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Building the Workforce Our Youngest Children Deserve

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Abstract

Adults who provide early care and education are critical for the healthy development and well-being of young children. Although many people in the early childhood care and education (ECCE) workforce are skilled and dedicated, their ability to provide high quality experiences for children is hampered by a lack of shared purpose and identity, insufficient or ineffective training, poor compensation and lack of institutional supports. In this report, we build on *The Early Childhood Care and Education Workforce: Challenges and Opportunities* (2012), a report of a workshop held by the Institute of Medicine and the National Research Council with the goals of defining and describing the ECCE workforce, exploring workforce characteristics that affect children's development, and considering ways to build ECCE as a profession. One major theme in our discussion is the need for integration of the two policy streams represented by the terms "early education" and "child care." Both settings provide experiences that affect child development. Both can function well when the personnel are well-trained, sensitive, and skilled, and work in supportive conditions. One feature of an integrated ECCE system is a unifying definition of the profession, a goal that could be promoted by revision of the federal occupational definitions and fostering federal and state collaborations around data. Policies to promote integration also include developing common goals, administrative systems, quality standards, and professional development activities. Quality ECCE hinges on building an effective workforce through professional development that promotes the use of effective and evidence-based practices. Improved working conditions would include adequate compensation and opportunities for advancement and recognition. We identify two broad policy goals for public agencies at all levels of government and professional organizations within the field: using current funding streams to promote quality and building public will through communicating the importance of policies and programs that enhance early childhood development.

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From the Editors

Early in my career, I tried to use “daycare” and “child care” interchangeably so as to be inclusive. Now I cringe at the first word. Isn’t it interesting how the terminology we use for the work of caring for and educating young children can be so loaded with meaning? Even among those who work in the profession, there are clear status differences between the job names, as well as between those who teach preschoolers or infants and toddlers. In this issue of *Social Policy Report*, Holly Rhodes and Aletha Huston summarize what we know about the 2 million or so people who comprise the early childhood care and education (ECCE) workforce. Having led the recent Institute of Medicine and National Research Council workshop on the ECCE workforce, these two authors are deeply familiar with the many issues that impede or could promote the more effective development of the ECCE workforce, the human capital that we count on every day to help our young children be safe and happy, while developing the skills to be successful in school and life.

Many barriers exist in the system of ECCE professional development (many call it a “non-system”): inadequate job definitions in federal workforce databases, separate funding streams for different types of programs, low wages, high turnover, limited evidence of effectiveness of teacher education and training, to name only a few. However, improvement opportunities exist as well: Quality Rating and Improvement Systems in many states that recognize higher quality (albeit at the center, not teacher, level), career ladders in a number of states that support and reward increased skills and education, subsidy programs that are allowed to use some portion of funds for incentivizing improved performance, and Race to the Top—Early Learning Challenge funds for some states to integrate and align their ECCE policies and agencies. Using lessons from the health care field, Rhodes and Huston examine the strength of ECCE as a profession. The clear nomenclature of the nursing field is a potential model and one that the Senate subcommittee considering reauthorization of Child Care Development Block Grant has also considered.

The commentaries in this issue provide distinct points of view. Pianta focuses on the new research about how to best teach the teachers. Haggard comments on the challenges for a state agency to continually modify its professional development system in line with the latest research and/or legislative demands. Both Pianta and Haggard note that new accountability demands on ECCE may present opportunities for inching the profession forward. Russell’s commentary contrasts the expectations, status, and pay that many European countries have for early childhood teachers with those of the U.S. Her commentary made me wonder how two quite contrary points of view can be held in our country—the perception of many people that ECCE work requires few specific skills and can be done by anyone is contrary to the steadily growing recognition by the public that the early years are important for brain development and learning. Until the majority of policymakers not only *believe* the latter point of view, but are willing to *act on it*, ECCE will remain seriously underfunded.

While waiting for the public will to catch up with the needs of children and families, Rhodes and Huston identify policy goals and research directions that will strengthen the ECCE workforce. All three commentators note a striking sense of urgency in our need to do what is necessary to improve the effectiveness and status of the profession. As Will Rogers said, “Even if you are on the right track, you’ll get run over if you just sit there.”

— Donna Bryant (Issue Editor)
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Building the Workforce Our Youngest Children Deserve

The last 50 years have witnessed a shift in young children's lives. By the age of 5, most children have spent a significant amount of time in the care of adults other than their parents (Federal Interagency Forum on Child and Family Statistics, 2011). Because experiences in the first few years of life build the foundation for good health, intellectual development, and social competence, the more than two million people who provide early care and education play a central role in children's development, probably second only to the family. Although many members of the early childhood care and education (ECCE) workforce are dedicated and skilled, large numbers of them are poorly trained and badly paid. One result is highly variable quality of care, with much of it being "mediocre" (Phillips & Lowenstein, 2011).

In March, 2011, the Institute of Medicine and the National Research Council Board on Children, Youth, and Families held a workshop on "The Early Childhood Care and Education Workforce." Its purposes were to define and describe the ECCE workforce, to explore characteristics of the ECCE workforce that affect children's development, and to describe the context that shapes the workforce and how to build the profession of early childhood care and education (IOM & NRC, 2012). The workshop led to a report summarizing the presentations and discussions, *The Early Childhood Care and Education Workforce: Challenges and Opportunities* (2012).¹ The present report is informed by the results of this workshop.

High-quality care and education matter. Not only can well-designed, sensitive care promote children's development, but also care that gives little attention to children's developmental needs can be detrimental (Peisner-Feinberg et al., 2001; Phillips & Lowenstein, 2011; Pianta, Barnett, Burchinal, & Thornburg, 2009). High-

quality experiences are especially important for children from low-income backgrounds, who fall behind their more affluent peers in cognitive and language development and social skills as early as 2 years of age, and who demonstrate the greatest gains from high-quality early education (Halle et al., 2009; Magnuson & Shager, 2010). Despite the potential advantages for them, children from low-income backgrounds have less access to high-quality early learning than do those from more affluent families (Magnuson & Waldfogel, 2005). As the number of children in poverty continues to grow, improving the quality of early care and education across the spectrum is increasingly urgent (Federal Interagency Forum on Child and Family Statistics, 2011). Further, the learning gaps associated with income inequality not only start before first grade, but have increased over the past 40 years (Reardon, 2011), making it even more critical to address early development.

Although many features of ECCE are important, teachers' sensitive and stimulating interactions with young children and their ability to offer developmentally informed children's activities are essential ingredients in a high-quality experience. Observational studies indicate a gap between these desirable evidence-based practices and the day-to-day practices of many caregivers and teachers (NICHD Early Child Care Research Network, 2006; Pianta & Hamre, 2009). Because the ECCE workforce is so critical and yet so unevenly equipped to promote children's development, it is important to the field to describe its members accurately and identify the qualities, skills, and supports that enable them to do their work effectively.

In this paper, we begin with a description of the ECCE landscape and currently available data about the workforce. Next, using data and discussions from the

¹As with all National Academies' workshops, the resulting report did not present conclusions or recommendations, which only accompany its consensus reports. The responsibility for the content of this article rests with the authors and does not necessarily represent the views of the Institute of Medicine, National Research Council or its committees.

workshop, as well as additional literature, we discuss three themes that we submit are important for moving the field forward. First, the early childhood care and education workforce is central to the quality of experiences provided to children and the potential for ECCE settings to promote positive child development; second, incorporating child care and early childhood education into a single integrated system has benefits for the workforce as well as the children and families whom they serve; third, professional development and institutional supports are needed to foster a strong ECCE profession and high-quality ECCE. Finally, we offer our conclusions and ideas about policy options.

The Current Early Childhood Care and Education Landscape

The terms “child care” (or “daycare”) and “early childhood education” suggest a dichotomy that is inconsistent with current thinking and reality. Historically, child care was intended to promote parental employment and early childhood education was designed to facilitate child development, but in practice, this distinction is artificial. Many child care settings are designed to promote learning and development, and many early education programs enable parents to work. Moreover, children learn from all of their experiences. Poor quality settings can teach negative lessons just as high-quality programs can teach positive lessons. For all of these reasons, the field has moved toward defining all such experiences for young children with such inclusive terms as “early learning” and “early childhood care and education” (ECCE).

The Adults Who Provide ECCE

The range of settings, funding streams, and regulatory structures in which adults in the field are employed has resulted in separate silos of workforce information. Members of the workforce are not easily categorized into occupational categories in federal labor systems, a topic we address in greater detail in a later section. As a consequence, it has proven far easier to define and describe workers in specific sectors of ECCE than it has been to define and describe ECCE as a whole. Here, we begin with an attempt to describe the workforce across sec-

tors using available data. Later, we address the rationale for and approaches to improving the cohesiveness of the ECCE profession as well as ways to improve data systems that provide a comprehensive picture of the workforce.

For the IOM/NRC ECCE workshop, Maroto and Brandon (2012) compiled a description of the current ECCE workforce across sectors. They used existing federal data to the extent possible, and conducted a review of approximately 50 studies with national and state level workforce data. These sources included nationally representative studies, such as the Child Care Workforce Estimates Study (Brandon, Stutman, & Maroto 2011); federal data from the National Households Education Survey (NHES), Current Population Survey (CPS), American Community Survey (ACS), and the American Time Use Survey; as well as Head Start data from the Head Start Impact Study and the Family and Child Experiences Survey (FACES). Workforce data from the National Pre-kindergarten Study, NICHD Study of Early Child Care and Youth Development, and other large, multi-state studies were reviewed and included as well. Finally, the authors reviewed single-state data.²

This compilation of descriptive data highlights several challenges in providing a cross-sector picture of the workforce. Data systems are generally maintained separately by program (e.g., Head Start and state pre-kindergarten programs) or are imperfectly aggregated by labor category or industry in federal data systems. Some federal data systems do not distinguish preschool teachers from kindergarten teachers or others serving school-age children. Despite the imperfect state of available data, describing the ECCE workforce writ large is an important first step in understanding these individuals as part of an integrated system.

