \$4 million was spent for advertising in Spanish, English, and Creole to get out accurate messages of the positive implications for the amendment. The Florida Constitution laws for amendments were carefully scrutinized. Amendments can only address one subject and are limited to 75 words (see Fig. 3.1). This concentrated petition effort proved fruitful for this first step of the initiative and the Amendment was on the ballot.

Besides radio and TV ads, both Lawrence and Penelas traveled across the state to hold rallies and informational meetings. This was an exciting time for Early Childhood professionals who were finally in the limelight for the important work they did each day for children and families. But with excitement, there were also fears from small for-profit childcare providers and faith-based providers that they would be left out of this initiative. In 2002, a coalition of advocacy groups also provided informational sessions in Central Florida to allay fears and deliver consistent messaging: the state would pay for the Voluntary Universal Prekindergarten (VUPK) program's basics; no parent would be compelled to participate (voluntary); and all childcare providers, whether private, faith-based, family childcare, and public school programs, that met the standards for high-quality prekindergarten would be eligible VUPK providers.

Maybe the sour 2000 Presidential voting chaos of the hanging chads in Florida made voters eager for a sweeter victory, and a referendum for children, a citizens' initiative that furthered the cause for children and families in the state, seemed just the ticket. But clearly, the amazing efforts of key individuals, such as David Lawrence, Alex Penelas, and child and family policy and advocacy groups, such as the Children's Forum, The Policy Group for Florida's Families and Children, the Children's Campaign, and Children's Week, in addition to the citizens of Florida,

rallied a victory – 58.6 % of Florida voters approved the Amendment (see Hampton 2003a, b; Pennsylvania House of Representatives 2006 for full stories). Article IX of the State Constitution was amended to read:

Section 1. Public Education. –

(b) Every four-year-old child in Florida shall be provided by the State a high quality pre-kindergarten learning opportunity in the form of an early childhood development and education program which shall be voluntary, high quality, free, and delivered according to professionally accepted standards. An early childhood development and education program means an organized program designed to address and enhance each child's ability to make age appropriate progress in an appropriate range of settings in the development of language and cognitive capabilities and emotional, social, regulatory and moral capacities through education in basic skills and such other skills as the Legislature may determine to be appropriate.

(c) The early childhood education and development programs provided by reason of subparagraph (b) shall be implemented no later than the beginning of the 2005 school year through funds generated in addition to those used for existing education, health, and development programs. Existing education, health, and development programs are those funded by the State as of January 1, 2002, that provided for child or adult education, health care, or development.

The excitement of the passing of the Constitutional Amendment in November 2002 was soon to be tempered by the long legislative climb through the Florida House and Senate, which would have to craft wording to implement and appropriate funding for this new Voluntary Universal Prekindergarten (VUPK). The 2003 Legislature passed Senate Bill 1334 after several amendments were made. This legislation mandated that the Florida Board of Education, the Auditor General, and Office of Program Policy Analysis and Government Accountability (OPPAGA), Florida government's equivalent of the US government's nonpartisan General Accounting Office, do a thorough study of UPK to guide the governor and 2004 Legislature. As the child develops slowly, so did the "baby steps" of the VPK enactment since the Amendment was voted into law in 2002 (see Table 3.1 for a timeline of events).

On April 15, 2003, the Board of Education announced the formation of a UPK Advisory Council (note that UPK and VUPK were used interchangeably from 2002 to implementation in 2005 when the "U" (Universal) was dropped completely to become Voluntary Prekindergarten – VPK). The Governor named Lieutenant Governor Toni Jennings to head the Council. Child advocates were delighted by Toni's appointment. Before earning her law degree, she was herself a teacher and her 20-year voting record in the Senate included strong supports for children's issues. This Advisory Council was to report back to the Board of Education by December 31, 2003.

Universal Prekindergarten (UPK) Advisory Council Charge to Define Quality Indicators

The 3 years of implementation efforts for Universal Prekindergarten programs that followed 2002 voter victory were filled with information and decision making sessions both in the legislature and in local communities. Funding the initiative was

Table 3.1 Florida voluntary prekindergarten program timeline

Date	Event	Specifics
1999	School Readiness Act	The Florida Legislature consolidated the state's early education programs
2001	Florida Partnership for School Readiness created	State-level governing board to coordinate early childhood efforts
November 2002	Passage of Constitutional Amendment ("Citizen Initiative" on the ballot through large-scale petitions)	Required high-quality, voluntary, free prekindergarten education opportunity for every Florida 4-year-olds, implemented no later than the beginning of the 2005 school year
March 2003	Passage of Senate Bill 1334	Required a study by the State Board of Education; a performance audit of the School Readiness Program by OPPAGA; financial and operational audits by Auditor General
April 2003	Establishment of Universal Prekindergarten Advisory Council	Requested recommendations on curriculum, standards, delivery system, assessment and evaluation, and cost
October 2003	UPK Advisory Council Report to State Board of Education for "Universal Prekindergarten"	Provided framework for State Board of Education's recommendations
December 2003	State Board of Education Recommendations to Florida Legislature for "Voluntary Universal Prekindergarten Education Program"	Recommendations differed from the UPK Advisory Council, included modifications to School Readiness Program
April 2004	Passage of "Voluntary Universal Prekindergarten" legislation, House Bill 821	Noted by advocates as lacking sufficient quality standards
July 2004	Governor Bush vetoed House Bill (HB) 821	Noted legislation lacking in sufficient quality standards
December 2004	Passage of HB 1A during Special Session – legislation established VPK Education Program, becoming 1002.67, Florida Statutes	Establishment of implementation parameters for VPK as well as revisions to the School Readiness Program – altering name to Early Learning and creating a system that included requirements for three state agencies
January 2005	VPK Legislation signed into law	Governor Jeb Bush signs the revised bill
August 2005	Voluntary Prekindergarten classes opened across Florida	After massive efforts by state agency partners and local Early Learning Coalitions, from January through August, the first VPK programs and classrooms were established

the central issue since Florida is a state with no state income tax, and in 2003, one of the leaner years, the state experienced a budget shortfall of \$4 billion. Little did the state know, but another factor, a record number of hurricanes in 2004 would also impact attention to the implementation as well as funding. The UPK Advisory Council headed by Lieutenant Governor Toni Jennings had a monumental task to

conduct a study on curriculum, design, and standards for the UPK program. David Lawrence, Chair of Florida Partnership for School Readiness who had been so instrumental in the inception of the Amendment and citizen initiative, was also on the Council along with 18 others from a broad spectrum of community and child services across Florida. Other designated members of the UPK Advisory Council included the Commissioner of Education/designee, the secretary of the Agency for Workforce Development/designee, the chairperson of a local School Readiness Coalition, the superintendent of a local school district, a representative of the faith-based providers of school readiness programs, a representative of the private providers of school readiness programs, a representative of public school providers of school readiness programs; a representative of public school providers of prekindergarten programs for students with disabilities, and a representative of the directors of Head Start programs.

The UPK Advisory Council was given the task to address curriculum standards in the areas of language and communication, early literacy and reading, and cognitive development that include developmentally appropriate assessments. The advisory report needed to include:

- Expected outcomes for children and school readiness programs
- Programmatic aspects of the VUPK program (best practices for quality VUPK education programs and providers)
- Coordination of VUPK education programs with existing school-readiness programs
- Cost estimates for quality VUPK programs

The UPK Advisory Council meetings were scheduled across Florida to be equitable to all of the diverse segments of this vast state – the Panhandle, in which Tallahassee the capital is located; the central region where the theme parks such as Disney and Universal Studios are located; and the major southern beach areas such as Tampa and Ft. Lauderdale. Florida maintains a “sunshine” law and all state-related meeting gatherings as well as information discussed at meetings must be open and available to the public. To serve this purpose, a website www.upkcouncil.org (now nonfunctioning) was established. This comprehensive resource included contact information about agencies and the UPK Advisory Council members as well as agendas and transcripts of meetings, presentations of experts, and meeting reference materials and also served as a means for public comment through a blog-type system (see Fig. 3.2).

The UPK Advisory Council maintained guiding principles, keeping central the intent of the citizen’s and early childhood community’s understanding of what they believe they voted for in 2002 (see Fig. 3.3). Florida already had in place the *Florida School Readiness Performance Standards for Three-, Four-, and Five-Year-Old Children 2002* developed by the Florida Partnership for School Readiness (FPSR), so after lengthy discussions, the council decided to use those standards with additional verbal language and emergent literacy indicators as child outcomes for VUPK.

Meeting agendas included prominent Early Childhood researchers and other professionals from across the country. Member attendance at meetings was high

- **June 24:** *Guiding Principles & Outcomes*; Tallahassee
 - **July 8:** *Conclusion of Outcomes*
- **July 23:** *Standards & Accountability*; Orlando
 - **August 6:** *Continuation of Standards*
- **August 20:** *Conclusion of Standards; began Costs & Resources*; Ft. Lauderdale
 - **September 10:** *Costs and Resources* ; Tallahassee
- **September 17:** *Service Delivery & Governance*; Tampa
- **October 1:** *Service Delivery & Governance* ; Tampa
- **October 15:** *First (had intended to be the final) Report*; Tampa

Fig. 3.2 UPK Advisory Council 2003 meeting agendas (Source: Florida State Board of Education Universal Prekindergarten Education Advisory Council Report and Recommendations to the State Board of Education, October 21, 2003)

Emphasize developmentally appropriate practices.

- Curricula and assessments in prekindergarten programs should be age-appropriate –focusing on early language development and literacy and reflecting individual needs and cultural and economic diversity.
- Appropriate assessment and intervention should be available to identify and support children who have early learning problems or special needs.

Focus on outcomes and accountability.

- Both public and private sector programs should focus on outcomes that align with Florida Partnership for School Readiness Performance Standards and the Sunshine State Standards.
- Programs should be accountable for outcomes, using a refined data collection and analysis structure.

Offer parental choice and opportunities for involvement.

- Programs should develop meaningful partnerships with parents, engaging them in decisions about their children’s program.
- Parents should have choices of programs, including settings that accommodate needs of working parents.

Be supported by adequate resources.

- Programs should have adequate, flexible resources needed to implement quality programs, including appropriate class size and teacher-child ratios.
- Providers, regardless of size, should have access to specialized resources.

Involve public/private partnerships.

- All types of providers should participate as equal partners.
- Communities must have flexibility to address specific community needs.
- Communities should demonstrate commitment to programs, supporting programs financially and helping develop capacity.

Employ qualified staff.

- Teachers should be qualified to provide an effective learning experience.
- The program should include a strong staff development component, engaging the community colleges and universities as partners in preparing early education providers.

(Andrews& Slate, 2001; Bowman, Donovan, Burns, 2000; Espinosa, 2002; Scott-Little, Kagan, Frelow, 2003; Shankoff & Phillips, 2002).

Fig. 3.3 UPK Advisory Council consensus – guiding principles (Source: Florida State Board of Education Universal Prekindergarten Education Advisory Council Report and Recommendations to the State Board of Education, October 21, 2003)

perhaps because they wanted to “strike while the iron was hot”; there was a short window of opportunity for this critical mission, if young children, especially those from high-needs areas, were to be served. Public comment was welcomed and meetings were generally reported to include thoughtful deliberation. On October 21, 2003, the Universal Prekindergarten Advisory Council rolled out its 88-page Report and Recommendations to the Florida State Board of Education, with sections on Accountability, Assessment, Community Partnerships, Parent involvement, Curriculum and Learning Environment, Professional Development, Costs and Resources, and Service Delivery Design and Governance ([Universal Pre-Kindergarten Advisory Council 2003](#)) (see the full 88-page report archived at http://www.teachmorelovemore.org/UPK_Report.asp).

On November 15, 2003, at a conference open to all and in Central Florida entitled – “Florida Universal Pre-K: A Brand New Day” – the tremendous work of the committee’s report to the State Board of Education was celebrated, while recommendations as well as advice from child authorities across the country provided strong research evidence support for the advocacy yet to be done with the 2004 Legislature. A “Wish List” of legislative priorities with aspects of quality childcare services topped the list. The Children’s Campaign, Inc. (<http://www.iamforkids.org/>) and the Florida Children’s Forum, Inc. (changed name to the Children’s Forum <http://www.thechildrensforum.com/>) provided almost daily messages through LISTSERV and public announcements to keep Legislators and the public informed of important quality indicators from the Advisory Council Report that must be represented in the 2004 implementation and funding legislation.

The UPK Advisory Council was, however, an “advisory” council, and just 2 days later, on November 17, 2003, the State Board of Education, after reviewing the UPK Advisory Board’s Report and Recommendations, presented their Recommendations and Options: *A Study of the Curriculum, Design, and Standards for Florida’s Voluntary Universal Prekindergarten Education Program (UPK)*.

The State Board of Education (2003) report differed from the UPK Advisory Council report on many key principles. The Florida Children’s Forum provided a summary comparison of the State Board of Education report to the UPK Advisory Council report (see Fig. 3.4).

The State Board of Education report maintained that “While it is imperative that the State have a vision of what the universal prekindergarten program eventually should look like, the State Board’s recommendations focus on what must be available beginning in 2005–2006 to all of Florida’s four-year-old children to meet the constitutional requirement of a ...highly quality prekindergarten learning opportunity delivered according to professional standards.” (State Board of Education 2003, p. 2)

Legislative Processes for Implementing the Amendment

Once the Universal Prekindergarten Education Advisory Council completed their work and submitted their report and recommendations to the State Board of Education, the State Board of Education’s revised recommendations moved to the

Governor's and the Florida Legislature's arena of responsibility for establishing the program in statute and appropriating a budget for the program. Issues flared in the short timeline of 2004 to implement a state program by Fall 2005. Various early care and education stakeholders weighed in, supporting or opposing the recommendations of the State Board of Education and/or the UPK Advisory Council. Agency placement of the program became a major battleground between stakeholders. The outcome was a plan to spread the program responsibilities across three state

High-Quality Learning Opportunity

<p>The State Board of Education recommendations include a redesign of the Florida School Readiness Performance Standards to include greater emphasis on early literacy and oral language skills. Related to assessment, the SBOE focused primarily on child performance and program performance (see Assessment and Evaluation section)</p>	<p>The UPK Advisory Council recommendations focus primarily on quality components of curricula, considerations for assessment, and guidelines for accountability. The UPK Advisory Council addresses assessment of the child, teacher, environment, and program</p>
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Quantity of Instruction

<p>The State Board of Education recommendations specify a 4-hour program day and a total of 180 days of program operation</p>	<p>The UPK Advisory Council recommendations provide a minimum of 4 hours of direct instruction and 180 days of operating programs</p>
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Delivery System

<p>The State Board of Education identifies a CDA as the necessary credential for UPK classrooms by 2006–2007</p>	<p>The UPK Advisory Council in reference to teacher qualifications details professional development, skill development and implementation processes. The UPK Advisory Council included a phased implementation plan for the eventual requirement of a four-year degree per classroom</p>
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Assessment and Evaluation

<p>The State Board of Education outlines processes of evaluation related to child and program performance with the development of consequences for poor performing schools that support program improvement</p>	<p>The UPK Advisory Council addresses evaluation considerations for the child, teacher, environment, and program with the provision of statewide guidelines to guide assessment</p>
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Fig. 3.4 Florida State Board of Education report vs. UPK Advisory Council report (Reprinted by permission from the Children's Forum, 2807 Remington Green Circle, Tallahassee, FL 32308)

Funding

<p>The State Board of Education identifies a cost per year based on Gold Seal programs. The SBOE recommends a workforce study for the capacity of programs and teachers</p>	<p>The UPK Advisory Council did not put forth a dollar amount for quality operations, but includes the need for funding considerations of extended day services. The UPK Advisory Council also recommends public/private partnerships to address the issue of capacity</p>
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Best Practices to Improve the Outcomes of School Readiness Coalitions and Providers

<p>The State Board of Education and the UPK Advisory Council put forth consistent recommendations related to Best Practices to Improve the Outcomes of School Readiness Coalitions and Providers for local governance</p>

State Governance

<p>The State Board of Education recommends a steering committee for implementation of UPK</p>	<p>The UPK Advisory Council recommends the creation of a Board for guidance, development, and council</p>
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Fig. 3.4 (continued)

agencies. The Agency for Workforce Innovation was charged with oversight of the day-to-day administration of the program at the state level. The Department of Education was given responsibility for development and oversight of standards, curricula, and kindergarten readiness screening and rates. As the state entity responsible for childcare licensing, the Department of Children and Families was charged with posting licensing profiles of VPK providers and coordinating with the other state agencies. Responsibility for local oversight of VPK was given to Early Learning Coalitions across Florida (Florida House of Representatives 2010).

Program Parameters

Faced with other constitutional mandates (bullet train and class size amendments) and a state budget deficit, it also quickly became apparent that the Florida Legislature had little incentive to fund the program at the recommended levels. In May 2004, the legislature passed what many believed was a flawed bill without provisions for quality and no phases for improvements to quality, such as increased requirements for teacher professional development or strong curricula requirements. Many child advocates continued to argue that the program created by the legislature was not of “high quality” as required by the Constitutional Amendment. Governor Jeb Bush vetoed the bill in July 2004 saying that it did

Table 3.2 VPK program parameters

Program characteristics	School-year program	Summer program
Program length	540 instructional hours	300 instructional hours
Class size	4–18 children	4–12 children
Teacher credentials	Child Development Association (CDA) or equivalent	Florida teacher certification or a bachelor’s degree in early childhood education or child development
Second instructor (no credential required)	For classes of 11 or more children	Not required
Provider requirements	Licensed childcare facility or family child care home; nonpublic accredited school exempt from licensure; accredited faith-based child care provider exempt from licensure; or public school	Licensed child care facility or family child care home; nonpublic accredited school-exempt from licensure; accredited faith-based child care provider exempt from licensure; or public school
Background screening	Must pass a level 2 background screening (includes local, state, and federal criminal records checks) before employment, which must be repeated at least once every 5 years	Must pass a level 2 background screening (includes local, state, and federal criminal records checks) before employment, which must be repeated at least once every 5 years

Source: Florida Statutes, 1002.51–1002.79

not include the necessary quality requirements. During a special session of the Florida Legislature, a new bill was passed and signed into law by the Governor. The Voluntary Prekindergarten Education (VPK) Program was created as a free prekindergarten program for eligible children (a child must be a Florida resident and attain 4 years of age on or before September 1 of the academic year of prekindergarten). Strong emphasis was placed on the parents’ right to choose whether to send their child or not (voluntary) (1) to either a school-year or summer program and (2) to either a private prekindergarten provider or a public school. Table 3.2 provides a summary of program characteristics.

Budget Parameters

A number of budget projections were developed, most developed based on an anticipated 70 % child participation rate, Georgia’s participation rate. The Revenue Estimating Conference predicted in June 2002 that Universal Prekindergarten would cost between \$425 and \$650 million a year (\$4,320 per child per program year). The Council for Education Policy, Research, and Improvement (a citizen board for policy research and analysis housed under the Office of Legislative Affairs until 2006) released a similar estimate (\$4,282 per child; \$396 to \$651 million per program year).

The Florida Department of Education's estimates were lower (\$277 to \$462 million for the first year with \$310 to \$516 million for the second year). All three estimates included a 6-h day in their calculations (Hampton 2003a, b).

The Policy Group for Florida's Families and Children, an independent, nonpartisan, nonprofit organization composed of state and local leaders focused on the promotion of evidence-based policies and practices that support the well-being of families and children, did an extensive analysis of prekindergarten programs in other states and developed a model of policies and funding parameters based on the Advisory Council deliberations and the growing likelihood that Florida would implement a prekindergarten program with a 3-h day. Differential teacher salary payments based on credentials, sufficient funding for monitoring of prekindergarten programs for quality enhancements, professional development opportunities and funding, funding for training and technical assistance consultants, and a third-party evaluation to ensure that inputs and quality requirements lead to positive child outcomes were included in their funding calculations of \$3,852 per child or \$5.7 million annually (with a 70 % participation rate) (Ghazvini and Foster 2004). In the end, the Florida Legislature delivered a 3-h a day program with less than funding than any of the projections or proposals.

According to The Children's Campaign, Inc., the 2004 legislative session followed neither the recommendations of the State Board of Education nor the UPK Advisory Council in implementation bills. The Children's Campaign with the UPK Executive Committee, a grassroots leadership team of proponents for high-quality UPK, laid out 11 key principles in their advocacy to the legislature. For the Bill that passed, only one of the key principles was met – equal access to programs and no cost to families; others were partially met, and some were not met at all. A summary of those key principles is presented in Table 3.3.

Carrying Out the Voter's Wishes: The First Year

While the many grassroots advocacy efforts continued working on improvement of quality principles, even years after the 2005 inception, communities dug in and worked with the funding appropriated and ongoing revised legislative edicts. For this first year of VPK to start August 2005, state agencies and local early learning coalitions had a very tight timeline to implement the program passed by the 2004 Florida Legislature. The DOE quickly convened a workgroup of early childhood experts to develop VPK Education Standards to address what children participating in VPK should know and be able to do by the conclusion of the VPK program. As soon as the State Board of Education adopted the VPK Education Standards, DOE moved to approve the Kindergarten Readiness Screening. Although the state had a kindergarten readiness screening prior to the implementation of VPK, the new VPK statute linked the kindergarten readiness screening to the success of VPK. Florida's kindergarten readiness rate was defined as the percentage of a public school's or private provider's students who completed the VPK program ready for kindergarten

Table 3.3 Key principles for quality compared to 2004 Florida Legislation

Children’s Campaign key principles	Impact of 2004 Legislation
Services for UPK in the Department of Education, headed by a Chancellor of Early Learning	UPK placed in the Department of Education; School Readiness remains in the Agency for Workforce Innovation (AWI); the Partnership for School Readiness Office is abolished
Staff qualifications no less than a Child Development Associate beginning in 2005 with benchmarks for increased qualifications – 2010 associate degree and 2013 bachelor’s degree	Child Development Associate required with no benchmarks mentioned
Unified system of services for children birth to 5 years of age	Regional Child Development boards and a Florida Child Development Advisory Council have some but unclear authority and managerial roles
Parent choice of settings – private, public, faith based	A choice provided, but the length of day (3 h per day) does not meet the needs of working families
Resource and referral agencies should provide a variety of services that streamline and not duplicate services	RR – access to a Regional Single Point of Entry, but not speak to unifying the school readiness enrollment process
Services for school-age children for before/after care	No mention
Gold Seal (high-level) accreditation required of all UPK providers by 2006	A variety of accreditations, some with minimal oversight, are allowed to meet the VPK qualifications
Staff to child ratios should not exceed one adult per ten children. UPK classroom group size should not exceed 20	No ratio mentioned except for the summer program option
A minimum of 720 instructional hours to achieve the desired learning outcomes	Summer program, certified teacher, 300 instructional hours School-year program, CDA teacher, 540 instructional hours; most programs 3 h per day/180 days
A professional development system for teachers to improve skills and obtain credentials	No mention of TEACH scholarships, nor articulations from 2- to 4-year institutions of higher education
Equal access must be ensured through equity in payment and free for all families	<i>MET</i>

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as measured by the Florida Kindergarten Readiness Screening (Florida House of Representatives 2010). The statute also called for the state board to establish a “low-performing” rate but prohibited the readiness rate to be any higher than the rate at which 15 % of VPK providers are designated as low performing.

AWI quickly developed guidance for early learning coalitions on VPK program implementation. Early learning coalitions were responsible for VPK provider recruitment and eligibility determination, provision of a resource and referral center to help

parents in choosing VPK providers, certification of eligible children, fiscal monitoring to ensure appropriate VPK expenditures, quality assurance with on-site monitoring for adherence to program requirements, invoicing and paying providers, and handling parent and provider concerns and grievances. As the state agency overseeing early learning coalitions, AWI was responsible for developing the parameters for these administrative and support functions and monitoring their implementation.

Overall, the implementation of VPK was considered a success in Florida. Despite the logistics of enrolling almost 106,000 children, a study by AWI found that parents and providers, for the most part, were satisfied. AWI completed a review of the first year of implementation, visiting seven coalitions and interviewing staff, board members, contracted service providers, school district personnel, childcare licensing staff, Head Start staff, VPK providers, and VPK parents. The majority of parents (78 %) were very satisfied with the VPK program. Several issues, however, were found, including mixed success of marketing and outreach, problems with the eligibility certification and attendance verification processes, inconsistent documentation of instructor qualifications, and limited monitoring and technical assistance. There were also concerns regarding the long instructional day that was developed for the 300-h summer VPK programming and the ability of a 3-h instructional day to meet curricula requirements (Agency for Workforce Innovation 2007).

Continuation of the Program: Participation and Funding

Participation in Florida's VPK program increased each year since its inception. Table 3.4 provides a summary of enrollment data and funding (Florida Department of Education 2006; Florida House of Representatives 2010).

Funding for the VPK program must be appropriated each year by the Florida Legislature and has remained relatively consistent since the program's inception. After slight increases in years 2 and 3, there have been slight decreases in the base student allocation during the last 2 years. Administrative and support funding at the agency and early learning coalition levels have also decreased in recent years from 5 to 4 % (Florida Department of Education 2006; Florida Children's Services Council 2011).

Accountability

The annual Florida Kindergarten Readiness Screening (FLKRS) used for the first 5 years of implementation demonstrated that children participating in VPK are more likely than nonparticipants to be assessed "ready" for kindergarten. FLKRS was made up of a subset of the Early Childhood Observation System (ECHOS),

Table 3.4 VPK program enrollment and funding

Program year	School-year program	Summer program	Total enrollment	Participation rate (%)	Per student funding for school year	Per student funding for summer	Total funding appropriated ^a
2005–2006	94,011	12,468	106,479	48.0	\$2,500	\$2,500	\$387,137,762
2006–2007	113,253	10,314	123,567	54.5	\$2,560	\$2,560	\$388,100,000
2007–2008	125,141	9,576	134,717	58.2	\$2,677	\$2,677	\$343,750,562
2008–2009	137,637	10,115	147,752	63.5	\$2,575	\$2,190	\$353,488,827
2009–2010	148,274	8,169	156,443	67.2	\$2,575	\$2,190	\$366,789,114
2010–2011	157,079	8,293	165,372	76.2	\$2,562	\$2,179	\$404,372,806

Source: Florida Office of Early Learning, Florida Voluntary Prekindergarten Education Program Fact Book, <http://factbook.flawwi.com>

^aUnspent funds are returned to the state when enrollment is lower than anticipated

an observational instrument that is used to monitor the skills, knowledge, and behaviors a student demonstrates or needs to develop; and two probes of the Dynamic Indicators of Basic Early Literacy Skills (DIBELS), Letter Naming Fluency and Initial Sound Fluency. After the first year of VPK, 61 % of VPK participants were determined “ready” for kindergarten (OPPAGA 2008). In 2009–2010, 89 % were assessed “ready” for kindergarten (Florida Department of Education 2010). The difference between participants and nonparticipants has seen slight variations. For example, the readiness rate of VPK participants in 2005–2006, the first year of assessment, was 12 % higher than children who did not participate, with the greatest differences found for children with disabilities, limited English proficiency, and Hispanic and African American children. This difference grew to 15 % in 2006–2007, and a 10 % difference on the ECHOS assessment and 19 % difference on the Reading Assessment were found in 2009–2010 (Florida Department of Education 2010; OPPAGA 2008; Senate Committee on Education PreK-12 2011).

Concerns regarding the screening and readiness rate continue to be expressed. A 2008 Office of Program Policy Analysis and Government Accountability (OPPAGA) report outlined several concerns regarding the Department of Education (DOE)’s accountability process including lack of readiness rates for children attending non-public schools. OPPAGA (2008) reported that DOE provided an incomplete picture of readiness due to the method of reporting readiness rates on each assessment measure separately, the method used to identify low-performing providers, and the timeliness of release of accountability reports. In a follow-up report in 2010, many of these issues had still not been resolved. Although report timeliness had improved and efforts had been made to reach out to nonpublic schools, concerns still remained regarding the percentage of VPK participants who did not complete a kindergarten readiness screening and the methods of calculating readiness rates and low-performing providers (OPPAGA 2010).

Quality Enhancement Efforts and Shortcomings

In an effort to clarify some of the VPK child readiness issues, another grassroots collaborative initiative was spearheaded by the Children’s Forum, two Florida universities (University of Central Florida and University of North Florida), the Florida Community College Early Care and Education Network, and nine Early Learning Coalitions to write and receive funding for the Florida PERKS (Partners in Education and Research for Kindergarten Success). This 3-year project from 2005 to 2008 was funded by the US Department of Education and designed to improve the knowledge and skills of early childhood teachers working in “high-needs” communities. They collaborated to:

- Increase the knowledge, skills, and practices of VPK teachers through early childhood development coursework at the community college level
- Test the effectiveness of varying intensity levels of technical assistance
- Enhance child outcomes through the professional development and technical assistance provided to teachers

In general, the findings confirmed the value of coursework at the college level and coordinated technical assistance to impact child knowledge and skills, as well as teacher classroom practices. Monthly technical assistance visits were more effective than telephone technical assistance or weekly on-site visits, and the coursework and technical assistance was associated with improved child outcomes (Hartle et al. 2007; U.S. Department of Education 2007, 2008).

While the evidence of DOE assessments on teacher quality related to child performance for the early years of VPK remained unresolved, in an effort to improve teacher quality overall, the Florida DOE developed several courses, eventually available online through the Department of Children and Families (DCF) Training Management System. Courses include Emergent Literacy, VPK Director Credential, English Language Learners, and Language and Vocabulary. VPK Early Learning Standards training, first developed in 2005 and revised in 2008, is delivered through DOE VPK Instructors. A VPK Teacher Toolkit was also developed, targeting Language and Vocabulary and Mathematical Thinking in the VPK classroom. In response to repeated criticism from the field regarding the confusion of having two sets of standards for 4-year-olds (VPK Education Standards and Early Learning Standards for Four-Year-Olds) and considering the statute requirements of review of the standards every 3 years, DOE and AWI, with input from key early childhood groups and professionals, revised the 2008 standards to develop a unified set of 2011 Florida VPK Standards.

During 2009 and 2010, the Florida VPK Assessment, an effort to infuse child assessments into the VPK program year, was developed and field-tested through a collaboration between Florida Department of Education and the Florida Center for Reading Research. In outlining the requirements for the assessment, DOE focused on ensuring that the assessment reflected current research on emergent literacy and numeracy, aligned with the VPK Education Standards, predicted student performance on the Florida Assessment for Instruction in Reading for Kindergarten, and informed classroom practices, providing VPK teachers with valid and reliable feedback regarding children’s progress in attaining the skills identified in the VPK

<p>Not met</p> <ol style="list-style-type: none"> 1. Teacher degree requirement: Lead teachers in both public and private settings must be required to hold at least a Bachelor's degree. 2. Assistant teacher degree requirement: Assistant teachers are required to hold at least a CDA or equivalent training 3. Teacher in-service requirement: Teachers must be required to attend an average of at least 15 clock-hours of professional development per year. 4. Staff-child ratio: At least one staff member must be present per 10 children in a classroom. 5. Screening-referral requirements: Programs are required to provide both screening and referral services covering at least vision, hearing, and health. 6. Required support services: Programs must offer (either directly or through active referral) at least one type of additional support service for families of participants or the participants themselves. 7. Meal requirements: All participants must be offered at least one meal per day <p>Met</p> <ol style="list-style-type: none"> 1. Curriculum Standards: The state must have comprehensive curriculum standards that are specific to pre-kindergarten 2. Teacher specialized training requirement: Pre-service requirements for lead teachers should include specialized training in pre-kindergarten. 3. Maximum class size: Classes must be limited to no more than 20 children.
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Fig. 3.5 NIEER Quality State Pre-K. Indicators met/not met by Florida VPK (Source: National Institute of Early Education Research 2009)

Education Standards. Field testing was completed in 2010 with planned statewide implementation for Fall 2010. Without specific funding, statewide implementation has been limited. Participation is optional, as interested programs must pay for part of the assessment costs (Florida Department of Education 2010).

While some initiatives have been implemented to enhance quality, funding limitations resulted in a lack of even minimal quality indicators (standards) known to impact overall child outcomes. According to the National Institute of Early Education Research (NIEER 2009), the Florida VPK program meets only three of the ten standards for quality prekindergarten (see Fig. 3.5).

What the NIEER researchers found was that professional development and education requirements are limited, programs may select their own curriculum (unless identified as a low-performing provider for 3 years in a row), and the only health and safety requirements are the minimum standards of childcare licensure. For license-exempt programs that are overseen by various accrediting bodies, there are few consequences when health and safety concerns occur. Early learning coalitions have terminated school readiness (childcare subsidy) contracts with some providers with egregious health and safety violations who continue to meet requirements and provide the VPK program. Without additional funding, which appears highly unlikely given Florida's economic situation since 2004, standards cannot be raised for Florida's VPK program.

Conclusion

While the VPK programming implemented is less than the ideal that voters wished for during that day in November 2002 when they cast their ballot for this Amendment to the Florida Constitution, it has provided a ray of hope for many parents with lower incomes, just above the poverty level. VPK provides an important educational opportunity for their children at no cost, and their only other options would have been no preschool at all. The configuration of VPK as of 2011, after 6 years of implementation, is found in Fig. 3.6 (Florida House of Representatives 2010). Even though

What Is Florida Voluntary Prekindergarten (VPK)?

(see <http://www.floridajobs.org/VPK/WhyPreKimportant.html> and <http://www.fldoe.org/earlylearning/>)

VPK stands for the *Voluntary Prekindergarten* Education Program. If you live in Florida, and your child turns 4 years of age by September 1, your child is eligible to participate in Florida's FREE Voluntary Prekindergarten (VPK) education program

Highlights of the VPK Program

FREE for all children who live in Florida and who turn 4 years of age by September 1

- No registration fee
- Parents may choose a participating private childcare or public school provider
- Early language and literacy focus

Curriculum

- Focuses on reading, writing, and social skills
- Prepares children to be ready for kindergarten
- Based on the adopted Florida VPK Education Standards (2008) in three areas: the domains of Language and Communication and Emergent Literacy, and in Mathematical Thinking; revised every three years

VPK Program Options

- *Option 1:* school-year VPK—540 instructional hours. [School-year VPK](#)
- *Option 2:* summer VPK—300 instructional hours. [Summer VPK](#)

VPK Providers

- Parents have the option of choosing the provider that meets their own family's needs
- Options include private and faith-based child care centers, private and public schools and licensed family childcare homes
- All VPK providers must meet high standards required by law

Fig. 3.6 Configuration and definition of Florida VPK in 2011 (Source: Florida House of Representatives 2010)

Instructors

- Ratios are 1 instructor to 10 children
- Class size will not exceed 18 children in the school-year program and will not exceed 10 children for the summer program
- All VPK instructors must have a minimum of a child development associate for the school-year program or a bachelor's degree in early childhood or related fields for the summer program

Transportation

Parents are responsible for their child's transportation

Child Assessment

The statute mandated a statewide kindergarten screening that assesses the readiness of each student based on the adopted VPK Standards. The Florida Center for Reading Research has developed the Florida Voluntary Prekindergarten (VPK) Assessment, in collaboration with the Department of Education. The purpose of this assessment is to provide teachers with valid and reliable feedback regarding children's progress in attaining the skills in the VPK Education Standards, so that teachers may use this information to inform instructional decisions in the VPK classroom. The VPK Assessment includes progress monitoring measures in the areas of Print Knowledge, Phonological Awareness, Mathematics, and Oral Language/Vocabulary that are aligned with the VPK Education Standards.