A previous analysis estimating the size of the paid ECCE workforce (Brandon et al., 2011) was summarized in the Brandon and Maroto (2012) paper. This analysis employed a demand-based model, using data from the 2005 NHES Early Childhood Supplement and concluding that the ECCE workforce is composed of 2.2 million people who constitute a significant portion (31%) of the total U.S. teaching workforce at all age levels (i.e., all who work in educational settings ranging from those

²The complete summary and bibliography of reviewed studies is included in an appendix of the workshop report (IOM & NRC, 2012). Tables of data used in the analyses may be accessed at <http://www.iom.edu/Reports/2011/The-Early-Childhood-Care-and-Education-Workforce-Challenges-and-Opportunities.aspx>

serving infants and toddlers through college-level settings). Approximately half of these individuals (51%) work in center-based settings and one-fourth (27%) are paid relatives. The remaining fourth are split almost evenly between nonrelatives in family child care settings (12%) and individuals working in the child's home (11%).

Maroto and Brandon (2012) also found that Bureau of Labor Statistics (BLS) arrives at a different total of 1.8 million paid employees in child care and preschool. Of these, 1.3 million are wage and salary earners with the remaining 431,000 self-employed. Of the wage and salary earners, approximately 247,000 work in private homes, 631,000 are child care workers working outside of homes, and 390,000 are preschool teachers. Of the 631,000 child care workers working in out-of-home settings, 253,000 work in child care centers, with the remaining 378,000 distributed across a wide variety of settings, such as residential care facilities or social assistance industries. Only 15% of preschool teachers are described as working in private or public schools, with more than 66% in social assistance establishments, which may be how many Head Start teachers are classified, although it is not possible to determine this using BLS data sources.

Although these data sources provide an initial view into the distribution of the workforce across settings, they also show the inherent deficiencies in existing categories for occupations and work settings. In particular, some workers classified as child care workers are caring for school-aged children. Also, unlike the demand-based method, which relied on information reported at the household level, the federal system does not reliably identify paid family, friends and neighbors who provide child care.

The Maroto and Brandon (2012) cross-sector analysis found that ECCE workers are nearly all women (97%) and have a median age ranging from 35 to 43. Approximately half are married and slightly more than two-thirds have children at home. The majority are white, non-Hispanic women. African-American, non-Hispanic workers comprise between 9% and 18% of the workforce across sectors, with the fewest working in family child care settings. Hispanic/Latina workers comprise a greater percentage of family child care workers, ranging between 36% and 40%.

The variability across individuals and work settings is particularly evident in their qualifications. Maroto and Brandon (2012) compiled data regarding the qualifications of preschool teachers from the Multi-State Study of Pre-Kindergarten (MSSPK), the Statewide Early Education Programs Survey (SWEEP), and Head Start FACES. These

data indicate a wide range of educational attainment. Across these studies, between 28% and 73% possessed a bachelor's degree or higher. The authors note that using data on state prekindergarten programs is likely to lead to overestimation of the number of preschool teachers with degrees, given how state requirements for these programs may differ from other types of preschool programming. Far fewer child care workers and even fewer family child care providers possess these qualifications. Recent data from the CPS and ACS indicate that between 13% and 21% of child care workers have a bachelor's degree or higher. Only between 9% and 12% of family child care workers had these qualifications (Maroto & Brandon, 2012).

Overall, descriptive data from federal systems and research indicate that the ECCE workforce is highly diverse and that some characteristics, particularly educational attainment and qualifications, vary by sector, with child care workers having lower educational attainment and less early childhood education-specific education, such as an associate's or bachelor's degree in early childhood education or a Child Development Associate credential (Maroto & Brandon, 2012). These differences pose conceptual as well as practical challenges. Conceptually, members of the field grapple with defining ECCE as a profession given the broad range of individuals and arrangements that must be accommodated. Practically, they face the challenge of holding the field accountable for ensuring that all members of this heterogeneous workforce possess the necessary skills and knowledge to provide the level of quality needed to promote children's development (Goffin & Washington, 2007). Yet, meeting these challenges is critical, given the strong evidence that the adults providing ECCE are central to its quality and to its potential for promoting children's development.

Adults Providing ECCE Are Central to Quality

Relations of Quality to Child Development

The quality of children's ECCE experiences matters for long-term intellectual development, socio-emotional well-being, and health (McLoyd, Aikins, & Burton, 2006). High-quality care includes close teacher-child relationships, frequent sensitive interactions between the child and the teacher, well-designed instruction, respectful and effective behavior management, and a rich physical environment (Burchinal, 2011; NRC, 2001). Both longitudinal naturalistic studies and experimental tests of interven-

tions have demonstrated that high-quality ECCE experiences are consistently related to cognitive and social development for children in general and are particularly important for children from low-income families (Barnett, 2011a; Burchinal, 2011).

Experimental studies have shown that the effects of well-planned interventions are not limited to short-term gains, but also last into adulthood (Campbell & Ramey, 1995; Karoly, Kilburn, & Cannon, 2005; Schweinhart, Barnes, & Weikart, 1993). Although impacts on test scores tend to fade out with age, both small demonstration interventions and large-scale programs have produced long-term impacts on adult functioning (Karoly, 2011a). Lasting effects are not limited to small, university-based programs. In one recent study, children who attended Head Start scored significantly higher than their siblings who did not attend on an index of adult functioning that included high school graduation, college attendance, “idleness,” crime, teen parenthood, and health status (Deming, 2009).

Economic analyses of high-quality early education consistently show that it is an excellent public investment, at least for economically-disadvantaged children. In an analysis of 20 interventions involving home visiting/parent education and/or early childhood education, 19 had positive benefit:cost ratios for children or their parents (Karoly et al., 2005). Long-term positive benefit:cost ratios were documented for all but one program that followed participants into adulthood (Karoly, 2011b). Further, data from model programs show that the earlier in life that these programs begin, the greater the return on investment (Heckman, 2008). The nation has a long history of public investments in education for older children; investments in early childhood have a parallel purpose of offering opportunity across the economic spectrum.

Recent research has carried the discussion beyond the simple association of quality with cognitive and social development. A review of several large-scale studies suggests a threshold of quality: below a medium level, variations made little difference for children’s intellec-

tual development, but variation within the higher ranges of quality predicted children’s cognitive performance (Burchinal, Vandergrift, Pianta, & Mashburn, 2010; Zaslow et al., 2010). That is, there was little difference between low and middling quality, but as it increased from medium to high, children’s performance improved. Many policymakers hope to identify “just good enough” quality on an assumption of diminishing returns with increases beyond a certain level, but these findings suggest the opposite—that raising quality beyond a medium level has considerable benefits. Although the evidence is strong for the importance of teacher-child interactions, it is less clear what adult characteristics are most important for generating those interactions.

Adult Characteristics that Contribute to Quality

Professionals in the field continue to debate the importance of a bachelor’s degree as a qualification for the ECCE workforce. Earlier studies supported the value of a BA as an indicator of teacher quality (Burchinal et al., 2000; Helburn, 1995; Whitebook, Howes, & Phillips, 1990), but experts disagree about its current useful-

ness as a yardstick for important skills (Barnett, 2011b; Burchinal, 2011). In a meta-analysis of seven large-scale studies, only 5 of 27 comparisons showed statistically significant effects on quality or child development favoring the possession of a BA; four showed a benefit for possession of any degree; and two showed a benefit for teacher certification (Burchinal, 2011; Early et al., 2007; Whitebook

& Ryan, 2011). But, in randomized trials of intervention programs and other rigorous evaluations, effective programs, such as publicly-funded prekindergarten programs in Oklahoma and New Jersey, included well-educated teachers (BA or higher) as part of a constellation of characteristics (Barnett, 2011b), suggesting that the degree may be an important component in combination with other features.

A growing body of research shows that particular teacher practices and behaviors may be more closely tied to child development and later achievement than wheth-

Experimental studies have shown that the effects of well-planned interventions are not limited to short-term gains, but also last into adulthood ...

er teachers have particular degree qualifications (Pianta & Hamre, 2009; Zaslow et al., 2010). For example, observed instructional quality in prekindergarten classrooms predicts children’s cognitive and language performance, and teachers’ positive emotional and interpersonal interactions with children predict social skills. Observed behavior predicts better than teacher degree qualifications (Mashburn et al., 2008). This body of research has informed recent efforts to improve linkages between the evidence base and strategies for professional development at both the pre-service and in-service levels, topics we address in a later section.

Members of the ECCE workforce also have widely varying attitudes, beliefs, and experience, all of which matter to the quality of care and education that young children experience. The NICHD Study of Early Child Care and Youth Development (NICHD Early Child Care Research Network, 2005) contains extensive information about caregivers’ education and training, beliefs, and experience along with observations of settings for children from 6 months

to 4.5 years of age. Although caregivers’ formal education and professionalism were related to the quality of care they provided, non-authoritarian beliefs about child rearing were the most consistent correlate of positive, supportive interactions with children in the classroom. Non-authoritarian beliefs include the ideas that children should be given opportunities to take part in decisions, that adults should explain the reasons for rules rather than merely demanding unquestioning obedience, that children are not inherently unruly, and that children have a right to disagree with adults. These beliefs characterize better educated caregivers, and partly account for the higher quality they provide. By contrast, caregivers’ ages, years of experience, and levels of depression showed little relation to observed quality of care (Huston, 2011).

Both the workforce and the child populations they serve are ethnically diverse, raising questions about whether different teacher characteristics matter for children from different ethnic or income backgrounds. For example, many people have suggested that families and children might be better served by caregivers of their own ethnic background, who may share language and cultural practic-

es. To date, there is no evidence that a “match” between child and caregiver ethnicity is critical for children’s development; caregiver sensitivity and cognitive stimulation are important regardless of ethnicity (Frede, 2011). A growing body of research is suggesting the importance of addressing the needs of children whose home language is not English (Garcia & Frede, 2010).

Work Contexts that May Affect Quality

Teacher and caregiver beliefs, attitudes, and qualifications are central to quality care, but teachers work in conditions that may either support their use of professional knowledge or impede their efforts to provide quality care. For example, infant and toddler settings

with high numbers of children per adult and large groups have lower levels of sensitive, responsive care than those with lower ratios of children to adults and smaller groups, regardless of teachers’ qualifications (NICHD Early Child Care Research Network, 1996; 2000). Highly successful preschool programs

not only have well-educated teachers, but also offer adequate compensation, strong curricula, professional development, small classes and reasonable ratios, strong supervision, mentoring and review, high standards and continuous improvement (Barnett, 2011b).

Inadequate compensation and stressful working conditions can pose major threats to the creation of a workforce who can provide quality care. Women working in early child care (other than preschool/prekindergarten) earn 31% less than women with similar qualifications in other occupations. The average hourly wages for preschool teachers and child care workers are shown in Table 1. Average annual salaries are approximately \$31,000 for preschool and kindergarten teachers, \$21,000 for assistant teachers, \$18,000 for other child care workers, and \$14,000 for family child care providers. There are few career ladders or opportunities for advancement. The field is full of anecdotes about young people who love working with children, but eventually leave the profession because they can no longer afford to live on poverty-level wages.

Providing care and education to young children can be rewarding work, but also can be demanding and

Table 1. Hourly Wages and Annual Turnover

Occupation	Mean Hourly Wage	Turnover Rate
Registered nurses	\$31.99	5 %
K-8 teachers	\$30.60	10%
Social workers	\$24.26	10%
Preschool teachers	\$13.20	15%
Home health aides/nurses aides	\$10.39	18%
Child care workers	\$10.07	29%
Food counter workers	\$9.13	42%

Source: Whitebook, 2011; Based on U. S. Depart. of Labor, Bureau of Labor Statistics, 2009

stressful, especially when teachers must deal with children's behavior problems. A recent national study demonstrated that seven in every thousand children in preschool programs had been expelled because teachers could not deal with their behavior problems (Gilliam, 2005). Demanding work at low wages makes it difficult to attract and retain a well-qualified workforce. One consequence is high turnover (Table 1), which has many negative consequences for settings and for children. These problems are especially serious in infant care because babies need continuity of caregivers as they are forming initial patterns of secure attachment (Whitebook, 2011).

In summary, although high-quality early care and education is a well-established means of promoting the intellectual and social development of young children and is cost-effective for the larger society, much of the existing care, especially for children from low-income families, is low- to moderate-quality, not reaching the thresholds needed to promote child development (Phillips & Lowenstein, 2011). Personnel qualifications vary widely, and the circumstances in which they work often pose barriers impeding their performance. One source of the variability in qualification and barriers to performance is a fragmented "non-system" of ECCE that has emerged with little organized planning and few guiding policy principles. We turn now to describing two major policy streams or "silos" of ECCE, considering how they might be integrated to build a better-qualified and better-compensated workforce and a system of institutional supports that offer high-quality education and care to young children.

Integration of Early Childhood Education and Child Care

Current ECCE programs in the United States emerged from two major policy streams with different historical origins, different goals, and different funding sources (Phillips & Lowenstein, 2011).

The Early Education Policy Stream

One of these policy streams, typically called something like "early childhood education," grew out of the War on Poverty during the Johnson administration in the mid-1960s, which generated a number of intervention programs targeting children of families living in poverty. Head Start was intended to give children from disadvantaged backgrounds the early experiences needed to foster success when they entered formal schooling. "Sesame Street," launched in 1967 with federal funds, had a

similar goal (Huston & Wright, 1997). At the same time, model intervention programs intended to ameliorate the effects of poverty and improve cognitive and social development—for example, the Perry Preschool Program and the Abecedarian Program—were initiated with strong random-assignment experimental research designs to evaluate their effects (Campbell & Ramey, 1995; Schweinhart et al., 1993).

With the growing recognition that the disadvantages associated with poverty begin well before age 3 or 4, Early Head Start (EHS) was introduced in the mid-1990s to provide services to families with infants and toddlers. It was conceived as a two-generation program designed to enhance children's health and development, support family and community partnerships, and deliver services to pregnant women and new parents. Program services are a mix of home-based intervention and center-based education for infants and toddlers. EHS currently serves about 90,000 children (Administration for Children & Families, 2010).

State prekindergarten programs, initiated in the early 1990s to prepare children for formal schooling, now exist in 40 states. Although most restrict eligibility to children at risk of low achievement (e.g., from families with low incomes, limited English proficiency, or children with special needs), a few states offer universal prekindergarten to all four-year-old children (Barnett et al., 2011). Some of these programs have demonstrated impressive results measured by classroom quality and child performance in kindergarten (Gormley, Gayer, Phillips, & Dawson, 2005; Gormley, Phillips, Newmark, Welti, & Adelstein, 2011; Wong, Cook, Barnett, & Jung, 2008). Many of them provide qualified teachers with pay and benefits on par with the elementary school teachers as well as a menu of program supports associated with evidence-based high-quality education.

Head Start and most state prekindergarten programs continue to serve low-income 3- and 4-year-olds for similar purposes based on evidence supporting their positive effects on school readiness and their cost-effectiveness (Karoly et al., 2005). About 38% of the nation's 4-year-olds and 11% of 3-year-olds are enrolled in Head Start and prekindergarten programs (Barnett et al., 2011).

Early intervention for children with disabilities is still another important part of the ECCE landscape with the goal of promoting the development of vulnerable children. Children identified as eligible for special education services under Part B of the Individuals with Disabilities Education Act (preschoolers) or Part C (infants

and toddlers), may be served in a range of settings. For infants and toddlers, these settings include their home, community-based settings, or other settings. Children ages 3 to 5 may be served in a range of settings along a continuum of inclusiveness with typically developing children. Eligible children receive special education services paid for with public funding as part of the state's requirement to provide children with a free and appropriate public education. Special educators and therapists may work as classroom teachers or in partnership with them. According to the most recent report to Congress (U.S. Department of Education, 2011), most infants and toddlers (85.5%) in the Part C program receive early intervention services in their homes. As of 2006, 304,510 (2.4% of the general population) infants and toddlers received services under IDEA Part C, and 714,384 (5.8% of the general population) of 3- to 5-year olds received services under IDEA Part B.

Private preschools occur in many settings, ranging from free-standing centers to churches or work settings. They may be for-profit or not-for-profit, and may or may not be exempt from licensing or other regulations. These settings operate on varying schedules, generally set their own standards for staff, develop their own programming, and are typically funded by parent fees and other private sources.

Head Start, state prekindergarten programs, and services to children with disabilities share several important features that affect the workforce and the quality of education offered. First, their principal objectives are promotion of child health and development through direct services to children and through broader supports to families with young children. They are judged by the quality of the services provided and sometimes by improvements in children's language and cognitive performance and/or social adjustment.

Second, all are publicly funded and offered without cost to families. Head Start is federally funded through grants to local organizations to provide educational, health, nutritional, and family services to low-income families and their preschoolers. These programs are housed in public schools or other facilities, and must meet federally mandated standards and performance measures including standards for teacher education and training. State prekindergarten programs are funded primarily by state and local governments. Most are offered through public schools, but some states have mixed delivery systems that include public schools, private preschools, and child care centers (e.g., Georgia).

Both the funding sources and institutional structures for these programs have direct impacts on workforce qualifications, standards of performance, and the environments in which teachers work. Federal funding often carries requirements for qualifications and credentials. In the reauthorization of Head Start (Improving Head Start for School Readiness Act of 2007), for example, provisions were included to require higher qualifications for the Head Start teaching workforce, alignment of Head Start school readiness goals with state early learning standards, state-level advisory councils in every state, and increased program monitoring that also includes reviews of financial records and child outcomes. By 2013, half of the lead teachers in Head Start are required to have a BA degree, and in 2011 the Obama administration announced that new Head Start contracts will be based partly on observed quality of teacher-child interactions in the classroom. Improved training and mentoring will be offered to assist centers with meeting the new standards (White House Office of the Press Secretary, November 2011).

When programs are part of the public school system, both educational requirements for teachers and compensation are determined by criteria that are similar to those for K-12 teachers. For state-funded prekindergarten in both public schools and other venues, requirements for teacher qualifications and other standards vary across states, with 27% of state programs requiring teachers to have a BA degree, 45% requiring specialized training in prekindergarten education, and 44% requiring at least 15 hours a year of in-service training. Almost half of the states monitor the implementation of comprehensive early learning standards (Barnett et al., 2011).

The Child Care Policy Stream

A second policy stream, typically called "child care," arose from the increases in women's employment and the introduction of work requirements for parents receiving welfare. Its primary purpose has been to facilitate employment by parents (usually mothers) at all income levels (Phillips & Lowenstein, 2011). As the demand for accessible and affordable child care has grown, a loosely-knit and highly-variable hodge-podge of care settings and care providers has emerged. Unlike the early education policy stream, there was no umbrella public policy planning system guiding the creation and funding of child care settings; in fact, even efforts to establish voluntary quality guidelines encountered political resistance. Instead, families use any care they

elect in a minimally regulated system that encourages a wide range of options.

Child care settings fall into three broad categories: center-based, family childcare, and in-home care (nannies) (Vandell, 2004). Because our concern in this paper is the workforce, we focus on the settings in which individuals are paid to provide care and education. We include the large number of friends, family and neighbors who are paid, while acknowledging that many relatives and others provide care without cost. (In the U.S., an estimated 3.3 million people provide unpaid nonparental care, IOM & NRC, 2012.)