Fig. 3.6 (continued)

working families have to secure and fund their child's care and education for the remainder of their work day, VPK provides a significant benefit for a portion (3 h) of each day. For especially smaller childcare and education providers, the guaranteed state funds for children attending VPK can be a great addition to their budgets. Florida VPK continues to evolve as strong advocates continue to rally support for the highest quality possible for the young children in state with no state income tax. Rays of VPK "sunshine" seem only limited by "clouds" of state budget deficits.

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Part II
Curriculum Initiatives for Early
Childhood Programs in a Global Age

Chapter 4

Opening Doors in Northern Chile: The International School of Arica

Michelle Pierce

Abstract In the northern Chilean city of Arica, Abigail Uribe had a dream of inviting the country's youngest citizens to learn English in the region's first bilingual school. The International School of Arica, referred to locally as TISA, opened its doors in 2007 with 43 students, toddlers through age 6. By the second year the number of students had doubled, and the school now houses a 2nd-grade class, with the expectation that grades would be added as the students continue to progress. A native of Santiago, Uribe moved to Arica, a city just 9 miles from the border with Peru, and was initially looking for a way to ensure that her own young children could have a quality bilingual learning experience. Her desire was timely, as Chile's "English Opens Doors" program had begun in 2003 as the Ministry of Education's endeavor to improve English as a foreign language teaching and guarantee that all Chilean students have access to English instruction at school. Even in this era of change, opening "a bilingual school in the desert," as Uribe calls it, was not without its challenges. Large cosmopolitan cities such as Santiago have much greater access to English-speaking staff, resources, and families who are seeking to provide their children with education in two languages. This chapter presents a case study of the International School of Arica, based on observations and interviews during the author's 3-month stay in the city, with the hope that TISA may serve as a model for those in other remote areas who seek to promote and develop bilingual programs. In particular, the chapter examines the school's creation, including recruitment of students and teachers; the school's structure and curriculum; parents' reasons for placing children in TISA and response to their children's bilingual development; the community's response to the school's opening; and the state of TISA today.

Keywords Bilingual education • Foreign language instruction • English as a foreign language • International schools

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Introduction

In the northern Chilean city of Arica, Abigail “Abi” Uribe had a dream of inviting the country’s youngest citizens to learn English in a bilingual school. The International School of Arica, referred to locally as “TISA,” opened its doors in 2007 with 43 students, toddlers through age 6. By the second year the number of students had doubled, and the school housed a 2nd-grade class, with the expectation that grades would be added as the students continue to progress. A native of Santiago, Abi, moved to Arica, a city just 9 miles from the border with Peru, and was initially looking for a way to ensure that her own young children could have a quality bilingual learning experience. Her desire was timely, as Chile’s “English Opens Doors” program had begun in 2004 as the Ministry of Education’s endeavor to improve English as a foreign language teaching and guarantee that all Chilean students have access to English instruction at school. Even in this era of change, opening “a bilingual school in the desert,” as Abi calls it, was not without its challenges. Large cosmopolitan cities such as Santiago have much greater access to English-speaking staff, resources, and families who are seeking to provide their children with education in two languages.

This chapter presents a case study of the International School of Arica (TISA), based on classroom observations and interviews with the school’s staff and parents during my 3-month stay in the city as a Fulbright scholar and visiting professor at the Universidad de Tarapacá de Arica. My hope is that TISA may serve as a model for those in other remote areas who seek to promote and develop bilingual programs. In particular, the chapter examines the school’s creation, including recruitment of students and teachers, the school’s structure and curriculum, parents’ reasons for placing children in TISA and response to their children’s bilingual development, the community’s response to the school’s opening, and the future of bilingual education in the region.

Benefits of Bilingualism

Abi was not alone in her desire to foster bilingualism in her children, as thousands of children worldwide grow up in homes and study in schools in which the use of two (or more) languages is the norm. There is evidence to suggest that bilingualism has a positive impact on cognitive abilities. Bialystok and her colleagues have examined the effects of bilingualism on the cognitive abilities of children aged 4–8 and discovered that the bilingual children were significantly better than their monolingual peers in certain kinds of tasks. Bilinguals seem to be especially adept at tasks that require the inhibition of distractions and switching between tasks – not surprising, given that those skills are put to use continually when one functions in two languages:

We all have a network in place that helps in resolving conflict; research suggests that bilinguals may tap this same network to help with interference control—that is, limit interference from the second language when they want to speak using the first. In addition, there is another network that individuals use when switching between tasks and bilinguals may recruit this same system when switching from one language to another. Since bilinguals are constantly recruiting these networks for effective communication, they may become enhanced for other, non-language related cognitive processing. The bilingual advantage in attention and cognitive control may have important, long-term benefits. For example, preliminary evidence even suggests that their increased use of these systems may protect bilinguals against Alzheimer's. (Bialystok et al. 2009, p. 89)

Moreover, a comprehensive review of 63 studies on the cognitive correlates of bilingualism indicated that bilingualism is linked to “increased attentional control, working memory, metalinguistic awareness, and abstract and symbolic representation skills” (Adesope et al. 2010, p. 207). Bilingualism is not merely convenient or advantageous; it may actually enhance the way we think.

In addition to the positive impact on cognitive development, the study of more than one language may also have powerful sociocultural effects. Bamford and Mizokawa (1989) administered the CCAI (Cross-Cultural Attitudes Inventory), a measure of attitudes toward Mexican-American culture, and found that 2nd graders in a Spanish immersion setting had a significant change in attitudes toward Mexican-American culture, as compared with 2nd graders in the monolingual English setting. Robert Gardner's decades of research in the area of motivation and attitudes in second language learning also suggest that more positive attitudes toward the target culture may be an outcome of second language study (Gardner 1985; Masgoret and Gardner 2003).

A bilingual schooling experience, therefore, can provide children with multiple advantages in both the cognitive and social realms. However, creating a successful bilingual education experience is a challenging endeavor, especially with regard to decisions around how best to provide dual-language instruction.

Teaching and Learning Academic Content in Two Languages

A recurring theme among teachers in bilingual classrooms is how to plan instruction for students who are learning academic content through a second language. de Jong (1996) observed and interviewed teachers in nine bilingual classrooms representing grades K-5; all teachers cited language proficiency – not having full access to the language of instruction – as the most significant barrier to learning content matter. In their presentation of a conceptual framework for the integration of content in foreign and second language instruction, Snow et al. (1989) suggest ways in which teachers in ESL and immersion settings can approach language and content integration. In some settings there may be separate language and content area teachers who can join forces to plan activities that draw on both of these areas of expertise. In other cases, one teacher must play both roles. They describe an immersion teacher

as one who “simultaneously plays the role of content teacher teaching subject matter and the language teacher seeking out opportunities to maximize language development” (p. 211). Teachers must constantly engage in a negotiation of meaning process around the content matter.

Also highlighted in the research is the concept of academic or discipline-specific language. As an example, “a math lesson on measurement would require students to know the vocabulary for systems of measurement, whether inches or feet, or metric terms” (Snow et al. 1989, p. 206). This content-obligatory language makes up part of what Cummins (1984) described as the context-reduced, cognitively demanding language proficiency required for academic achievement. Both Cummins (1981) and Collier (1987) found that children generally could attain the proficiency necessary for face-to-face conversational interactions in their second language in 2 years; but it takes anywhere from 5 to 9 years to reach the level of native speakers for tasks requiring cognitively demanding academic language in the second language. Hence, a great deal of attention must be given to developing academic second language skills while ensuring that students are learning the appropriate grade-level content concepts. Research suggests that a preview-review method of conducting introductory and follow-up review in the native language is effective in facilitating the learning of content concepts, as opposed to concurrent translation in native and second language (Ovando et al. 2005; Ulanoff and Pucci 1993). In short, it is important that teachers use the second language consistently at designated times, providing support for content learning through the use of visuals, demonstrations, and modified language; but previews or reviews of concepts in the native language are also warranted.

The consistent but separate use of two languages also holds true for literacy instruction. A comprehensive review of research on bilingual vs. English-only reading instruction indicates that the optimal instructional approach is one in which reading in the native language and English are both taught, but at different times each day (Slavin and Cheung 2005). Importantly, the authors note that “across 17 qualifying studies of all types of programs, 12 found effects favoring bilingual education and 5 found no differences. None of the studies found results favoring English immersion” (p. 273). Therefore, the importance of carefully planned literacy instruction in both languages cannot be understated.

While teachers’ instruction in one language at a particular time may remain consistent, children’s responses to this instruction may very well be inconsistent, especially in the beginning. One consequence of learning academic content through a second language is that students may revert to their native language for content area discussions. Generally, this is thought to be acceptable, given that the primary goal in schools is learning academic content and skills (Freeman 1998; Genesee 1987). Even if dual-language proficiency is a desired outcome, this goal should not be sacrificed.

It is also essential to recognize that language learners come to the classroom as individuals and that factors such as age and personality play a role in the second language learning experience. Tabors (1997) notes, for instance, that a child’s ability to take risks is one aspect of personality that is salient to the discussion of successful second language acquisition:

Risk-taking children often plunge almost fearlessly into communication in the new language, making many mistakes, but getting by nonetheless...instead of hanging back until they believe they are totally competent, they use whatever words they have and hope for the best....(p. 86)

But Tabors also stresses the differences in the levels of motivation that learners possess, noting that in addition to social risk-takers, there are also students who may initially refuse to “play the game of second language acquisition” (p. 80). Preschool children may persist longer in the use of their native language or may be content to spend a longer time being nonverbal (Tabors 1997). On the other hand, Wong-Fillmore (1991) suggests that younger children are at an advantage for the initial phases of language learning because they may go for hours undaunted by the fact that they do not share a common language with playmates, for example, whereas by 3rd and 4th grade, children are “much more hamstrung by the inability to communicate easily with one another” (p. 62).

In the sections that follow, as the Chilean education system and the creation of TISA are described in more detail, we will see many of these important aspects of nascent bilingualism and features of quality bilingual programs played out in the daily lives of young children in the TISA community.

Chile and Its Educational System

Chile stretches 2,653 miles (4,270 km) along the Pacific Ocean and boasts a rich history, varied landscape, and recent acclaim as one of the most progressive and thriving countries in South America. While the majority of Chileans speak Spanish as their native language, members of indigenous communities also speak other native languages, such as Mapudungun, the language of the Mapuche in south-central; Chilean Quechua; or Aymara in the northernmost region of Arica and Parinacota. Indeed, in the city of Arica a number of official signs in government buildings are in both Spanish and Aymara.

The educational system in Chile consists of three basic levels: *parvularia* (for children up to 5 years of age), *básica* (ages 5–13, divided into 8 grades), and *media* (ages 13–18, divided into 4 grades). School is required from ages 5 to 18, and both public and private universities are an option for those seeking higher education. Education in Chile operates on a system of vouchers that cover the majority of primary and secondary students. Schools receive direct payments based on daily attendance. Schools are either *pública* (nearly all owned by the municipality), *subvencionada* (subsidized mostly with government funds), or *privada* (private, but still may receive some government subsidies).

Regardless of the funding source, the curriculum for childhood and adolescent education in Chile is designed and managed by the country’s Ministry of Education. The national curriculum, which also mandates textbooks to be used, includes a number of themes and topics at each level. In early childhood classrooms, personal and social development and relationships with the natural and

cultural world are emphasized. In elementary levels, beginning in grade 1, subject areas include language and communication; natural sciences; history, geography, and social sciences; and mathematics (Ministerio de Educación 2012).

The Study of English in Chile

The study of English as a second language in Chile took a great leap forward in 2004 with the creation of the “Inglés Abre Puertas” (English Opens Doors) program during the tenure of Chilean president Michelle Bachelet and minister of education Mónica Jiménez. The program aimed to improve the instruction and learning of English among elementary and high school students. However, in order to achieve that goal, the country found itself in need of more highly qualified teachers of English. Hence, numerous projects related to professional development for English teachers began, including the creation of local teacher networks for the sharing of instructional strategies, workshops to develop specific skills, scholarships to study abroad, and increased emphasis on the quality and number of courses in English and language pedagogy offered at Chilean universities. Interestingly, in 2009, during my 3-month stay in Arica, the initiative underwent a change in name from “English Opens Doors” to “Languages Open Doors” (Idiomas Abren Puertas) to include Mandarin Chinese, German, and French.

In any case, Abi Uribe’s decision to embark on the development of a bilingual school was timely, in light of the country’s increased emphasis on language study as a means to greater opportunities and global understanding.

The TISA Vision

Abi’s early fascination with language learning and teaching is where the story of The International School of Arica (TISA) truly begins. Abi attended a public school in Santiago, the nation’s capital, and knew in early childhood that she wanted to teach something, having admired her 2nd-grade teacher and the values and compassion she transmitted. She began studying English in 5th grade and discovered she had a love for and facility with the language. Later, at Universidad Metropolitana, she continued her studies and began substitute teaching at a private school; but she knew she needed to learn more.

A chance to travel to Mexico changed Abi’s thinking and would ultimately lead to the founding of TISA. In Mexico, Abi joined with students of English from all over the globe – Finland, Russia, China, and others. “I understood how relevant English was to me because I could know the world through these people,” she explains. “When I realized that I had the chance to know the world through my English, I said, this is the way. It’s so relevant to provide your students this global view of the world.”

In Mexico Abi was part of an institute led by Myriam Monterrubio and colleagues at the CCME (Centro de Capacitacion para Maestros de Ingles/Training Center for Teachers of English), which focused on teaching languages to young children. She notes, “You have to follow the same process that we follow in the native language acquisition. Learning by doing was a real thing – not something we do because it sounds beautiful.” In a second institute, Abi studied cognitive theory and multiple intelligences, emphasizing the impact of this work with an analogy: “I entered into the ‘brain world.’ It must be like when a doctor knows about all the systems that you have inside, so that you can understand that when someone feels this, it’s because of this.” When she returned to Chile, her studies abroad had changed her views and helped to create her vision for a bilingual school.

Upon returning to Chile, Abi visited bilingual schools in various regions, taking note of the aspects of the schools that she liked, and began work on a proposal for what she called the “perfect school.” It would have no more than 20 students per class, with 2–3 adults per class, begin with children at a very young age, employ theories of multiple intelligences, encourage learning by doing, and foster bilingualism. “Why? Because I am absolutely sure that bilingual people are more intelligent!” she laughs, “It’s very difficult to know two languages; getting a bilingual mind is hard work.”

The TISA Design and Curriculum

It was not until Abi and her family moved to the northern port city of Arica that she would have the chance to put her plan into action. Upon settling in Arica, Abi secured funding from a private owner and would serve herself as the school’s creator and director; she had also located a building in which to house the school.

TISA opened with a total of 43 children in four different groups in its first year: “Play Group 1” for babies (generally accepted around the time they can walk on their own) and toddlers, “Play Group 2” for children age 3, “Pre-Kinder” for age 4, and “Kinder” for age 5. Abi was especially committed to using a thematic room system, whereby the children move from room to room, and the rooms themselves are set up by discipline – science, language, and so on. She remarks, “We have seen how our students have improved in autonomy. All the rest of the preschools have just one room, the same room for everybody. Here they move naturally, they say ‘hi.’ It’s like a kind of small city.”

Each room was staffed with three adults: an English teacher, a credentialed preschool teacher, and a “técnico,” or teacher’s aide. Abi explains, “In most schools, the técnicos clean, change diapers, and prepare materials. At TISA, all of them have to plan, all of them have to assess.” I asked if there were ever tension around técnicos being asked to do the work of teachers. On the contrary, Abi states, “They feel so proud. They are so wonderful; so smart, so responsible. I told them, ‘You have two more years to finish their studies to become teachers.’” This pride in shared responsibility is easily noticed in a discussion I had with Miss

Kelly, a teacher in the Kinder class, who explained that the teachers and técnicos plan together on Mondays a week in advance. “What we most try to avoid is the idea that we have to go over material and get through it in a certain amount of time, without any attention to whether the child has learned. We respect the progress of each child,” she says. The discussion I had with Kelly mirrored discussions I had with the two teachers in the room; while the job titles may differ, the sense of pride and responsibility was the same.

This notion of one community with a shared commitment extends outside of the classroom as well. Miss Anita and Don Mario, who clean and take care of the building, wear the same blue and gold uniform as students and are featured in photos along with teachers in the school’s entryway. “This the TISA view,” explains Abi, “Miss Anita is part of the team, as is Don Mario. If our students see the way we behave, the way we treat people, they’re going to do the same.”

Since academic content is determined by the national curriculum, the work of the TISA staff is to create materials and lessons to deliver and assess the content in English. Making content comprehensible through English is accomplished through the use of myriad teaching strategies – visuals, repetition, rephrasing, and continual comprehension checks. The native language of Spanish is also used to support the learning of English and to develop students’ literacy and content understanding in both languages. Teachers end each day with what they call a “maternal language block” of 45 min. They tell students, “Ahora hacemos el switch” (Now we make the switch), and during this time they reinforce in Spanish the content they have developed in English earlier in the day. Starting in 1st-grade literacy instruction also occurs in both languages at separate times. By 2nd grade, most children are able to read and write short texts in both languages.

Code-switching, the alternating use of two languages, is also accepted as a natural part of the learning and language acquisition processes. In my observation of the Pre-Kinder class, a child excitedly exclaimed during English instructional time, “*Es un square chiquitita!*” upon recognizing that the teacher was holding a picture of a really little square. Says English teacher Patricia, “The important thing is that it’s a square; there’s no embarrassment there.” Teachers do not correct the child who code-switches, but simply respond in English to form the habit of that particular classroom time being in English. “We just keep speaking English even if they respond in Spanish,” says a 1st-grade teacher, “Over time, they respond more in English.”

Another difference at TISA with regard to instruction is that teaching and learning may surpass what is required by the Ministerio. One teacher notes, “If we can, we do more, when we see that the children can do more.” She goes on to explain, “For example, the Ministerio says that children in Kinder need to know their numbers up to 20. In Kinder, we go up to 100... What I like most here is that we can take the children where they are able to go and go beyond what the Ministerio requires. We don’t limit the children; we let them grow.”

Assessment is an essential part of planning. At the end of the day, teachers and the técnico do a checklist of progress together to see whom and what needs more attention. “We do this every day, we’re evaluating progress every day, together,

the three of us,” remarks one teacher. I was able to observe informal assessment of progress in the Pre-Kinder classroom, where students were working on colors and shapes. After describing pictures on large cards, teachers checked for understanding by circulating to ask individual students, “Is this the red circle?” or “Show me the blue square.” Students then worked independently to draw and color shapes; that work was also assessed at that end of the day. Assessment also includes summative evaluation sheets completed by the teaching team, along with more formal quizzes given in the 1st- and 2nd-grade classrooms. Finally, every grade-level team has to have a folder – with a copy of all materials in the folder to share with the next team next year. Abi says, “If you want to teach here, it’s a team, and we share materials.”

Recruitment of Teachers

While the vision for and planning of TISA’s structure and classroom communities were in many ways joyful and rewarding for Abi, it would be safe to say that the recruitment of *people* – the teachers and students – to fill the community was much more challenging.

To understand the difficulties, it is first important to understand more about Arica’s location and how it differs from the metropolitan area of Santiago, for example. In greater Santiago, it is not uncommon to find bilingual schools; indeed, it is not uncommon to find people who speak English, be they tourists or residents who have come from or traveled abroad to English-speaking countries. Arica is a smaller and more isolated city with a population that, generally speaking, does not know or use English.

Finding English teachers trained in language pedagogy was not as difficult, in part because the local universities offer this preparation, but a major obstacle Abi faced was finding qualified *early childhood* teachers who would be willing and able to teach in English for most of the school day. She explains, “We live in a city where it’s difficult to find good level professional people for this job. Two hundred people came for interviews for preschool teachers, but it was impossible. Nobody speaks English here.” So Abi took a “grow your own” approach and decided she would hire early childhood educators who were willing – if not yet able – to speak English and train them herself.

Play Group 1 teacher Miss Janina, for example, is Peruvian but came to Chile 20 years ago and finished a 4-year program in early childhood education at the Universidad de Tarapacá de Arica. She saw an ad in the paper for teachers who were willing to learn English and applied for a job at TISA. Janina spent a year learning English in 3-h class sessions twice a week before the school opened. Teachers continue to take classes at the school in the evening, and Janina has also enrolled in an English course at the university because she wants to study more.

All TISA teachers reported that the use of English in all subjects was challenging in the beginning. Miss Paula says, “It was difficult at first. I was afraid the children were not going to understand. At the beginning, they didn’t speak much in English.

In time, over the year, they went from saying ‘soap’ to saying ‘I need soap, please.’ From less to more – expanding.” Paula notes that her English has improved along with the children’s because she has to speak English at the school.

Recruitment of Students and Families

The initial community reaction to TISA was one of curious skepticism and revealed some misperceptions about bilingualism and bilingual education. Since Arica is a city where few people speak English, Abi had a fair amount of convincing to do, unlike in Santiago, where bilingual schools have far fewer problems with recruitment and enrollment. Some of her 43 students in the school’s first year came from homes in which at least one of the parents had had sustained exposure to the English language or had a reason to believe it would help their children down the road. “We have to think of the future,” states one mother, “My husband had to give up a chance for a scholarship because he didn’t know English.”

Parents’ main – and very reasonable – concern was that children would not understand what they heard in the classroom, that they would feel frustrated and unable to learn. “I had fears about the demands of doing school in another language,” says one mother. At home parents were worried about possible communication difficulties their children might have because of the two languages. One mother of two daughters at TISA remarked, “Our English is very basic. We wondered if our interaction with the girls was going to change.” Abi says parents asked, “What is going to happen if they speak English at home, and we won’t understand?” Parents wondered if they would be forced to speak English. Abi explains: “I had to explain that bilingual means Spanish and English – two languages. A bilingual child is able to use two languages. He is going to use the language according to the need.” After children started at TISA, some parents then wondered why children were not using their English at home. Abi notes that one parent told her sadly, “But my child doesn’t speak English at all in my house.” Abi reports her reply with a grin, “I said, yes, because he knows that you don’t speak English!”

Eventually, parents’ concerns decreased, and word of mouth helped to spread the success of the school’s first year. By the second year, TISA’s enrollment had more than doubled. Some parents shared with me how the bilingual experience is changing their children’s thinking and attention. A mother described a situation in which her 5-year-old was listening to a woman in a store and whispered to her mother, “She’s speaking English.”

Most parents I spoke to were quick to point out the school’s special community atmosphere and focus on the individual child as important reasons for placing their child at TISA. The learning of English was important, but the overall TISA vision of education was paramount in recruiting and retaining students. One mother, a psychologist, stresses that the draw to TISA was the “new system of education – not just bilingual, but each child as an individual.” She states, “My dream is that my daughter stays here in this system. It would be difficult to change.”

TISA Today

The dream for children to stay at TISA has come true, though not in the way Abi might have originally anticipated. The school that began as her own dream in 2007 has now, 5 years later, evolved into something no one could have imagined at the time. Abi left Arica and TISA in the summer of 2009 but has remained in close contact with the school's staff and new directors. A new facility was envisioned, and by 2011 TISA had reopened as the Azapa Valley School on a stretch of land in the fertile valley just 3 km outside Arica where the special climate allows for the growth of various fruits and vegetables and the prolific cultivation of olives. The Azapa Valley School is one of 902 schools across Chile to have received the "green" stamp from the Ministry of the Environment by incorporating ecology into the curriculum, training teachers, and investing in sustainable infrastructure (Miranda 2011). Still maintaining its focus on developing bilingual citizens, the Azapa Valley School now emphasizes the development of ecologically responsible citizens as well. Perhaps appropriately, the seeds that Abi planted with TISA have evolved into a thriving educational community in a place known for its unique ability to nourish and sustain growth.

Conclusion

The story of TISA is a heartening one that points to the impact one person and one idea can have on an entire community, and on fostering global awareness and the potential for bilingualism at an early age. It is easy to envision bilingual schools flourishing in large metropolitan areas around the world, where an influx of immigrants and expatriates make teachers of other languages available and the learning of other languages the norm. In more remote areas, bilingual education becomes more remarkable and requires the vision of people who see the value of offering opportunities to become bilingual in early childhood – and working to make those opportunities available.

The bilingual teaching practices at TISA are ones known to be effective: teaching language through content, conducting daily and summative assessments, reviewing concepts in the native language at a set time in the day, teaching literacy in both languages, and accepting code-switching as a natural part of the learning process. Also key to the TISA's success was the fact that the development of bilingualism was coupled with effective practices in early childhood education and the emphasis on building community and allowing children to progress at their own pace.

As we move forward in a global age, it is hoped that this kind of educational experience in early childhood can become a reality in many smaller and more remote communities, so that all youngsters have the chance to reap the benefits of bilingualism, which is the norm for so many children around the world.

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Chapter 5

Identity, Materials, and Pedagogy: Girls in Primary Science Classrooms in Wales

Cleti Cervoni

Abstract Girls' achievement in science has caught up with boys' in the UK and the USA, yet girls do not choose careers in science at the same rate as boys. Understanding more about the multiple and sometimes contradictory ways that girls experience science in a classroom context will help shed light on the larger problem of girls' retention in science.

Keywords Children voices • Teachers' voices • Science pedagogy • Gender equity • Identity • Inquiry • Sociocultural • Strategies • Girls and science • Primary science classroom

Introduction

Floating and Sinking (Classroom A)

Ms. O'Neil introduced the science activity by telling the students (7- and 8-year-olds) their task was to discover which objects sink and which float and which might do both. The students were seated around a table in small mixed-sex groups of four. In the middle of the table was a plastic tub filled with water and a roll of paper towels for spills. On the front table, Ms. O'Neil had placed bins of objects for the students to choose from: small rubber ducks, birthday candles, feathers, and crayons with paper and without paper, different colored rubber bands, plastic berry baskets, wooden blocks, and plastic coins. The teacher established the rule that the students could choose five objects at a time, and she assigned one person in each group to be the one

Please note all schools', students', and teachers' names used in this chapter are pseudonyms.

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to get up and get them for the group. The students were told to return the first five objects and get five more to try. Once the rules were established, Ms. O'Neil let the students explore, discover, and "mess about" (Hawkins 1974). The room was noisy and busy with students getting up to get materials and making guesses to each other about which object would float or sink. Ms. O'Neil moved among the groups listening for the students' ideas about why one object would float or not and posing additional questions such as "What did you notice?" and "Tell me more."

The lesson took a little less than an hour. After about 15 min of exploring, Ms. O'Neil called all of the children to sit on the rug and report back on what they had discovered and what questions still remained especially what had confused them. She wrote all of their ideas and comments on the whiteboard. The students mentioned air, weight, size, and the materials the object was made of. The questions and ideas remained on the board until the next day when Ms. O'Neil posed another question to the students, "Could you make something that floats sink? And something that sinks float?" After doing this in the same groups and similar to the day before, Ms. O'Neil and the students added new questions on the board or erased the ones they had answered by additional exploration. On the third day Ms. O'Neil challenged each group with a scenario: they had to design a boat that could carry a piece of fruit (a small lead weight) across the tub of water to islanders who needed the food. They could use all of the materials and objects on the table, but they had to do it in silence yet cooperating with each other. At the end of each day of exploring and learning about floating and sinking, students were asked to make entries into both a group journal and an individual science journal. Ms. O'Neil looked at the ideas the students wrote about and what questions and confusions remained as a way to plan further instruction.

Floating and Sinking (Classroom B)

Ms. Abby like Ms. O'Neil introduced the science activity to the children by telling them they were going to learn about floating and sinking. As she wrote those words on the board, she asked the students what came to their mind. She then wrote those ideas on the whiteboard. The children said things like a heavy object like a rock would sink, while a light one like a seed might float. Ms. Abby had brought in a selection of fruits and vegetables (apples, grapes, oranges, carrots) and placed those objects on the desk in front of her along with a tub of water. She passed out a worksheet to all of the students who were seated at tables in small groups of four and asked each student to fill out the worksheet. They were to predict and mark on their worksheet which fruit or vegetable would sink or float and then see if they were correct as she placed them in the tub of water. At the end of the lesson, Ms. Abby asked each student to draw a picture of what they had noticed and copy from the board the definition of buoyancy.

These two classroom scenarios, composites of science activities that I have observed, illustrate how two different teachers might teach the same science topic,

floating and sinking. In structuring their lessons, the teachers make choices about how to plan instruction and which materials to use and how to group the students. In addition, whether conscious or not, teachers' decisions represent what they think science is and how it should be taught. These decisions plus a myriad of others such as how to group the children and what resources to make available to students all make up a classroom environment for learning science. The science activity described in Classroom B may look like a model science lesson. It is hands-on and the teacher has chosen interesting and appealing materials. Yet from the assessment it is unclear to the teacher whether the students have actually learned anything about buoyancy. In Classroom A, revisiting the concept of buoyancy over multiple class periods and through multiple investigations allows the teacher to scaffold the student's learning. The final assessment is a performance assessment which allows the students to show and not just tell the teacher what they understand. In this chapter, I suggest that some classroom environments may open up opportunities for all students to learn science (such as Classroom A), and other classrooms (such as Classroom B) may limit and close down opportunities especially for girls and some boys.

Girls and Science Equity

By all accounts girls' achievement in science has caught up with boys' in the UK and the USA (American Association of University Women 2011). Although achievement tests show girls' achievement progress, we know that they do not choose careers in science at the same rate as boys. In addition, these tests assume all girls experience science learning in the same way which we know is not true. Understanding more about the multiple and sometimes contradictory ways that girls experience science in the classroom context will help shed light on the larger problem of girls' retention in science. I begin by first reviewing the long cultural history and representation of science as a masculine content area.

The Historical Legacy of Science as Masculine

Science is often thought of as a masculine subject area. It is considered masculine because we are often taught mostly about male current and historical scientists. In schools science knowledge is described as rational, logical, and hierarchical with one way to get to the right answer. Science lessons are often about learning facts and memorizing definitions. Yet it has been widely recognized that learning in science through facts and definitions is not the way science is actually done in real life by scientists. The process of doing science is messy, subjective and objective, masculine and feminine, and grounded in scientists' personal experiences and social contexts. For example, in her biography of Barbara McClintock, Evelyn Fox Keller

(1983) portrayed the woman scientist as someone who used feminine subjectivity such as intuition and awareness of relationship to notice change in corn chromosomes. By showing that science can involve practices more associated with femininity than masculinity, Keller (1985) argued for reclaiming science as a fully human activity. She drew attention to the complex range of practices undertaken by scientists that she described as collaborative and inclusive of other's ideas. Despite such debates about science, social representations and images of science as masculine, objective, and unemotional continue to circulate in society and influence how science is taught in primary schools. Students tend to represent scientists as white males who wear glasses, never comb their hair, and mix chemicals in a lab. Some argue that students will continue to reconstruct science as masculine, rational, and objective and fail to recognize the roles of emotion and intuition unless teachers actively intervene to disrupt it (Haste 1994).

In order to try and understand how girls experience science, I chose two urban primary school classrooms in Wales to study. I had the opportunity to do this while having the benefit of a research scholarship in Wales in the spring of 2008. Over a period of 8 weeks, I observed these two classrooms and sat in on science lessons. I interviewed students and teachers before and after the science activity. The children were 7 and 8 years old (Year 3 in Wales). I asked the teachers about their goals for the lesson, the curriculum they were following, and how successful they thought the activity had been. In my interviews with the students, I used the same materials the teacher had used in the class, e.g., batteries and bulbs or a ramp and a car, to help the students remember the activity. In total I interviewed 28 boys and 18 girls who represented the population of boys and girls in the classrooms.

In addition to the interviews, I took notes on the classroom environment. I noticed the layout of tables; the availability of materials, texts, and equipment; and how the teacher and students used them. I was particularly interested in the access that students had to each other, how they were grouped, and the actions of the teacher and the classroom assistants in relation to the groups. Finally, I looked at whether the students could move freely around the classroom or were restricted to sitting at a desk or table.

Science Curriculum and Pedagogy in Wales

In Wales, science education reform documents determine which science topics should be covered at each grade or age level. For example, in Year 3 (7- and 8-year-olds) the following topics are expected to be covered: scientific inquiry, life processes and living things, materials and their properties, and physical processes. How the topics are taught and what materials the teachers use to teach these concepts are at the disposal of the individual teacher. These professional documents describe science in primary school as an active process of learning where teachers build on students' prior knowledge through inquiry-based questions to help students learn science concepts with deep understanding. Students are encouraged to "mess about" with objects (Hawkins 1974), exchange

ideas with peers, and use their own questions for further exploration of puzzling phenomenon (Duckworth 1990, 1996). Science knowledge does not come from the objects themselves but from the ideas that are generated by the individual in interaction with and use of objects (American Association for the Advancement of Science 2001; National Research Council 2009a, b). This child-centered way of teaching science encourages students to learn how to “think like a scientist.”

In the schools in Wales, there is a pedagogical document to guide teachers in how to teach science.¹ Known as CELIPS (Cardiff Effective Learning in Primary Science), this pedagogical format is based on the successful numeracy and literacy programs in Wales. In the CELIPS format, science lessons are timed and very structured. For example, there are five steps to a successful science lesson:

Engage: (5 min) whole class to get the students interested.

Explore: (10 min) (pairs or groups) to ascertain the present level of what the children know.

Challenge: (10 min) (pairs or groups) to take the learning forward.

Apply: (10 min) (whole class) apply new understandings.

Reflect: (5 min) (whole class) students say what I learned and how I learned it.

All of the teachers I observed were familiar with the CELIPS guide to teaching science. The science discourse in each activity was about making predictions and estimations, comparing and contrasting data, making accurate observations, and conducting “fair” tests. Where I found the classrooms differed is in how much time teachers gave the students to complete the investigation, i.e., multiple days or 1 h; how the teaching assistants responded to students; whether or not the students had access to the materials; and whether or not the students were able to move freely around the room to talk to other student groups or were restricted to working within a mixed-sex group. In all of the classrooms at the end of the lesson, students were asked to record their data by drawing or writing in an individual or group science notebook.