Child care centers are group settings of varying sizes that are typically operated in schools, churches, and free-standing buildings that are sometimes designed for the purpose. Family child care homes provide care for one or more children in the caregiver's home; and in-home caregivers care for children in their own homes. Although all three types of care can be full-day and year-round, both centers and child care homes typically operate during daytime hours (e.g., 7 AM to 6 PM) on weekdays. Many caregivers in each type of care are nonrelatives, but they may also be relatives of the child.

Compared to family child care homes and to care in the child's own home, center-based child care generally has larger group sizes, higher child:adult ratios, and more educated and better-trained providers. Family child care homes have larger group sizes and higher child:adult ratios than do in-home caregiving settings (Dowsett, Huston, Imes, & Gennetian, 2008; Vandell, 2004). Based on observational studies, centers are more developmentally stimulating than either child care homes or in-home care for 4-year-olds, and children attending them have higher cognitive and language competencies (Vandell, 2004). By contrast, centers and child care homes attended by infants and toddlers have lower observed quality than do in-home settings (Dowsett et al., 2008; NICHD Early Child Care Research Network, 1996; 2000). Preschool children (age 3 and older) are more apt to be in center care than are infants and toddlers (Phillips & Lowenstein, 2011).

The child care policy landscape differs from the early education policy stream in three important respects. First, the principal purpose of child care is to facilitate parental employment. Although many organizations and individuals in centers and home-based care have developmental goals, curricula, and offer high quality, the policy motivation for these services is providing care for children while parents work.

Second, child care is funded primarily by parent fees, with some contributions by employers, churches, and other institutions that may provide space, utilities, and/or janitorial services. Most child care centers and child care homes are not-for-profit or for-profit entities as contrasted with early education programs in public institutions. The major sources of public fund-

ing for child care are tax credits in the income tax system and subsidies in the form of vouchers to parents. Tax credits are nonrefundable, and therefore are of use only to individuals earning enough to owe taxes. Parents can receive a maximum credit of \$1050 per year for one child or \$2100 for two or more children. They can be used for any provider who files a tax return declaring the income.

Federal funds to subsidize care for children of low-income working parents are provided through Child Care and Development Block Grants (CCDBG) in the form of vouchers that may be used for any provider. These sources of public funding have few if any requirements for quality or caregiver qualifications. This "parent choice" approach partly reflects the lack of agreement about what competencies are essential for practitioners, and, combined with minimal regulation, presents a significant barrier to achieving collective competence

among providers. The CCDBG program does require that states use at least 4% of their CCDBG grants for quality improvement (e.g., mentoring or training), but these funds can be expended in many ways, including basic inspections of facilities.

The CCDBG grants are administered by the states, which are allowed some latitude to set eligibility criteria, time periods of eligibility, the amounts that parents

Although many organizations and individuals in centers and home-based care have developmental goals, curricula, and offer high quality, the policy motivation for these services is providing care for children while parents work.

must pay (“co-pays”), and reimbursement rates. Federal rules allow eligibility for parents with incomes up to 85% of the state median income, but many states set lower levels and yet still have waiting lists. Although federal rules allow subsidy rates to reach the 75th percentile of local market rates, which are supposed to be determined by a market survey, reimbursement rates in all but three states are below market levels (National Association of Child Care Research and Referral Agencies, NACCRRRA, 2011c; Tavernise, 2011). The result is an economic squeeze for child care providers who accept subsidized children, leading many to refuse or limit the number they serve and leaving them little income with which to pay more than minimal wages to their employees. Only one in six eligible children actually receives subsidized care (NACCRRRA, 2011b).

Finally, regulations and standards for quality in child care are determined at the state level, with some local control. As a rule, policy makers regulate professions when the risk to consumers is high and avoid regulating when the perceived risk is low (Dower, O’Neil, & Hough, 2001; Dower, 2011). Most states have regulations for child care centers and child care homes that are designed to assure basic safety and prevent injury (e.g., absence of health hazards, sanitation and cleanliness), but many settings are exempt from even these minimal requirements. National studies indicate that basic safety continues to be an issue, particularly in home based child care serving infants and toddlers (Phillips & Lowenstein, 2011).

States have widely variable standards and levels of implementation for teacher and caregiver qualifications and training, group sizes, and child:adult ratios. No state requires child care center teachers to have a BA, and many of them require only minimal amounts of pre-service or in-service training. The maximum number of infants allowed per adult ranges from 3 to 12 (NACCRRRA, 2011a; Phillips & Lowenstein, 2011). Although all states now have a set of early learning standards, only about half of them monitor implementation in child care settings (NACCRRRA, 2011a). Child care homes are subject to even less regulation. Most states have minimal requirements for health and safety as well as child:adult ratios, but impose no requirements for caregiver qualifications. Similarly, there are virtually no public regulations or requirements of individuals who provide care in children’s own homes.

An Integrated System of Early Care and Education

Because of the fragmented nature of ECCE and its history in two distinct policy streams, some have labeled it a “non-system” (Kagan, Kauerz, & Tarrant, 2008). ECCE personnel work in settings that range from carefully planned and executed programs to those that are not subject to even minimal requirements. Programs vary by primary purpose (i.e., education versus enabling parents to work), hours (i.e., part-time versus full-time), and settings (e.g., homes, centers, schools). Their funding may be public or private; they may be not-for-profit or for-profit; and they are subject to varying degrees of regulation and oversight. Yet, the same issues of producing experiences that promote children’s well-being exist regardless of the venue or its label. The challenge for the field lies in marrying the two purposes of access to affordable care while parents work and providing children in all settings with experiences that support and encourage their development. Central to that marriage is a well-trained workforce in a system that enables them to use their skills well.

The last several years have seen the beginnings of an integrated ECCE system. Phillips and Lowenstein (2011) note that the nation has “the semblance of a delivery system for low-income four-year-olds” (p. 485) with supports for very modest numbers of children younger than 4. Some states have instituted early education programs and funding mechanisms that span Head Start, prekindergarten and child care centers. One notable success is the U.S. military early care and education program, which has achieved dramatic results raising qualifications and quality, such that 97% of their programs are accredited by the National Association for the Education of Young Children (NAEYC) in comparison to 8% of programs nationwide (Phillips & Lowenstein, 2011; Russell, 2011). This is a “closed system” allowing for more control and monitoring than is the case in other venues.

A major barrier to these efforts at integration is the lack of a clearly defined set of professions and occupations in the ECCE field. Labels for people who work in this field include “teacher,” “child care worker,” “daycare provider,” and “babysitter,” among many others. Defining the workforce or profession is a critical first step toward building a coherent system of ECCE.

Building Institutional Supports for a Strong Profession

Building and strengthening ECCE as a cohesive profession (as opposed to a group of low-skilled, easily replaceable

workers) is a way to approach long-standing problems in ECCE. Maintaining separate systems for “care” and “education” is one barrier to ensuring the quality of children’s experiences and interactions across setting or program type. An effective system of professional development is needed to build needed the skills and knowledge for all who work with young children (National Council for Accreditation of Teacher Education, 2010; Ochshorn, 2011); however, we suggest, as others have previously, that focusing solely on professional development strategies to produce a competent workforce is not sufficient for sustainable, replicable, and widespread quality across ECCE. Instead, a broader systems approach is needed (Austin, Whitebook, Connors, & Darrah, 2011; Kagan et al., 2008; Ochshorn, 2011). A well-functioning profession that attracts and retains its workforce includes mechanisms for career advancement, reliable processes and standards for education, training and induction, recognition of the value of the work through monetary and other means, and an established process for adapting to changing knowledge and circumstances (Dower et al., 2001).

We draw upon the lessons from the health care field, and particularly from a model developed by Dower and her colleagues (2001) and presented at the IOM/NRC workshop. As illustrated above, this model provides a rationale and a set of guiding questions to examine the strength of emerging health care professions along five dimensions. We use elements of the model as a framework to examine ECCE as a profession, focusing on defining and describing the profession, building an effective system of professional development (a term that combines Dower’s “education and training”), fostering institutional support through systems of recognition for the workforce, and building the ability of the profession to adapt to change—its proactive practices and viability.

Profiling a Profession: A Model from Health Care

- **Definition/Description of the Profession**—the definition and description of the aims and services provided by the profession, and of the size and characteristics of the workforce
- **Safety and Efficacy**—safety concerns the evidence for potential risk of harm; efficacy concerns the evidence of the effectiveness of the services provided
- **Education and Training**—a description of what it takes to become a member of the profession and how the profession ensures the competence of its members; includes both practitioners and researchers
- **Governmental and Private Sector Recognition**—outside recognition of members of the profession by those who seek or pay for services and those who regulate the profession; includes licensure and credentialing
- **Proactive Practice Model and Viability of the Profession**—the “ability of a profession to understand and adapt to change is an indication of its viability. A profession’s role in leading positive change is an indication of its strength.”

Source: Dower, O’Neil, & Hough, 2001

Defining and Describing the Profession

According to Walter Gilliam, “A profession has an identifiable body of knowledge and skills, but it’s also an identifiable body of knowledge and skills that most people value and most people feel they themselves do not possess” (p. 79-80, IOM & NRC, 2012). A profession includes those who possess a defined set of requisite knowledge and skills, and excludes those who lack them. In our view, professional identity for ECCE is particularly hampered by

the final element of Gilliam’s definition. The low status afforded to ECCE work seems to reflect a belief that little separates ECCE caregivers from babysitters and parents, who generally care for children without any special training, particularly in settings that are not designed with an educational focus.

The most successful professions reach consensus about the services they do and do not provide, articulate areas of overlap with other professions, and describe the profession’s own distinctive attributes (Dower et al., 2001). Including child care and early childhood education in a single, unified profession is hampered by the lack of agreement about shared purpose and identity (Goffin & Washington, 2007). Even determining a name is challenging. “Early childhood care and education” is inclusive, but has not helped to settle the field’s defining intent. Confusion exists even among caregivers themselves, particularly those serving infants and toddlers, who are less likely to consider themselves part of a profession than are those serving preschoolers (Peterson & Valk, 2010). With a low level of professional identity come turnover and job dissatisfaction, which in turn have been linked with stress, burnout, and lowered interest in professional development (Peterson & Valk, 2010). Having a mission-oriented organizational vehicle through which to develop consensus has proven critical in other professions, particularly in providing conceptual leadership (Goffin, 2009; Kagan & Neuman, 2003). Further, a clear articulation of

purpose and value is a key element in building public understanding of the importance of the workforce and its work (Gormley, 2011).

Presenters at the ECCE workforce workshop undertook the task of developing a conceptual definition of ECCE with the goals of making its boundaries clear and easily understood within and outside of the field, ensuring comparability with existing federal data systems, and capturing its unique qualities (IOM & NRC, 2012). The model proposed is shown in Figure 1, which includes the occupation, the sector, and the enterprise. The proposed definition of the occupation is paid work that involves direct care and education of infants and children from birth through age 5. The sector includes the occupation as well as those who work for establishments that provide direct services

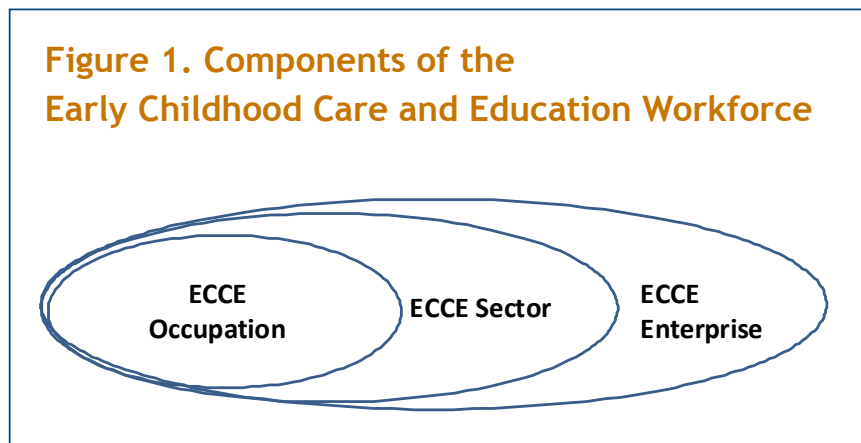
to children (e.g., administrators, cooks). The enterprise includes the sector, as well as those “whose paid work has a direct effect on caregiving or educational practice” (e.g., faculty who train ECCE providers, licensing officials) (IOM & NRC, 2012, p. 2-4). Conceptually, this definition is a move away from viewing ECCE as either custodial care or education to one that reflects the growing consensus that separating the two perpetuates a false dichotomy.

Philosophical and practical challenges to adopting such a framework include how to consider those who work indirectly with children through parents and teachers in home visiting and consultative roles, those who are part of other professional communities (e.g., speech therapists), as well as those who might feel excluded from the shared mission if they do not fit the occupational definition (IOM & NRC, 2012).

Once conceptual boundaries are set, professions should be able to describe their members. Access to timely and accurate data on its members makes it possible to understand and communicate about a profession’s size, demographics, and growth trends, as well as its capacity and capabilities to meet the needs of the popula-

tion served (Dower et al., 2001). In ECCE, data are available to describe portions of the workforce largely along programmatic or state boundaries, though some collaborative work is beginning (Kipnis & Whitebook, 2011). Head Start has long collected detailed information about its programs, teachers, and children both through ongoing reporting requirements, as well as through periodic evaluations and descriptive studies. Similarly, the early childhood special education programs funded through the Office of Special Education and Rehabilitative Services at the U.S. Department of Education maintains its own data systems (U.S. Department of Education, 2011a). Although separate programmatic funding streams and differing degrees of regulation serve to reinforce separate sources of data about the workforce, promising efforts to coordinate

and/or integrate data across the ECCE workforce are underway. For example, although systems are nearly all voluntary, states are implementing workforce registries that can be useful for providing essential, and currently unavailable, data on the workforce. The National Registry Alliance and others are continuing



Source: Brandon, 2011

to work on the development of common constructs and ways of measuring outcomes in professional development on a national level (National Registry Alliance, 2009).

Key sources of data about the workforce come from federal agencies, including the Bureau of Labor Statistics and the Census Bureau. Their data are critical for both defining and describing the workforce because they are the primary source for workforce information across all sectors of the U.S. economy. The Standard Occupational Classification Manual (U.S. Office of Management and Budget, 2010) provides detailed coding descriptions to be used for “all occupations in which work is performed for pay or profit” consistently across agencies. As such, its occupational categories communicate information to a wide audience about the nature of the work and of the workforce. For ECCE, the most relevant occupational categories and descriptions are “Preschool Teachers, Except Special Education” and

“Childcare Workers,” as shown in the sidebar.

A second system, the North American Industry Classification System (NAICS), is used at the federal level for classifying businesses by type of service. Industries currently captured in the system relevant for ECCE are: (1) Elementary and secondary schools; (2) Child Day Care Services; and (3) Private households.

These federal definitions are inadequate, primarily because they maintain the artificial dichotomy of education and child care, which does not reflect the reality of the work or the overlap in roles. In addition, the information collected lacks sufficient detail to identify members of the ECCE workforce who work in various settings, or to clearly separate individuals working with preschool children from those caring for older children (IOM & NRC, 2012).

Professional Development

Goffin and Washington (2007) describe some of the consequences of confusion about professional identity as lack of collective competence and dependability. Lack of collective competence refers to the gap between the evidence base around effective practices and its consistent use in the field. Without collective competence, the efficacy of practitioners (and hence the quality of the care and education they provide) is unreliable. In other words, professions must identify exactly who needs particular competencies, then determine how best to produce those outcomes (National Professional Development Center on Inclusion, 2008).

The health care model leads to considering how well systems of education and training prepare individuals to obtain licensure and certification, recognizing the reality of multiple pathways, programs, and career tracks. It calls for professions to examine how well the providers of education and training are prepared for their roles. Ultimately, professional training and education programs are to be aligned with the standards of the profession, which correspond to systems of recognition.

Standard Occupational Classification Codes Related to ECCE

Preschool Teachers, Except Special Education (code: 25-2011)
Instruct preschool children in activities designed to promote social, physical, and intellectual growth needed for primary school in preschool, day care center, or other child development facility. Substitute teachers are included in “Teachers and Instructors, All Other” (25-3099). May be required to hold state certification. Excludes “Childcare Workers” (39-9011) and “Special Education Teachers” (25-2050).

Childcare Workers (code 39-9011)
Attend to children at schools, businesses, private households, and childcare institutions. Perform a variety of tasks, such as dressing, feeding, bathing, and overseeing play. Excludes “Preschool Teachers, Except Special Education” (25-2011) and “Teacher Assistants” (25-9041).

A key aspect of this analysis is determining if and how the profession ensures that education and training programs adequately and consistently prepare individuals to deliver high-quality services.

In ECCE, the term professional development is used to encompass both in-service and pre-service education. The National Professional Development Center on Inclusion (NPDCI) (Buisse, Winton, & Rous, 2009; NPDCI, 2008) has developed the following definition:

Professional development is facilitated teaching and learning experiences that are transactional and designed to support the acquisition of professional knowledge, skills, and dispositions as well as the application of this knowledge in practice. The key components of professional development include: (a) the characteristics and contexts of the learners (i.e., the “who” of professional development, including the characteristics of and contexts of the learners and the children and families they serve); (b) content (i.e., the “what” of professional development; what professionals should know and be able to do; generally defined by professional competencies, standards, and credentials); and (c) pedagogy (i.e., the “how” of professional development; the approaches, models, or methods used to transfer professional knowledge and support its application in practice) (NPDCI, 2008, p. 3)

The reality of the ECCE workforce and settings presents significant challenges to creating systems that reliably prepare individuals for work with young children. First, the current levels of training and preparation of individuals in the workforce range across the spectrum from no training to advanced degrees. Second, education and training are needed both for those preparing for careers in ECCE and those already working in the field. Third, typical 2- and 4-year teacher preparation programs are not structured to meet the needs of non-traditional students

who have limited finances and face family and logistical constraints that make participation in higher education difficult if not impossible (Zaslow et al., 2010). A substantial portion of the workforce may need basic adult education around language, literacy, and math (Zaslow et al., 2010). Finally, the current system does not consistently reward those who further their education; compensation is typically tied to the sector or funding stream rather than to individual qualifications (Austin et al., 2011; LeMoine, 2008). Some localities address compensation by offering salary supplements to workers who improve their educational credentials and/or scholarships to enable ECCE workers to receive added education (Russell, 2011). This system is substantially different from the public K-12 education system where teachers must meet minimum degree and certification requirements to teach in classrooms, must participate in regular professional development, and receive compensation in accordance with their qualifications and experience (Whitebook et al., 2009).

Even when ECCE workers pursue professional development, the quality and effectiveness of the training they receive are variable. One reason is the fragmented and uncoordinated nature of the professional development carried out by various entities (Winton, McCollum, & Catlett, 2008). Existing credentials, including the BA, represent a wide range of educational experiences, many of which lack important content, especially about young children's development, as well as limited practice opportunities. Many current programs are overly focused on general knowledge and induction, rather than offering practical experience with evidence-based practices (NCATE, 2010; Winton, 2011). In one study of 450 teacher preparation programs in higher education offering early childhood education degrees, fewer than half had received recognition for quality from NAEYC and the National Council for the Accreditation of Teacher Education (Hyson, Tomlinson & Morris, 2009). Another larger study of teacher preparation programs highlighted the difficulties that 2- and 4-year institutions face in meeting the demands for highly qualified teachers, particularly given the challenges students face in balancing work, life and school and poor job prospects (Maxwell, Lim & Early, 2006). These programs often do not offer sufficient depth of preparation to work with very young children. In particular, only 49% of bachelors' degree programs preparing students to work with young children required even one course in the education and care of infants and toddlers. Little is known about the content, providers, and methods of in-service training that many caregivers and teachers receive (IOM & NRC, 2012).