Learning as a Social Process

Classrooms are social places. Students interact with each other, teachers interact with students, and when it comes to science, students and teachers interact with the materials and objects of science, e.g., batteries, bulbs, plants, and animals. As students participate in a science activity, they bring their ideas of who they think they are as “scientists in the making” or as someone who can or cannot do science. As the teacher prepares the activity, she brings her own ideas of what science is and who can do it. These are the implicit and explicit messages that I mentioned earlier. In order for students to be able to learn in school (to gain the knowledge and skills

¹The USA has a similar guide to teaching science called the 5 Es: *engagement, exploration, explanation, elaboration, and evaluation* (Bybee et al. 2006).

to understand science and act like a scientist), they have to be able to navigate these multiple messages and decide which particular types of information to concentrate on. For example, if Gina who likes science and wants to get better at it is asked to be the recorder in her group, she may or may not be able to actually participate in all parts of the activity because she is busy taking notes. Or if a girl who likes science is told by the teacher she is not very good at reading and writing, she may not think she is very good at science if it's taught only by reading and writing. The social dynamics of the classroom and girls' self-images and ideas about science make it difficult for some girls to be successful. It is up to the educators and policy makers to be aware of how choices and decisions around materials and pedagogy can set some girls up to fail or succeed in science. If we want girls to develop a self-identity of becoming successful in science, then we have to be aware of the social worlds of the classroom and how students fit into those social worlds.

To understand how the complex and dynamic aspects of a science classroom can influence girls' participation and potential as future scientists, I next describe and contrast two science activities in two demographically similar classrooms. I want to show how one classroom opens up opportunities for girls in science while the other closes down opportunities, thus placing the girls in the position of not being able to fully participate in the science activity. By not being able to participate fully, the girls are at a disadvantage in getting things done and are unable to understand how to access the knowledge and skills they need to be successful.

The Kingman Primary School

The Kingman Primary School was in the center of a large city in Wales with an enrollment of 420 children. When I collected my data there in 2008, 84 % of the students were ethnic minorities, primarily Somali, and for many students English was their second language. Students sat at tables and there were reference books around the room. The teacher sat at the front of the room with a computer and a *smart board* that displayed the data the students collected. After the students did their work in groups, they gathered on the rug in front of the teacher to talk about what they noticed. The following is a description of a science lesson I observed on force involving cars and ramps.

Understanding Force Using Cars and Ramps

The science activity of the day involved rolling a plastic red car down a ramp and measuring how far it would travel on four different surfaces, e.g., sandpaper, rubber, plastic, and carpet. The teacher told the students that in order to make it a "fair" test, two children should measure how far the car traveled on each of the different surfaces. Students were assigned to mixed-sex groups and instructed to decide

among themselves who would do what task (e.g., measure distance, collect data, or roll the car). The teacher worked with one group and the male assistant teacher with the other. The assistant teacher's role appeared to be in managing discipline especially in reporting to the teacher which girls were talking. Three other mixed-sex groups were told to work on their own to complete the task and to gather the data. I noticed many students seemed confused when trying to read the tape measure, and the teacher often interrupted the activity to explain to the whole class that they were not meant to be working out how *fast* the car could travel but how *far*. In the group with the assistant teacher, the only girl in the group of five, Liv, was asked by the assistant teacher to be the recorder and was told by the boys in the group and the assistant teacher what data to write down on the whiteboard and how to spell it. As a result, Liv was not given a turn to roll the car down the ramp nor to collect the data herself. Her job as scribe afforded her both positive and negative positions. Initially she reported that she felt included:

I like being the recorder because then it's something for me to do (that's) really fun. And it's nice because I have fewer things to do and it's fun to help people. (Liv aged 7)

On the negative side, however, Liv was given a marginal position with respect to the action. She did not roll a car down the ramp. To give up the role of the scribe would be to defy the assistant teacher's authority with the danger of losing her position as "the good girl" (Walkerdine 1989). Yet, her complicity prevented her from fully engaging in the science activity and limited her access to the subject.

Other girls and boys assigned to groups without an adult to help were told by the teacher to "work things out for themselves." I noticed that the girls in one group without a teacher or an assistant teacher seemed to need more direction to get started without someone in their group to take on leadership role. Mira gave me a clue about what she thought might have helped her and the other girls to understand the science activity. Her expectation of cooperative learning appeared to be at odds with the teacher's.

It's hard with only one teacher. It's easier like in Maths when you get two (teachers) to help us work it out. I get to work with my friend but we don't get it and (the teacher) tells us to work as a team. There's a boy to listen, Mason, sometimes he tells me what to do. Yesterday he asked me what's the answer to my test and I told him. I'm not supposed to because the teacher doesn't want us to tell each other the answers. (Mira aged 8)

For Mira, the classroom messages are conflicting and appear to be inconsistent. On the one hand, without Mason to help her, she doesn't know what to do, yet the rules of the classroom appear to be to do your own work. Laya another girl at the same table expressed similar ideas:

In science, I'm confused about everything. While I'm on the carpet I don't talk in science. I just keep quiet because I don't know about science. Because of the spelling and the writing my teacher says I don't understand it and that's the truth, I don't understand it. (Layla aged 7)

Both Layla and Mira were confused and did not understand what was going on in science. For Layla, the carpet (where the teacher brought the students together

to talk about what they had observed in the science activity) is a specific space where the restricted movement and the teacher's comments had come together as a message for Layla which she seemed to experience as "I don't talk in science." By acting out her feelings of incompetence by not speaking, she further excluded herself from becoming a participant in science. Mira, for her part, mentioned the possibility of working with a friend in mathematics, suggesting that when the setting allowed she was able to use others as a resource (cf. McDermott 1993) and feel more competent as a learner. However, the teacher's orchestration of the setting and the assignment of groups in science placed her in a group without her friend. When comparing science with mathematics, Mira indicated that a boy, and not her friend, sometimes helped her. Her comment, "the (classroom) teacher does not want us to tell each other's answers," suggests that she had read the classroom environment as a place where sharing knowledge with others was not legitimate. These messages in the science setting seemed to indicate conflicting messages about cooperative learning and independent work: work in a science lab group knowing that science is ultimately done by oneself and not as a cooperative venture. Without teacher intervention, these girls' self-identification as the "one who doesn't understand" was likely to become their dominant social identity in science. To manage the incompetence they were feeling and expressing, the girls drew on what they knew best, the feminine aspects of being a girl (Duveen and Lloyd 1990, 1992; Ivinson and Duveen 2005); they kept quiet, sat still, and tidied up the classroom tables.²

Miriam, in contrast, a girl in another mixed-sex group, appeared to do everything herself. I watched as she rolled the car down the ramp, measured the distance herself, and recorded the data on the small whiteboard without the assistance or involvement of any of the other students in her assigned group. In my interview with Miriam, I found that she was the only one who could describe what she did and how the data she collected might relate to the concept of force. Yet by working alone Miriam placed herself in the danger of being seen by the other students or the teacher as someone who does not cooperate and collaborate since her actions excluded the other girls (and boys) in her group.

What I have illustrated is that the messages made available to all of the girls in this classroom were complex. In their interviews, many of the girls reported that they liked science and wanted to be successful in doing science, but it is clear that the mixed messages they received prevented them from seeing how they could be successful. Their only recourse was to defer to what they knew worked in being a "good girl" (Walkerline 1989, 1998): be quiet, sit still, and clean up.

In the next example, I contrast the Kingman school classroom with a classroom at the Campbell school. In doing so I want to show how another classroom with similar demographics can open up possibilities for girls as they negotiate meaning in science.

²Pseudonyms have been used for the schools, students, and teachers in all quotes and references.

Campbell Primary School

The Campbell Primary School has a similar demographic profile to the Kingman School. Located in a residential neighborhood in the center of a large city in Wales, students were primarily from Bangladesh and Nepal. For many students English was their second language.

In this particular Year 3 science classroom, students worked in pairs at tables and were allowed to choose who they wanted to work with. This resulted in same-sex pairings as girls chose girls and boys chose boys. Located around the room were numerous reference books, a carpeted area to sit on, and three computers for the children's use. The science activity of the day was to make a bulb burn brighter.

Batteries and Bulbs

In a previous lesson, the children had learned how to make a simple circuit. In the lesson I observed, the teacher asked the students to once again try and light their bulb with batteries and wire, but this time “try and make your light bulb burn brighter.” On a table at the front of the room, the teacher had placed three large bins of materials containing bulbs, bulb holders, batteries, and wire. The classroom was active, busy, and noisy as children gathered materials, talked with each other, visited other tables, looked through books, and tried different ways to get their bulb to burn brighter. In contrast to the first classroom described above, the teacher circulated around the classroom asking children about their ideas and making suggestions. In this way she was able to notice what the students were doing, answer any questions they might have, and monitor their progress. There was an assistant teacher who stayed with a small group of girls and boys who appeared to need more help.

Mim and Taci, two 7-year-old girls, sat together at that table with the female teaching assistant. I observed Mim and noticed that some boys at another table had placed five AA batteries together to get their bulb to burn brighter. I watched as she tried it herself and succeeded. Taci, who was in the same group, having watched Mim, went and found her own set of batteries and a bulb and mimicked Mim's approach. Her bulb however did not light up. The female teaching assistant who was watching both girls suggested that perhaps Taci's bulb was faulty and she got up to get her a new bulb. The new bulb worked and Taci successfully got hers to burn brighter. I noticed she repeated the experiment four or five times while smiling to herself. She then went over to another table and showed Gabrielle and another girl how to line up their batteries correctly so that they too could be successful. Later when I asked her about visiting the other table, Taci said that her friend was “stuck” and she liked “to help.”

Tab, another girl, was looking through a reference book and saw a battery and bulb setup and attempted to copy the diagram with the materials. The classroom teacher immediately sat down on the carpet with her and worked together to duplicate the

diagram. Later when the whole class got together to discuss their results, the teacher showed them Tab's configuration of batteries and bulbs that had made a bulb burn less bright not brighter.

In this classroom the teacher orchestrated a setting that allowed students considerable autonomy. Students worked with friends, walked around the room freely, and accessed texts when they wanted. This freedom of movement the students had allowed them to engage in the science activity in multiple ways, e.g., looking things up on a computer, comparing experiences with others, and helping other students, trying new things out themselves. These multiple entry points into the science activity positioned all of the children as active and legitimate participants. By being able to negotiate meaning for themselves with the help of others, adults and children, the girls experienced active participation, achieved success, and arguably were in a position to form positive social identities in science. For example, Taci was able to act, make mistakes, and redo the task until she achieved success. She also fulfilled her feminine identity as one who "likes to help others." All of the girls that I interviewed in this classroom described in detail what they had done and could describe how to make a light bulb burn brighter or in Tab's case, less bright.

Discussion

Using these two classroom examples, I have showed how there are multiple and sometimes conflicting messages to girls in a science classroom. These messages and, more importantly, the meaning that the girls make of them can either open up opportunities for them to learn in science or create barriers and trap the girls into fixed positions like always being the recorder. The way both teachers orchestrated the setting in terms of movement, grouping arrangements, and instructional discourse provided different opportunities for engagement and experimentation.

In the first classroom, the teaching assistant acted as a disciplinarian and assigned the one girl in the group he worked with as the recorder. When their movement was restricted, the girls in the first classroom example lost a sense of being active participants in the science activity. In that classroom the girls floundered without a teacher or a boy (their words) to help them out. A long historical legacy of linking science with masculinity ensures that the social identity of incompetence rather than competence in science is more readily available to girls. In the first classroom example school, I noticed the girls when they weren't sure what to do remain quiet, tidied up, and at times took their cues from the boys and the male assistant teacher. However, I wish to point out that this was not the case for all girls in that classroom and that Miriam, for example, managed the situation in a different way.

In the second classroom, the assistant teacher assigned to help the girls recognized what they needed for support, and she provided it by suggesting the materials might be faulty and encouraging one girl to try getting a fresh bulb. In that

classroom, Taci and Mim were able to move from just repeating the actions of the boys to exploring on their own. I realize that there is a distance between completing the task and understanding of broader concepts, but at least in this classroom, the girls were able to tell me in their follow-up interview exactly what they had done and the result they achieved. We know that mimicry is an initial step in learning (Collins et al. 1989), so I suggest that the girls were on their way in developing an understanding of how batteries and bulbs work. Taci went a step further and shared her expertise with another group of girls to “help them out.” In this way Taci demonstrated Keller’s depiction of science as a fully human activity (Keller 1983, 1985). She was able to complete the science activity with success *as well as* help her friend. This allowed the girls to impose meaning on activities which were personal as well as scientific.

I noticed that many girls looked to or deferred to boys as more expert in science and consequently took less initiative in conducting the science investigation. This may be related to how the teacher placed children in groups. For example, in the first model school classroom, the teacher placed girls and boys into mixed-sex groups. We also noted that the girls in these groups acted as if the boys and the teacher knew more about what to do in science than they did. Girls did not speak out or actively join in activities except in isolated instances. This silencing was partly to do with the position afforded by the setting and the girls’ tendency to take up social identities of incompetence historically extended to girls in science. In contrast, in the second school with the same demographic profile, boys and girls worked in same-sex groups, thus excluding gendered practice in which girls deferred to boys. The same-sex groups ensured that the boy-competent, girl-incompetent gender dynamic did not arise. In that way, the message systems available in the science classroom *opened up* possibilities for girls to engage in science, and they responded by doing science and working in cooperative ways that might be associated with femininity. In the first classroom, the mixed-sex groups *closed down* the possibilities for girls to participate in science.

What I hoped to illustrate is that science itself is not a content area that girls cannot learn, or that girls need extra help or a different kind of science like “kitchen science.” Science learning is not something that excludes girls and always sets them up as passive, oppressed, and disadvantaged in schools. Although historically the association between science and masculinity is strong, much can happen in small movements in a classroom that complicate this legacy.

By focusing on the small movements between and among teacher and students within everyday classroom practice, it is possible to understand how each girl’s experience of science can be individual and varied. The messages the girls receive can be affirming or contradictory to how they think of themselves as students doing science and help explain why some girls in comparison to boys fail to overcome the historical legacies of science that position them as on the fringe rather than as central participants in science (Cervoni 2011). This awareness has implications for classroom practice in science and in the professional development of classroom teachers.

Questions for Teachers to Ponder

Learning science is more than just memorizing definitions and doing hands-on activities. It's about having students develop a deep understanding of how the world works and being able to see themselves as someone who can do science. If we want students (boys *and* girls) to be able to think like a scientist, e.g., to explore, to discover, to make mistakes and redo, to collaborate with others, and to be curious, then students need time to do this. Students need to experience for themselves how ideas build on other ideas and how those ideas can come from personal experience or peers or the teacher and ideas in books. Students have to be able to experience science as the fully human activity it is, where emotion and intuition interact with careful observation and detailed record keeping.

Students enter our classrooms with ideas of who they are in relationship to science. They bring their prior knowledge of how the world works and their ideas of who they are as students learning new content. When students are blocked from full participation or trapped into positions of incompetence by peers or teachers, students cannot fully develop an identity of competence or being successful in science. For example, even though Liv liked being a recorder, she wasn't able to engage in the science activity and consequently couldn't tell me anything that she had done or understood. Teachers have authority in the classroom, and even off-handed comments have powerful effects on how students think about themselves as capable of learning. I encourage teachers to ask students how they think about their work in science so that they can access more of this nuance in the identity-building students are doing.

Even though national and state-mandated science curriculum frameworks guide which topics we teach, it is often at the discretion of the classroom teacher to determine how she will use the materials assigned. In the UK and in the USA, there are pedagogical documents that help guide the instruction. Effective structure comes with practice and knowing your students. If students are to work in groups, then it is important for teachers to visit each group making sure students understand the directions and making sure each student gets a chance to participate. Teachers need to mix groups up and assign different roles to see how each student participates in different groups. Science is a collaborative enterprise, and students need to be encouraged to learn from each other and from the teacher as well as how to use resources such as books and the Internet. This means the classroom teacher needs to relinquish some control and allow students to explore their ideas, to act as a guide rather than authority/truth holder.

Time to make mistakes is also very important. Some science lessons require more than an hour for students to really grasp an understanding of how batteries or bulbs work or what it means for an object to float. In the floating and sinking lesson described in the introduction, the teacher broke the lesson down into three sections: an introduction where students could just mess about with the materials; another task where the students had to make something float, sink, and vice versa; and finally a design challenge where students had to make a boat. This design challenge

acted as the performance assessment. This way the students had a chance to check out their predictions and redo their designs which is important in learning science. In the classrooms where girls were successful, the teacher moved from group to group checking in and asking students about their thinking and making suggestions to further their thinking. This is in contrast to Classroom B where the teacher had the students copy the definition of buoyancy from the board. She was unaware of the questions the students still had about what they had noticed, and even though the activity was hands-on with interesting materials, there was no discussion about what confused the students and what they would like to do next.

Teachers influence how students see themselves as learners and as scientists in the making, and it is important that teachers take a reflective approach to lesson development that considers students' emerging identities. As teachers plan instruction in science, they might ask themselves the following questions:

- (a) How and in what ways do the students in this class think about themselves as scientists in the making? What are each student's strengths and what do they need to work on?
- (b) Are my learning objectives clear to me? What will I accept as evidence that the students have learned what I set out to teach?
- (c) Have I chosen materials that are interesting and appealing to both boys and girls? Do I have enough materials?
- (d) What other resources do I need that will extend students' ideas?
- (e) Is the task clear to all of the students and does every student have a chance to participate?
- (f) Have I built in enough time for students to explore and discover and ask questions?
- (g) Am I available to all students, checking in with them and hearing their ideas? What will I do next as a result of hearing these ideas?
- (h) Does my performance assessment make the students' learning visible to me and to them?

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Chapter 6

Let's Get Talking: Communication, Language and Literacy in the Early Years

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Abstract This chapter offers knowledge and understanding of how, why and what to promote for optimum language learning situations in early childhood education and care. It demonstrates how early years teachers, practitioners and families in England encourage and promote communication, language and literacy for babies and young children. The chapter reveals how studying and promoting young children's language development can be an exciting journey. The chapter addresses multilingual aspects as many practitioners work in ethnically diverse settings.

Keywords Communication • Early language development • Emergent literacy • Bilingual learners • Story and storytelling • Rhyming • English as an additional language • Pedagogy • UK policy • Practitioner role • Partnership with parents • Playful literacy

Introduction

This chapter offers knowledge and understanding of how, why and what to promote for optimum language learning situations in early childhood education and care (ECEC). It demonstrates how early years teachers, practitioners and families in England encourage and promote communication, language and literacy for babies and young children. The case studies and scenarios are based on real families interacting with practitioners in a variety of settings. It also reveals how studying and promoting young children's language development can be an exciting journey.

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The chapter contains multilingual ideas and activities as many practitioners work in ethnically diverse settings which constantly have to adapt to support different intakes of children and families. Key aspects addressed are:

- Babies as effective communicators exploring first steps into language and literacy
- The language and values of home impacting upon young children's learning
- High-quality opportunities for communication between adults and young children in early years settings
- Young children taking the lead in conversations
- The importance of stories, storytelling and books in young children's everyday experiences
- Playful early literacy experiences to promote reading and writing

Language Is the Key!

Competence in oral language and communication is crucial to young children's development. It is the essential foundation for learning, for communicating and building relationships with others as well as for enabling children to make sense of the world around them (Brock and Rankin 2008). Adults' roles in promoting language and communication in young children is of the utmost importance and should be of high interest and concern of parents, carers and families, as well of course, for early years practitioners and educators. In recent years young children's linguistic competence has also become an interest and concern for policymakers in the UK.

The importance of parents and carers to their child's early language cannot be overemphasised – they are the key influences in young children's language and literacy development. Children develop language from birth, and their progress depends on warm and positive interaction in safe, stimulating environments. Children learn most effectively through being involved in rich experiences, exploring their environment, interacting, talking and playing with adults and other children. Adults need to join in their play, both talking, listening and promoting two-way conversations with the children, taking into account their interests and previous experiences. This needs to occur with families in the home, with carers and with educators in pre-school settings as well as with teachers in the early years of schooling. Knowledge about how young children acquire language and develop into competent talkers and thinkers is *key* to good practice and those educating young children should be well qualified and well informed. It is therefore essential that all practitioners are able to develop, establish and articulate their professional and practical knowledge about early language development to stakeholders such as parents and policymakers. Practitioners also need to develop positive relationships with parents and carers and promote anti-discriminatory practice to meet children's needs in terms of ethnicity, culture, religion, home language, family background, special educational needs, disability, gender and ability (Power and Brock 2006). They should record observations of children's play, learning and language achievements to determine if provision is high quality, and

both children and their families should be involved in these processes (Brock and Rankin 2008). Studying and promoting young children's language development can be such an exciting journey!

Early Language Development

Communication, language and literacy are areas of study that continue to produce new research findings and stimulating theories, and certainly justifies regular review and reappraisal. (Whitehead 2010: xiv)

As Whitehead (2010) asserts it is crucial that early years practitioners continually review theories from linguists, trends in linguistic research and policy decisions in order to make informed decisions about their practice. Research in the field of developmental psychology shows that the interactions which occur between young children and their carers are important. They not only promote close relationships and early language development but also contribute to children's intellectual development. Young children acquire language through significant others in their immediate environment, through responding to sounds, sentences and experiences expressed by their parents, family and other carers (Brock and Rankin 2008). From the moment they are born, babies begin to be language users through absorbing, listening, imitating and practising these sounds, gestures and facial experiences, and their responses are reinforced by the significant others. Linguistic patterns regarding language and communication begin to emerge, as babies try so hard to make sense of what is happening around them. Gradually they learn to reproduce sounds and words and establish an understanding of how language works, the structure and grammatical sense of putting these sounds and words together. With exposure to language, every child will acquire a sophisticated symbol system to serve her communicative needs, gaining an understanding about her own particular language.

Many children will acquire more than one language, sometimes two or three at the same time, sometimes one after another. Young children grow up in a variety of linguistic and sociocultural experiences, in worlds where their first language may not be the national language, in families that are promoting their heritage language, as well as the host country's language, or where signing may be the first or additional language. There are an infinite variety of patterns of language use and each new experience, each new word or new way of expressing something extends children's language skills in some way. Humans use rules in conjunction with words which enables 'infinite generativity' – the ability to produce and understand an infinite number of utterances from a finite amount of words (Atchison 1998). Such is the power that language offers to children, and such is the power they have over it (Brock and Rankin 2008). Children will undoubtedly understand more than they can express and demonstrate the meaning of in their everyday language use. By the age of 5, a child's language is firmly in place with a vocabulary of several thousand words. It is evident that the opportunity to hear and use language for a wide range of purposes, audiences and contexts directly affects the rate and expertise of children's future language development.

Becoming Communicatively Competent

Opening up the world of knowledge and understanding and finding there is lifelong satisfaction in communicating with and without words, and in reading and writing, also equips children for survival in a fast-developing global world economy where the future is known and unknown. (Bruce and Spratt 2011: 13)

Babies born with the propensity to be sociable, particularly with their carers, and the beginnings of language are in early conversation or ‘proto-conversation’ in everyday routines and play. Parents and caregivers scaffold language and learning (Bruner 1983), and they act as facilitators of language through their participation and activity – children desire to communicate and develop their socio-cognitive skills and this drives their language development. Children become familiar with routines of communication and can gradually take more initiative – children learn language through using language (Tomasello 2003). Thinking about what others are thinking is one of the most important things humans can do – understanding intention and emotional reactions impacts on every social encounter.

Discourse is the language used in conversation – how people make meaning and how meanings are socially constructed – so that expressing them is effectively a kind of social practice (Widdowson 2007). Central to the discourse-making process are the interlocutors or conversationalists and their efforts to make and interpret meanings through speaking *and* listening to each other. Communicative competence is the ability to create appropriate meanings which the receiver will process and which correspond to the norms of use of that language community. Through watching, listening and participating, young children subconsciously learn the conventions and routines of turn taking. This may differ according to sociocultural assumptions and expectations – children will acquire the pragmatics of a language through observing others, both adults and other children. Children understand more successfully when the task is set in a meaningful context, and this supports their understanding and encourages them to abstract the experience and encode it in language. Additional contextual and linguistic support, often referred to as ‘scaffolding’, can enable young learners to complete a task successfully without being denied cognitively challenging work. Wells’ (1987) longitudinal study entitled the Bristol University Language Development Programme followed the development of a representative sample of children from their first words to the end of primary school. The researchers recorded many examples of language used in naturally occurring settings in homes and at school. The research showed the active role that children play in making sense of the world around them and in mastering communication. The original study was inspired by Vygotsky’s (1978) work, and the findings indicated the importance of the sociocultural context.

Young children are therefore active meaning makers (Wells 1987, 2009) and what they say offers a window into their thinking. Young children are not only acquiring vocabulary, they are also learning about concepts and trying to make sense of the world. It often sounds as though they are getting things wrong, but careful listening can enable adults to see how children are interpreting what is going on around them. Language enables us to negotiate or renegotiate our

understanding – language and thinking processes must interact in order for intellectual development. Sociocultural theory is the study of how children learn through social situations, being embedded in their immediate environment and society, shaped by relationships, norms and cultural expectations of that community (Vygotsky 1978). How adults and children interact is crucial in the co-construction of language and learning.

Oscar at 17 months old is already an expert communicator with his first 15 words and he can communicate both his presence and his needs quite clearly to adults. He is very social and waves, calling 'Hiya' not only to family but to anyone he meets whilst at the park, on the train or in a restaurant. His use of 'Wow!' is full of intonation and meaning and his daycare key-worker related how he used this on his first visit to the toddler outdoor play area. 'More' and 'ta' were his first words and these are self maintaining and enable him to get the food, toy or action he wants. He connects gesture and words very effectively for example when he is looking for the 'cat' stretching his arms out, palms upwards questioning 'where?' He has just learnt to use 'Mummy' strategically, so that she stays with him whilst he goes to sleep. He appropriately uses 'aaaaww' empathically to show love and affection and 'quack quack' and 'woof woof' as he interprets the noises of the animals he sees.

My grandson Oscar is already applying some of Tough's (1976) communication skills of self-maintaining, interactional, directive, orienting, empathic and imaginative. Tough developed cognitive and social aspects of language from Halliday's (1975) functions of language:

- Regulatory: language used to influence behaviour of others; persuading and requesting other people to do things
- Interactional: language used to develop social relationships
- Personal: language used to express personal preferences and identity of the speaker; the 'Here I am!' function
- Representational: language used to exchange information
- Heuristic: language used to learn and explore the environment, questions and answers or the kind of running commentary that accompanies children's play
- Imaginative: language used to explore the imagination that may accompany play or arise from storytelling

These communication skills and functions of language can still be useful for practitioners in today's settings, to help them monitor that children are using a range of language for a range of purposes. Tough's (1981) research in the UK found that *disadvantaged* 3-year-olds used language to focus experience and monitor activities, whilst *advantaged* 3-year-olds used language for reasoning, predicting events and creating imaginative projects. Tizard and Hughes' (1984) study of complex usages of language in the spontaneous conversation of 30 4-year-old girls, their mothers and their teachers, at home and at school, found significant social class differences, as working-class girls' language style changed more between home and school than that of the middle-class girls. Tizard et al. (1983) discuss the findings from their research in relation to Labov's (1972) research with black children in US cities. He argued that verbal deprivation was a myth and that it was the work of educational psychologists attempting to discover the reasons of poor

performance of children in schools from a perspective of disadvantage or defect. These two historic studies remind us that care needs to be taken in claiming early disadvantage and this is particularly the case at the present time in the UK. A new proposal is that 2-year-olds are going to be subjected to a language test. This very early intervention seems to be from a disadvantage perspective that may not take individual children's maturation, development, gender and developing bilingualism into account. However, Tickell (2011: 28) argues that 'extending the free entitlement to disadvantaged 2-year-olds means that more children, and their families, will benefit from access to early years services and therefore support for language development from an early age'. She recommends that 'the Government investigate urgently how the development of children's English language skills can be effectively supported and assessed' (Tickell 2011: 28). It can be seen that the importance for young children's early language development for later educational success is now being recognised by the UK government.

UK Policy

The Early Years Foundation Stage (EYFS) (DfCSF 2008a, b, c) was introduced in England as a 'single quality framework' for children from birth to 5 to meet the diverse needs of all young children. The EYFS was developed around key themes, principles and commitments, and the curriculum was focused on six areas of learning – personal, social and emotional development; communication, language and literacy; problem solving, reasoning and numeracy; knowledge and understanding of the world; physical development; and creative development. Language and communication contributes to all these six areas, key to learning and understanding and so crucial for young children's development. A review of the EYFS will lead to a new framework to be introduced in September 2012 which will emphasise three 'prime' areas of personal, social and emotional development; physical development; and communication and language. Tickell (2011: 5) states that these are 'particularly important for igniting children's curiosity and enthusiasm for learning, and for building their capacity to learn and to thrive'. The role of practitioners is obviously crucial to ensuring that communication and language receives a high profile based on appropriate and effective knowledge and understanding.

In 2010, the Coalition government in the UK has stated that they would build the capacity for children, families and communities and that they recognised the family as being a huge untapped resource. They aim to continue with the Sure Start Children's Centres in disadvantaged areas, with services targeted to work more effectively to remove barriers for vulnerable families. The poorest young members of society will be particularly supported and 130,000 disadvantaged 2-year-olds will receive 15 h a week of free nursery education, building on the pilot schemes introduced by New Labour (Brock and Rankin 2011). Low socio-economic status does not mean low aspirations, but it is more likely that there are barriers to achieving them (Hirsch 2007). The gap in attainment is evidenced in Feinstein's (2003)

research which found that children from high socio-economic status at 22 months overtook the children from low socio-economic status as their age increased at 40 months, 5 years and 10 years of age. This was further substantiated by the Sutton Trust (2010) funded report which showed that children in the poorest fifth of families were already nearly a year behind children from middle-income families in vocabulary tests. This research by Waldfogel and Washbrook (2010) indicates that children's educational achievements are strongly linked to parents' income and therefore a key barrier to social mobility.

There is no doubt that communication is the key life skill for every child – for them to achieve at school, make friends and be successful in later life. Yet there are still many children starting school in the UK (normally at the age of four) without the extended vocabulary and communication abilities which are so important for learning and for making friends. According to Lindsay and Dockrell (2002), an estimated 1 in 10 children have some speech and language difficulty in one or more areas: receptive/expressive language; phonology, the sounds that comprise speech; grammar, the rules of sentence construction; and pragmatics, the use of language. Their research found that children living in areas of disadvantage are more likely to have language delay. The Bercow Report (DfCSF 2008a, b, c) examined the situation of language extreme consequences of communication problems for children and young people in the UK, examining the problems caused by language delay, language disorder or limited vocabulary. The New Labour government response in 2009 was to fund a £52 million package, £40 million of which was a programme of training and supporting the pre-school workforce in speech and language development and needs. The Every Child a Talker (ECAT 2008) programme was developed to strengthen children's early language development through promoting developmentally appropriate, supportive and stimulating environments for children to enjoy, experiment and learn language. Dedicated early language consultants were trained to work with practitioners in targeted early years settings, with a child-minder or at home with their parents. Speech and language therapists and language consultants were involved in ECAT that provided support materials, promoted activities for specific language development and advised careful observation and monitoring of children's language development through audit and analysis of current early language provision.

Practitioners' Roles

Potter (2008) states that age development in the early years predicts later child outcomes and that whilst it is vital to establish communication enabling environments in early years settings, there are significant challenges in doing so. When Potter and Hodgson (2007) analysed language tape-recorded conversations between nursery nurses and children, they found that staff began two thirds of all conversational turns. Such findings are worrying because for children to become better communicators, it is very important that they have frequent experience of starting conversations. This is

because when children take the lead, they are likely to talk more and use their language more creatively than if they are simply responding to what adults have said. Potter and Hodgson (2007) undertook a longitudinal study of quality of play settings in Northern England, using (Harms et al. 2005) *Early Childhood Environmental Rating Scales* (revised). They found that the lowest scores obtained were in the area of 'Language and Interaction'. They then delivered a training course for practitioners, which focused on getting the practitioners to use a range communication enabling strategies. The practitioners were taught to think about developing children's vocabulary, their own physical positioning and the personalities of the children in a group. The use of prompts such as pauses, comments, playing alongside and positive replies in their conversations with children were promoted, and their use resulted in the adults changing the way they interacted with children in important ways. The adults began to use more pauses and ask fewer questions and the children started more interactions and led more conversational turns. As the adults used longer pauses, this gave the children more time to think about what they had heard and to find the words they needed to reply or begin a new turn in the conversation. The practitioners were advised to monitor the number of communication opportunities available to children in different situations and the nature of adult interactional strategies being used.

Practice and Pedagogy

Educators of young children need to think about their practice and provision, and this includes examining their pedagogy and how they promote children's learning in early years settings. Pedagogy encompasses the principles, theories and practice that underpin practitioners' knowledge; social interactions, observations and assessments; awareness of the child's level of learning; and provision and organisation of materials, space and routines (Brock et al. 2009). The Researching Effective Pedagogy in the Early Years (REPEY) (Siraj-Blatchford et al. 2002) project findings demonstrated the most effective pre-school practice and the importance of adult-child interaction. The findings indicate that the more effective settings have well-qualified staff who are able to match curriculum and pedagogy to children in order to promote cognitive challenges and 'sustained shared thinking' (SST). Children's talk should be stimulated through SST where children are engaged in meaningful discussions which involve co-constructing meaning and understanding. This requires supporting children talking, thinking things through, rationalising their ideas and engaging in problem solving in intellectual ways. SST should occur in both teacher-initiated group work and freely chosen yet potentially instructive play activities, where there is a balance of adult-led and child-initiated interactions and play. Directed teaching should occur alongside interactions which guide, but do not dominate, children's thinking. Effective practitioners plan for optimum language opportunities for young children through play activities through:

- Modelling appropriate language and matching it to activities and experiences
- Promoting specific vocabulary and opportunities to use, repeat, understand and consolidate it
- Contextualising learning through play, first-hand and active experiences, using practical resources, visual support and other children
- Getting the children actively involved in talking and doing
- Encouraging socio-dramatic play and role-play opportunities
- Praising, encouraging, asking questions and interacting verbally with children
- Creating an atmosphere of fun where children want to participate

Practitioners need to plan and provide opportunities for 'good talking' to take place. Drawing a room plan and noting where the talking 'hot spots' are and drawing a timeline that lists everything that happens during a setting's day are valuable ways of monitoring effective language activities.

Supporting Bilingualism in the Early Years

More children in the world grow up bilingual than monolingual and speaking more than one language actually comes naturally to young children. Cunningham and Andersson (2003) report that while international research documents the successes and difficulties of parents developing their children's bilingual competence, the advantages of being bilingual or multilingual are immense and include:

- Enhancing self-esteem
- Enabling communication with extended family and friends
- Developing knowledge about how language operates
- Supporting cognitive flexibility and ability to learn more languages
- Enhancing problem-solving and analytical skills

Code switching is the ability to use more than one language during communication through substituting a word or phrase from one language with a phrase or word from another language. Code switching may be syntactically, semantically and phonologically appropriate and can occur between sentences (intersentential) or within a single sentence (intrasentential). This can be seen in the following extract:

Nusrat: Did you stay in hospital?
 Wajid: Yes.
 Nusrat: Yes. I can remember you went to the hospital.
 Wajid: You, you, er went to the hospital
 Nusrat: I went to the hospital to see you didn't I?
 Wajid: Yes.
 Nusrat: You had a drip on your arm.
 Wajid: Yes, ai thai see na (*Wajid points to his right arm*)
 Nusrat: On your arm.

Wajid: Yes, I had a teeka, peena nee na sa dud, halley chadur laprey aim see na. (*Yes I had an injection, couldn't drink the milk, I could only hold the scarf.*)

Nusrat: Kerey chadur? (*Which scarf?*)

Wajid: Apni chadur, apni hadur, apni bed a kaul carana na scarf. (*My scarf, I take it to my bed.*) (Brock and Rankin 2008: 38)

This example demonstrates how fluent Wajid aged 3 is in Punjabi and how he is learning English and able to code switch between the two languages. It can be seen how important it is that Nusrat scaffolds Wajid's language and how they have shared meaning making and are able to reflect on and discuss their established relationship, personal history and past experiences (Brock and Rankin 2008). Kenner and Hickey (2008) provide another example of code switching where a 2-year-old is offering an 'ice cream' to his English-speaking mother and 'glace' to his French-speaking grandmother. There are several interesting studies in the UK that have examined the nature of families supporting heritage language. These include Jessel et al.'s (2004) intergenerational research exploring the relationships of grandparents and grandchildren; Papatheodorou's (2007) research promoting playful, interactive learning activities with parents and children in a Greek community school; and Brooker's (2002) research with Bangladeshi families on their children's transition to school. Conteh and Brock (2011) argue that bilingual learners in the early years need particular kinds of 'safe spaces' for success in language learning and that the key to providing these is in the relationships that are constructed between learners and their educators. Brooker's (2002, 2003) work shows that 'safe spaces' for bilingual learners need to be places where all their learning experiences, in home, community and school, are recognised and valued. Positive home-school links need to continue throughout the early years and into school with educators recognising and valuing the diversity of ways in which parents support their children at home (Conteh and Brock 2011).

English as an Additional Language

Many young children enter school at an early stage of learning English as an additional language – either through being newly arrived into an English-speaking country or because families have promoted their heritage/first language within the home environment in order for them to gain fluency in this before learning English. It can take up to 2 years of additional language learning to acquire basic interpersonal communication skills – the ability to use language to socialise and manage discourse in conversational situations – but it can take between 5 and 7 years to acquire cognitive academic linguistic proficiency, the ability to use language in more demanding academic, problem-solving and literacy activities. Cummins' (1984, 2000) common underlying proficiency is the interdependence of cognitive and literacy skills. Second language acquisition is a complex process, and in order for a first language to be truly additional, it needs to be maintained, encouraged and valued (Conteh and Brock 2006). Young bilingual children need to feel that their first

language is valued, as it is a main constituent of their thought processes. They need an environment where they can practise, explore, think and talk aloud in both their first language and the targeted additional language.

Young bilingual children may:

- Be very communicative at home and yet reticent in settings
- Use their first language in diverse situations within their families
- Have a good level of understanding of concepts in their first language
- Expect adults to understand them when they use their first language

Young bilingual children may not understand every word, not follow long sentences and get tired more easily. They may have difficulty in processing in the additional language and, even when the input is understood, have difficulty in communicating back in the additional language. They may choose to be silent until they feel competent or even feel insecure and so 'opt out' deciding not to talk, or even listen, if they feel overly pressured. Practitioners need to:

- Be very aware of own language use and show children how to use language to communicate.
- Exploit previously used language and so activate children's prior knowledge.
- Use oral strategies through talk and interactive questions.
- Connect first language to additional language.
- Consider pace, allowing time for children to think, consolidate and translate.
- Ensure children understand before progressing.
- Integrate speaking and listening to reading and writing.

The benefits of supporting bilingualism are immense, as it enhances children's self-esteem, enables communication with extended family and friends, develops knowledge about language and supports cognitive flexibility and ability to learn more languages (Brock and Conteh 2011). Practitioners need to consider how they provide for first and additional languages in their setting and how to capitalise on support they can receive from young children's families in order to achieve maximum benefits.

The Importance of Stories, Storytelling and Books in Young Children's Everyday Experiences

Bookstart, run by the national charity Booktrust, was the first national baby book-giving programme in the world. Wade and Moore (1998) introduced the idea of Bookstart in 1992 in Birmingham with 300 babies and by 2001 there had been over one million Bookstart babies. Bookstart operates through locally based organisations by giving a canvas bag to every new baby. The bag contains baby books, advice booklets for parents on sharing stories and an invitation to join the local library. The aim is that every child in the UK should enjoy and benefit from books

from as early an age as possible and the Bookstart bag is given to parents by their health visitor at the 8-month health check. Wade and Moore (1998) found that Bookstart babies were six times more likely to be library members and their parents were more confident about reading to their children. Some parents may have limited literacy skills, but they can be encouraged to look at the pictures with their child and talk about the illustrations (Brock and Rankin 2008). Anderson and Svensson (2008) explored the reading behaviours of 10 young competent nursery and reception children involved in the national Bookstart evaluation study – Bookstart: Planting a Seed for Life. This research examined the children’s attitudes to reading, their responses to selected texts and their understanding of early phonological and letter knowledge. The researchers also interviewed the parents in order to discover the home literacy events that shaped these young children’s reading competences. They found that this group of young readers, from different socio-economic groups, were reading in advance of their peers.

You can never begin to share books and read to children too soon – in fact very young babies soon develop their love of books and stories even before they are able to understand the words or see the illustrations clearly.

James loves books and from the age of three months he has been able to handle them and turn pages. At the age of 14 months he can now sit for twenty minutes at a time with an adult, listening to stories and pointing at the pictures. Again intonation is important – as the more an adult uses in the reading the more active listening James does. Animal stories are his favourites and he points to the different animals saying ‘daddy’ – which is his word for all mammals and male adults at the moment – he knows the difference but is at the stage of over generalisation in his vocabulary use.

This scenario of my grandson hopefully will, in the future when James goes to school, demonstrate Makin’s (2006) findings that shared book reading in families is strongly linked with successful school literacy and thus with identity, the belonging and participation in literate societies. She demonstrates that from an ‘emergent’ perspective, literacy is recognised as beginning from birth. Whitehead’s (2002) case study of the process of sharing picture books with a child in the first 3 years of his life at home with parents and visiting grandparents captures the rich detail of the experience through Dylan’s unique responses to picture books from a developmental emphasis, reflected in the month-by-month observations.

Reading stories to children is thought to be *the* most important activity for their successful future reading capabilities on entry to school. Well’s (1987) research in the Bristol literacy projects involved audio taping the language use of 128 young children aged 15 months and then 39 months in their family lives. The tape recorders were placed in the children’s homes and captured the conversations that the children naturally engaged in throughout the two and a half years. The results showed that the quality of young children’s early language experiences could vary greatly. The team tracked the children in their sample as they entered formal schooling and found that the impact of these early ‘story’ experiences made a difference to the children’s capability in school, in their literacy achievements (Brock and Rankin 2008).

Practitioners know that reading stories to children is obviously worthwhile, but there is a wealth of value gained more than just hearing a story. As children listen, participate, retell and respond, they are creating stories in the mind and this 'storying' is one of the most fundamental means of making meaning (Wells 2009). Experience of stories promotes language development, develops understanding of the world and the people in it and enriches imagination. Children love to listen to, and to read, stories they like over and over again. They enjoy familiar themes unchanging and the same ending always occurring, paying attention to words after they have discovered what happens (Meek 1991). They use the prediction, sequencing, repetition and text/illustration correlation promoted in a story. Children have a natural impulse to tell stories as a means of making connections between what they are learning and what they already know (Wells 2009). Children's metacognition in action can be seen through their story repertoires, and observing children's story-play can provide a window into their thinking – their meaning making – their knowledge about language and their self-regulation and decision making. Fox's (1993) research is both fascinating and complex as she writes about her detailed analysis of young children's story-play repertoires. The following examples from young children's everyday play show the influence that certain stories have had on them:

- Holly stamps her foot as Red Riding Hood after
- Carmen as a wicked stepmother chants 'Mirror mirror on the wall'
- Katie wears a shawl 'I'm the poor, poor peasant woman'
- The 'Tiger came to tea' often at Melissa's house
- Jed – 'If you don't wear a collar you get taken to the pound'
- Theo's obstacle course – 'Get on my back and I'll carry you' – storying the Gingerbread Man. (Brock and Rankin 2008)

Here are some useful examples of how to promote different purposes of language:

- 'Shadow-tell' stories for children to both listen attentively and participate in the telling, feeding the language back.
- Model language through story whilst using props.
- Use different versions of stories and create alternative endings.
- Offer the words to repeat and expand upon.
- Provide 'hot-seating' opportunities for children to get into role through a 'large' cardboard model of a 'shy' Elmer to enable the children to speak directly to him.
- Enable children to empathise with 'Farmer Duck' who does all the work (Brock and Power 2006?).

Story sacks (Griffiths 2011) contain the storybook, models of characters and practical objects from the story. These are so valuable to lend to parents so that they can become involved in storytelling, role-playing, reading and using the language of story with their children whilst handling the characters and props. A range of stories from different cultures and backgrounds should be developed in each setting. Sargent's (2008) *Little Book of Story Bags* contains a wealth of ideas of how to create and use story bags to enhance storytelling for both practitioners and parents. Practitioners can encourage parents to:

- Make reading a high priority and to be role models through reading for themselves.
- Make it an enjoyable and sharing time and providing quality time for reading.
- Involve all members of the family in reading with babies and young children – including siblings and grandparents.
- Show that it's important for everyone to read, including for different purposes and in different places.
- Involve their children in accessing a wide variety of story, picture, rhyming and information books and join a library to help make this possible.

Rhyme, rhythm, sound and song are very important elements of learning a language and they are also routes into developing phonemic awareness. MacLean et al. (1987) found that the number of nursery rhymes known by pre-school children predicted later reading success. Rhyme and song should be a natural event in young children's lives and practitioners should transmit this to parents. Most parents will naturally sing, rhyme and story with their children, but practitioners can ensure that parents understand the importance through creating resources and providing information. One children's centre created song and rhyme bags containing playful resources and laminated song cards for 'Five Little Ducks', 'Dr Foster Went to Gloucester' and 'Twinkle Twinkle' for parents and children to borrow and sing at home. These bags contained visual and malleable resources to support children's learning of the songs and rhymes and to also extend the adult's repertoire. Writing out familiar rhymes, laminating and hanging them from a mobile, makes them accessible to adults and parents working in or visiting a setting. Recognising that James at 21 months was making hand gestures for 'Wind the Bobbin Up' and Oscar at 23 months was singing 'Tommy Thumb' whilst in the bath enabled grandma to sing with them and build on the work started in their ECEC settings. One nursery created pulley systems to pull 'Incey Wincey Spider' up the spout and 'Hickory Dickory Dock' mouse up the clock. The practitioners were matching the words of the traditional nursery rhymes to physical actions and in doing so promoted fine and gross motor movement to enable children to become totally involved in the language and rhyme.

Partnership with Parents

Partnership with parents is important for all ECEC settings – as parents' involvement with their children's early literacy experiences has a positive impact on their children's reading performance and is the key to young children's future literacy achievement and educational success (Desforges and Abouchaar 2003). Research has repeatedly shown that one of the most accurate predictors of a child's achievement is not only parental income or social status but also the extent to which parents are able to create a home environment that encourages learning and communicates high, yet reasonable, expectations for achievement (National Literacy Trust 2011).

This recent review from the UK's National Literacy Trust Research Review entitled *Literacy: A Route to Addressing Child Poverty* demonstrates that parents' involvement in their own literacy skills and their understanding of the hugely important role they play in developing their children's educational outcomes. Nutbrown and Hannon's (2003) research examined the family literacy practices from the perspectives of 5-year-old children drawn from areas of social and economic deprivation in an English city. This research built on Hannon and Nutbrown's (2001) earlier work that had provided parents with ways of thinking about their own literacy and their roles with their children and how this reflected a sociocultural change in family literacy for the families. The children made more literacy progress than comparable group children not participating in the study.

Playful Early Literacy Experiences to Promote Reading and Writing

Acquiring literacy is crucial for children's educational achievement, but it is important that reading and writing should be portrayed as appealing, interesting and enjoyable. This should be promoted through a wide range of activities and experiences from the very early years. Practitioners need to be aware of what skills, knowledge and attitudes are needed to enable children to achieve competence. Without children getting a multitude of oral language, story, rhyming and song experiences, the route to literacy will be much more difficult than it needs to be.

In the UK there is an emphasis on the early acquisition of literacy skills that has caused concern amongst early years researchers and educationalists, who believe that young children are being pushed into acquiring these at too early an age. They have concerns that this causes some children difficulties, resulting in them learning to fail and so achieving a less than adequate competence of literacy as they go through formal schooling. Whilst Tickell (2011) has placed less emphasis on the acquisition of literacy in the revised Early Years Foundation Stage, there are plans to bring in reading tests for 6-year-olds in schools in England. The tests will be based on children's knowledge of synthetic phonics as a progress check to help identify children needing extra support. The government view that the 'synthetic' phonics method as advocated by Rose (2006) is the most important method of teaching children to read. A response from the UK Literacy Association (2010: 13) was that restricting children 'to an unbalanced diet, the thin gruel of a phonics-dominated approach, is a recipe for lowering standards and turning children against the written word'.

In what ways can practitioners promote literacy acquisition through playful experiences, taking care not to push children, particularly boys, too rapidly through prescriptive activities? There needs to be a balanced diet of experiences in order to maximise the ways each child can learn to read and write. A focus on developing children's speaking and listening skills will form a sound basis for future success in

reading and writing. The term ‘emergent literacy’ was first introduced by Marie Clay in 1966 and gradually replaced the notion of ‘prereading’ (Riley 2006). Most children cannot escape literacy; it permeates their environment – in their home, in nursery, on the television, in supermarkets and in the high street. Signs and notices in our highly literate environment surround us, even if literacy does not have a high profile at home and parents do not read books or newspapers. Therefore, if all children enter school with familiarity of literacy, what varies for each child is the quality of interaction with these experiences. Children can learn how to make literacy their own invention, in similar ways as that they previously learned to do with spoken language (Riley 2006: 49).

This chapter seeks to affirm how children, in order to become competent and active readers and writers, need a multitude of experiences of oral language, of talking, listening, storying, rhyming, reading and singing. These are the building blocks of literacy and make the difference as to how quickly and easily they acquire literacy (Brock and Rankin 2008). The importance of providing children with meaningful, multisensory early literacy experiences to create future success is evidenced in Whitebread and Jameson’s (2005) research with children aged 6 and 7 who were asked to reproduce oral and written stories after:

- (a) Hearing stories
- (b) Shown stories of photocopied sheets of story characters
- (c) Free play experience of story dolls and props after hearing the story
- (d) Adult-modelled stories using dolls and props

The analysis of the children’s written stories in the play condition of the children showed:

- More conflicts and resolutions
- Different scenarios from the original stories
- More confidence in the oral storytelling activity
- Higher-quality story writing

Fathers need to be involved in the development of their children’s literacy skills and Saracho’s (2007) research demonstrates how successfully a group of fathers were encouraged to read books, engaging their children in discussions about books they read. A valuable way of encouraging fathers is through appreciating both their and their young children’s technology experiences. Marsh’s (2004) research in a working-class community in the north of England identified the ‘emergent techno-literacy’ practices of a group of 44 children aged between 2.5 and 4 years of age and documents the importance of recognising these family practices in ECEC settings. As Levy (2011) argues, reading is no longer about just reading books, and young children are accessing a wide variety books, comics and digital screen texts. Becoming a reader involves developing many skills, but of key importance, as Levy’s (2011) case study research evidences, is how young children view themselves as readers. There are important implications from her work for practitioners, as it presents the complex nature of reading in modern society, examining children’s perspectives and dispositions to reading.

Conclusion

This chapter should have evidenced the wealth of early language and literacy practices that occur and need to be valued in both ECEC settings and young children's home backgrounds. It indicates that it is important to keep an open mind about young children's language and literacy development and not make assumptions about children's home experiences. The chapter also asserts that both the knowledge base and experience of practitioner are crucial but also that observing, monitoring, assessing and analysing are important. Observing children in an enabling environment is important as it informs the way practitioners work with children and their families (Bruce and Spratt 2011). Undertaking observations of children's communication, language and literacy activities and analysing their linguistic accomplishments and development can help ensure that they are experiencing a depth and breadth of experiences with peers and adults. Practitioners should:

- Listen to what children are saying.
- Check the practitioner's modelling of language and provision of opportunities for child talk.
- Observe what is happening.
- Analyse what it shows.
- Document future aspects for development.

'Learning Journeys' (Carr 2011) are a valuable way of documenting children's language and learning through an emphasis on dialogic talk about learning – describing how children learn, discussing what has been learnt, documenting the activities and language used and deciding what to do next. Practitioners reflect on children's dispositions and motivation through recording the narrative, i.e. telling a story of the context, relationships, concentration and persistence, using photographs and video to capture verbal and non-verbal communications. The focus is on language and learning, more than on achievements, on what children are interested in and involving both the children themselves and their families. Observations should be a two-way process and parents should have a role in contributing to these. This will enable planning to be effective in following children's interests and it is also important to allow children to reflect on their own learning. Documenting learning with photographs will offer children the wherewithal for them to think and talk about what they are doing by engaging them in the narratives and dialogues.

Listening to and analysing young children's language not only promotes knowledge about their early language development, it should be an exciting adventure into their communicative competence and their thinking. At the time of writing this chapter, my grandsons' early language is beginning to explode and I am not only enjoying listening to them and in taking an active part on building their repertoire, yet I cannot help analysing what they are saying and using these examples with undergraduate and postgraduate students on early childhood education courses. I am determined to disseminate to them not only the importance of successful early language development but also my enthusiasm for field of study. My aim is to

develop the students' and practitioners' knowledge base and competence in working in partnership with young children and their parents. I hope that this has also come through this chapter for the readers of this book.

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Chapter 7

China's Educational Reform and Its Impact on Early Childhood Curriculum

Yaoying Xu and Bing Liu

Abstract China's educational reform has come a long way, along with its large-scale economic reform since the early 1980s. Educational reforms have attempted to broaden educational endeavors on developing well-rounded individuals through a shift from examination-oriented education to quality-oriented education with a holistic approach. However, outcomes of this reform seem too complicated and controversial to claim it a success. This chapter addresses China's *Suzhi Jiaoyu* or quality education as a result of its educational reform. The impact of *Suzhi Jiaoyu* on early childhood curriculum in China was explored, specifically from the following aspects: curriculum standards, teacher quality, instructional approaches, assessment and evaluation system, and parental involvement. Challenges and issues around this educational reform were discussed.

Keywords Chinese educational reform • *Suzhi Jiaoyu* • Early childhood curriculum • Special education

Introduction

China's educational reform has come along with its large-scale and worldly known economic reform since the early 1980s. As a response to the educational reform, the traditional examination-oriented education in China has been challenged and

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widely criticized because of its overemphasis on rote memorization and standardized testing scores. Educational reforms have attempted to broaden educational endeavors on developing well-rounded individuals with a holistic approach. Significant changes have been observed in the last three decades throughout China's educational system from early childhood education to higher education. Undoubtedly, the impact of this educational reform on early childhood curriculum is profound and extensive.

The purpose of this chapter is to explore the impact of China's educational reform on the early childhood curriculum. We started the chapter with an introduction to the educational background of China and major components of the educational reform, followed by a discussion on China's *Suzhi Jiaoyu* as a result of the educational reform. Then, we focused our discussion on China's early childhood education by exploring its curriculum standards, teacher quality, instructional approaches, assessment and evaluation system, and parental involvement in early childhood education. We concluded the chapter with a discussion on challenges and issues in early childhood education and the future direction of China's educational reform.

China's Educational System

Background

Education has been valued throughout the history of China. The term "education" in Chinese language consists of two words: *jiao* (teach) and *yu* (nurture). To teach and to nurture are two major concepts involved in education. While this literal interpretation may carry some true meaning of the educational philosophy in China, the significance of early childhood education for an individual's development was formally recognized in the early twentieth century (Vong 2008). Historically, the Chinese formal educational system consisted of only the elementary education (for children 7–15 years old) and higher education (for students over 15 years old). Instead of receiving public education, children younger than school age typically received private instruction from private tutors or home teachers (Bai 2000).

Confucianism has played a significant role in the Chinese educational ideology except for the Cultural Revolution period (1966–1976) when the formal educational system was abandoned and Confucianism was criticized. Throughout the Chinese history, hierarchical order in the society was emphasized; collectivism has been valued and reflected by the educational policies. Interpersonal relationships among individuals in the same society were highlighted (Triandis 1990). This is especially important for the contemporary early childhood educators and researchers in China because the "One Child One Family" policy since 1979 has put more responsibility upon early childhood professionals to provide social interaction opportunities for young children to interact with their peers, who otherwise would interact primarily with their siblings at home settings.

Educational Reform

At the end of the Cultural Revolution, the Chinese government started its Open Door Policy with an emphasis on economic reform shifting from politics-oriented policies (Sun 2010). To meet the needs of this economic reform for skilled professionals, workers, and the overall quality of the society, the Chinese government launched an intensive educational reform since 1985.

Two types of school educational system reform took place. The first was the reform of educational system at different levels such as compulsory school educational system and the reform of advanced school educational system. The second was the reform of educational system with different categories such as the reform of private educational system and vocational educational system (Sun 2010).

The term *Suzhi Jiaoyu* is a unique concept that has emerged along with the educational reform, specifically with the curriculum reform at the primary and secondary levels reflected by curriculum goals and standards, teaching educational administration system, and the reform of intraschool management system. For example, the educational administration system was reformed to increase the authority and responsibility of the local governments in managing primary and secondary education with decentralized control from the central government over basic education. With the intraschool management system, the reform changed the dual system of power in primary and secondary schools from two lines of authority (a principal who usually is the professional educator and a party secretary who represents the party branch) to principal management system with a principal as the primary authority in charge of teaching quality and daily decision-making process (Sun 2010). This change was assumed to ensure the quality of education in terms of student outcomes and instructional practices.

Suzhi Jiaoyu: Quality Education

The term *Suzhi Jiaoyu* is a unique concept that has emerged along with the educational reform, specifically with the curriculum reform at the primary and secondary levels as reflected in curriculum goals, standards, methods, materials, and assessment systems (Dello-Lacovo 2009). The literal translation of *Suzhi* is quality or competence, and *Jiaoyu* is education, thus *quality education* or *competence education*. The term first appeared and was used by policy makers and educators in the early 1980s with different kinds of educational interventions to raise young children and students' overall *Suzhi* or quality (Woronov 2009). Gradually this term was extended from school-based education to family-based education, and throughout the 1990s, the term was widely used by educators, policy makers, as well as parents, for all kinds of purposes. However, the meaning of *Suzhi Jiaoyu* was never clearly defined; therefore, the components of *Suzhi Jiaoyu* have remained ambiguous.

In spite of the ambiguous definition and interpretation of the term, the concept of *Suzhi Jiaoyu* was proposed and quickly became one of the guiding principles of educational policy in China. A common interpretation of *Suzhi* includes cultivating creative and independent thinking skills, integrated practical or problem solving skills, teamwork, and cooperation (Dello-Lacovo 2009). This term encompasses a wide range of educational ideals but generally refers to a more holistic approach to education that centers on the whole person instead of discrete, isolated skills. Therefore, *Suzhi Jiaoyu* has been often proposed as a solution for the problems caused by or related to the traditional examination-oriented education.

Under *Suzhi Jiaoyu*, students' workloads were supposed to be reduced, and standardized examinations that focused on discrete skills training or rote memorization were to be replaced by quality-oriented, process-emphasized projects or activities. According to the 2003–2007 Action Plan for Invigorating Education, the "Project for Quality-Oriented Education (*Suzhi Jiaoyu*) in the New Century" was proposed to focus on fostering students' creative and practical skills and *Suzhi* or quality of students that included a wide range of areas such as moral, intellectual, physical, and aesthetic development (Dello-Lacovo 2009; Zhu 2004).

Although *Suzhi Jiaoyu* is a new term, the values emphasized by this concept have its roots in the traditional Chinese ideology. For example, the *Suzhi Jiaoyu* policy raised the question on how children should be educated in terms of not only individual quality but also the collective quality of the nation, which has always been valued in the traditional Chinese education. The eventual goal of this policy was to prepare "well-rounded" children and adults with qualities in the four developmental categories: intellectual, moral, physical, and aesthetical. By theory, these four categories also aligned with the theory of Marxism, which was followed by the central Chinese government. In reality, however, these categories were often overlapped, and there has never been a clear guideline providing clear directions guiding the practices.

As a result, the term *Suzhi* has been broadly used in various occasions or often-times has been overused to refer to not only the educational system or policy but also to individual people, in any educational or societal occasions. For example, when a student is considered high *Suzhi*, she or he not only excels in academic subjects but also talented in extracurricular areas such as music, arts, physical education, as well as being considered a good character with high moral standards such as selflessness, diligence, and commitment. Or a mother could be considered by her neighbors as low *Suzhi* because she yelled at her child in public. An employer might accuse his employee of having no *Suzhi* for talking bad behind somebody's back. To loosely define, a person with *high Suzhi* would be somebody who is intellectually competent with strong knowledge base, practically skilled in a specialty area, physically healthy, morally right, and aesthetically talented. Ideally, when a nation or society consists of such individuals, the nation or the society is one with high quality.

Under the banner of *Suzhi Jiaoyu* Action Plan, a list of educational initiatives was proposed from prekindergarten to higher education. Early childhood education and education for children with disabilities has been one of the initiatives listed

under this *Suzhi Jiaoyu* Action Plan, among other aims such as the universalization of 9-year compulsory education, curriculum reform, moral education, physical and aesthetic education, and education for ethnic minorities (Action Plan 1999). Although the focus of the curriculum reform is on primary and secondary education, its impact on early childhood education curriculum is evident and significant in content and context.

Early Childhood Education

In the Chinese educational system, early childhood education refers to the education for young children from birth to age 6. The public school system in China consists of a 12-year formal education: 6-year elementary school, 3-year middle school (junior high), and 3-year high school. China provides 9-year compulsory education that consists of 6 years of primary education and 3 years of middle school education. Early childhood education in China is non-compulsory; therefore, the quality of early education varies greatly from program to program and region to region.

Before they enter the grade schools, young children may go through three types of early education programs: childcare or nursery programs for infants and toddlers (birth to 3), kindergarten programs for children 3–6 years of age, and a 1-year pre-primary program for children in rural areas prior to primary school who might not have the opportunity of entering kindergarten at the age of 3 (Zhu 2008). The term “preschool” which typically refers to programs for 3- to 5-year-olds in the Western world was replaced by the term “kindergarten” in this chapter which refers to programs serving 3- to 6-year-olds in China. Traditionally, nursery programs focused more on childcare and kindergarten programs focused more on education. Since the educational reform, early childhood programs started to emphasize both care and education throughout nurseries to kindergartens by focusing on the development of “well-rounded” or “fully developed” child (Zhu 2001).

The reform in early childhood education in China aligned with the overall educational system reform under the *Suzhi Jiaoyu* policy (Liu and Feng 2005). As discussed earlier, *Suzhi Jiaoyu* was an ideological concept attempting to transform practitioners' educational ideas on how young children learn (Liu et al. 2004; Zhu 2003). Different from the traditional early childhood education curriculum that either focused on providing childcare (e.g., nurseries) or school readiness pre-academic skills (kindergartens), the reformed early childhood curriculum emphasized developing the whole child in terms of the following areas: respecting children, active learning, teaching to meet individual learning needs, play-based teaching and learning, and teaching and learning through routines in kindergartens (Liu and Feng 2005).

Kindergarten reform began as a small-scale, experimental format that emerged spontaneously in different parts of the country in the early 1980s and gradually

expanded to a large-scale reform. Eventually it developed into a top-down model, led by the central government based on the *Regulations on Kindergarten Education Practice* issued by the National Education Committee of the People's Republic of China in 1989. Since then the early childhood programs have been increasing every year. By 2008, the number of kindergartens nationwide was 133,700, an increase of 4,600 from the previous year, serving 24,749,600 children 3–6 years old, an increase of 1,261,300 (Ministry of Education 2009).

Under this new model, play has been identified as a major way of young children's learning instead of structured group lessons. Early childhood educators started to observe children's play behaviors during activities as part of the evaluation process. Identifying individual differences of young children was another major component of the reform, which has also been the most challenging part of the reform because it caused conflicts with the traditional value of collectivism. Respecting children as individual persons is a new concept for many Chinese educators and parents. For example, it has always been valued and emphasized in the Chinese educational curriculum that the interests of the collective group supersede the interests of oneself. It was viewed as being selfish if an individual put his or her own interests above those of the group.

Despite these challenges, educators have been carrying out the reform based on the modern theories and practices that respect young children as a group with similar developmental patterns while, at the same time, recognizing them as individuals with their own characteristics. As a learner-centered approach, the current Chinese kindergarten programs have been revitalized with new ideas of interacting with young children. Educators and parents have begun to appreciate that young children are not just being protected by the adult society, they should be respected as individuals with independent personality and dignity and respected as persons with their own rights to learn and develop (Liu et al. 2005).

Curriculum Standards

The goals and standards in early childhood education in China have been changed since 1979. According to the *Education Law of the People's Republic of China* (National People's Congress 1993), early childhood education has been regarded as the foundation of overall education. To ensure the quality of early education, national guidelines of policies for early childhood education were established by the central government as a general framework; the local governments and communities have established their own developmental plans (Wong and Pang 2002). The national *Kindergarten Work Regulation* recommends that kindergarten programs provide care and education for young children 3–6 years old by focusing on the development of the child as a whole and emphasizing play-based, integrated curricula; this was a gradual movement from a teacher-directed to a child-centered approach (Li 2006; Wong and Pang 2002). Five developmental and learning domains

were addressed including health, social/emotional, science, language, and art, upon which four goals were developed:

- To prepare a healthy environment
- To promote cognitive and language development
- To foster children's moral and social development
- To develop children's appreciation for the arts

The early childhood curriculum reform was featured by the shift from the emphasis on teaching knowledge and skills to an emphasis on development of the whole person with abilities in all developmental and learning areas, particularly with an emphasis on meaningful problem solving abilities. This change was reflected by the emphasis of the educational process that respect individual child's learning needs instead of an emphasis on the educational outcome under the uniform curriculum standards (Zhu 2004). In recent years the traditional uniform curriculum was criticized by educators and researchers because of the gap between the curriculum designers and curriculum implementers. Typically the curriculum was designed by specialists who have expertise in the content area but who have no direct service experience working with children and their families. The curriculum was prescribed for teachers with standardized goals and objectives. Teachers' role was to follow the curriculum with the purpose of delivering the content instead of following the learners (children) to ensure effective learning within the meaningful context. Therefore, the traditional kindergarten instruction was to transmit knowledge through drill exercises (Zhu and Zhou 2005).

Despite the vague definition of *Suzhi Jiaoyu* policy in early education, the curriculum reform has started changing the foundation of the traditional kindergarten educational paradigm. The reform requested that early childhood professionals examine children's prior experiences, interests, and needs, engaging children in meaningful activities, and evaluate children's learning through multiple measures and sources. Obviously this request would require higher-level skills from teachers than a standardized curriculum because teachers would play a more active role as a decision maker in both the curriculum development and implementation. However, kindergarten programs and teachers in rural areas might not receive the same level of support (both financial and professional) and resources, and consequently many rural kindergartens might have to share resources including books, Internet connections, and multimedia services. Many kindergarten programs in rural areas might experience severe shortage of personnel; as a result, the quality of early education might have to be compromised. On the other hand, kindergartens in big cities and economically advantaged areas have been benefited from the reform. For example, Zhu and Zhou (2005) conducted a survey on kindergarten directors investigating early childhood education teachers' practices in terms of curriculum development and implementation as well as pedagogical methods in teaching young children. They found that teachers in Shanghai area since the educational reform started to pay more attention to children's independent study and positive interaction between teachers and children. Teachers also changed from emphasizing the standardized curriculum to multiple orientation and self-determination of the curriculum

(Zhu and Zhou 2005). Although teachers were reportedly better prepared in terms of beliefs, perceptions, and behaviors, preparing high-quality early childhood teachers continued to be a daunting task.

Teacher Training in Early Childhood Education

Chinese kindergarten teachers were trained primarily through three ways in the past several decades since the early 1950s. The first was the traditional training programs provided in normal schools or universities. The second included vocational schools that recruited students directly from junior high or middle schools. The third category was through retraining of returning teachers from the field. The formal education of early childhood teacher preparation varies from 2-year junior colleges to 4-year colleges with bachelor's degrees to master's and doctoral programs from normal universities. In addition to the formal education, local county and city governments may offer ongoing in-service training through distance education such as online and correspondence education.

Because the early childhood education in China was non-compulsory, early childhood teachers were placed in a lower social and economic status than other teachers (Zhu 2008). The quality of early childhood teachers also varied greatly. For example, among the kindergarten teachers and directors, only about 6 % held a bachelor's degree, about 43 % of them received 2- or 3-year college education, and over a half of these teachers and directors received no professional training (Ministry of Education 2005; Zhu 2008).

Under the traditional Chinese teacher education, knowledge was viewed as objective, neutral, and universal (Dello-Lacovo 2009; Zhu 2004), and teacher's role was to deliver the knowledge with an emphasis on the learning outcomes or skills and minimal consideration of contextual factors such as individual interests, family background, or situational changes. Instead of an integrated approach to instruction, kindergarten teachers were trained by subject areas such as language arts, mathematics, or social studies. Knowledge was taught through drills, practices, and tests instead of hands-on projects. In this teacher training model, kindergarten teachers were generally stronger in content knowledge than they were in pedagogical knowledge with at least 2 or 3 years of training.

The quality of early education teacher preparation programs has a direct impact on the quality of instructional practices in early childhood. The uneven economic development in China has also affected the uneven distribution in terms of quality of early childhood education. While kindergarten teachers from more developed regions have implemented child-centered instructional strategies to promote the individual potential, teachers in rural or underdeveloped areas were still managing to provide basic educational needs such as textbooks, writing papers, pencils, and chalks. While a kindergarten in Shanghai or Guangzhou has teachers with a degree from advanced teacher preparation programs to teach children holistically, in a rural community there might be a classroom of children with ages ranged

from 2 to 6 being taught by a young teacher who barely graduated from high school or middle school.