Teacher qualifications could be defined by the knowledge and skills that good caregivers and teachers need to provide quality education and care (Barnett, 2011b; Burchinal, 2011; Pianta et al., 2009). While the research about degrees is equivocal, at present, they are poor proxies for the specific competencies that teachers should demonstrate (Pianta & Hamre, 2009). Increasingly, experimental evaluations indicate that training on specific skills or curricula can have important impacts on quality, child development, and success in later schooling (Fukink & Lont, 2007; Pianta et al., 2009). The skills that teachers and caregivers ought to demonstrate are likely to differ depending on the ages and developmental needs of children and on the settings under consideration.

Even with important evidence emerging about effective professional development, far too little rigorous research testing the process (versus the content) of such programs exists (IOM & NRC, 2012; Winton, 2011; Zaslow et al., 2010), making it difficult to answer the questions posed in the health care model about the adequacy of education and training for ECCE. Existing research offers some information about the features that characterize effective professional development: (a) clearly articulated objectives and methods that are aligned with desired practices; (b) an explicit focus on evidence-based practices and linking knowledge to practice; (c) collective participation of all teachers by classroom or program to foster collaboration and shared-problem-solving; (d) a format, intensity and duration matched to the complexity of the content; (e) inclusion of training on child assessment and interpretation to help guide self-evaluation and monitor the effectiveness of the professional development; (f) methods for identifying teacher/caregiver proficiency for specific practices; and (g) tailoring to fit the organization and learning standards for children (IOM & NRC, 2012; Ochshorn, 2011; Zaslow et al., 2010).

Professional development for ECCE appears to be most successful when it is part of an array of supportive factors (e.g., increased compensation, administrative support, appropriate class size). Strategies include coursework; on-site support through mentoring, coaching, and technical assistance; and video with modeling and feedback (Zaslow et al., 2010). The wide range of needs of the workforce means that professional development does not fit one mold, and must take into account the logistical hurdles that teachers and caregivers face (Winton, 2011). Designing professional development in coordination with practitioners is one approach to address these needs (Buysse, Sparkman & Wesley, 2003; Diamond & Powell, 2011).

Systems of Recognition

Government and private sector recognition offers benefits to the members of a profession as well as to the public (Dower, 2011). Certification, licensure and other forms of credentialing for both individuals and settings are the tangible signs of demonstrated competence, ideally based on assessments of knowledge and skills. In the health care field, such credentials offer consumers protection from unqualified practitioners and are also used as a source of information for consumers seeking particular expertise. Some of these forms of recognition are mandatory for practice, while others allow professionals to indicate that they possess more specialized or higher levels of expertise. Such credentials are recognizable by employers and directly relate to career ladders, providing a structure for promotion and compensation.

Professional organizations have a unique role in building consensus around criteria for professional competence, as well as in raising public awareness of the importance of workforce quality. The National Association for the Education of Young Children (NAEYC), which describes itself as “the leading membership association for those working with and on behalf of children from birth through age 8,” offers accreditation to qualifying ECCE programs, but does not have a comparable set of credentials for individuals. It and other national organizations, for example, NACCRRRA, Zero To Three, and the Division for Early Childhood of the Council for Exceptional Children, address ECCE workforce issues, but one survey found that many members of the workforce do not belong to a professional organization or subscribe to a professional journal (Raikes et al., 2006).

Many states have established Quality Rating and Improvement Systems (QRIS) that specify quality standards for practitioners as well as programs, but also include accountability, outreach, financial incentives, and dissemination of information to parents (Austin et al., 2011). The ratings allow programs to progress up a series of steps denoting increased quality, often tied to increased reimbursement rates for subsidized children. These QRIS and other professional standards overlap and vary, are largely voluntary, and are not consistently applied to all sectors of ECCE (Winton, 2011).

Individual licensure, certification, and/or other credentials are not required to practice in most ECCE settings (LeMoine, 2008), and most state and professional organization systems of recognition are focused at the program level. Efforts to address the recognition of

educational attainment and professional qualifications in ECCE have included establishing linkages between career ladders, wages and benefits, funding state prekindergarten programs on wage scales equal to those at the K-12 level, and developing programs that offer individual salary supplements, financial assistance with insurance, and/or individual scholarships that link educational attainment to subsequent wages (IOM & NRC, 2012). In other professions and in K-12 education, compensation is tied to particular levels of educational attainment and credentials awarded by states or professional organizations (Goffin, 2009; Whitebook et al., 2009). Some have suggested exploring the example of other similar fields, such as nursing, by developing a system for national certification for ECCE personnel based on agreed upon core competencies (Winton, 2011). Such a system would provide a means for public recognition of expertise and demonstrated skill.

A major barrier to regulating teacher qualifications and overall quality is the trade-off between quality and the number of children who can be served (Bryant, 2011). Raising the “floor” of ECCE across the board increases its cost and raises issues of reduced capacity. Some argue for using market-based solutions to increase awareness and demand for high quality and for using policy to encourage these choices (Blau, 2011). One reason for such an approach would be to avoid the unintended consequences that sometimes result from regulation, such as pushing families to find cheaper, unlicensed care or raising class sizes to cover wages (Blau, 2001; 2011). Others argue that regulation and/or public funding are necessary to decouple parent payment from teacher compensation and to develop and compensate a skilled workforce and reduce the risk of harm to young children that currently exists in a system with prevalent poor quality (Phillips & Lowenstein, 2011; Pianta et al., 2009; Whitebook et al., 2009).

Proactive Practice and Viability

A profession’s ability to “understand and adapt to change is an indication of its viability” (IOM & NRC, 2012, p. 5). Having sufficient information upon which to base decisions, sufficient resources and freedom for innovation, and a strong leadership infrastructure that can push for needed changes are essential to a viable profession. Having practice guidelines, interprofessional teams, and professional and advocacy groups promotes proactive practice and innovation. It is also important to examine client satisfaction and accessibility of services (Dower et al., 2001).

Developing mechanisms for reaching consensus, reducing “fiefdoms,” and continuing to build leadership

infrastructure are key tasks that map onto current efforts of professional organizations and others in the ECCE field to promote innovative thinking and respond to changing conditions. For example, integration across sectors is a key priority in the Race to the Top—Early Learning Challenge Grants, which “will support States that demonstrate their commitment to integrating and aligning resources and policies across all of the State agencies that administer public funds related to early learning and development” (U.S. Department of Education, 2011b).

Policy Directions

Challenges

The current state of ECCE in the United States presents some formidable barriers to achieving the goal of a well-qualified workforce who provide high-quality care for young children. The lack of integration across the various facets of ECCE is a major impediment to creating more effective policies than those currently in place. We have discussed at some length the two policy streams with different purposes, administrative structures, funding sources, requirements for personnel qualifications, learning standards, and program quality. This fragmentation is reflected in the definitions of the profession and the forms of training and recognition that are currently in place.

A second major barrier is serious underfunding for most forms of ECCE. With the exception of some large publicly funded programs that are mainly focused on 4-year-olds from low-income families, most ECCE relies heavily on parent fees. Although programs often struggle financially, the costs to parents are high. For example, the average annual cost of full-time center care for an infant in 2010 ranged from \$4,650 in Mississippi to \$18,200 in District of Columbia, with slightly lower costs for 4-year olds. The cost of center-based infant care exceeded 10% of median income for a two-parent family and was higher than college tuition in most states (NACCRRRA, 2011b). Parents’ ability or willingness to pay limits how much the provider receives, which in turn limits the ability to raise the wages of workers. According to an analysis by Blau (2011), market forces are not likely to change this situation because parents will not or cannot pay more for high-quality care than for care provided by untrained, low-skilled workers. At the same time, there is a plentiful supply of unskilled workers ready to accept child care jobs, and the absence of requirements for specific skills keeps costs low.

Policy Options

Government and nongovernmental entities can use several “policy levers” to attain their goals: generating data, providing funds, regulating individual practitioners or programs, creating voluntary standards and guidelines, and disseminating information. Although the federal government exercises many of these policy options, state and local governments have major roles in making and implementing ECCE policies. Nongovernmental professional organizations also contribute to policy through recognizing or certifying individuals or programs and establishing standards.

Integration across silos. Building a strong ECCE system hinges on integration of goals, settings, policy silos, professional definitions, and professional development activities. The Race to the Top—Early Learning Challenge Grants recently awarded to nine states represent an explicit move forward in this regard by providing grants to states that prioritized this integration, including specific efforts toward meeting the needs of the workforce defined broadly as,

“any professional working in an Early Learning and Development Program, including but not limited to center-based and family child care providers; infant and toddler specialists; early intervention specialists and early childhood special educators; home visitors; related services providers; administrators such as directors, supervisors, and other early learning and development leaders; Head Start teachers; Early Head Start teachers; preschool and other teachers; teacher assistants; family service staff; and health coordinators. (U.S. Department of Education, 2011b).”

This broad definition provides an important signal that all of these individuals serve as educators, and the funding to explicitly improve cross-sector ties is an important step in building a more cohesive system.

Other efforts to achieve integration have occurred as states and other public agencies recognize the obvious point that programs for young children are affecting learning and development (positively or negatively) regardless of the program label. A number of states have introduced mixed delivery systems in which state-funded prekindergarten is offered by both public schools and child care centers, and/or is coordinated with Head Start. One consequence is the development of common requirements for programmatic and personnel quality.

Reducing or eliminating administrative silos in the states would facilitate integration. For example, the state of Washington, one of the Early Learning Challenge Grant recipients, has a Department of Early Learning, with responsibility for a wide range of services to young children. Many states administer their CCDBG funds through their workforce or employment units, but these funds can also be administered by departments with responsibility for education. Recent research supports the effectiveness of integrating professional development across sectors in ECCE on a statewide basis (Landry, Swank, Anthony & Assel, 2011). State-level Early Learning Councils represent another move toward integration, but ultimately integrated and coordinated efforts will mean making difficult choices to relinquish some administrative autonomy and share power (Winton, 2011). Given the barriers, integration will not happen quickly or completely, but integrating the definitions and professional development activities of people in the workforce is one major step toward that goal.