In more developed areas along the east coast such as Shanghai and Guangzhou, kindergarten teachers often held a bachelor's or a master's degree in early childhood education, and the early childhood curriculum was incorporated with modern approaches and Western philosophies that emphasized child-centered learning and teaching. In rural areas or less developed regions, many kindergarten-age children were not provided formal early childhood education at all, and when they did receive 1-year preprimary education for school readiness preparation, the curriculum was primarily designed for elementary-age children with a focus on academic skills instead of a holistic approach (Cai 2005; Zhu 2008).

Instructional Approaches

The traditional curriculum paradigm focused on structuralization, systematization, uniformity, and standardization, whereas the reformed curriculum emphasized complexity, multiplicity, individuality, and contextual peculiarity, especially the appropriate cultural context (Zhu 2008). The standardized curriculum with universal principles in child development and education typically did not involve family backgrounds, personal experience, social relations, and cultural heritage (Zhu 2008); therefore, the instructional methods were mostly prescribed with the central purpose of grasping knowledge rather than interpreting knowledge. One primary goal of the early childhood education reform was to incorporate new educational theories and learner-centered approaches to early education, with the purposes of improving the quality of kindergarten education and strengthening the instructional skills of kindergarten teachers. As a top-down model, this reform was carried out through administrative policies to all levels of administrative organizations and kindergartens. Compared with the traditional model that was teacher-directed and skill-oriented, the reformed model emphasized child-initiated activities, individual differences, play-based performance, integrated curricula, and the process of learning (Zhu and Zhang 2008). As a result, a variety of Western curriculum approaches has been adopted including the Project Approach, Reggio Emilia, High/Scope, and Montessori (Li and Li 2003). Developmentally appropriate practice (DAP) was introduced as the framework for curriculum development.

One essential change in the new approach to kindergarten curriculum is the emphasis on young children's active learning through exploration with the environment and interaction with peers in hands-on activities. Learner-centered instructional approaches have been incorporated into the educational system (Dello-Lacovo 2009). Instead of being the direct recipients of new information, young children were encouraged to ask questions and to connect their personal and family background to the new information. Academic skills were planned to be embedded within multiple contexts such as arts, music, and physical education. Constructivism and social/cultural interactive learning has played a major role in the development

of this new approach. Instead of learning through structured instruction as a collective group, young children now are encouraged to “construct,” to build their own knowledge through active process of learning.

Under the new curriculum, teachers’ role was not only to facilitate young children to acquire knowledge; more importantly, teachers need to prepare children to be competent in using the knowledge in real-life situations. While this change has inspired many Chinese early childhood educators to be creative and reflective, it has also caused challenges because it affects the fundamental ideology in the Chinese educational system. In the traditional Chinese culture, learning was more extrinsic than intrinsic. This has much to do with a fundamental value rooted in the Chinese culture, namely, that you learn with the main purpose of benefiting the collective group other than simply for the purpose of enjoying yourself. When these two purposes do not align, conflicts may arise.

Assessment and Evaluation System

Examination-oriented education was not a new concept in the Chinese educational system. For over a 1,000 years, Chinese imperial governments adopted centralized examinations to determine official status and power, and this concept has been rooted in Chinese culture and society. In ancient China, the examination focused primarily on skills of essay writing, poetry writing, and calligraphy as well as Confucian ideology and classical literature and history that required rote memorization and recitation (Zhu 2008). Because of the influence of testing system in the Chinese history, standardized examination was always valued in the Chinese educational system; it persistently exists during the educational reform throughout early childhood to higher education (Pepper 1996) with the teacher as the center of the learning process and the students the information recipients (Thogerson 1990).

Many of the features of the traditional Chinese educational system were carried over to the Chinese modern schools (Pepper 1996). The evolution of the modern schools in China was a fusion of traditional imperial methods with examination as the primary assessment system prescribed by governmental regulation and modern Western schooling features with multiple subjects such as science, math, and literature instead of overly focusing on history, literature, and essay writing. Under this model, schools were standardized and regulated by the central government; educational resources were controlled by a few authorities in educational research (Pepper 1996). This model was widely criticized by both educators and parents because of its rigid focus on examination, its disconnection between formal education and practical life skills, and teacher-centered instruction (Pepper 1996).

Although the curriculum reform goals were established at all levels of the educational system from early childhood education to higher education, there was no effective evaluation system developed to guide the assessment tools and to determine whether the curriculum goals had been met (Beijing Report 2006; Marton 2006). There were no clear evaluation criteria being established to guide the evaluation

methods and procedures (Wen 2007). For example, a survey conducted by Shandong Education Department in 2007 identified six major problems holding back the progress of *Suzhi Jiaoyu* (Dong 2007). Although the *Suzhi Jiaoyu* policy valued all five developmental areas, it was found that intellectual education was the focus with a high emphasis on standardized examination in subject content areas and low emphasis on non-examined areas such as moral, physical, and aesthetic education, emphasizing knowledge transmission rather than cultivation of creative skills and practical skills. As a result, the small percentage of “bright” students was the focus to earn the fame for a school, whereas the “average” students were neglected. The survey indicated that nearly 60 % of teachers believed that children’s study load was actually heavier under the reformed curriculum than it had been 5 years previously; what was worse, some children’s health was reported worsened under the heavy load of study (Dong 2007).

Another example was about cram schools that provided revision and preparation classes during official summer breaks for the next school level (e.g., from middle to high school). Although the Shanghai Education Commission strictly prohibited cram schools running preparation classes during the summer break except for classes for struggling students, a 2006 report indicated that more than two thirds of Shanghai students were attending these classes, among whom including primary school students and students with high ability (Chun 2006).

Under the current examination-oriented assessment system for higher education entrance and secondary school entrance, examinations were provided as early as in kindergarten to “prepare” children for the heavy testing schedule at grade schools. Children in kindergarten were not only given tests but also given ranks based on their test results, and these results were often announced in class as a “motivation” to encourage their learning. As a matter of fact, it has become the courteous greeting of parents and grandparents at social occasions for them to ask each other “What is your child/grandchild’s rank in his/her class?” instead of asking “Has your child enjoyed his/her preschool?” which would be more common in Western culture. Aligned with the testing, kindergarten teachers started assigning homework almost every day including most weekends, despite the opposition from the central and provincial regulating governments. The examination-oriented approach was so penetrating, even at occasions when teachers choose not to assign homework, parents would question teachers whether their children had been taught enough.

Without changing the examination-oriented assessment approach from the top of the system, it was almost impossible to convince teachers and parents to abandon the testing methods because a testing score was the primary criterion for high quality or *Suzhi* for both teachers and students. Examination success was of critical importance to students’ future lives and remains the primary form of assessment of teacher quality and school performance. There has been a widespread discussion on reforming the examination content in line with the new curriculum goals, and there have been some changes to the examination system with some regions now setting their own exams on certain subjects. Some provinces and cities started to consider additional admission criteria rather than test scores alone to recruit high-quality junior secondary graduates to outstanding senior secondary schools. However, the

primary admission criterion was still the result from examination contents that required traditional rote learning methods instead of problem solving skills. For example, Marton (2006) found that the geography public examinations were still testing low-level cognitive skills emphasizing memorized details instead of conceptual understanding, which completely contradicted the goals of the curriculum reform.

Parental Involvement

Parental involvement in early childhood education has been always important in China, but traditionally in a more informal way until children entered grade schools. In recent years, with the emphasis of *Suzhi Jiaoyu*, childcare was shifted from home setting provided by primary caregivers including grandparents or relatives to formal education in kindergarten programs. As a result, parents and/or grandparents have been more formally involved in early childhood education. This is especially true for children 3–6 years old from more developed regions. Zhu and Zhou (2005) conducted a survey of current Shanghai early childhood education on 127 communities, and results indicated that early childhood educators in Shanghai had increased partnership with families under the reformed early childhood curriculum. However, although the importance of involving parents was recognized, the role of parents and communities in the development and implementation of the curriculum was vague and remained informal.

In general, for children between the age of birth and 3 years, Chinese parents were reported being more involved in home-based childcaring programs than school-based programs (Lau et al. 2011; Nyland et al. 2009). In urban areas, home-based babysitting for this age group of children was the primary form of childcare (Gao and Zhai 2004). The quality of home-based childcare programs varied greatly. In recent years, the increased number of layoff workers contributed to the increase of home-based childcare along with grandparents who are available and willing to take care of the grandchild at home setting. In addition, mothers who do not work in the workforce would not use public childcare programs for financial or educational reasons. The education levels of these caretakers ranged from elementary education to higher education, and, therefore, the quality of home-based childcare programs ranged from basic childcare to high-quality care and education. As a result, the education and care for children under 3 years old was not guided by consistent curriculum standards; formal education does not typically start until children reach 3 years old and enter kindergarten.

Another characteristic in early childhood education is the rapidly growing trend of private early care and education programs as a result of the economic impact and change of governmental policies (Nyland et al. 2009). In terms of funding sources, kindergartens in China used to have four categories: kindergartens sponsored directly by the government for its personnel at all levels, kindergartens sponsored by state-owned enterprises and large corporations as a support for their employees,

kindergartens cosponsored between parents and local communities in urban areas, and kindergartens sponsored by local rural governments in the countryside (Zeng 2008). All these kindergarten programs were considered public early childhood programs with full or partial support from the different levels of government and agencies. Private early childhood programs came into existence as a new concept along with the economic reform.

The central government in China started to shift its responsibilities for funding and managing early childhood education to nongovernmental agencies or private sectors since the 1990s (Li and Wang 2008). As a result, some public early childhood programs were forced to transform into self-funded enterprises when the budget was cut from the local governments. This change of policy has caused controversy among parents and educators. For example, Li and Wang's study (2008) indicated that many people were concerned about the quality and standards of self-funded programs when the transformation to private sectors changed the nature of teaching profession, whereas others expressed their support because the transformation might elicit fair market competition and might lead to a more reasonable distribution of educational resources.

Challenges and Issues

Ideological Conflicts

Under the reformed curriculum model, play has been identified as a major way of young children's learning instead of structured group lessons. Early childhood educators started to observe children's play behaviors during activities as part of the evaluation process. Identifying individual differences of young children was another major component of the reform, which has also been the most challenging part of the reform because it caused conflicts with the traditional value of collectivism. Respecting children as individual persons is a new concept for many Chinese educators and parents. For example, it has always been valued and emphasized in the Chinese education curriculum that the interests of the collective group supersede the interests of oneself. It was viewed as being selfish if an individual put his or her own interests above those of the group. As a result, although many teachers and parents may understand the importance of child-centered curriculum, the implementation of the new curriculum could be compromised.

One of the challenges for teachers' implementation was the lack of effective guidelines for instructional practices, and oftentimes teachers were not prepared to implement the new curriculum. Due to the lack of firsthand experiences in the new approach, many teachers had to rely on their own understanding of the theory and transform from the theory to practice based on their past experiences. A gap might exist between teachers' pedagogical ideas and instructional practices, and this gap could be widened without appropriate teacher preparation. According to a survey on 246 county education bureau leaders conducted by the National Education

Administration Institute, only about half of these leaders thought that the teachers in their divisions had received effective guidance, and only about 43 % of them thought that the teachers were able to adapt to the new curriculum (Yu et al. 2005).

Consequently, in many areas, teachers continue teaching children using the same materials and approaches such as drills and practices under the new term “*Suzhi*” education. For example, a report from Shandong province indicated that teachers’ instructional methods still reflected their traditional beliefs in teacher-centered instruction with an emphasis on discrete skills requiring rote memorization and testing (Shan 2002). Although some student-centered components were included in the curriculum and inquiry-based activities were suggested, teachers tended to focus on the textbooks and considered the components of new curriculum irrelevant to the contents and their instructional practices (Marton 2006). Compared to examinations on core content subjects, some teachers and parents agreed that music courses should be cut back, physical education could be exempted, and even students’ sleep time could be shortened (Wen 2007).

Imbalanced Resources

In addition to ideological conflicts, the limited or lack of educational resources is another challenge to implement the new early childhood curriculum. In China, over 50 % of the population lives in rural areas (Zhao and Hu 2008). However, young children from rural or underdeveloped areas had not been guaranteed early education for several decades since 1949. The agricultural communities have unique needs and challenges in terms of young children’s care and education due to the lack of resources and limited funding, among many other factors. Lower enrollment in elementary schools and high school dropout rates had been major issues in many rural areas. Since the economic reform and the Open Door Policy, the government established national guidelines that specifically focused on early childhood education in serving children in rural areas. In 1983, the central government released *Concern about Early Childhood Education in Rural Areas* specifying the critical role of early childhood education with policy guidelines. The new guidelines encourage small towns and villages to take more active roles in developing and implementing early care and education programs to serve the local communities. As a minimum requirement, children 5–6 years old are offered a 1-year preprimary program before they enter the primary school.

The financial resource in China’s education is low and unequal with a significant discrepancy between urban and rural schools starting with prekindergarten programs and getting worse in junior and senior high school. This discrepancy has put students from rural areas in a disadvantaged situation for the competitive standardized higher education entrance exam, which was the major official path to successful careers and better life (Gu 2000). Not surprisingly the *Suzhi Jiaoyu* reform that emphasized educating the “wholeness” of the child with a holistic approach did not benefit students from rural areas. Due to the discrepancy from the starting point,

children from rural areas had to spend longer study hours in order to be able to compete with their counterparts from more developed areas. At the primary school level, it was found that children from rural schools spent more time on content subjects required for the core exams such as math and language arts and less time on non-exam courses such as computing design or oral English, either due to the lack of expertise from teachers, lack of resources from the school, or lack of access of students to after-school private programs (Kipnis 2001; Liu and Feng 2005). Therefore, the definition of *Suzhi* carried very specific meaning to these students, testing scores in standardized exams, which was followed by the rest of the sequence: low scores → low *Suzhi* → low-level job → low-quality life.

The Persistence of Examination-Oriented Education

The educational reform in China has been attempting to transform the traditional examination-oriented education into quality-oriented educational system by focusing on improving students' creativity and independent inquiry. However, without changing of the higher education entrance examination criteria that mainly rely on standardized testing scores, the implementation of quality education, or *Suzhi Jiaoyu*, has become an empty slogan.

When the quality of students and schools was evaluated by the percentage of passing standardized tests, the quality-oriented education was "operationally" defined as testing scores. When parents chose kindergarten or elementary schools, what they were looking for was not how the curriculum was developed and implemented in what contexts; instead, they were looking at the most explicit factor: how many children were accepted by schools at the next level, for example, at the high school level, how many students passed the higher education entrance exam. This is common sense because no caring parents would take the risk of their child's future by choosing not to look at this factor. Consequently, even some parents may not agree with the examination-focused approach or teacher-directed instructional methods; the outcome of these practices became the sole motivation. In some cases when schools were trying to follow the national education policy by reducing the homework load of students and cutting back the study hours at school and after school, parents chose to pay private tutors to make up for the "loss" because they were concerned that their children might not do well in exams (China Education Journal 2005).

Future Direction

Evidently, the outcome of quality education, or *Suzhi Jiaoyu*, was complicated and impossible to be estimated from only one dimension. The persistence of examination-oriented education has its roots in the larger social and political system beyond the educational system. For example, entry-level jobs and promotions for governmental

officials and professional personnel were still based on examinations that focused more on the foundational knowledge and theoretical aspects than on problem solving skills (Niu 2007). When parents and teachers witnessed that the only path to a successful career is by receiving higher education, children were encouraged to study hard as early as at kindergarten age. However, the primary criterion for their performance throughout the school years is their successful entrance to the next school level as determined by their testing scores (Dore 1976; Andreas 2004).

The solution to this problem obviously involves the change of the higher education admission criteria and procedure along with other systematic changes. To make fundamental changes of these issues related to quality education, however, the educational system needs to be reviewed from an ecological systems approach; that is, the child and the child's family need to be viewed within the larger social context. In addition, the interactions between and among multilevel factors need to be examined. The interrelationship between home, community, and the society needs to be investigated systematically from multiple perspectives at different levels. Only then the early childhood curriculum would be meaningful and relevant to the child and the child's family, from which children would be able to benefit under high-quality early education and care that leads to later success in school and work.

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Part III
Beyond the Walls of the School
and Center

Chapter 8

Rhyme Times, Treasure Baskets and Books: How Early Years Libraries Can Help to Deliver the Best Start

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Abstract Encouraging young children and their families to access a library with all its resources can provide a great foundation for developing early literacy, communication and language skills. Library services offer educational and cultural enrichment for the young; the children's library can be seen as the treasure house providing access to wonderful books and other resources to inspire the imagination and delight the sense of adventure. Community-based libraries are uniquely placed to support families and young children as they offer accessible learning opportunities for intergenerational groups.

Keywords Books • Bookstart • Emergent literacy • Family learning • Google generation • Libraries • Parents • Partnerships • Reading • Role of librarian • Rhyme times • Treasure baskets

Introduction

Encouraging young children and their families to access a library with all its resources can provide a great foundation for developing early literacy, communication and language skills. Access to library services offers educational and cultural enrichment for the young; the children's library can be seen as the treasure house providing access to wonderful books and other resources to inspire the imagination and delight the sense of adventure. This chapter will discuss how community-based early years libraries are uniquely placed to support families and young children as they offer accessible learning opportunities for intergenerational groups (Rankin et al. 2007; Feinberg et al. 2007).

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Policymakers in many countries are concerned about educational attainment and future employment prospects for their citizens. Literacy levels and reading skills for the information age are receiving a high profile in many parts of the world (Dugdale and Clark 2008). A study to identify how the ‘Google generation’, currently in their school or pre-school years, are likely to access and interact with digital resources in 5–10 years’ time suggested that information skills are needed more than ever. Emerging research findings from the USA point to the fact that information skills need to be inculcated during the formative years of childhood (CIBER 2008, p. 32). Librarians who are knowledgeable in early literacy theory and children’s literature are a vital aid to literacy development.

The National Literacy Trust (NLT), an independent UK-based charity, campaigns to improve public understanding of the vital importance and impact of literacy. The NLT believes a strong library service is essential in building a reading culture and a literate nation. The Manifesto for Literacy launched by the NLT in 2009 was developed in consultation with over 30 national organisations. This makes specific recommendations for government to develop literacy support for families, to modernise literacy teaching and to run a national campaign taking literacy to new audiences. During the consultation period, the four key themes which emerged all suggested a role for libraries:

- Breaking down barriers: the importance of speech, language and communication in the early years
- Better literacy begins at home: the role of the family in developing a child’s literacy
- Literacy is the key to the digital age: the need to modernise literacy in the school curriculum to include new forms of literacy and promote the enjoyment of literacy
- Brighter futures: to raise awareness of the importance of literacy skills where they are lowest (National Literacy Trust 2009)

The two conditions essential for creating a reader are early experiences of a print-filled environment and adults reading these materials and a caring adult to introduce the child to literary pleasure. The public library meets both requirements (Wilkie 2002; Greene 1991). The next section will discuss the role of the public library service and the librarians who work to provide free access to a range of resources and activities for children and their families.

Public Libraries: A Welcoming Place in the Community

Public libraries have traditionally encouraged children and young people to make use of their resources and services. Koontz and Gubbin (2010) remind us that public libraries are a worldwide phenomenon, occurring in different cultures and at different stages of development. The public library as a community agency is uniquely suited to facilitate the learning experiences of very young children and their caregivers. The importance of libraries to children and their families in providing access to the

knowledge and multicultural riches of the world has been recognised by the International Federation of Library Associations (IFLA 2009). A quality children's library can help to equip children with lifelong learning and literacy skills enabling them to participate and contribute to the community (IFLA 2003).

In the USA, the 'family-centred library' is a purposefully designed public space that welcomes very young children and families. It is filled with developmentally appropriate activities and materials to encourage play, interactive learning and socialisation (Feinberg et al. 2007). Boher (2005) reports on the growing number of US public libraries that are transforming library spaces into dynamic learning centres focussing on developing literacy in young children. Public libraries in the UK have been at the centre of their local communities since the nineteenth century, providing services for children and young people and reflecting the diversity of the population they serve (Black et al. 2009; Goulding 2006; McMenemy 2009).

In 'The Place for Children' research, Elkin and Kinnell (2000) assessed the significance of the public library service in the UK in supporting the reading developments of children and young people from birth through to 16. Elkin writes that '*Every child needs the library: children are the future movers and shakers of the nation. Reading has a value in children's personal, social and imaginative development*' (2000, p. 118). This research found that libraries supported children's development, improved their reading skills and offered a welcoming, safe, socially inclusive place in which to read and a neutral ground for those disaffected from school.

In the 'Start with the Child' report, a working group from the Chartered Institute of Library and Information Professionals (CILIP) provided an overview of library services to children and young people. This recognised the contribution libraries can make in delivering government policies on lifelong learning, combating social exclusion and improving the quality of life of children and young people in the UK. At the centre of advocacy activity, this argues that libraries can change children's lives.

Reading is a hugely important part of children's and young people's development. Books inspire their imagination, help them to grow emotionally, and develop their understanding of the world and their place in the local and global community, past and present. Libraries are a hugely important part of children's and young people's lives because they bring books and children together; they provide reading opportunities free of charge, and so they encourage experimentation and learning. (CILIP 2002, 9)

Librarians know that reading to babies and young children is one of the most effective ways of enhancing language development in a child (Walter 2009; Brock and Rankin 2008; Greene 1991). In terms of cognitive skills development, librarians have a contribution to make to the early years by providing activities that support the development of literacy and speech, language and communication skills. These services are focused on helping to deliver the Every Child Matters (ECM) agenda in the UK. There are a number of great 'selling points' when encouraging parents and carers to bring their children to the library as they provide free access to books and other resources! As Feinberg observes, '*They provide opportunities for people who*

do not necessarily travel in the same occupational, social, political, or economic circles to meet and greet each other' (Feinberg et al. 2007, p. 22). The case for reading for pleasure has been set out in research by bodies such as the Organisation for Economic Co-operation and Development; the *Reading for Change* report showed that reading for pleasure is more important for children's educational success than their family's socio-economic status (OECD 2002).

Research by Matarasso (1998) into the impact of libraries on a wide range of personal and community development issues found the wider, often unseen, importance of libraries to their communities. Public libraries are complex institutions but offer a place where people and families can become part of the community and can effectively connect with local services. Access to free books at the local library provides an ideal starting point for fostering a love of reading, but librarians recognise that some parents may need encouragement and reassurance to take up these opportunities. Librarians can also encourage parents and caregivers to talk, sing and read to their infants (Greene 1991; Department for Education and Skills 2002). The needs of parents and carers are also provided through special collections of information about childhood services and resources about parenting.

Improvements in literacy, at any point in life, can have a profound effect on an individual, and the UK National Year of Reading (NYR) campaign in 2008 was about celebrating and encouraging reading in all its forms. Public libraries were identified as essential partners in the NYR campaign strategy. As part of the community-based reading activities, librarians helped to promote bedtime reading with the message that reading with your children is easy, rewarding and can be life changing (Thompson 2009).

Children's Rights

Library practitioners are at the forefront of promoting children's rights and play a key role in disseminating information about the importance of early literacy to parents, childcare providers, early childhood educators, children's advocates and political decision-makers. Koren (2011, p. 154) reminds us that the United Nations Convention on the Rights of the Child (CRC) offers support to library policy and practice related to children and young people; Koren believes that children should be able to rely on libraries for their rights to information and education. Library services are also seen to enrich lives and provide cultural experiences. The Arts Council England has the responsibility for championing, developing and investing in libraries in England and states that access to knowledge, experiences and treasures within libraries is every child's birthright (Arts Council England 2011). Children have a basic need to find out, and the information they gain is essential for individual development. They can use the information they obtain to change their circumstances, can function better in society and be informed individuals who can contribute to social change.

Librarians in the Community: Active Partners in Delivering the Best Start

Community libraries are no longer regarded as quiet places, and proactive librarians are constantly breaking down the stereotypes and preconceptions that exist for their workplace and their professional role. Librarianship can be regarded as a primarily female profession, and practitioners are often conventionally associated with just 'providing books'. However, they are now recognised as playing a key role in outreach work in the community. Here is an observation from Jane, an early years librarian, about her colleague Chris:

Chris was appointed last year as a children's librarian, and he is the first male children's librarian that we have had. This is great as he usually takes the 'Saturdays' sessions where dads can spend more time with their kids away from home, just like mums at mothers and toddlers groups. So I think it really helps when you are dealing with groups like that to have a good role model. (Jane, early years librarian)

Many librarians in the UK are now involved in helping to deliver the Every Child a Talker (ECaT) project, a national project to develop the language and communication of children from birth to 4 years of age. The project was set up after concerns about the high levels of language impoverishment in the UK and how this affects children's progress in school and chances in life. ECaT aims to raise children's achievement in early language, raise practitioners' skills and knowledge and increase parental understanding and involvement in children's language development.

In delivering community-based programmes and activities, librarians are likely to be working in partnership with other practitioners who support young children and their families (Prendergast 2011; Rankin 2011). Professionals from different backgrounds need to understand each other's roles and responsibilities in order to work together effectively. A lack of knowledge can lead to misunderstanding and negative stereotypes, but an understanding of each other's roles, philosophies and ideologies can lead to trust and respect between professionals (Frost 2005). Where there is effective communication and understanding, other practitioners such as speech therapists and health visitors can be advocates and promote the benefits of early years library provision. This type of effective partnership working is demonstrated by the very successful Bookstart scheme which will be discussed later in the chapter.

Many early years librarians are actively involved in taking their provision and resources out to the local community, and much of their time is spent on outreach work – they leave the library premises to visit parent and toddler groups, children's centres, nurseries and young mums' groups. They may be running sessions in locations that are not part of the library building at all. Here is a view from Alex who works as an early years librarian:

There is no typical day as an early years librarian – my job is full of variety, and there are several different areas of responsibility. Probably about 40 per cent of my time is spent on outreach work in the community – I visit parent and toddler groups, children's centres,

nurseries, young mums' groups and so on. It's all about trying to get over to parents the importance of reading and helping young children to develop a love of books and reading. (Alex, early years librarian)

Librarians have always been interested in a 'reading child' and in promoting the wonderful range of books to help fire the imagination. Increasing knowledge about child development and emergent literacy has highlighted the needs of babies and toddlers and what libraries should be providing to support their learning. Studies on the development of the brain suggest that a young child's early years are very important as the learning that takes place at this time contributes to brain development and functioning. The early interactions that occur between children and their parents and carers are crucially important for young children's personal, social, cultural, emotional and linguistic development. McKechnie (2006, p. 75) notes that the enabling adult turns up time and time again in studies of early reading acquisition. In discussing the work of those who bring children and books together, Butler reminds us that '*we cannot produce child readers without adults*' (1992, p. 8). A visit to the library to take part in an activity session with the librarian or to choose books together provides a wonderful sharing opportunity.

Working with community partners expands the reach of the library to connect with new audiences and partnerships to create new and improved services (Feinberg et al. 2007). Partnership working brings benefits for both the individual practitioner and the organisations they work for. Research undertaken on the legacy of the UK's National Year of Reading (which took place in 2008) has shown that librarians work very effectively in partnerships with other professionals and practitioners (Rankin et al. 2009). The message here is that teamwork is important as partnerships can help deliver and achieve organisational objectives (Carpenter 2010; Rankin and Butler 2011). Early years librarians will liaise with others who work in 'partner' organisations, such as health visitors, speech and language therapists, nursery teachers and staff from various children's projects. Many are actively involved in delivering the Bookstart scheme which relies on partnerships between practitioners. The development of the Children's Centre networks in the UK presented the opportunity for many librarians to become an integral part of the multi-agency services helping parents to support their children's early language and literacy, as well as communicating important messages about emotional and social development and health issues (Rankin et al. 2007; Rankin and Brock 2008).

Creating a Welcoming Atmosphere and an Interactive Learning Space

Librarians are keen to encourage families to use library services and recognise they are competing with many other facilities and activities – such as museums, sports centres, parks and shopping centres. Libraries are working hard to create a welcoming atmosphere, and the ambience, layout, design, furniture and fittings will all have

a part to play. A key message is that libraries are engaging, informative, creative and memorably enjoyable places for people to visit and use (MLA 2008).

Nowadays, children's libraries are interactive learning spaces, and there is a trend in the UK to redesign and refurbish children's sections using colourful, themed environments (Black and Rankin 2012). The Family Place Libraries in the USA redesign the library environment to be welcoming and appropriate for children (Feinberg et al. 2007; Kropp 2004). There is a challenge in encouraging adults to come to the library and then ensuring they make repeat visits with their babies and young children. This is reemphasising the message about partnerships. Successful venues will provide an inviting space, enhanced by carpeted floors, toddler safe furniture and a good range of books and other enticing resources for school-age children. Welcoming spaces are needed where children and the adults looking after them can spend time with books, and the public library has a key role to play in helping to prepare for the learning experiences at school (Diamant-Cohen 2007).

Once families have been encouraged to come into the library, choosing books together is an important activity for parents and their babies and young children. Book selection should be an enjoyable experience, and, ideally, books should be displayed on tables and low shelves with their attractive covers showing or open at interesting illustrations. Versatile, low shelving will allow books to be displayed at child eye-level. Young children and babies will be able to choose their own books when the front pages are displayed facing forward. The storage and display of picture books in mobile kinder boxes also allows for easy browsing by children and their parents.

A number of companies produce play furniture which doubles as a book display. One example is a reading tower which has an upper level with paperback shelving for older children and a lower level with picture book shelving for younger children. The sides have metal panels to encourage magnetic games. Another book display idea is the reading tunnel which encourages children to choose their own books; this kind of book display furniture is also intended to promote physical activity. There are differing professional opinions on this as some librarians like this approach and are using a range of equipment; others have said quite emphatically that the library is not a playground!

Activities: Rhyme Times

An important aspect of public library policy is to encourage family reading, but children's librarians also provide collaborative activities such as storytelling events, toy libraries, family literacy activities, craft activities and puppet shows. Popular additions are interactive library sessions using rhyme, rhythm, songs and music. This is an important element of early language development; 'rhyme time' interactive sessions provide a wonderful opportunity for singing songs and rhymes together in an informal and supportive setting. These musical activities are enjoyed in children's libraries around the globe. Most cultures have their own long-established

rhymes and songs, and singing in different home languages can promote bilingualism and also provide a link to the children's heritage.

Sharing Reading Experiences

Research studies have documented the complex and powerful influences that home and community have on young children's educational and social achievement, and there is an increasing expectation that library practitioners will work in partnership with parents. Parents after all are in the best position to introduce their children to the world of words. According to Jama and Dugdale's (2010) research, parents are the most important reading role models for their children and young people. Reading together and sharing books encourages talking which helps to develop speaking and listening skills. We know that fluent readers are more likely to do well in school, and reading and literacy skills will stand them in good stead for life in the twenty-first century. The benefits of sharing books last longer than a lifetime, since children who are brought up to value reading are likely to pass their love of reading (and their good literacy skills) on to the next generation (Rankin 2011, p. 185). Butler (1986, 1995) writes about the importance of sharing books with children and advocates a relaxed approach to the subject of learning to read. She emphasises the importance of parents reading aloud to babies and continuing to read aloud to children in their early school years. Fox (2008) also strongly advocates the benefits of reading aloud, and the story time session is of course a much enjoyed activity in many libraries. The generic message is that reading with young children is important irrespective of first language, heritage or cultural background (Rankin and Brock 2008). The Family Reading Campaign in the UK is a partnership campaign working to ensure that the importance of encouraging reading in the home is integrated into the planning and activity of all the key organisations concerned with education, health, libraries and parenting.

Resources in the Library: Books and More

Librarians will have knowledge about children and their families' culture, heritage, language and interests to ensure that a breadth of valuable resources are provided for the local community; this is known as collection development. The early years specialists in the library service have a particular expertise in children's literature. The well-planned early years library will provide a range of books, toys, story sacks, treasure baskets and other creative resources for young users and their families.

The IFLA's *Guidelines for Children's Library Services* recommend that librarians should choose materials which are of high quality and are age appropriate. 'Children's libraries should include a variety of developmentally appropriate materials in all formats, including printed materials (books, periodicals, comics, brochures),

media, (CDs, DVDs, cassettes), toys, learning games, computers, software and connectivity' (IFLA 2003, 9). However, there is also the ethically challenging issue of choosing materials that reflect a variety of values and opinions and the local community culture. Some public library authorities leave book selection up to commercial suppliers, while others still rely on the decisions of professional librarians. In collection development, many of the choices that selectors make have strong ethical implications (Hauptman 2002; Brock et al. 2011). Librarians will have knowledge of the culture, heritage, language and interests of the local community they are serving. Ethical selection policies require that librarians choose appropriate materials while attempting to ignore social and personal prejudices that may cause the censoring of 'unacceptable' materials.

Books and Picture Books

Picture books are the core of an early years library collection and are important as they enable us to explore the world around us. These books provide opportunities for multicultural content and will help to reflect the cultural heritage of families in the local area as well as a view of the wider world. Board books with easy to see pictures are excellent for a baby as they are easy to handle for tiny fingers and the pages will not tear. We know that babies will explore books with their eyes, hands, mouth and feet! Although books will form the core, the collection should also include resources for babies, infants and toddlers and provide materials in a variety of formats to encourage play, creativity and development – the emphasis is on having fun.

Story Sacks

Another very popular resource provided by the library is the story sack or sometimes called story bag. This is a large cloth bag which contains a children's book with supporting materials to help stimulate reading activities and to help create a memorable and enjoyable experience. The sack can include soft toys of the book's main characters and other props and scenery that parents and other adults can use with children to bring a book to life, even if the adult's reading skills are limited. Story sacks are a popular, nonthreatening way of encouraging parents and carers to start sharing stories with their children, especially those parents with little positive experience of books. Story sacks can be purchased commercially, but they are also often made by community-based projects and so will reflect the interests and heritage stories of that community.

Another resource which comes in a bag are the *Count me in 1 2 3* number bags, and many library services in the UK have these available for loan. The aim is to help develop the numeracy skills of pre-school children through the use of resource bags

containing counting games and stories. The activities in the bags are designed to encourage listening, looking and learning about colours, shapes and sizes.

Babies Love Treasure Baskets

With babies and very young children increasingly being involved in early years library settings, it is essential for librarians to be responsive and reflective to ensure that these young children's needs are met in an appropriate way. The early years library can expand the range of resources to provide multisensory sources, and the treasure basket is the perfect educational 'toy' for babies who are not yet able to crawl but are able to sit, propped up with cushions. The treasure basket itself is a basket ideally made from a natural material such as wicker. It is filled with natural and inexpensive objects from the real world and found around the home. The objects are natural and everyday items that provide babies with sensory stimulation, help develop hand-eye coordination and make choices and develop preferences.

The idea of the treasure basket was developed by the child psychologist Elinor Goldschmied from observing children and the way they gained knowledge of the world around them. A treasure basket is full of interesting objects that babies want to investigate, and they can play with little or no adult help. In contrast to the shared activity of reading books together, playing with a treasure basket is very much a baby-only activity. The adult role is to provide security by having an attentive but not active presence (Nutbrown 2011; Goldschmied and Jackson 2004; Forbes 2004). Librarians can encourage parents to sit and watch their babies enjoying the treasure basket without interfering and to resist the temptation to choose objects that they think their baby would like. Babies are socialising when sharing a treasure basket and need a safe quiet space in the library to enjoy this experience (Rankin and Brock 2008).

Toy Libraries

Librarians know that the constructive use of toys can help a child's development. Community toy libraries were first formed in England in the late 1960s initially for children with additional needs, and today, there are an estimated 1,000 toy libraries serving a quarter of a million children and their families. Toy libraries can engage parents who otherwise might not use early years play services, but they also provide a chance to see and try out different toys and can help parents in selecting toys for their child's stage of development. Parents can be supported by knowing that playing with toys can stimulate language skills and help to develop hand/eye coordination. When choosing new toys for stock, librarians will strike a balance between those that are more widely available and specialist items. Toys that are part of the

toy library collection have to be really sturdy, very safe and cleanable. They also need to demonstrate equalities and represent all sections of the community.

So far we have discussed the library environment and the expertise of the librarian in developing a collection of resources and materials to support the needs of children and their families in the local community. The next section will explore the partnerships and programmes that made the vital community connections.

Bookstart: A Great Partnership

Many early years librarians in the UK are involved with Bookstart, run by the national charity Booktrust. Bookstart is the national early intervention and cultural access programme for every child. This is the first national baby book-gifting programme in the world and encourages all parents and carers to enjoy books with their children from as early an age as possible. Bookstart began in Birmingham in the UK in 1992 with 300 babies, and by 2001, there had been over one million Bookstart babies (Wade and Moore 2003).

Bookstart for babies 0–12 months aims to provide a canvas bag to every new baby born in the UK containing baby books, a booklet for parents setting out information and advice on sharing stories with young children, a Children's Centres leaflet and a booklist and invitation to join the local library. These packs are distributed through health visitors, libraries and early years settings. Usually, a health visitor will give babies their first book pack at 6–12 months and another book pack to toddlers at 2–2½ years. Preschoolers aged 3–4 years usually receive their My Bookstart Treasure Chest through an early years setting.

The Bookstart packs are also available from the local library. The contents of the packs and Treasure Chests have been carefully chosen to include everything parents and carers need to get started sharing stories, rhymes and songs.

The packs are also available from the local library. As an extension to the book gifting, *Booktouch* packs are available for blind and partially sighted babies and *Bookshine* packs are available to help parents of deaf babies and children discover books together. The books are selected by a team, which includes a health visitor and an independent expert on children's books.

Libraries welcome the very youngest members of their communities by the Bookstart Book Crawl. This encourages children under five to join the library and to borrow books by rewarding them with stickers and certificates. I had a lovely experience recently when visiting a new early years library run by one of my former students. A baby was visiting the library with her mother, grandmother and aunt and was presented with her first Book Crawl certificate. It was wonderful to see the happy smiles on the adult's faces – the baby of course just blew bubbles and tried to chew her certificate!

As a pioneering initiative in children's book gifting, the Bookstart programme has been of interest to researchers investigating its impact on language and literacy development in babies and toddlers. A recent research survey of participating

families has shown there is improved library membership and improved shared reading frequency for 'less active' reading families. As a successful programme, the Bookstart model has been copied internationally (Allen 2010; North and Allen 2005; Redrup-May 2007).

A Glimpse Around the World: Reading Programmes

Around the world, there are many examples of programmes and initiatives to encourage emergent literacy in the very young and reading opportunities for older children. It is not the purpose of this chapter to provide a detailed listing of all the reading schemes on offer but hopefully to raise awareness that this reader development activity is actively promoted by librarians keen to foster emergent literacy and promote a love of reading. Each country will have their own projects, and we have already discussed the well-established UK-based Bookstart scheme. In the USA, Reach Out and Read is an evidence-based nonprofit organisation that builds on the relationship between parents and medical providers to develop critical early reading skills in children, beginning at 6 months of age. This scheme gives new books to children and provides advice to parents about the importance of reading aloud. *Nati per Leggere* (Born to Read) is an Italian national programme to enhance literacy and health in young children through reading aloud.

For older children in the UK, the national Summer Reading Challenge, coordinated by the Reading Agency, is run in 97 % of UK public libraries. It is organised locally by public library services working closely with schools and other partners in the area. Children aged 4–11 are invited to read six books over the course of the summer holiday. They join at their local library, and there are stickers and rewards to collect along the way, with a certificate if they read six books. In the USA, summer reading programmes first emerged as public library services for children during the latter part of the nineteenth century and now bring children from different parts of the community together (Fiore 2005).

Beyond Story Time, Beyond the Library Walls: Outreach Work as a Global Phenomenon

This chapter has highlighted the work of libraries providing story times for children in the local community and the range of activities around reading programmes and initiatives. These are welcome and well-used resources for those who are happy to use the services and are confident about attending such organised events. However, the disengaged single parent or disadvantaged family will need considerable encouragement to access such resources even if they are freely available. There are many possible barriers – lack of knowledge or negative perceptions about libraries, lack of transport, low literacy skills and/or mistrust of public institutions. Children's librarians have a good knowledge of their client groups based on local demographics,

and the evidence shows they are effective at engaging the ‘hard-to-reach’ groups, successfully building partnerships based on reading and family learning (Brock and Rankin 2011).

In many parts of the world, librarians are making a significant difference to the communities they serve by taking their activities and resources out beyond the bricks and mortar library walls. Innovative professional practice and interagency cooperation takes literacy opportunities directly to the very young and their families, offering services that promote social inclusion. Here are some examples:

- Outreach is a fundamental aspect of working with Traveller, Roma and Gypsy families in the UK. Riches (2007) reports on storytelling services for the under-5s being made available on mobile libraries, and Sure Start librarians have arranged for book boxes to be given to Traveller communities. Hampshire County Council developed a number of storybaskets as part of the Living Album project; these give children the opportunity to learn about Hampshire’s Gypsy heritage and the Gypsy and Traveller lifestyles (Rankin and Brock 2008).
- In Vancouver, Canada, the Early Years Community Programme responds to the need for young children to grow up in environments rich in language and literacy learning opportunities. The early years librarians have vulnerable families as their priority and go out into the community working in partnership with family service agencies, community groups and caregivers (Prendergast 2011).
- The *Library has Legs* is a preventative outreach model promoting the importance of early literacy in the Cranbourne area of Victoria. Developed through Communities for Children, one of the four initiatives of the Australian government’s stronger families and communities’ strategy, this project takes the Let’s Read library resources to places where families already go including the local medical centre and local emergency relief agencies (Smith 2008).
- Public libraries in Western Australia have been particularly successful in delivering services such as story time programmes and resources for pre-school children. Holding story time sessions in different venues such as shopping centres, swimming pools and parks may not be perfect for the librarian as a story reader, but this outreach activity really helps to connect with adults and children who would never enter a library. Librarians have presented *Storytime at the Beach* to coincide with holiday time swimming classes held at beaches (North 2000).

Dorion (2011) describes the challenges of providing library services to remote and isolated communities where books are in short supply or may not be embedded into local culture. In some parts of the world, dedicated librarians and community leaders go to extraordinary lengths to get books into the hands of children and encourage them to read and become literate. In remote nomadic villages of northern Kenya, the Camel Mobile Library caravan carries a supply of new books and has helped local children succeed in school. Donkeys are used to carry books to remote communities in Columbia. Here, Luis Soriano, a primary school teacher, loads books from his personal collection into the book pouches on the Biblioburro and travels to villages where children can borrow from his collection. In Thailand, the government has begun a literacy programme to bring books to remote villages in the jungle – as transportation is difficult, the Books-by-Elephant delivery

programme travels between the villages. In Norway and Finland, there is a long tradition of providing library boats, providing books for children and adults in the remote communities. Although the primary goal of these programmes is to get books into the hands of children, the ultimate goal is literacy and the empowerment of a new generation of readers and writers.

A Unique Combination of Benefits... Helping to Deliver the Best Start

Communities give purpose to libraries, and this chapter has discussed how library provision reaches out to the local community beyond the library walls. There is growing interest in the social impact and contribution libraries make to the social cohesion and development of their communities (Pateman and Vincent 2010). Public libraries with their welcoming presence in communities are well placed to help address the literacy challenge. The personal touch that children's librarians bring to their communities sets the stage for lifelong reading (Higgins 2007). When people talk about how public libraries have changed their lives, they always emphasise the importance of library staff who are seen to be helpful, knowledgeable and trusted (CILIP 2010).

But what of the future of library provision for children? Elkin (2011) speculates on the many and varied future needs of the child. Reading still has a transformational power, and for the older generation, this largely means reading in printed form, particularly for leisure reading. The privileged younger generation have been described as the 'digital natives' of the Google generation, born into a new digital landscape. They have spent all of their lives surrounded by computers, mobile phones, video games, the Internet and all the other digital wonders that increasingly define their world. This constant exposure to digital media has changed the way these digital natives process, interact and use information and presents particular challenges for those providing library resources and services. Sally Maynard suggests the role played by libraries and librarians in providing access to reading material cannot be overemphasised, and this applies to all kinds of material, not just books (Maynard 2011). As stated at the outset of this chapter, access to library services offers educational and cultural enrichment for the young. The children's library is a treasure house providing access to wonderful books and other resources and activities to inspire the imagination, delight the sense of adventure and provide the best start for active citizenship.

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Chapter 9

The Politics of Play in England: An Appeal to the Houses of Parliament

Pat Broadhead

Abstract This chapter reports the work of a group of English play scholars who took the case for playful learning in educational settings for young children to the Houses of Parliament, London, in 2008. The chapter aims to show how, within policy, play remains rooted in a moribund political-policy history that privileges adults as ‘constructors of play experiences’. However, on a more optimistic note, it shows how ‘little victories’ might have repercussions in the ongoing sociopolitical play debates to privilege children as active orchestrators of their own playful learning experiences in educational settings. The chapter also describes the role of an Early Years Children’s Champion.

Keywords Play • Playful learning • Playful pedagogies • Play policy • Early years curriculum • Play research • Houses of parliament • TACTYC • Early years children’s champion

Introduction

In England, the term ‘early years’ has encompassed different age ranges. Within the current climate and for the purposes of this paper, it relates to the age range birth to 5 years, the period covered by the related curriculum, the Early Years Foundation Stage (EYFS).

This chapter describes how a group of early years educators and play scholars took their case for widening opportunities for young children to experience playful learning in educational settings to the House of Commons, within the Houses of Parliament in London, England. The Houses of Parliament are comprised of two

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chambers: the House of Commons (where the case was made) is the first chamber. The House of Lords is the second chamber of the UK Parliament. The House of Lords is independent from, but complements the work of, the House of Commons. Members of the Lords play a role in making laws and keeping an eye on the decisions and actions of Government and Opposition who are based in the House of Commons. The House of Commons comprises 650 Members of Parliament (MPs) elected by their constituents to represent their interests and concerns. MPs consider and propose new laws and can scrutinise government policies by asking ministers questions about current issues either in the Commons Chamber or in Committees.

The group of educators and play scholars did not proceed into the chamber of the House of Commons but exercised their rights by liaising with an elected MP to call a meeting within a committee room of the Houses of Parliament. To this they invited politicians, policymakers and other influential and interested individuals, some of whom represented national groups concerned with issues for children.

The focus for our representations to Parliament was play and learning for young children in early education settings and was borne of a deepening concern that play was diminishing and in danger of disappearing from the early education agenda in a prevailing political and policy climate that emphasised formal learning over and above children's rights to be independent decision-makers, through playful exploration and engagement in high-quality early years settings.

The journey to the Houses of Parliament began from the discussions and deliberations of the Executive Steering Group of an early years organisation named TACTYC which is explained in further detail later in the chapter. The journey progressed through to a research colloquium focussing specifically on play and learning in educational settings. This colloquium was held at Leeds Metropolitan University in England, where the author of this chapter was then working. As far as we know, this play colloquium was the first of its kind in England. We went from the play colloquium onto the Houses of Parliament and then produced a related publication: *Play and Learning in the Early Years: From Research to Practice* (Broadhead et al. 2010). As we say in England, 'Big trees from little acorns grow'!

Care and Education in the Early Years in England

There is a complex picture of childcare and educational provision for children between birth and 5 years in England. This has developed from historical antecedents. Day care provision grew during the 1930s from social service funding, usually available for families on low income where the mother needed to work or where children were deemed to be 'at risk' in some way. Educational provision expanded most substantially from the 1960s onwards usually in the form of nursery classes attached to primary schools (for children aged 5–11 years) or educationally funded nursery schools (for children aged 2/3–5 years). There was significant and unprecedented expansion and a combining of the care/education ethos under the New Labour Government between the years 1997 and 2010. During this era, billions of

pounds were invested in the development of universal provision, with the intention of locating a Sure Start Children’s Centre in every neighbourhood with services for children aged from 6 months to 4 years. Due to a range of new policy initiatives, this funding diminished rapidly under the Coalition Government elected in 2010. The Coalition Government came about because the Conservative Government did not have a sufficient majority, postelection, to take power and so formed an alliance with the Liberal Democrat party. From 2011 onwards, the Coalition introduced sweeping cuts across many public sector services including those for children and families. There has been and continues to be considerable public dismay and protest at the diminishing of these vital services for children and families including Sure Start Children’s Centres. There is growing recognition of and evidence from across the world that early access to high-quality early education and care provides young children, particularly those from low-income and second-language groups, with a good start in life (OECD 2006). Within the UK, a major, longitudinal study has also shown the impact of high-quality early years education on children’s longer-term achievements and well-being (Sylva et al. 2010).

In England, as in many other countries, provision for children and families is subject to political manipulations in times of economic hardship and is influenced by the state’s view of motherhood as a cultural phenomenon (Vandenbroeck 2003) and by variations in private sector provision as a direct result of economic downturns (Dillon et al. 2001). Because playful activity has a tradition of sitting at the heart of provision for young children, this too becomes subject to the whims of politicians and so to cultural influences through the policy provision of the day. A forthcoming section will focus a little more on how play has ebbed and flowed in early years curriculum policy in England. First of all, however, the TACTYC organisation, as the one that spearheaded the journey to the Houses of Parliament, is briefly introduced.

What Is TACTYC and Why the Interest in Play?

TACTYC is an Association for the Professional Development of Early Years Educators. Whilst the word ‘TACTYC’ was once an acronym, this is now no longer active. The following extract from the website (www.tactyc.org.uk) gives a succinct overview of its origins and its clear intentions, as an organisation, to work in the best interests of its members and of young children’s rights:

TACTYC was founded in 1978 by a group of early years teacher trainers who recognised how isolated they were feeling in their work and how supportive and developmental it could be to come together with others in a similar position on a regular basis. Today, TACTYC has broadened its base to welcome people from a wide range of early years’ backgrounds, early years researchers, education consultants and professionals working with children and families in day-care, education, health, play work and social service contexts and TACTYC also warmly welcomes students from across these areas.

One key theme that unifies the work of all these professionals is upholding the right of every child to receive a high quality educational experience wherever they are, in an early

years setting. At TACTYC, we would maintain that a high quality educational experience comes from well-trained practitioners who are themselves able to access on-going professional development throughout their working lives. Providing high quality educational experiences for young children can almost be said to be a lifetime's work! Learning is a complex business and young learners are at the cutting edge of learning; they deserve the best we can offer.

TACTYC identifies advocacy and lobbying as part of its core business, and the Executive enter the policy-linked and political arenas on behalf of the members and in relation to sustaining a high-quality experience for children. The website continues:

... providing a voice for all those engaged with the professional development of practitioners through responding to early years policy initiatives and contributing to the debate on the education and training of the UK early years workforce.

During the period 2006/2007, a number of related initiatives began to cause considerable concern amongst the wider early years community in England, including TACTYC. These concerns related to the emerging demise of play from the educational experiences of young children. This aspect is addressed in further detail in the next section. These concerns were clearly not only arising in England. Other authors globally were expressing similar concerns. Miller and Almon (2009) in the USA were writing of the need to restore child-initiated play to the kindergarten and to recognise its status in relation to children's learning. In New Brunswick, Canada, a new curriculum was being devised with the intention of putting play and playfulness back at the heart of the early experiences of children in care and education settings (Early Childhood Research and Development Team 2008). In relation to playful engagements by and with children, Pramling-Samuelsson and Fler (2006) show similarities and differences across five international early years curricula and the influences of local and cultural conditions; whilst they do not look specifically at how playful learning is conceptualised in these curricula, they do illustrate how such curricula as Te Whariki (New Zealand) and Reggio Emilia (Italy), just as with the New Brunswick example, are building practitioner policy appropriation around a starting point of children's perspectives and experiences, rather than a starting point of adult-led activity – an inevitable norm in a centralised curriculum of the kind we were experiencing in England from 1988 onwards when a National Curriculum was introduced for children aged from 5 to 16 years.

A Brief Overview on the Organisation of Early Learning in England and the Growing Concerns Around the Diminishing of Play in Educational Settings

The Desirable Learning Outcomes (DLOs) were published as part of an overall Nursery Education Scheme (DfEE 1996); these provided the first early years curriculum for the age range in England. This was a slim policy publication designed

to inform the curricular experiences of children aged 3–5 years. It identified recommended achievements and skills of children by the time they entered compulsory education which is the beginning of the term after the term in which they are five in England. These Desirable Learning Outcomes were grouped around six areas of learning that, give or take changes in some wording, have remained the same since 1996 and are as follows: Personal and Social Development, Language and Literacy, Knowledge and Understanding of the World, Mathematics, Physical Development and Creative Development. They took their direction and structure from the organisational structure for the curriculum for older children.

Play is barely mentioned in this document except for some examples of adult-led activity that might be deemed to have playful undertones but to be very adult initiated and directed. The DLOs were narrow and prescriptive, and the nature of the child's day-to-day experiences was not considered. However, hindsight has revealed that these documents set a tone within early years policy speak within which it was deemed acceptable to virtually ignore the benefits and entitlements of playful learning except as a vehicle for curriculum delivery by adults.

In 2000 in England, the Curriculum Guidance for the Foundation Stage (CGFS) (QCA 2000), also for children aged 3–5 years included one page on 'Play' (p. 25) calling it 'a key way in which young children learn with enjoyment and challenge'. There are four bullet points to support the role of the practitioner and eight bullet points to illustrate how play is linked to learning and development. The 'Stepping Stones' for each of the six areas of learning provided an inevitably, overly simplistic notion of progression for young learners, and the guidance to practitioners depicted the adult as leading the learning though questioning, activity provision, modelling, encouraging, displaying, etc. (The areas of learning are the same six as for the DLOs with 'Emotional' added to 'Personal and Social Development' and 'Communication' added to 'Language and Literacy'.)

As with the previous policy document, the tone of the CGFS also implies that all learning for young children follows on from interactions with adults and makes no consideration of the learning potential of playful experiences as initiated and sustained by children themselves either alone or with peers. Essentially, the CGFS was designed to ensure that all providers registered with their local authorities in order to receive the nursery grant and also formed the basis for inspection. The nursery grant funding came down from government to local authorities to provide, for the first time in England, access to free provision for 3- and 4-year-olds, initially for 12 h and then for 15 h a week. It was a significant policy initiative and represented the first free entitlement to provision for this age group. Settings, which received the funding, were accounted through their curriculum provision by providing a checklist of accountability for auditing inspectors. As the CGFS was introduced, so too was the developing documentation on Profiling and Assessing children by the end of the Foundation Stage (DfES 2003), discussed in the next paragraph. This is the end of the child's 'reception year' (the child's fifth year); an anomalous, 'in-between' year in English primary schools, which is neither nursery education nor the period of statutory schooling.

The Foundation Stage Profile (DfES 2003) was finalised in 2008 to complement the then current curriculum documentation, the Early Years Foundation Stage (DCSF 2007) (EYFS) which had replaced the CGFS. The EYFS does take a more extended view of play than any previous early years policy documentation, offering a more substantial section than did the CGFS, but still no more than a page. However, it does state very clearly that ‘play underpins the delivery of all the EYFS’. It also states that ‘play underpins all development and learning for young children’ – a highly contestable statement and undoubtedly unproven. For example, conversations are not ‘play’ and children surely learn from these. It may seem dogmatic to emphasise one phrase; the intention is however to illustrate how the relative paucity of content conveys a dangerously limited understanding of the complexities of play at policy level and the inherent dangers of policy impact over the next 20 years if there is a continued ignoring of playful learning and playful pedagogies as complex practices built upon complex concepts. In addition, other related statements are similarly simplistic. The exemplification of the developmental milestones across the areas of provision are less adult-centric than in CGFS but frame pedagogical guidance under the far more restrictive and narrower terms of ‘Planning and Resourcing’. Some attempts are made to acknowledge young children as autonomous learners, but there is still a marked tendency to suppose that significant learning will only take place in the company of adults insofar as playful activity is involved.

Throughout this period of curricular changes, there were other aspects of policy that were seen as directly impacting on the demise of play in early years settings in England and so were being raised as areas of significant concern at TACTYC’s Executive discussions and across its membership. From 1998 onwards, large numbers of 4- and 5-year-olds were finding themselves subject to extensive periods of passive, teacher-directed activity as the emphasis on literacy and numeracy acquisition became increasingly prominent in the school-based curriculum for 6- and 7-year-olds. School Inspectors, known as ‘Ofsted Inspectors’ (Office for Standards in Education), were looking very closely, in fact almost exclusively, at literacy and numeracy teaching in schools. A national expectation grew amongst school-based/related educators that this pertained also to the 4- and 5-year-olds in the anomalous, ‘in-between’ reception classes. TACTYC and its members believed that these children should have been experiencing a nursery-based, playful, curriculum rather than extended periods of teacher-led passivity. There was a further and inevitable backwash as the teachers of younger children were expected to be part of the preparation of children for the national Standard Assessment Tests at age 6 years. As the time being taken for the formal delivery of literacy and numeracy lessons became greater, the time for playful learning became less. By 2007, the TACTYC Executive began to feel that action needed to be taken and others were also expressing concerns about the negative impact of centralised policy on young children’s experiences (Anning and Edwards 1999; Moyles et al. 2001; Broadhead 2004). In particular, the TACTYC Executive were interested in exploring ways in which playful learning might become the heart of the child’s experience in early years educational settings, whilst also acknowledging that the adult has an important role to play through the provision of playful

pedagogies. What this role might be, how it might look in action and how it might be balanced against the centralising of the child's experience seemed worthy of further, systematic investigation.

Moving Forward in Challenging the Diminishing of Playful Learning in Early Years Educational Settings in England

It was felt that it would be timely to bring together a group of play scholars researching and disseminating aspects of play within educational settings. This would be held at Leeds Metropolitan University in the north of England. A small grant was obtained from the Vicky Hurst Trust, a foundation established to celebrate the life of Vicky Hurst, a huge advocate of and prolific author on early years play in the UK. A small additional grant was provided by the British Educational Research Association's Early Years Special Interest Group, led by Professor Elizabeth Wood and by Leeds Metropolitan University who also provided a site for the colloquium. A two-night/three-day residential was arranged for presenting scholars and invited international visitors in April 2008 (one of whom was Professor Louise Boyle Swiniarski).

The 2 days provided extensive opportunities for presentation and discussion of ongoing research and related findings. At the end of the 2 days, in seeking to ensure wider impact beyond those participating, two important decisions were taken by the group:

- To seek a publisher for the presentations so they might be more widely disseminated and so influence contemporary political and policy-related decisions and inform practice
- To take the issues around playful learning and playful pedagogies to the halls of the Houses of Parliament, the seat of power, in order to draw attention to the significant concerns about the diminishing of play as a recognised and integral part of every young child's playful learning experiences in an educational setting

Two key issues had arisen from our research-informed conversation at the 3-day play colloquium. These centred around the two constructs of '*playful learning*' and '*playful pedagogies*'. These were, at this time, unfamiliar terms in the English early years play vocabulary, and yet they chimed with the emerging messages from the presentations and discussions. It was decided to draw together the key messages around these two interconnected constructs for two reasons:

- As a first stage in building new and better understandings of the relationships between play and learning, as manifest through the role of a playful pedagogue. From this, we felt it would become easier to confront the message emerging from the early years curricular literature that 'play was a vehicle for learning and that practitioners should utilise it as such'. This was felt to be an unsophisticated and dated notion that needed to be challenged and we felt the research we had been presenting and engaging with might constitute an important step forward.
- As a basis for the presentation to Parliament, which was organised as described in the next section.

The Road to Parliament

The president of TACTYC, Wendy Scott had strong links with a Liberal Democrat Member of Parliament, the Right Honourable Annette Brooke. This event was held in 2009 when New Labour was still in power, and so prior to the establishing of the Coalition Government. Annette, a strong advocate for young children, agreed to host the event, a necessary prerequisite for entry to Parliament for such representations. A TACTYC working group set about planning the presentation and individually inviting a wide range of delegates including MPs, policymakers and representatives of other organisations with vested interests in the early years curriculum and we hoped, in playful learning and playful pedagogies. Refreshments were ordered. The event would consist of a power point presentation by Professor Pat Broadhead, then Chair of TACTYC and some written material provided in packs. The remainder of the event would be TACTYC Executive members along with Professor Elizabeth Wood from BERA circulating for one-to-one and small-group discussions with the delegates around the issues that had been raised in the power point presentation and contained within the material in the delegates' packs. The next section details the information in terms of brief but important points collated from the individual presentations at the colloquium which were subsequently organised to address the emerging and important constructs of:

- Playful learning
- Playful pedagogies

The following document was circulated to delegates at the meeting in the House of Commons. It is presented here in its entirety; it briefly summarises findings from the individual papers presented at the colloquium under the above two headings and identifies the play scholar whose work is being summarised in each instance. Based on discussions at the colloquium, it identifies, on conclusion, what further research would be useful in continuing to illuminate the interconnected constructs of playful learning and playful pedagogies and so to move forward the policy and practice debates.

Summary of the Findings from the Play Research Colloquium Held in April 2008

Nine researchers established in the field of play scholarship presented findings at Leeds Metropolitan University in April. Other national and international delegates were in attendance. The seminar explored contemporary research on children as playful learners and on adults as playful pedagogues. The research evidence is summarised under these two headings *together* with suggestions for developing a future research agenda. Few researchers are currently active in this field reflecting a general lack of funding.

Children as Playful Learners

Play and emotional and cognitive development are interconnected. Children engaged in play situations show greater evidence of problem-solving abilities and creativity. Children engaged in playful tasks they have initiated show higher levels of cognitive self-regulation (*Dr. David Whitebread, University of Cambridge*).

Children respond positively and quickly when adults convey the acceptance of playful learning in the classroom. Children for whom play is a regular and fulfilling occurrence in the classroom showed improved performance on problem-solving, number and literacy tasks (*Dr. Justine Howard, University of Swansea*).

Social free play is an evolved behaviour and is important for complex, autonomous social behaviour leading to self-knowledge and social competence in all primate species; rough and tumble play experience is essential for all juvenile primates, including human children, to independently learn the necessary skills to fully engage in the complex social relationships underlying adult society (*Dr. Pam Jarvis, Bradford College*).

Play can promote conflict resolution skills in young children; highly social and cooperative play in classrooms has clear links with learning, progression and identity formation (*Professor Pat Broadhead, Leeds Metropolitan University*).

Risky play is difficult to theorise but essential for well-being; children need opportunities to push themselves beyond boundaries in familiar environments; schools and classrooms have become risk-averse places, and this is detrimental to children's development and well-being (*Dr. Helen Tovey, Roehampton University, London*).

Children have many ways of making meaning (multimodality), and this is facilitated through imaginative play; there are clear links between playful meaning making and the meanings made as they use marks for early writing and for early written mathematics – key aspects of children's learning (*Maulfry Worthington: Free University Amsterdam*).

Children's role play is naturally influenced by the media; this is their culture and should be respected and understood; there are no polar opposites between their online and off-line worlds; motivation for reading/writing is high in virtual worlds, including in social networking sites (*Professor Jackie Marsh, University of Sheffield*).

Further research into playful learning is needed in order to:

- Extend our understanding of bio-cultural development and how this might influence curriculum and pedagogies
- Develop professionals' understanding of the links between cooperative play and intellectual development and of children's capacity to develop strategies for conflict resolution during social and cooperative play
- Understand pedagogies which respect children and which develop a climate of trust in early years settings
- Gather evidence of children's capacities to make meaningful choices and take the lead in their play
- Gain insights into how children's self-initiated activities lead to deeper, more sustained learning experiences

Adults as Playful Pedagogues

A pedagogy of play is only gradually being defined. Practitioners continue to have problems defining their role, assessing children's learning through play and understanding when and how to be involved. Play in early years settings is operating to an outcomes-led agenda which is contrary to the true nature of play (*Professor Elizabeth Wood, University of Exeter*).

Understanding the complexity of children's play as a work in progress is demanding for educators as they tend to engage in partial observations; educators need help in understanding the ways in which different areas of play provision can contribute to children's learning and how this is taken forward through planning and record-keeping (*Professor Pat Broadhead, Leeds Metropolitan University*).

Practitioners are reluctant to allow or enable children to take risks, they see danger rather than competence and subversion rather than confidence; children who lack access to challenging, adventurous play can become risk averse or reckless and do not develop the skills to be safe (*Dr. Helen Tovey, Roehampton University, London*).

Only knowledgeable adults can interpret the complex, inner meanings of children's play; this ability can be learned through informed observations of children and through professional dialogue (*Maulfry Worthington, Free University Amsterdam*).

Educators need a deeper understanding of children's computer use in the home; it is becoming very sophisticated at an early age for some children (*Professor Jackie Marsh, University of Sheffield*).

When teachers understand play, its provision and potential, then children respond with multilayered narratives and make powerful links between events in their home and school lives: teachers can respect and engage with the uncertainty of play in relation to its inherent learning potential (*Kathy Goouch, Canterbury Christchurch University*).

Further research is needed in order to:

- Develop a shared language and shared professional knowledge about the characteristics of play and playful learning in educational settings
- Strengthen understanding of how playful learning and the given curriculum can interconnect and extend professionals' confidence in making meaningful links
- Underpin professional development in observing and learning from play observations through joint activity and reflection (at pre- and in-service levels)
- Develop professional understanding of the links between cooperative play and intellectual development and of children's capacity to develop conflict resolution strategies during social and cooperative play
- Determine how play in educational settings generates creative thinking for adults and children
- Enable exemplary play pedagogues to share their excellent practice and understandings with others, including collaborative action research projects

Many of the above play scholars subsequently published their work in Broadhead et al. (2010), alongside other play scholars who came on board at the point of publication. In addition, a review of the primary curriculum that was ongoing at that

time also drew on extracts from the published summary of the work and spoke positively about the relationship between play and active learning for older children (DCSF 2008). It was a singular experience for all of us involved in the initiative and opened our eyes to the potential of engaging with playful entitlements for young children as a political act. But did it make a difference?

Subsequent Developments in Relation to Playful Learning in the Early Years of Education

In 2009 (still under the auspices of the New Labour Government), a publication emerged from the Department for Children, Schools and Families (DCSF 2009). It took new directions in extending and elaborating playful pedagogies, although the document did not have the status of ‘policy’ but of ‘guidance’. Significantly for an English government publication, for the first time it used the terms ‘pedagogy’, ‘playful learning’ and ‘playful teaching’ and was an extended exposition of and reflection on these terms and on the implications for creating an effective, appropriate and playful learning environment. Quite appropriately, the substantive publication sought to support practitioners in coming to grips with a challenging point of practice – namely how to ensure that within the day, a young child has opportunities both to initiate and direct their own playful learning and to be meaningfully engaged with adult-led, planned but playful activities. The government-funded REPAY project (Researching Effective Pedagogy in the Early Years; Siraj-Blatchford et al. 2002) had revealed from a study of 14 foundation stage settings that in terms of intellectual, social and dispositional outcomes, ‘the most effective settings are those that provide opportunities for teacher-initiated group work and the provision of freely chosen but potentially instructive play activities’ (Siraj-Blatchford and Sylva 2004:713). Defining ‘instructive’ is the challenge in relation to playful learning in that the adult may not understand the learning potential of children’s playful activities unless they take time to study the play and to understand its potential. What may look to adults like ‘messiness’ may in fact contain the purpose and progression of playful learning (Broadhead 2004, 2006; Moyles 2010a). The richness and meaning making of children’s play are often unavailable to adults unless they can become skilled observers and interpreters of play (Broadhead and Burt 2011; Worthington 2010).

Wood (2010) has illustrated the complexity of the construct of achieving balance between adult-direction and child-initiated activity. In exploring this complexity, she draws a useful distinction between *mixed* and *integrated* pedagogical approaches. In *mixed* approaches, adult-directed activities take centre stage in planning, assessment and feedback, and child-initiated activities, including play, are left at the margins of practice. In contrast, with *integrated* approaches, adults are involved with children in planning for play and child-initiated activities, based on careful observations and well-structured and (for the child) meaningful interactions. In *integrated* approaches, planning and pedagogical decision-making are informed by children’s choices, interests, capabilities and knowledge, which are then fed forward by

practitioners into further curriculum planning. In an *integrated* model, teaching and learning become co-constructive processes, where the focus is on dynamic interactions between the people, resources and activities in the setting, with the curriculum being used as a framework rather than a straitjacket.

Wood's model is necessarily complex, and the related practices are not achieved only through exposure to policy or written guidance; reflective practice aids appropriation and understanding, and this takes time when new constructs are being unpacked, explored and examined (Moyley 2010b). Appropriation in this context implies not only policy application but contextualised interpretation and intelligent action. Let us return briefly to the DCSF (2009) pedagogical guidance publication. It provided the reader with a continuum of approaches (p. 5) as a starting point for examining this complexity. This continuum raises concerns about how playful learning is being conceptualised in this search for a 'balanced pedagogy', and I would argue that this conceptualisation is a legacy from the previous 20 years rather than an attempt to look ahead within paradigms that encompass the child as active meaning-maker who playfully draws on experiences from both within and beyond the classroom (Pramling-Samuelsson and Fleer 2009). There for four points or approaches described as follows:

1. Unstructured: play without adult support
2. Child-initiated play: adult support for an enabling environment and sensitive interaction
3. Focussed learning: adult-guided, playful, experiential activities
4. Highly structured: adult-directed; little or no play

The explanation goes on:

At one end, too little adult support can limit learning. While play without adults can be rich and purposeful, at times it can become chaotic or repetitive activity which is 'hands-on, brains-off'. At the other end of the scale, too much tightly directed activity deprives children of the opportunity to engage actively with learning.