Building public awareness. A strong ECCE profession can contribute to building the political will for public and community responsibility for young children’s health and development. One element in the template for a profession is proactive practice—communicating its competence and value to the broader world and advocating for needed changes. Professional groups and public agencies in some states and localities have brought together stakeholders to develop comprehensive plans for early learning and early development that can present a unified set of options to policymakers, private funders, and the public. For example, the Washington State Early Learning Plan is a strategic road map for building the early childhood system in Washington State (Washington State Department of Early Learning, 2010).

Privately funded advocacy groups have also organized planning efforts. For example, the Early Childhood Initiative Foundation in Miami, FL, was “formed to work toward an early childhood education and development initiative in Miami-Dade County,” with the aim of “uni-

versal readiness” — that is, “making available and affordable high quality health, education and nurturing for all of this community’s 160,000 children between birth and age 5” (Early Childhood Educational Initiative website, 2012). Professionals within colleges and universities can contribute to informing the public about the importance of early childhood. The Center on the Developing Child at Harvard aims to catalyze “the implementation of effective, science-based public policies” and prepare “future and current leaders to build and leverage knowledge” (Center on the Developing Child website, 2012).

Professional organizations and nonprofits could do a great deal to build public understanding of the importance of early childhood and to promote public will to support effective programs, but they must speak with one voice. Public support for Head Start and for prekindergarten for example, shows that money can be found when the will to do so is there. One barrier to unity can arise when for-profit and privately run not-for-profit early childhood programs believe that publicly funded programs will compete with them for children. Avoiding this competition is one motivation for mixed delivery systems.

Specific policies. Building an integrated ECCE system and building political will are broad policy goals, but our analysis of the ECCE workforce and workplaces also leads to a number of specific policy ideas. Many of these were mentioned earlier, but we elaborate here. Policies to build an efficacious and high-quality workforce must address the basic issues of compensation and career ladders. Raising subsidy reimbursement rates to market levels is an important step toward allowing providers to receive higher wages and to obtain more training and professional opportunities (NACCRRRA, 2011b). Because most child care jobs include few benefits, health insurance assistance is an important means of improving workers’ overall compensation packages. The new federal health care law may address this issue for most workers, but subsidies may still be required to enable them to pay for required insurance.

One element in the template for a profession is proactive practice—communicating its competence and value to the broader world and advocating for needed changes.

Both federal and state governments can and often do make funding contingent on staff qualifications and program features. Head Start has increasingly moved in this direction, and will take another step when contractors are required to demonstrate effectiveness in order to retain funding. By contrast, CCDBG funding carries almost no contingencies. It might at least require that providers receiving CCDBG funds meet such minimum standards as licensing or certification, training, background checks for employees, and regular inspections for health and safety hazards (NACCRRA, 2011c).

The CCDBG does require states to use at least 4% of the federal grants for quality improvement, but the federal government could increase the percentage requirement and increase monitoring of how these funds are used (NACCRRA, 2011c). States and local governments can add quality requirements. For example, the funds for subsidized child care provided by the City of Austin, Texas must be used in a setting that meets more than minimum quality standards of the state quality rating system. Many states offer the incentive of higher reimbursement rates to centers or child care homes that exceed the minimal licensing requirements, but the differential rates might be increased along with technical assistance to help centers meet quality requirements. Quality Rating Improvement Systems already exist in many states, and they could be used more effectively to publicize and reward improved quality.

Each of these policy solutions requires public funds, a significant barrier in the face of public budget reductions. In fact, the total budgets allocated to prekindergarten in many states declined in the last few years (Barnett et al., 2011). Most of the public funding is limited to families with low incomes, but policies need to address the basic dilemma that most child care funding is provided by parent fees, which constitute a substantial part of family budgets. Ultimately, a strong system of ECCE will require more public funds and probably more private funds (other than parents' fees). Again, achieving this goal will depend partly on generating sufficient political will to make early childhood a priority.

A number of policy options could promote clear definitions of the occupation, which would clarify standards for professional development activities. First, the federal agency occupational categories, preschool teachers and child care workers, perpetuate a distinction that is inconsistent with an integrated definition of the profession. We propose that the work to clarify the aims and definitions of the ECCE profession be taken on in a collaborative ef-

fort of key professional organizations using the definition developed for the workshop as a starting point. This definition of an early childhood care and education professional occupation as *"paid work that involves direct care and education of infants and children from birth through age 5"* provides a basis for continued engagement with those who develop data categories at the federal level. Improving federal definitions is an important policy goal because the federal data systems contribute widely used information for policy purposes. The difficulties encountered by Maroto and Brandon (2012) in collecting descriptive information were in part due to the fact that there is no accurate, agreed-upon, and clear definition of the occupation for data collection purposes.

Related to the issue of integration across sectors, there is a need for improved and integrated data systems that would strengthen the field of ECCE by tracking the workforce in ways that would clarify its role in the economic fabric of a community, state, and nation as well as monitoring progress in attaining policy goals. Good data would enable policymakers to provide feedback to the public about ECCE, to determine the need for regulations (e.g., licensing and certification), and to identify shortages and oversupply of workers. The state of Pennsylvania developed a model system integrating data from all agencies and programs that serve young children—those with responsibility for certification of settings and programs, early intervention services, subsidy services, and early learning services—allowing the state to implement a system of assessment and accountability, to track professional development and to provide technical assistance to programs (Dichter, 2011). Further, combinations of state and federal sources modeled on the K-12 data systems can be used to good effect for descriptive and evaluative purposes (West, 2011).

Finally, public agencies, educational institutions, and professional organizations could take steps to improve professional development at all levels of the ECCE educational spectrum. Education and training programs need to teach students about the developmental needs of very young children and give them the tools to provide early learning experiences that are both emotionally supportive and intellectually stimulating. Teachers in training need both didactic knowledge and more practice in early childhood settings than many programs now offer. Public agencies can offer in-service training and mentoring for individuals working in ECCE settings. Programs that offer salary supplements and/or tuition to ECCE workers who improve their educational credentials could be expanded. Profes-

sional organizations could work across sectors and develop mechanisms for speaking with one voice about national core competencies and recognizing individual professional excellence, as well as the quality of ECCE settings.

Research Directions

Obviously, more information is needed about many of the topics discussed. Here we enumerate a number of areas for future research that participants in the IOM/NRC workshop identified (IOM & NRC, 2012). The first is comprehensive data on the current state of early education and care, including its workforce. The National Survey of Early Care and Education, which is currently in the field, is the first comprehensive survey since the early 1990s and will generate a wealth of valuable information. For example, this large survey will yield data from all types of providers, provide insight into the supply of ECCE and how families identify and use ECCE services, and examine data on providers and families at the local level (NORC, 2012).

Second, systematic investigations of different types of professional development, including random assignment experiments, would provide essential and valuable information to guide education and training programs. Although some small-scale investigations are currently underway, there is need for more systematic knowledge about what methods and content are most effective in education and training programs ranging from formal college and university programs to short-term workshops and presentations of specialized content.

Third, publicly funded programs face increased requirements for evidence of program effectiveness and efficiency that have direct implications for the workforce. ECCE has a strong record of empirical evidence of effectiveness from experimental studies and naturalistic investigations, but the field faces significant new challenges with the creation of Quality Rating Improvement Systems and proposals to evaluate both teachers and programs using indicators of process and child progress. One major issue revolves around developing valid and useful measures of teacher competence program quality, and children's development.³

Fourth, parallel assessments of economic efficiency, including benefit:cost analyses, would inform program development and modification. The ECCE field has been

strengthened by the integration of economic and developmental research that provides policymakers with evidence of short- and long-term benefits. We need such analyses of programs serving today's children to inform policy.

Finally, workforce issues in several populations of settings and children need further study. Current research provides little information about "family, friend, and neighbor" care that takes place outside any system of regulation. Less attention has been given to quality and professional development among people providing early care and education for infants and toddlers than among those working with preschoolers. Promoting optimal development of infants and toddlers may involve different issues of training, professional development, and quality definitions (both structure and process). More information is needed about the qualifications and curriculum offerings that promote development of children for whom English is a second language.

Conclusions

Adults who provide early care and education are critical for the healthy development and well-being of young children. Although many people in the ECCE workforce are skilled and dedicated, their ability to provide high quality experiences for children is hampered by lack of appropriate training, low levels of compensation and lack of institutional supports. People working across sectors in early childhood care and education lack a sense of shared purpose and identity that could strengthen and build a coherent system of early care and education. As a result, many of the youngest and most vulnerable children receive mediocre care with little support for cognitive and social development. Our analyses of the IOM/NRC workshop discussions and current research yield the following conclusions.

Strengthening the profession of early childhood care and education and improving its effectiveness will be advanced by integrating the two policy streams represented by the terms "early education" and "child care." Both settings provide experiences for young children that can affect their growth and development. Both can function well when the personnel are well-trained, sensitive, and skilled and the work conditions enable them to use their skills. One feature of an integrated ECCE system

³As with all National Academies' workshops, the resulting report did not present conclusions or recommendations, which only accompany its consensus reports. The responsibility for the content of this article rests with the authors and does not necessarily represent the views of the Institute of Medicine, National Research Council or its committees.

is a unifying definition of the profession. In other fields, defining the boundaries of an occupation is an important step in building a profession.

Revision of the federal occupational definitions and fostering federal and state collaborations around data are important policy options.