This suggests that perceptions of 'child-initiated play' as 'messy' or 'chaotic' still prevail when it may be that the adults cannot make meaning from the play as initiated by the children because they do not fully understand the nature of those lives as they are represented in the play. English early years policy needs to engage with the substance of children's lives and with their cultural and social experiences as they underpin their identity formation (Brooker 2002; Papatheodorou and Moyley 2007). This is particularly important in those early years when children are making their first major transition from home to school and to the wider world. However, on a more positive note, this publication did mark a significant move from a predominantly developmental reference point of progression through 'stepping stones' and 'outcomes' to one of understanding how children make meaning in complex environments – and an early years setting is a hugely complex environment where adults routinely take for granted what every child must learn anew. So, there were aspects of the DCSF (2009) publication that broke new ground in discussing playful learning and playful pedagogies, but some parts of it also, that seemed to look back to previous and restricted play-related policy speak.

The Current Position in England

In 2010, Dame Clare Tickell was appointed by the Coalition Government to undertake a review of the Early Years Foundation Stage (EYFS). New proposals were published and a public consultation was undertaken. The responses were published in December 2011 as a summary document, and a further consultation was undertaken which is ongoing as this chapter is completed. This second phase of consultation is unusual in English policy development. Its purpose is not clear, but it may be that government were taken aback at the responses they received to the first consultation. There was much in this that respondents were critical of and which remain as key concerns even as I write.

There is insufficient space to go into depth at this point, but some key issues are as follows:

1. School-readiness has emerged as a key theme for the Coalition Government. It is presented as developmental readiness that relates especially to literacy and numeracy. New policy is advocating the assessment and categorisation of children as young as 2 years to identify them as showing the potential for having behavioural and learning difficulties in school. It seems that the school system will determine the developmental trajectory for young learners and young children will be pathologised through early labelling of failure.
2. Play has virtually disappeared from the document; the terms ‘playful learning’ and ‘playful pedagogy’ are not used. The terms ‘adult-led play’ and ‘guided play’ are the only references to play. The idea that children are powerful instigators of their own learning through play is ignored.
3. Literacy has been separated from Communication and Language. There is no acknowledgement of their interconnected nature nor of the wealth of cultural impact on learning associated with these areas. Literacy for young children appears to have been limited to learning to read and write.

As noted above, the consultation is ongoing and many people are responding to what they see as policy proposals that have turned back the clock in curricular provision for young children, and especially so in relation to what is now known and understood about the positive impact of playful learning and playful pedagogies. I can only say: ‘Watch this space!’

Becoming an Early Years Children’s Champion

Before I consider whether or not the journey to the Houses of Parliament was worth it, let me briefly describe a recent development in my life as, for me, this development is also part of the journey of advocacy, lobbying and the need to protect children’s rights and interests – the issues that were also at the heart of our play research and its dissemination of course.

I live in Sheffield, a large city in the north of England, just south of Leeds where I worked. Just prior to my retirement from academic life, I was approached by an officer of the Local Authority and by the local councillor with responsibility for children's services (known officially as the Cabinet Member) and asked if I would consider undertaking a voluntary role as 'Early Years Children's Champion'. As far as we are aware, Sheffield is the first Local Authority to create this role. I was privileged to be asked and accepted, although none of us at that time had any clear sense of how the role would unfold or what it would be.

The proposal for such a role had arisen from a public consultation that the Local Authority was undertaking relating to an ongoing Review of Children's Services across the city. It was subsequently agreed that the role would encompass the following:

- Build a dialogue with the Early Years Sector on how best to take collaborative action to improve children's early years experiences.
- Be an advocate for the importance of children's early years.
- Make suggestions and recommendations for practical action to the Cabinet Member for Children, Young People and Families and the Executive Director for Children, Young People and Families.
- Encourage greater participation across the sector in pooling expertise, resources, knowledge and skills to ensure greater quality of services for young children and families in Sheffield.
- Support the delivery of the birth to five strategies and the intensified effort in Sheffield to improve the delivery and quality of early years services.
- Bring creative ideas and have up-to-date knowledge of research and methods.

These are substantial tasks and responsibilities for a volunteer, and the early part of the role has involved getting out and about and meeting people, attending a range of meetings and getting a picture of what is ongoing in a major city during a time of economic recession, cuts in public spending and services and austerity. I anticipate some interesting and potentially very challenging times ahead as I attempt to create a bridge between a cash-strapped local council and local services, many of which, support children and families suffering the impact of economic recession. I am certainly looking forward to being an advocate for play and to minimise the potentially negative impact of a school-readiness agenda that denies children their right to play and learn in ways that suit them and that denies practitioners the right to continue their own professional learning around play and playful pedagogies.

This chapter has argued that play currently remains peripheral within English policy documents where it would benefit from a much richer conceptualising as a learning experience. It currently continues to be framed within the context of adult activity, whereas play belongs to children. Creating pedagogies of play can embrace its socio-cultural dimensions for individual learners and for communities of co-learners and can recognise that the agency of the child requires new and expanded forms of pedagogical thinking; alongside this, we must also look to the longer-term 'protection' of playfulness (Parker-Rees 1999). Currently, such forward movement will have difficulty arising from pedagogies driven by policy because current framing is predominantly and

conservatively rooted in the past, relying most substantially on developmental and outcomes-based models. Young children have varied and rich experiences in the world and in the right conditions can clearly re-engage with these within their child-initiated and child-directed play experiences. There will always be activities designed and led by adults; perhaps it is time to stop calling them ‘play’ and to stop calling what children choose to do ‘unstructured’. Therein might lay new beginnings.

So was the journey worth it? Well of course it was and of course it goes on for me and for the other play scholars who contributed to that event. It led for one thing to being invited to write this chapter and so the work goes on. Who knows what those attending the seminar in the House of Commons remember of that day, but perhaps the fact that we did make our presentation there will be inspiration for others to do the same at some point in the future. We have to keep the child’s right to engage in playful learning and access playful pedagogies on the political agenda because if we don’t, who will?

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Chapter 10

Cross-Sector Partnerships for Early Education and Care

Mary-Lou Breitborde

Abstract This chapter describes an initiative that leveraged government policy to build an organization whose work transcends the boundaries of sector and geography. The Northeast (Massachusetts) Regional Readiness Center is a cross-professional structure that brings together stakeholders from several sectors for the purpose of improving communication, creating partnerships, and collaborating to provide professional development that targets the needs of young children in the region and those who educate and provide them with care.

Keywords Northeast Regional Readiness Center • Partnerships • Professional development • Cross-sector collaboration • Community schools • Interprofessional education • Race to the top • Common core standards • QRIS

Introduction

The ultimate goal of this collection of chapters is to broaden the perspectives of preservice and in-service early childhood professionals so that in considering other ways that nations and organizations do things—establish priorities in early education, structure their services, and judge their successes and failures—early educators might rethink their own goals and programs, perhaps even look differently at the children in their care. Globally literate educators are aware of, and value, multiple perspectives (Swiniarski and Breitborde 2003). They are constant learners, gathering information and seeing what’s needed in early education through the eyes of all parties, including children’s. Reflective practitioners, they are always skeptical of their own “best” practices. In gathering up and considering multiple perspectives and points of view,

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globally literate educators understand how context plays a central role in children's lived worlds—the contexts of cultural beliefs and understandings; family structure and interaction; the health of the child, of the family, and of the community as a whole; social class and economic welfare; and community relations and expectations.

While globally literate early childhood educators may understand how contextual problems such as lack of access to health care and poverty affect the children in their immediate charge as well as children in that community or that state or nation as a whole, past, present, and future, too often, the process of obtaining information or services that would enable a child even to attend a program (transportation, stable housing, respite care) is daunting, if not impossible, to navigate. Extra-educational services in the United States are typically the province of several distinct public or nonprofit agencies who don't necessarily communicate well with early educators or with each other. While they share a common goal of maximizing children's development and welfare, they share also the problems of chronic underfunding, short-staffing, and increased pressure to produce quantitative data that purports to indicate that their work is "effective." And, too often, while they might benefit from pooled resources and shared support, the worlds of early education, social work, health, housing, legal services, etc., are separated by the boundaries of their special perspectives, their language, and their priorities. These boundaries enclose arcane discourses that might as well be foreign languages, connoting meanings and assumptions accessible only to the professionally initiated and creating barriers of communication and goodwill. Social workers become the "problem" to early educators. Teachers become obstacles to health workers. The legal world is heartless and inflexible, and everyone agrees parents are the common enemy. This chapter describes an initiative that has had success in leveraging government policy to build an organization whose work transcends the boundaries of sector and geography. The Northeast (Massachusetts) Regional Readiness Center is a cross-professional structure that brings together stakeholders from several sectors for the purpose of improving communication, creating partnerships, and collaborating to provide professional development that targets the needs of children in the region and those who educate and provide them care.

“Schools Can’t Go It Alone”: The Need for Interprofessional Partnerships

The idea that children's development depends on communication and collaboration on the part of workers from multiple sectors is not new. Within public education, the model has centered in schools variously labeled "full-service," "extended-service," or "community schools" (Blank et al. 2003; Melaville 1989; see <http://www.communityschools.org>). In some ways, using the school as a source for information, referral and direct help to children and families recalls the function of the one-room rural schoolhouse, a multipurpose community institution that characterized most of American schooling through the nineteenth century and that exists today in remote island communities in New England and in sparsely populated western states.

Whether ancillary services are housed under the school's roof or linked by special relationship to agencies outside the school, there is a general recognition that "schools can't go it alone." Since Maslow, we have known that a child is not mentally or emotionally free to learn unless his or her physical and primary emotional needs are satisfied (Maslow 1962). Six-year-old Joseph, habitually truant, has a single mother who is too ill to get him dressed, fed, and out the door in the morning. His classmate Janelle comes every day, but without the eyeglasses she needs to see her work that her family can't afford to buy her. Lawson (2004, 2009) has long claimed that the needs of vulnerable children call for partnerships among schools, families, community organizations, government, businesses, and higher education institutions and that the preparation of professionals whose aim is to help children should be prepared "interprofessionally."

In response, our university, whose College of Health and Human Services includes the Schools of Education, Nursing, Social Work, Criminal Justice, and Occupational Therapy, offers a graduate course, "Partnerships for Families: An Interprofessional Approach," to graduate students in early childhood education, social work, and nursing (Bryne et al. n.d.). One of this university's partner schools has housed a health clinic to provide immunizations and first-line care to children and their families. The local police department sends officers to the school to work with children to help them avoid gang involvement and prevent violence. University students have run after-school programs and served as mentors. A "night school" offers immigrant parents classes in English, citizenship, high-school equivalent test preparation, and technology training. The model has its limitations, however; like many such "community schools," it relies on one principal's imagination and her personal relationships with university staff and community agencies. The grants that funded some of the above programs in the 1990s have been discontinued in favor of funding that aims directly at improving "adequate yearly progress" on high-stakes state tests in compliance with the No Child Left Behind Act of 2001. Under NCLB, the link between basic health/social services, adult education, and children's learning was ignored.

The Obama election brought to Washington a new Secretary of Education, Arne Duncan, who, in his tenure as CEO of the Chicago Public Schools, created a network of community schools whose links to social agencies ensured that families could access the supports that would allow their children to come to school regularly and attend to learning (Chicago School Chief 2005). In a speech he gave to the United Way of Los Angeles in March 2011 entitled "The Road Less Traveled," Duncan challenged the Greater Los Angeles area to reimagine our basic "concept of school" and broaden children's educational experiences, starting with expanded early education, to provide them with "art, chess, family literacy nights, robotics, debate teams, and GED and ESL programs for parents." He urged communities to partner with businesses for mentorships and internships, and with nonprofit organizations "like the YMCAs, the Boys and Girls Club, college-readiness programs, and other providers" to run their programs in the schools so that "schools become the heart of community life and of family life." And then, "I promise you our children will do just fine" (Duncan 2011).

At the same time that Duncan took on the task of improving the nation's schools, new Massachusetts governor Deval Patrick, a former assistant attorney general under Bill Clinton (and a native of Chicago), appointed Paul Reville his state Secretary of Education. Reville had a background in building partnerships on behalf of public education. He had founded a multiservice educational improvement organization (the "Alliance for Education") serving Central Massachusetts and had led and taught in alternative secondary schools. He supported "extended-day" and "extended-year" schools that would offer the kind of enriched learning activities that are typically available only to children whose parents can pay for them and "wraparound services" for their families. As Secretary, he would oversee three state departments of education, including the Dept. of Early Education Care, the first-in-the-nation agency that includes both early education and care, and after-school services for children and families. His agenda—to reducing the wide educational achievement gaps among Massachusetts children by widening access to high-quality education P-16, enlisting whole communities and all sectors in the effort—paralleled Duncan's.

Race to the Top and Readiness

The Obama-Duncan commitment to improve public education in general and, especially, to correct the pernicious "achievement gaps" between racial, linguistic, and sociocultural student subgroups overrepresented in high-poverty urban schools resulted in competitive grants to states who would agree to tackle the problem in comprehensive but focused ways. Millions of American Recovery and Reinvestment Act dollars were granted to states under the "Race to the Top" program. Massachusetts' proposal, written jointly by Reville's Executive Office, the Department of Elementary and Secondary Education, and the Departments of Higher Education (DHE) and Early Education and Care (EEC), was successful. The proposal made several references to the need for cross-sector collaboration in the development of "a seamless education system from birth through higher education" (MA. DESE 2010, p. 14). It recognized the wide gulf between high- and low-performing schools and districts in our crowded state, where advantaged communities yield student achievement scores at the highest international levels, and low-performing districts, home to poor immigrants, people of color, and English language learners, are worse than those of many developing nations. The pattern is not surprising: of the children in the 35 lowest-performing schools in Massachusetts, 9 in 10 are poor; 9 in 10 are students of color; 1 in 5 has a defined disability; and 1 in 4 is an English language learner (MA. DESE 2010, pp. 146–147).

Our state's successful proposal promised comprehensive wraparound initiatives for children and families that would involve early education and care providers and community health and human service agencies in providing integrated community support for children's social, emotional, and health needs in high-poverty schools "where often the most effective classroom instruction cannot entirely overcome these non-academic barriers to learning" (Massachusetts Department of Elementary and Secondary Education 2010). It admitted that "in most districts, existing education

and human service systems (e.g. child welfare, juvenile justice, and mental health services) demonstrate good intentions but also pervasive inefficiencies and fragmentation of effort” (MA. DESE, pp. 153–154). Recognizing the importance of reaching children before they enter kindergarten with comprehensive strategies to ensure their learning, the proposal saw EEC as a full partner in the delivery of high-quality services to children, their families, and the early education workforce. EEC was charged with the development of a Quality Rating and Improvement System (QRIS) to assess and improve early education in center- and school-based programs, family child care, and after-school programs (Schilder et al. 2011); the creation of a Birth to School Age Task Force to support the healthy development of children, particularly those from low-income families; and the expansion of universal prekindergarten to promote school readiness. The Race to the Top early childhood initiatives linked early education standards and K–3 curricula and assessments, including integration of the federal common core standards in early grades, provided model curricula through a digital library, and developed formative assessments and curriculum-embedded performance tasks in early grades.

Central to the carrying out of RTTT programs and priorities was the establishment of six regional Readiness Centers to provide high-quality, targeted, professional development to “great teachers and leaders”—an “effective, academically capable, diverse, and culturally proficient workforce” (MA.DESE, p. 87), focused on student learning. The six regional Readiness Centers would serve as hubs for collaboration among local, regional, and state education stakeholders and would convene stakeholders from across the early education, K–12, higher education, and out-of-school-time sectors collaboratively to address education priorities, leverage resources, and increase integration and coherence, all focused on improving teaching and children’s learning. These new centers would build new relationships and partnerships among regional stakeholders, resulting in more coherent and focused professional development aligned with the real needs of children in the region, as well as statewide educational priorities. The collaborating partners to the Readiness Centers would, for example, develop criteria for selecting and assessing professional development providers; identify and disseminate replicable effective programs to partner child care centers, schools, and districts; and establish an educational culture characterized by cross-functional, cross-sector communication within a shared vision and vocabulary for education reform (MA. DESE, p. 34).

A group of higher education institutions, school districts, early childhood and out-of-school-time programs, and workforce development agencies submitted a successful application to form the Northeast (Massachusetts) Regional Readiness Center (<https://www.salemstate.edu/academics/schools/9444.php>) in early 2010. It would be headquartered at Salem State University, a large public institution with a long-term commitment to preparing and serving teachers for the region’s schools. NRRC took as its mission to respond to the educational needs of P-16 schools and community organizations with resources, opportunities for collaboration, and models of effective practice. Its ultimate intention was to become a central network of research-based, effective professional resources for implementing, supporting, and sustaining improved educational practice in the region. In a region that included

several older, formerly industrial cities, gateways for new immigrants and housing many schools considered low-performing, NRRC acknowledged the rich history and culture of our communities as resources for learning, the variety of workplaces and areas of economic growth, the wealth of cultural institutions and museums in the region, and the many organizations that contributed to the education and welfare of children and families. NRRC would help develop great educators cognizant of regional needs and help improve the quality of early education and out-of-school-time programming by strengthening the preparation and support of providers, articulating career pathways for those committed to young children's education and care, and expanding after-school opportunities for older children.

The NRRC was from its inception a self-consciously collaborative entity, whose members believe that professional growth happens best in communities of practice. NRRC's Executive Committee and Advisory Board represented the region geographically and included early childhood, school-age, and higher education organizations, public, private, and nonprofit. Its priorities were embodied in six teams: early childhood, out-of-school-time programs, STEM (science, technology, engineering, and mathematics), College/Career Readiness, Communities of Practice, and Assessment and Evaluation. These teams would take the lead in developing programs and activities, grant-writing, and professional development. In Board and Team meetings and programs, NRRC would use the discussion and decision-making protocols to model collaborative structures and strategies and maintain positive relationships among participants.

Sharing the common purposes set by the Governor's Office, the six regional Readiness Centers varied in their membership, decision-making structures, and program priorities. NRRC, though, was unique in several ways:

- (a) It developed an organizational structure designed to model and sustain common goals, mutually respectfully communication, and collaborative work.
- (b) It included early educators in its leadership structure. The regional representative of the Dept. of Early Education and Care is a full member of the Advisory Board, which also includes early education faculty and administrators from higher education and from regional centers and partnerships. Early education was embodied as a priority in the creation of an Early Childhood Team.
- (c) Its membership was deliberately cross-sector, including representatives from higher education, schools and school districts, child care/out-of-school time organizations, community agencies, and workforce development. The Advisory Board also includes regional representatives from EEC and ESE.

Collaborative Professional Development to Advance Early Childhood Education

One of NRRC's first accomplishments was the receipt of a regional partnership grant from the state Dept. of Early Education and Care to NRRC's Early Childhood Team. The multiyear Region 3 Partnership (R3P) project (<https://www.salemstate.edu>).

edu/academics/schools/10846.php) uses federal American Recovery and Reinvestment Act funds to provide professional development and career advancement opportunities to some 2,000 licensed child care providers in northeastern Massachusetts. Participants are teaching assistants, family day-care providers, after-school program staff, child care center directors, or teachers or paraprofessionals in public schools. At least half the children in their charge must have received state low-income tuition waivers. The survey that NRRC's Region 3 Partnership (R3P) grant development team sent to some 600 practitioners indicated a need for training and support for directors/administrators and programs leading to a leadership credential, assessment of the quality of the various Child Development Associate programs offered in the region and increased transferability of the CDA credential into college early childhood programs. For the 39 % of providers who reported that English was not their primary language, there was a clear need for workshops and courses offered in contextualized English both to increase their early education knowledge base and also to improve their ability to model standard English for the children in their charge. Providers and administrators requested professional development on a wide variety of topics, including how to engage young children in science inquiry, how to identify and work with children with special needs, how to nurture social-emotional development, how to teach and lead with culturally proficiency, and how to assess children's learning in multiple, authentic ways. Rather than choose from a random menu of offerings on important topics, R3P urged participants to enroll in a program leading to a certificate (e.g., infant/toddler or school-age educator), a Child Development Associate credential, an associate [2-year] degree, a baccalaureate degree with an initial license as an early childhood teacher, or a master's degree in early childhood education, taking courses from the organization offering the program and using its resources for information on admissions, financial aid, and academic, and test preparation support. Three members of the Early Childhood Team, who represented early childhood "hubs" in the region, became key project leaders. The three geographical hubs included a community college, 4-year institutions, federal Head Start programs, private preschools, YMCA/YWCAs, Catholic Charities, community development agencies, after-school programs, and several public school districts with early childhood programs.

Outside the Early Childhood Team, NRRC provided support to R3P by helping organize professional development on targeted topics and publicizing on its website links to the various career pathways in the region to help participants move toward degrees and professional credentials. NRRC provided easy access to a network of early childhood providers, school districts, agencies, and early childhood teacher preparation programs across the region and linked its website to the R3P calendar of activities and professional development opportunities. NRRC also made sure to include R3P participants and other early childhood providers in its non-grant professional development programs, for example, its workshops on the new statewide curriculum frameworks that incorporate federal common core standards in literacy and mathematics.

All NRRC higher education partners offered workshops and undergraduate and graduate courses within the grant using formats, locations, and special

schedules feasible for working adults, including nights, weekends, late afternoons, week-long summer institutes and as hybrid or online formats, and at sites accessible to the three hubs cities (Lynn, Lawrence, and Lowell) and subregions. All agreed to reduce their tuition and fees to meet the EEC rate requirements as part of their in-kind contribution; the maximum amount a student was asked to pay for a 3-credit college course was \$50. Salem State, for example, offered special sections of its cross-sector graduate course *Partnerships for Families: An Interprofessional Approach to early childhood directors*, as well as baccalaureate courses in language and literacy development and special education and workshops in family literacy and collaborative assessment to child care providers and early childhood paraprofessionals. NRRC's community college partners offered courses and continuing education workshops in, for example, child development, early childhood curriculum, infant/toddler programs, contextualized English, and the process of obtaining national accreditation. Professional development offerings, in whatever form, were aligned with the EEC's Core Competencies for Early Educators: Understanding the Growth and Development of Children and Youth; Guiding and Interacting with Children and Youth; Partnering with Families and Communities; Health, Safety, and Nutrition; Learning Environments and Curriculum; Observation, Assessment, and Documentation; Program Planning and Development; and Professionalism and Leadership (Massachusetts Dept. of EEC Core Competencies). Links to how the activities support an early childhood program's advance on one or more of the five standards that ground EEC's Quality Rating and Improvement System (Curriculum and Learning; Teacher-Child Interaction; Safe, Healthy Indoor, and Outdoor Environments; Workforce Development and Professional Qualifications; Family and Community Engagement; and Leadership, Administration, and Management) are explicit (Mass. Dept. of EEC QRIS). In addition, where appropriate, professional development offerings address ESE's Curriculum Frameworks and national (National Association for the Education of Young Children 2008) standards for early education programs (Overview of NAEYC Standards and Criteria).

In the first year of the grant, R3P offered adult basic education and high-school equivalency support; contextualized ESL classes; center accreditation support; Child Development Associate certificate trainings; professional development workshops for continuing education credit; college courses for associate, bachelor, and master's degree pathways; academic advising; QRIS and Core Competency information; and outreach and coaching and mentoring services for infant/toddler, pre-school, school-age, family child care, and public school early education programs. The three urban "hubs"—Lawrence, Lynn, and Lowell—employed part-time bilingual (Spanish-English and Khmer-English) coaches. In its second year, the grant will offer similar professional development and information and advising related to individualized development and career advancement. To address the growing need for professional development for providers whose English is limited, some continuing education workshops will be offered in Spanish. Pre-workshop trainings in computer labs will strengthen providers' ability to register online for grant activities

and access Dept. of EEC information and registries and, at the same time, reinforce their computer skills. Grant leadership intends to create a large “steering committee” to widen the project’s governance structure and provide subcommittees for detailed tasks undertaken by interest groups.

The umbrella collaborative NRRC was instrumental in enabling R3P grant leaders quick access to a network of providers, school-based early childhood programs, and higher education programs in the region for planning, information-gathering, coordination, and program delivery.

By including early childhood as a priority focus area from the beginning, NRRC raised early educators’ awareness and expectations for involvement in all conversations related to P-16 education, for example, programs on the new common core standards/curriculum frameworks for literacy and mathematics. The R3P-NRRC partnership has provided a cadre of providers who care for the neediest children in the state with financial support to increase their knowledge and skills and advance their careers along clear professional pathways.

In addition to R3P, NRRC is undertaking several other projects in Year 2 of its existence. Among the initiatives already underway are (1) a series of programs aiming at increasing school districts’ ability to plan, even collaborate on, comprehensive transition programs for students with special needs who are nearing graduation and entry into the workforce; (2) workshops for faculty in educator preparation programs, including in early childhood education, on the new common core standards in English and mathematics with work toward vertical articulation of their curricula; (3) a regional structure providing information on out-of-school-time programs for children and youth; and (4) an expansion of its website to include links to replicable programs and research. In our first year, we’ve learned much:

- That good people have much to learn about each other’s work on behalf of children
- That time spent in building and guiding relationships—for example, through inclusive membership, structured discussions, and establishment of norms—is time wisely spent
- That positive relationships will motivate ideas and partnerships, often with no external funding

Funding for the NRRC was very late in arriving. The Advisory Board, Executive Committee, and teams met for a full year before the Race to the Top grant was awarded to the Commonwealth. NRRC partner organizations hosted meetings and programs at their own expense and moved forward with common purpose and goodwill, so that when the (modest) funds did arrive, NRRC had already built its networks and held fruitful conversations and initial programs linked to regional priorities. At this writing, given the political climate in Washington, the future of federal grants is uncertain. We at NRRC, however, believe that the partnerships and relationships fostered by this center will stand and result in continued collaboration to meet regional educational needs, despite the vicissitudes of government funding. We have taken a giant step forward in building alliances on behalf of children and their teachers.

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Chapter 11

The Science Art and Writing (SAW) Initiative

Jenni Rant

Abstract The Science Art and Writing initiative is a cross-curricular education approach exploring scientific themes through practical science activities underpinned by visually striking images which are used as a creative stimulus for extension activities in art and writing. The images encourage inquisitiveness and offer a nonthreatening starting point for exploration of diverse scientific topics. Practical science activities aid understanding, and creative investigation improves the confidence of children with varied learning styles in communicating science through varied media.

Keywords Science • Art • Writing • Poetry • Scientific images • Creativity • Learning • Cross-curricular

Introduction

Being a scientist requires curiosity and creativity; it requires imagination, observation, experimentation and communication. The term scientist in this opening sentence could easily be replaced by ‘artist’ or ‘writer’, and the subsequent requirements would still hold true. The Science Art and Writing (SAW) philosophy is based on this principle: disciplines are interwoven to maximise understanding and create a learning environment where there are no boundaries to thinking.

Confidence to explore science is abundant in young children who are constantly questioning the world around them, without labelling the act as being a form of scientific enquiry. The use of scientific images as a stimulus for introducing scientific topics offers a rich and diverse platform for children to begin their own journeys of understanding. From the educator’s perspective, images give a starting

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point that is accessible to children of all learning styles and an opportunity to make leaps across the curriculum and the different disciplines as topics are explored in a holistic manner.

The SAW philosophy evolved from an idea that the world-class scientist Professor Anne Osbourn from the John Innes Centre had whilst on sabbatical in the School of Literature and Creative Writing at the University of East Anglia in 2005. Anne had been awarded a Dreamtime Fellowship by NESTA (National Endowment for Science, Technology and the Arts) and wanted to explore ways of bringing science into language through creative writing and was exploring the use of scientific images as a stimulus for writing poetry. It was during this experiment that her children became inquisitive about the images. Anne decided to take a selection of images into her local primary school to see if the children responded in a similar way – they did! What was equally intriguing was the response of the teachers to the process, all keen to get involved, resulting in a whole school Science, Art and Writing project, extending to the local high school. The resulting creative output was published in a book entitled *SeeSaw* (2005). Local schools who heard about the project began contacting Anne to ask for ‘SAW projects’, hence the naming of the initiative and the founding of the SAW Trust (UK registered charity no. 1113386). Teachers weren’t the only ones asking for projects; scientists, artists and writers wanted to be involved so the SAW Trust began running sets of projects, bringing together professional scientists, artists and writers to work with teachers on topics chosen by the schools, relating to the science content of the curriculum.

During this time the logistics of SAW projects were varied, some projects involved whole schools and some just one class, some schools invited many visitors to run sessions whilst in other schools teachers led many of the sessions themselves. What emerged from this developmental phase was a flexible model for delivering novel and diverse, cross-curricular activities with accessible links to visitors with real-life examples. In the years that followed, the scope of the SAW initiative has been tested across all school years and beyond to groups of adults and on basic scientific topics from the curriculum to the most abstract and cutting-edge research topics, consistently producing fantastic results. The SAW philosophy provides a framework for creative pedagogy where students are encouraged to take a personal approach to learning and seeks to nurture the next generation to be open-minded citizens, able to confidently engage across society, form opinions and be included in future developments.

Method

As alluded to in the introduction, one of the strengths of the SAW initiative is that it offers a flexible approach to delivering cross-curricular activities and as such there is no single prescriptive method. The SAW Trust has developed a range of training courses for teachers and SAW practitioners and will be translating them to e-learning packages to make them more accessible globally. SAW training courses provide an

in-depth introduction to the SAW philosophy together with practical activities and resources and result in SAW accreditation with membership to the online community. For more information on the training packages, visit the SAW website (www.sawtrust.org). The following guide to designing and delivering a SAW project shows the key steps required and combines examples from a variety of case studies to illustrate the scope of design options available.

Step 1: Project Logistics

Firstly, schools need to decide how many classes will participate in the SAW project and how many days the project will run for. A SAW project with just one class is easier to organise, can take place in 1 day and offers the teacher an opportunity to experiment with the approach on a small scale. However, a whole school approach means a shared learning experience, where teachers are able to support each other through the process and divide the tasks. Whichever approach is taken, the steps to designing a successful project remain the same!

Schools then need to decide if they wish to invite practising scientists, artists and/or writers* to join them in the design and delivery of the project or if they will do it as an 'in-house' venture (*science, art and writing are at the heart of SAW, but other disciplines can be included such as maths, music, history, drama and dance). There are many benefits to children associated with inviting visitors to work in schools such as the inspiration of working directly with practising scientists, artists and writers, the insights it gives to these careers and their relevance in the real world. In addition to this, it is a valuable opportunity for teachers designing a SAW project to work with professionals from other backgrounds to build confidence in designing novel activities whilst getting an insight into current practices and renewing their enthusiasm for the different disciplines.

The network of SAW-trained experts continues to grow, and a member's section of the SAW website is being developed to include details for locating SAW practitioners.

Step 2: The Scientific Theme and Keywords

Themes generally fall into three categories:

1. A theme from the school curriculum such as living things, sound, magnetism or senses
2. A special theme (e.g. extreme sports during sports week or evolution on Darwin's Day)
3. An area of current scientific research – this generally comes with the visiting scientist!

Once a theme has been decided, assembling a list of keywords begins to shape the project in terms of learning outcomes and also aids in searching for appropriate images (Step 3). For example, let's say you decide to theme the project on the senses, a good selection of keywords might be nerve cells, smell receptors, taste buds and antenna.

If you choose to work with a scientist and theme the project on their area of research, then it is a good idea to talk to them about their research before you begin to assemble your keyword list. This gives the teacher an opportunity to familiarise themselves with the scientists research and make links with topics covered on the school curriculum. For example, a SAW project themed by a scientist who researches the soil bacterium *Streptomyces* can provide links to living things, habitats and microorganisms.

Step 3: Choosing a Set of Images

Once the theme of the project has been decided, the teachers (and the scientist) search for a set of intriguing, high-quality scientific images that relate to different facets of the theme. These will be used as a creative stimulus and link the different sessions of the project.

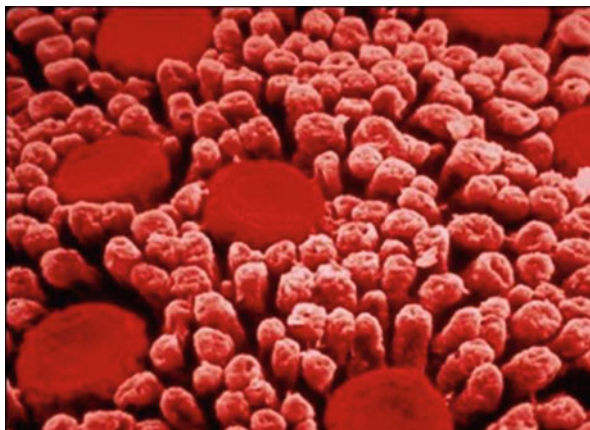
Scientists may have images produced in their research that are suitable and there are many excellent images on the Internet that can be used. A selection of website addresses are listed in the resource section which offer a good starting point for image searching.

The terms and conditions of use of image collections can be found on the respective websites. It is a good practice to record the source, legend and credit of images as you find them, so when you come to short-list a final set of 6–8 images for your project, it's easier to obtain permissions for use if required.

Using the theme of 'senses' as an example, try typing 'taste' into the search box on the Science Photo Library database (www.sciencephoto.com). This yields over 30 pages of mixed images, many of the tongue but also many of people eating, so refine the keyword to 'taste buds'. This reduces the number to 10 pages of more contemporary and surprising images (Fig. 11.1); click on ones that stand out to you or compel you to know what they are. This can become very addictive and reading the bite-sized information that comes with the images is a fantastic learning experience that prompts you to type new words into the search box. Avoid obvious images (like people eating) as children are used to seeing them but they will be intrigued by close-up images of the tongue's surface and could easily embark on a creative journey, perhaps imagining what it would be like to take a stroll across the tongue's surface!

Searching for images related to the theme can be included as part of the SAW project if children have access to computers as this will enable them to personalise

Fig. 11.1 Surface of the tongue (Image credit: Omikron, Science Photo Library – Human tongue)



the images they wish to use. This proved to be particularly effective during a SAW project at a special school where the children have complex physical/sensory difficulties. The theme of temperature was explored and the children delighted in finding thermogram images of all sorts of things.

More example images chosen and used by teachers and scientists for a diverse variety of SAW projects can be seen on the SAW website (www.sawtrust.org/classroom.html).

Step 4: Designing the Activities

Now you know how many children will be participating in the project, if you are inviting visitors to join you and have chosen your theme and a selection of exciting images, it's time to share the images with any invited artists/writers and design the activities.

You may have activities that you already use in science, art and writing and just want to experiment by linking them with scientific images, but you might like to take the opportunity to design new activities or improve existing ones. If visitors are joining you in designing the project, then they will be able to design their sessions and provide a range of ideas and techniques that can be adjusted using the expertise of the teacher to shape the activity into one that is challenging but achievable for the age of the class. If visitors are coming from high schools or universities, it is worth investigating the activities used by them as they can often be adjusted to suit a younger group. The Internet provides an ideal place to search for ideas that are either posted as a complete activity or being showcased by others that have used them. SAW projects work well with structured activities but equally SAW offers

the scope to have open-ended sessions where children are able to take the lead in the direction the activities take.

The following examples show images chosen to hook children into the theme and the activities used for a variety of age groups.

Example 1: Mundesley First School

Theme: The Sea *Age group:* 4–8 years *Visitors:* 3 scientists, 3 writers, 1 artist (Fig. 11.2)

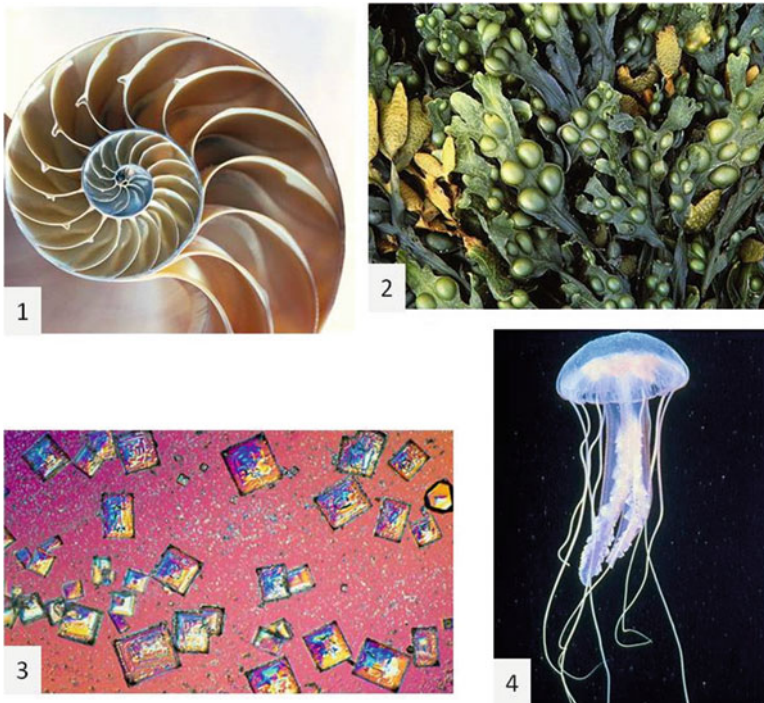


Fig. 11.2 Images used for a SAW project on the theme of ‘The Sea’ (1. Lawrence Lawry, Science Photo Library – Nautilus shell, 2. Simon Fraser, Science Photo Library – Seaweed, 3. Astrid & Hanns-Frieder Michler, Science Photo Library – Salt crystals and 4. Pascal Goetgheluck, Science Photo Library – Jellyfish)

This was a whole school project (135 children).

The younger children visited a local beach where they beachcombed, collecting materials in bags and buckets to observe and use back in the classroom. The objects were used alongside the images as a stimulus for Science, Art and Writing activities.



Science

The items collected on the beach were used for a sorting exercise by the 4–6-year-olds. Two tables were labelled with different names such as living (or once living) and nonliving, smooth or rough, hard or soft and natural or man-made, and the children had to sort their collection, placing items onto the tables that seemed to be the best fit. The sorting process required the children to study each object and think about what details were important for classifying items into groups.

The children were able to look in more detail at objects using magnifying glasses and microscopes. The bladders on the seaweed were investigated under a digital microscope and used to study floating and sinking and adaptation to habitat.



The 6–8-year-olds investigated the properties of salt in a variety of ways starting by examining different types of salt under a microscope. They compared the foaming properties of fresh water and salt water by grating a bar of soap into jars, adding different samples of water and then shaking them to compare the foam produced. The immiscible interaction of oil and water was explored by mixing dyed water with oil in clear beakers and watching them separate. Salt was then dropped into the oil/water mix, travelling through the top layer of oil, dragging droplets down through the water layer until the salt dissolved in the water, releasing the droplets of oil which travelled back up to the top.

The nautilus image was used to discuss the concept of movement by organisms adapted to live in the sea and how this differs from the familiar swimming technique used by mammals. To swim, the Nautilus uses jet propulsion created by drawing water into and out of its living chamber. This allowed the introduction of Newton's third law of motion; for every action there is an equal and opposite reaction. To explore this, the children built pop-pop boats which are powered by simple heat engines.

Art

The younger children spent lots of time looking at the textures and colours of all the items collected on the beach under the microscope and then, with help, made

seaweed templates for painting. A class of 5- and 6-year-old children explored shapes and textures.

Different species of jellyfish and flounder fish were researched in books, the nautilus spiral shell structure was observed and the children noticed similarities with shells they had collected from the beach.

The salt crystal image was compared with different types of salt that the children had studied under the microscope. The children worked collaboratively using materials collected from the beach to make collages and worked independently on painting techniques to represent the textures and shapes of the things they had observed.

Older children also examined textures under the microscope and then created sea habitat pictures using bubble wrap for printing with paint and stuck sand onto their paintings with glue. Sea salt was also sprinkled over the wet paint to create spots of bleaching.



Writing

The images along with the objects collected on the beach were very much the root of inspiration for poetry where the children were encouraged to feel and observe objects and think about how it would feel being the objects and the journeys they may have made to end up on the beach. The children worked on class poems and were then encouraged to write their own poems. The reception class worked on group poems and took photos of things they had collected from the beach using a digital microscope and then put descriptive words on them. The teacher put all the photos into a movie that was set to music and presented by the reception class at a school celebration assembly. Another class formed an orchestra to set their poems to music which worked particularly well for children with special needs and a group poem entitled 'What we know about ourselves', where all the class were sea anemones was acted out spectacularly in the assembly!

Seaweed like a necklace
 Long enough for me to wear
 With squidgy bits for me
 To squeeze.

Victoria Ing (aged 5)

SEA

Steps sucker
 Rock crasher
 Fish crasher
 Sand stroker
 Sea stroker
 Pebble washer
 Rock smoother
 Steps stamper
 Boat beater
 Boat crusher
 Sand soaker
 Foam maker.

Class poem (aged 6-8)

WHAT WE KNOW ABOUT OURSELVES

Amy lives in water.
 Martha blows herself up
 Like a puffer fish.
 Sam T has no skeleton.
 Ben pulls his tentacles in to eat.
 Eleanor sucks up seaweed.
 Guy looks like a flower plant.
 Callum has a tail to push himself.
 Fish hide in Jake.
 Sarah hides when the tide goes out.
 Yvonne looks hairy.
 Sally has a lot of tentacles.
 Joe can sting you and leave
 A red mark.
 Alex has fluffy babies.
 Caitlin is smooth.
 Ben is wobbly.
 We are all Sea Anemones.

Class poem (aged 6-8)

This whole school project ran over 3 days and involved many visitors coming into school. The knowledge, techniques and session ideas that the visitors brought to the project injected energy into the teaching staff, and the celebration assembly on the third day meant that all the children could benefit by sharing their experiences with the rest of the school. Working towards a presentation to round up a whole school project also gave the staff the opportunity to extend activities with the children beyond the science, art and writing disciplines nicely into music, drama and ICT.

Example 2: Costessey Infant and Junior School

Theme: Sound *Age group:* 6–7 years *Visitors:* 2 scientists, 1 writer, 1 artist (Fig. 11.3)

This project took place over one school day with one class of 30 children aged 6–7 years. The day began with introducing the visitors by getting the children to guess who the scientists were; this is a fun warm-up exercise that challenges the

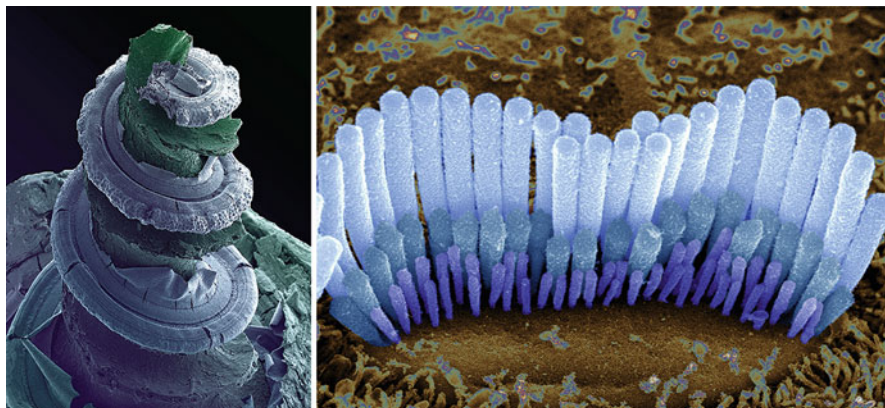


Fig. 11.3 Images used for a SAW project on the theme of 'Sound' (1. Dr. David Furness, Wellcome Images – Cochlea of the inner ear and 2. Dr. David Furness, Wellcome Images – Sensory hair bundle from inner ear)

children's predetermined stereotypes of what scientists, artists and writers should look like. The science activity took place first from approximately 9 a.m. until 10.30 a.m. when the children stopped for their morning break. After break the writing activity began and ran from 10.50 a.m. until the lunch break at 12.15 p.m. The art activity took place over the afternoon session from 1.15 p.m. until 3 p.m. The teacher, scientists, artist and writer are involved in all sessions as a team but the experts from each discipline lead their respective sessions supported by the rest of the team.

Science

We started the science by asking the questions – How do we know sound travels? Can we see it? Does it travel at the same speed everywhere? The images were used to help the discussion along. Then we started the first of three activities – bottle xylophones. The children were taught to tap a glass bottle with a pencil or blow across the opening of the bottle to make a sound. Then water was added to the bottle and the children noticed that the pitch of the sound had changed. Once they were familiar with the concept that the amount of air in the bottle determined the amount of vibration possible and in turn the pitch of the sound, they were challenged to work in teams of 4 and 5 to make a musical scale with 8 bottles per team. The children noticed that when you blow across the top of the bottles, lots of water and a little air gives a high note, whereas a little water and lots of air gives a low note, but when you hit the bottles with a pencil, the reverse is true! Some time was spent playing with the xylophones, trying to play familiar tunes.



Then, we moved on to the second activity which would test the concept that sound is made when something vibrates, causing the air around it to vibrate and we hear it when our ear drum vibrates. Firstly, each child had a plastic cup, a length of string and some masking tape. The children had to stick a length of string in the bottom of the cup so that it hung out of the bottom like the centre of a bell. The children were given small squares of slightly damp cloth and asked to hold the string close to the point of attachment and, whilst holding the cup upside down, slide the cloth tightly down the string. This makes a noise a bit like a chicken clucking! Then, we produced a massive bucket and did the same thing... it created the biggest noise, more like a cow mooing!



Finally, the children were taken outside to play a game called bat and moth. This involves standing in a circle and nominating one child to be the bat and a few children to be moths. The bat is blindfolded and then the moths have to move around the circle constantly saying ‘moth, moth, moth’, and the bat has to try and catch them. The children can take turns playing the different roles so that everyone gets a go at being something and explores the concept of using sound to locate prey instead of sight.

Writing

The writer decided to introduce the children to the ‘word monster’! The monster follows the sound of our heart beat, boom-boom, boom-boom (using image number 4) and lives in this strange place (image numbers 5 and 6) – inside our ears. The monster likes to eat sounds and can gobble up parts of words making them sound different. The children all took turns saying their names and the word monster ate some of the letters of their names; the word monster ate the R, the E and the B of Rebecca’s name transforming it to ‘ecca’! The children really enjoyed this and soon wanted to practise with all sorts of words. They suggested what the word monster might look like and then wrote some poems about it.



The Word Monster
By Thomas Richardson (aged 6)

The word monster

The monster took my name.
I am now called adison.
The monster ran away.
I am not seeing him again.

Madison White (aged 6)

Art

The artist asked the class what happened when they listened to sound. The children said it depended on the sounds they heard. If it was music, they may dance; if it was someone talking, then they would hear information and maybe respond; and if it was the fire alarm, then they would run outside! The artist asked them what they thought it would be like if they could smell, see or even taste a sound. The children found this idea very amusing and offered up lots of suggestions of how different sounds could be perceived by the other senses.

The artist then told them about people who have a condition called synaesthesia, where stimulus of one of the senses triggers the response of another, e.g. on hearing certain sounds or particular notes, a person may experience a visual representation of the sound such as certain colours or even a firework-type display.

There are different types of the condition and as many as 1 in 23 people may be affected. The artist told the children that people throughout history have used the condition as a stimulus to create literary works, music and pieces of art. The children were given black paper, coloured chalks and crayons then the artist played them a selection of sounds and pieces of music and they had to try and interpret the sounds with colour on the paper.

The project on sound shows how a common curriculum science topic can be approached in a cross-disciplinary way to get the children to play with the things they are learning, gain a deeper understanding and see how sound relates to the world they live in and the impact it can have on people's lives. Planning a one-day, one-class SAW project enables different subject lesson planning to be combined into a project-style plan, and inviting visitors to lead the sessions adds an extra dimension. The scientists that worked with the teacher were not sound researchers, but scientists are confident science communicators that are able to bring the concept of the scientific method and thought processes to the classroom to explore all curriculum topics. Equally, teachers that have participated in SAW projects or are introduced to it during teacher training are finding this method of delivering the curriculum to be a useful tool when used independently as an 'in-school' project.

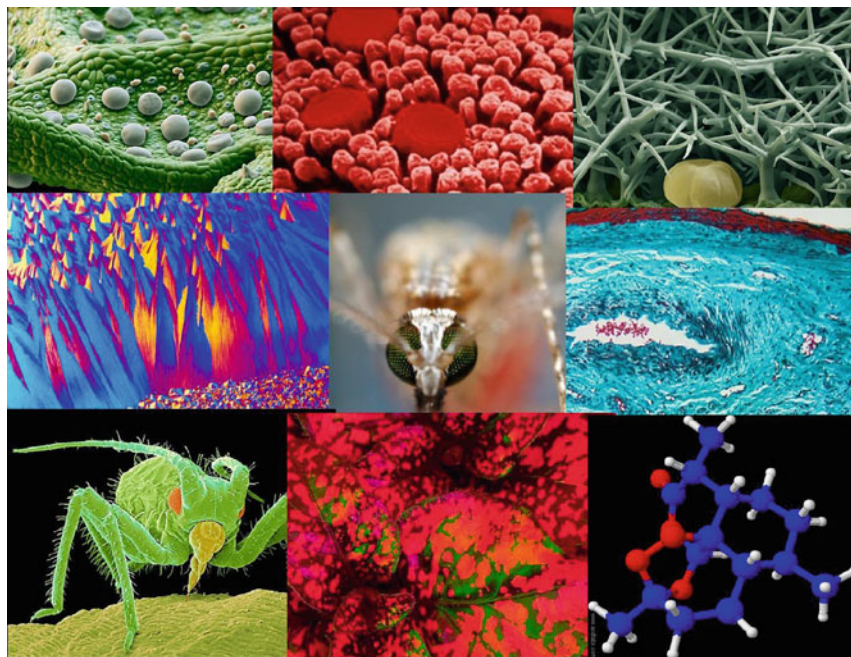
The first example showed how a one-off 'special' topic can be the focus of a SAW project, and the second showed how SAW can be used to explore a science curriculum topic. The final example shows a selection of science research topics that come straight from cutting-edge research labs and demonstrates how even very young children can become engaged in the most abstract of topics!

Example 3: Research Topic Straight from the Lab!

Scientists Sam Mugford and Melissa Dokarry study the synthesis of products made by plants and their functions. Children at Martham Primary School explored chemicals responsible for colours and scents and extracted colour pigments from flowers. Figure 11.4 shows example images, poems and artwork from a case study of this SAW project published in the scientific journal *PLoS Biology* (2008).

The example shown is taken from the book *SAW Showcase* (2009) that celebrates the creative output generated by a set of 15 projects delivered in Norfolk primary schools by scientists from the John Innes Centre and the Institute of Food Research working with local artists and writers.

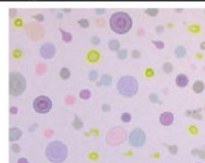
These examples show that even the most abstract and advanced topics can be explored in the classroom with young children in this cross-disciplinary style. The scientist brings in a real-life example of current scientific research that demonstrates the relevance of science and its ongoing need in understanding the world around us. It also shows that scientists don't know the answers to the experiments they are doing and the diverse number of topics being researched.



Spreading colours

Colourful flames, the light looks alive,
 Spreading slowly across the paper.
 Multi-coloured molecules,
 Chemicals mixing together,
 Sparkling in the light,
 Dancing in the alcohol.

Olivia Hesseltine Age 7



Science nose

As I crush the molecules with my fingers
 Cells explode like a bomb.
 Chemicals zoom upwards into my nostrils.
 Strange smells make my brain dance.



Lloyd Sayer Age 8

Fig. 11.4 SAW project on the theme of plant natural products

Dialogue between children and a diverse array of scientists, artists and writers provides a powerful tool for removing preconceived ideas that children may have about people and gives the opportunity to show that we can all participate and be interested in science, art and writing, even if we don't choose them as a career. The link created between the teacher and the SAW practitioners gives a forum for sharing ideas and learning new techniques. From a logistical view, scientists often have access to equipment that isn't available to schools which opens up possibilities of new practical activities in the classroom.

The images are an important anchor for the topic whilst exploring it through different disciplines and their contribution to a high-quality SAW project should

not be underestimated. How and when the images are used should be decided during the planning stages and children should have access to good quality colour prints of the images throughout the day.

Step 5: Sharing the Experience

To get the maximum value from a SAW project, it is important to celebrate the many creative outputs that will have been generated by the children. Schools are very good at sharing achievements, so there is no great detail here except to say that sharing the output can extend the core Science, Art and Writing activities into a wider set of disciplines such as ICT, dance, drama, music and varied styles of writing, so it makes sense to factor in some time for this final step.

Schools may like to consider the following approaches: a special feature on the school website or newsletter; contacting the local press or television to cover the project; a special assembly, play, presentation or poetry reading in school or at a community venue; and the production of a school anthology or an art exhibition.

Concluding Remarks

Since the very first set of SAW projects, it has been clear that this style of cross-disciplinary approach excites children and adults alike. The inclusive nature of learning a central topic using a variety of methods allows everyone to participate in some way and feel an ownership over their contribution to the collaborative activities. As a scientist, artist or writer, it is very rewarding to see others inspired by your work; it motivates, improves confidence and can provide a source of new ideas.

People that have participated in SAW have made the following comments:

“Much of the school curriculum is taught in fragments, which does little to support an informed view of how the world is organised and how we operate within it. I firmly believe that an interdisciplinary approach to learning is key to developing understanding and is best achieved through creative use of knowledge, hence the need for experts and development of imaginative links. SAW can achieve this and is the reason why I promote SAW in lectures and workshops working with student teachers and teachers in school.”

Ann Oliver, Lecturer in Education (PGCE PYM), University of East Anglia

“This work fires the creative process and makes connections between science and the arts in the children’s minds.”

Ken Holbeck, Head Teacher, Rockland St Mary County Primary School

“With respect to educational outcomes, the SAW initiative is in my opinion much more than innovative: it is potentially transformative.”

Arthur J. Stewart, Ph.D., Project Manager, Science Education Programs, Oak Ridge Associated Universities

“I was really surprised by the enthusiasm with which the children involved themselves in the

SAW project – and the results were awe-inspiring. I was impressed at how clever the children were at grasping new concepts and how imaginative with their science-inspired poetry. The best part of all was seeing how much they enjoyed themselves, as did my scientific colleagues and I.”

Dr Kamal Ivory, Research Scientist, Institute of Food Research, Norwich

“SAW participants undertake real hands-on scientific investigation related to striking scientific images. They respond both in their own words and also in artistic production. This helps to embed knowledge but also makes it pleasurable and specifically earned and owned by the students.”

Mike O’Driscoll, SAW lead writer

“SAW week was a fun week because it was a change from the normal lessons, and we also had fun while we learned.”

Hollingworth Primary School pupil

Resources

Suggested websites for image searching:

Science Photo Library – <http://sciencephoto.com/>

SAPS Plant Science Image Database – www.plantscienceimages.org.uk/

Wellcome Images – <http://images.wellcome.ac.uk/>

NASA – www.nasa.gov/multimedia/imagegallery/index.html

The Why Files – <http://whyfiles.org/category/cool-science-images/>

Science Image Online – www.scienceimage.csiro.au/

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Afterword

World Class Initiatives and Practices in Early Education: Moving Forward in a Global Age seeks to present an overview of key directions, set by institutions, professional organisations and nations worldwide that meet the current global needs of young children. The intent of the book is to support a pathway for all children to a meaningful education in a global age, beginning in their early years. The book defines the scope of early education as *Birth to Eight*, which encompasses an international host of categories under the umbrella of early education and care: infant and child care, preschool, nursery school, early years education, kindergarten and primary grades of the elementary school. It offers the reader an analysis of the early childhood education movement as founded on its antecedents from the nineteenth century progressing to present-day twenty-first century models.

The book's chapters discuss issues and innovations in a three-part delivery. Part I provides an introduction to the Universal Preschool Education (UPE) concept as it is evolving globally towards its goal of equal access to educational opportunities for all children, aged 3–5. This section also focuses nationally on two state exemplars that pioneered Universal Preschool Education in the United States, namely, Florida and Tennessee. Florida was one of the earliest states to establish Universal Preschool Education available for all of its young residents. Chapter 3 highlights how the state of Florida continues to improve its statewide programmes. Chapter 2 details the state of Tennessee's efforts in creating voluntary Universal Preschool Education programmes open to families with 3- and 4-year-old children. It is interesting to note that *Mission Readiness*, a non-profit and nonpartisan national security organisation of retired military leaders, cited the state of Tennessee for highly successful volunteer Universal Preschool Education programmes in its recent publication (2013).

Part I compares in the opening chapter the progress of international Universal Preschool Education programmes in other nations by examining Great Britain, Italy, France, Iceland and Finland for time-tested models with unique cultural characteristics and nomenclature of their respective nations. Such countries are likewise noted in the research studies on Universal Preschool Education by the Organisation for Economic Co-operation and Development (OECD). This chapter

also recognises the contributions OECD has made since 1996 to further the cause of Universal Preschool Education among its member nations worldwide through the publications of its Education Directorate.

Part II explores recent early childhood curriculum research initiatives and practices for teaching the Birth to 8 aged children in Chile, China, Wales and England. Part III is focused on community engagement with an examination of how community settings beyond the school and child care centre enhance early childhood education through advocacy, partnership building and institutional support in both the USA and the UK.

This book is a reader-friendly edition of chapters written in a conversational mode. Each chapter attempts to capture its author's unique message and voice. The voices are diverse and therefore presented in many formats. British- and American-based authors use their own spellings to denote the tone and authenticity in their writings. Chinese authors introduce their cultural terminology to the field of early childhood. Likewise, advocates from various professions speak to the responsibility of community engagement for the improvement of early childhood education from their specialised perspectives. Scientists demonstrate how their research projects provide a rich environment for young children to grow in the knowledge of their world. British librarians join with early education institutions to offer literacy programmes that outreach to families and children throughout a nation. University professors from schools of education on both sides of the Atlantic Ocean challenge colleagues to form partnerships for professional involvement with governmental agencies and institutions to improve policymaking and implementation of innovations across the spectrum of the early childhood years.

The book acknowledges that today's children live in a fast-paced changing world which the Canadian sociologist, Marshall McLuhan, described as the 'Global Village'. The readings in this edition represent, in part, that village. The contributing authors respectfully share some ground-breaking strategies, policies and practices that assist educators, families and community members to form joint ventures and guide their young children to move forward in this global age. The authors define the necessary knowledge and skills for interacting successfully in a culturally diverse community that is continuously in flux. Their messages blend their scholarship with their equally important aspirations for helping young children to grow as confident and competent members of a global society. The goal of this book is to bring communities of teachers and families together for educating young children as citizens of the world.

As editor of this book, I would like to thank the series editor, Dr. Mary Jalongo, for encouraging me to pursue this edition for the series, *Educating the Young Child: Advances in Theory and Research, Implications for Practice*. I also appreciate the reviewers for their helpful suggestions to improve our manuscripts. I thank all of the authors who contributed their valuable expertise. I want to particularly mention Dr. Anne Osbourn, Associate Research Director of the John Innes Centre, UK, and the founder of the SAW Trust, who offered her institutional support for our last chapter on her *Science, Art and Writing (SAW)* project. Her multidisciplinary approach to teaching and learning clearly illustrates why the SAW programme resonates with

young children across borders from Great Britain to Italy, Estonia, China and the USA. Finally, I owe a debt of gratitude to my family and colleagues for their continuous moral support.

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About the Editor

Dr. Louise Boyle Swiniarski is a Professor of Education at Salem State University in Massachusetts, where she coordinated the Student Teaching Program in England and currently directs the Northeast Global Education Center with a colleague from the Geography Department. She has been a Visiting Professor at Leeds Metropolitan University in the UK, a Visiting Practitioner at Harvard University Graduate School of Education's Principals' Center, and program coordinator of Early Childhood Education at the graduate and undergraduate levels at Salem State University. Her research projects on comparative early childhood education, the rights of the child, and global education have been presented nationally and internationally at conferences around the globe. Her current educational policy interest is promoting Birth to Eight Early Education programs and professional development of educators for that age group statewide in Massachusetts. She has received an International Research Scholarship from the Government of Finland for International Scholars to Study and Research in Finland. As an author of many publications, she is on the editorial board of the *Early Childhood Education Journal* and previously served on the Publication Committee for the journal *Childhood Education*. Boston College awarded her Ph.D. and B.S. degrees and recognized her as one of the Fifty Faces of its Lynch School of Education.

About the Authors

Dr. Mary-Lou Breitborde is a Professor and former Associate Dean of Education at Salem State University, where she directs the Center for Education and Community. With Dr. Swiniarski she authored two books, *Teaching on Principle and Promise* and *Educating the Global Village*. She writes on culture and learning, social history, and community schools and teaches courses in social and historical foundations of education. She presents her research at statewide meetings as well as national and international professional conferences. Dr. Breitborde has received research awards and fellowships for projects in women's educational history and has been a visiting scholar at the University of North Carolina and Knox College in Illinois. Her Ed.D. degree is from Boston University and her A.B. in Sociology from Wheaton College, Massachusetts.

Dr. Pat Broadhead is Professor Emerita of Playful Learning at Leeds Metropolitan University. She has published widely on the development of children's social and cooperative skills in playful learning contexts and on the associated pedagogies of play. She developed an observational tool called The Social Play Continuum. For 6 years she was Chair of TAYTAC, an organization in the UK that supports professional development for early childhood education practitioners. She has been a teacher as well as a teacher trainer and an advocate with parliamentary representatives on a range of issues relating to young children and their families. She is currently the Early Years Children's Champion for the City of Sheffield in the North of England, a first of its kind voluntary role in the UK. She is also the founding editor for *The International Journal of Play*.

Dr. Avril Brock is a principal lecturer in the Carnegie Faculty at Leeds Metropolitan University. She lectures in the School of Education and Childhood and works with Ph.D., Ed.D., postgraduate, and undergraduate students studying early childhood education. Avril has led the MA Childhood and Early Years course and is at present coordinating the portfolio of master's courses. Avril's Ph.D. longitudinal research elicited early years educators' thinking about their professionalism. The results of her dissertation can be seen in her research article "Building a model of early years

professionalism from practitioners' perspectives" (*Journal of Early Childhood Research*, 2012) and in Brock, A. and Rankin, C.'s (2011) *Professionalism in the early years interdisciplinary team: supporting young children and their families*, published by Continuum. Avril has also written books and journal articles on bilingualism, early language development, and play. She has worked in higher education since 1989 after being a deputy head, primary and early years teacher in West Yorkshire, where she worked with linguistically diverse children and their families. She is at present compiling a *Handbook of Reflective Practice* for early childhood educators. Avril has participated in several Socrates, Comenius, and Erasmus European-funded international projects and is involved in interdisciplinary partnerships with colleagues in West Yorkshire, UK, and throughout the USA.

Dr. Cleti Cervoni is a Professor and Acting Associate Dean of the School of Education, and as a past Chair of the Childhood Education Department at Salem State University, she teaches courses on science methods, qualitative research, and teaching, learning, and assessment. She holds a B.A. (1971) in Biology from Salem State College; M.Ed. (1975) from the University of New Hampshire; a Certificate of Advanced Study, CAS (1998); and an Ed.D. (2004) from Harvard University Graduate School of Education. Dr. Cervoni has a three-pronged research agenda grounded in a focus on science education, gender identity, and equity in education. She studies how gender identity and cultural experiences shape and are shaped by students learning in school. She has presented her research at numerous national and international conferences. Dr. Cervoni is a former high school biology teacher, naturalist, and environmental educator. Dr. Cervoni received a Fulbright Research Fellowship with Cardiff University in Wales UK (2008) and an Earthwatch fellowship for study of bird life in the Pantanal, Brazil (2004). An award-winning teacher, she was named to the Massachusetts Science Teacher Hall of Fame in 1997. Dr. Cervoni has published guides to schoolyard and backyard science and edited teaching resources on studying endangered species and vernal pools in Massachusetts.

Dr. Alisa S. Ghazvini has a Ph.D. in Child Development and currently works as an early childhood consultant. With over 25 years of experience in the early childhood field, Alisa has operated a preschool program, served on the faculty at Florida State University Department of Family and Child Sciences, held leadership positions in statewide organizations, and has provided policy and program evaluation and development services to numerous state agencies and organizations. Dr. Ghazvini's training and consulting interests include public policy research and development, system and program design and evaluation, early childhood accountability systems, infant and toddler development, family engagement and support, strategic planning, and early childhood leadership. She has served in leadership roles related to the development of Florida's early learning standards, early childhood professional development competencies, quality rating and improvement system proposals, and statewide child screening protocols. In addition, she assisted with the development of child welfare practice protocols, including a chronic neglect protocol. Dr. Ghazvini has authored numerous policy papers and several research articles.

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Dr. Rebecca Isbell is Professor Emerita of Early Childhood Education at East Tennessee State University where she directed the Center of Excellence in Early Childhood Learning and Development. She was also awarded the Distinguished Professor in Teaching citation. She is the author of 12 books including textbooks, teacher resource books, chapters, and articles that relate to Early Childhood Education. Isbell has been involved in the design of some of the state of Tennessee's early childhood programs including Tennessee Early Childhood Training Alliance, articulation agreements with universities and community colleges, and pilot studies of the Voluntary Pre-K program. She has been a presenter throughout the United States and internationally including countries such as Canada, Denmark, Singapore, and China. Her Ed.D. and B.S. degrees are from the University of Tennessee with additional work at University of South Florida.

Dr. Pam Jarvis is a graduate psychologist, social scientist, and educational researcher, with many years of experience in creating and teaching child development, social science, and social policy modules for Early Years Professional Training in community, further education, and higher education programs throughout the UK. She has taught in schools within her specialist subject areas of psychology, sociology, and history. She is currently working as a Senior Lecturer in the McMillan School of Teaching, Health and Care of Bradford College and as an Open University tutor for early education and child development students at the undergraduate and master's levels. She is also an active researcher and has recently finished a piece of historical research on the life and work of the early years practice pioneer, Margaret McMillan. She was awarded a Ph.D. by Leeds Metropolitan University in 2005 for her thesis entitled, "The Role of Rough and Tumble Play in Children's Social and Gender Role Development in the Early Years of Primary School." She is known internationally for her many publications on play.

Dr. Bing Liu is Professor and Associate Dean of the Institute of Medicine and Nursing at Hubei University of Medicine, China. Dr. Liu's research focuses on health services, health administration, and medical education. He conducted studies investigating the relationship between the quality of community health services and the residents' satisfaction. He also examined the effects of implementing evidence-based nursing practices in rural and urban areas of China.

Dr. Michelle Pierce is a Professor and Chairperson of the Adolescence and Leadership Department in the School of Education at Salem State University in Massachusetts, where she teaches courses on multicultural education, adolescent literacy, and reading and language. She received her Bachelor of Arts degree from Wellesley College, her Master of Arts in Teaching degree from the University of Pittsburgh, and her doctorate in literacy, language, and cultural studies from Boston University. A former foreign language and English as a Second Language (ESL) teacher, Dr. Pierce is now a frequent presenter at national conferences on research topics related to reading instruction, the literacy development of English language learners, and teacher education and professional development. Fluent in French and Spanish, she was a Fulbright Scholar in Arica, Chile, in the spring of 2009.

Carolynn Rankin worked for 20 years in special and academic library and information services before moving into professional education as a Senior Lecturer in the Faculty of Health and Social Sciences at Leeds Metropolitan University. She is a Member of the Chartered Institute of Library and Information Professionals (CILIP) and a Fellow of the Higher Education Academy. Professional activities include Deputy Chair of the CILIP Library and Information Research Group and External Examiner for the CILIP Qualifications Board. She is currently a Visiting Fellow at Leeds Metropolitan University. Carolynn's research interests are interdisciplinary, exploring the connections between civil society and social justice and access to literacy and learning via libraries. She has undertaken research on the social impact of the National Year of Reading in the UK and is currently evaluating the development of the *Sister Libraries* program of the International Federation of Library Associations. Carolynn has coauthored and edited many books and professional articles. She has also presented her work throughout Great Britain and internationally at professional conferences.

Dr. Jenni Rant first became involved with Science, Art and Writing (SAW) project in 2005 while studying for a Ph.D. in Plant Pathology at the John Innes Centre in the UK. Working with SAW as a practicing scientist offered her an exciting and novel platform to communicate her research to school children while at the same time providing her opportunities to gain many professional development skills by collaborating with other professionals from diverse disciplines. Over the following 7 years, Jenni gained experience designing and delivering SAW projects in schools on a wide variety of scientific topics. Likewise, she tested the scope of the SAW process for engaging diverse scientific concepts and exploring creative arts. After completing a postdoctoral research project in 2011, Jenni took a full-time position with the SAW Trust to develop training workshops and packages tailored to the

needs of higher education institutes, schools, and businesses. Her goal is to enable more researchers, teachers, and children to benefit from participating in SAW projects both nationally and internationally. She is currently the Project Manager of the SAW Trust.

Dr. Yaoying Xu is an Associate Professor in the Department of Special Education and Disability Policy at Virginia Commonwealth University (VCU). She teaches graduate courses including assessment, instructional programming, and multicultural perspectives in education as well as doctoral courses that focus on research design, funding, conducting research in special education, and global education. Dr. Xu's research interests involve culturally and linguistically appropriate assessment and instruction for young children and students with diverse backgrounds, impact of social interactions on school performance, and empowering culturally diverse families of young children and students with disabilities in the process of assessment and intervention. Dr. Xu publishes extensively in professional journals and book chapters. She has received numerous awards for her scholarship and leadership, including the VCU School of Education Distinguished Scholarship Award, the Presidential Research Incentive Program Award at VCU, and the Charles P. Ruch Award for Excellence in Teaching from VCU School of Education, to name a few.