We also conclude that a well-functioning and efficacious profession depends on a skilled workforce and working conditions that support both children and their teachers and caregivers. Quality ECCE hinges on building an effective workforce through professional development that provides necessary knowledge and skills, including use of effective and evidence-based practices. Improved

Revision of the federal occupation definitions and fostering federal and state collaborations around data are important policy options.

working conditions would include adequate compensation and opportunities for advancement and recognition within a well-defined career ladder. The heavy reliance

on parent fees for funding most ECCE limits the funds available, which in turn leads to low wages and high turnover. The public perception that ECCE work requires few specific skills makes it difficult to justify higher costs for quality ECCE. Both public policy and organizations within in the field can address these problems by using current funding streams to promote quality and by building public understanding and support for enhancing early childhood development. ■

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Taking Seriously the Needs and Capacity of the Early Childhood Care and Education Workforce

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In their summary of “The Early Childhood Care and Education Workforce,” Rhodes and Huston provide contemporary data and analysis of the workforce in one of the most important sectors of public investment. The original report is unique for its unrelenting contention that early childhood care and education (ECCE) is utterly dependent on the capacities of the adults working with children. These adults are human capital that is the sector’s leverage for individual and societal success. A national focus on this stunningly diverse set of people—some adolescents, others past retirement; some with Ph.D.s, others recently literate—their preparation, compensation, career paths, and the experiences they require to be successful, could not be more important.

Investment in the features of ECCE and its workforce now travel with accountability. Whether through performance standards that could trigger sanctions (i.e., Head Start reauthorization) or markets that incentivize performance (Quality Rating and Improvement Systems), there is a clear signal that the ECCE workforce must now engage children to foster development and learning. Meanwhile programs, states, and school districts must wrestle

with upgrading training, compensation, and educational levels. Performance-based accountability is a tectonic shift in regulating ECCE—and fundamentally tied to the idea that human capital is quality.

Analysis of ECCE human capital is grim. Low compensation, high attrition, education or training don’t seem to improve competence, and modest returns to child outcomes are the norms. Suggested policy fixes are the usual suspects: investments in compensation and funding, and better/more professional development. Before commenting on these recommendations, ubiquitous in a decade of ECCE reports, I offer an observation that frames the urgency with which they should be considered.

Over the past five years, economic circumstances for families of young children (soon to enter school) portend only higher rates of special education and problem behavior, and larger learning gaps. And school services dwindle as the stimulus package winds down. Now more than ever, ECCE is asked to deliver on its promise of impact—for more children, facing greater challenges, for a longer time. These challenges are not those of two decades ago, when much of the research summarized in

the report was conducted. They are demonstrably greater. Incremental changes in the ECCE workforce are not likely to counterbalance the erosion of supports and increased risks present in the lives of children served by the sector.

Perhaps now is the ECCE workforce Sputnik moment—a time for policies that shape an intentional system of early education—policies that force the integration of structural investments (compensation, training) with what we actually know about fostering competence in the adults who serve children. An unfortunate but plausible consequence of policies that only require teachers to have a degree is that competence and children’s learning will not be enhanced by teachers spending time and money on higher education as we know it. Funding and fostering the redesign of higher education for adults who serve young children can now draw from research on content, skills, and delivery models proven effective in controlled trials. Rather than Piaget and Skinner, courses can focus on the mechanisms of language development in context, or trajectories of early literacy skills and how to teach them. ECCE teachers can be taught about math and supported to teach math competently to young

children. Inputs can be bundled in higher education and job-embedded delivery systems that increase teacher knowledge, skill, and child outcomes and link to compensation,

professionalization, certification, and degrees.

What is described above is feasible and based on a decade or more of solid science. Advancing the

capacity of the ECCE workforce is not limited by a lack of knowledge or effective tools, but by lack of design-thinking and political will. The stakes are high.

Commentary

The Early Childhood Care and Education Workforce from a State Policymaker's Viewpoint

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Understanding the critical importance of quality early childhood care and education experiences for young children has resulted in significant increases in public funding—and corresponding expectations of accountability. In New Mexico, more and more legislators are interested in research regarding the impact of high quality early childhood programs and are increasingly committed to funding. Ten years ago, legislative efforts focused primarily on funding for child care as a social service. Today, child care advocates must work collaboratively with those working to increase funding for home visiting, early intervention, early childhood mental health,

prekindergarten and family support services as an early learning continuum that begins before birth and is aligned with kindergarten and the primary grades.

As a long-time bureaucrat within an agency of state government that is responsible for a broad range of early childhood programs, I have learned that some basic questions must be answered to guide public policy decisions:

Who is the early childhood care and education workforce? States must establish what entities are included in their early childhood system to determine the competencies and levels of competency required for those working in varying roles within those systems. Traditionally, early childhood professional development systems have focused

narrowly on those working with typically developing 3- and 4-year-olds in center-based programs. This must change. As our field grows and develops, we must continually modify professional development systems to prepare qualified individuals to work in myriad roles. For example, we have now recognized early childhood mental/behavioral health services as a significant gap in our early childhood service delivery continuum. Thus we must determine the services that are necessary to fill this gap - and subsequently the competencies and professional recognition system that is most appropriate for individuals providing these services.

What is professional development? Stakeholders in New Mexico tackled this question as we began to establish our professional develop-

ment system. It's not necessary for every state to have the same definition, but it is an essential foundational decision that must be made. The New Mexico definition of professional development, for example, differs from the one established by the National Professional Development Center on Inclusion. In New Mexico, stakeholders define professional development as transcribed coursework that leads to a degree in early childhood education, qualifying an individual for state-issued certification or licensure. Training, on the other hand, is viewed as primarily "system specific" and provided as in-service. Both professional development and training are essential elements of a viable, high-quality early childhood care and education system.

Who is an early childhood professional? Twenty years ago, there was agreement in New Mexico that a professional was anyone who had made a commitment to working with young children—and that these individuals were simply at varying levels within the professional development system. This was an effort at inclusivity and served that purpose at the time. Today, many, if not most, would argue that early childhood practitioners will never achieve professional recognition if we maintain this definition.

We must prepare leaders in our field who will challenge assumptions and tackle public policy issues that confront us today. For example, we must

- Move beyond collaboration and alignment to build an integrated early childhood care and education system that is child- and family-centered.
- Fill gaps in the continuum of services without adding more silos to a system that is already fragmented.
- Determine if categorical funding is an outdated strategy for funding ECCE programs; it may actually subvert the radical system changes that are needed.

If we do not take these steps, we will continue to struggle—and settle for doing the best we can with the way things are now.

Commentary

Important Work Still to Do in ECCE Professional Development

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Early childhood education has received considerable attention, as our nation grapples with failing schools and failing children.

Research on brain development and economic benefits has added to our knowledge about the importance of the early years. Studies have tried to answer what is "good enough" to give young children, particularly those coming from families with high

needs, the "inoculation" they need for future success. And at the heart of that discussion is what do we want and need in our early childhood education and care workforce.

Investing in the education and compensation of the early childhood workforce is investing in the foundation of America. Early childhood teachers parent their own children and act *in loco parentis* for the children in their classrooms for most of their waking hours five days

a week. Their education affects the educational outcomes for children, both in their classrooms and in their own homes. Yet in our discussions of what educational achievements we want for the workforce, we often overlook the compelling body of evidence linking maternal education and children's educational outcomes (Magnuson & McGroder, 2003).

There is no debate in France or Finland about the education or compensation of the early childhood

workforce (Directorate of Education, OECD, 2004; Ravitch, 2012). In those countries teachers must have a bachelor's degree, compete for entrance in and successfully complete the equivalent of a two-year master's degree focused on the pedagogy and practice of teaching young children. They also must participate in substantial, ongoing professional development. In return, preschool teachers are paid well, have good benefits and hold positions of respect within their societies. A basic college degree is not debatable; it is seen as necessary but not sufficient career preparation. And early education is treated as a public good, not left to chance. Their upfront educational and ongoing compensation investments pay off in high quality early childhood experiences for young children and very low turnover rates. In the U.S. a substantial amount of the investments we make in education, ongoing professional development, and onsite technical assistance and coaching is lost as teachers leave their classrooms for higher paying jobs.

Rhodes and Huston encourage both system integration and building public will as necessary for real system transformation. But for now we must look to states and localities for strategies that

1. elevate both the expectations and rewards for early childhood teachers;
2. decouple what parents can afford from the rights and needs of the child for a high quality early education and care experience; and
3. stop investing in poor quality programs.

While we wait on public will to catch up with the needs of our young children, we must ensure that every investment we make, whether it is in Pre-K, Head Start or CCCDBG quality or subsidy dollars, is strategically targeted to workforce professional development, compensation and recognition. For example, raising subsidy reimbursement rates without directly earmarking some of those funds to improve the compensation of the workforce is not sufficient. The hoped for "trickle down" does not always happen. And increased educational expectations of the workforce must be coupled with clearly defined and meaningful compensation incentives.

Finally, we must be bold in our nomenclature that defines the work of early educators. While the desire to be inclusive is understandable, we must raise the bar on what we call and expect from those whose "paid work involves direct care and education" of our young children. The nursing field has set an example for us in its clear nomenclature tied to progressive roles, responsibilities and educational expectations for their profession. Before we ask the Bureau of Labor Statistics to re-examine its titles for our workforce, we must do the necessary work that sets out such a pathway for our teachers of young children, with clear distinctions tied to educational and role expectations.

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Social Policy Report (ISSN 1075-7031) is published four times a year by the Society for Research in Child Development. Its purpose is twofold: (1) to provide policymakers with objective reviews of research findings on topics of current national interest, and (2) to inform the SRCD membership about current policy issues relating to children and about the state of relevant research.

Content

The *Report* provides a forum for scholarly reviews and discussions of developmental research and its implications for policies affecting children. The Society recognizes that few policy issues are noncontroversial, that authors may well have a “point of view,” but the *Report* is not intended to be a vehicle for authors to advocate particular positions on issues. Presentations should be balanced, accurate, and inclusive. The publication nonetheless includes the disclaimer that the views expressed do not necessarily reflect those of the Society or the editors.

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