

Quality Teaching and Learning in Pre-K Classrooms: What It Takes

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Access to affordable preschool programs is a crucial issue for improving kindergarten readiness for 3- to 5-year-olds, but research shows that the quality of teaching and learning in those programs is just as essential. Across the country, states are boosting preschool policy standards and strengthening educational requirements for preschool teachers. California has not been at the forefront of this effort. But newly elected Governor Gavin Newsom is making preschool quality a signature issue of his administration. He, along with the legislature and other policymakers, are calling for more funding, access, and teacher preparation. This brief focuses on their proposals, examples of successful reforms, and ongoing challenges that were discussed at PACE's annual conference in February 2019.

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Introduction

Brain development during the first five years of life lays the foundation for all future learning; for example, neural changes from ages 3 to 5 build the connections necessary for executive functions—planning, organizing, self-regulating, and working memory.¹

In light of this research, many states are boosting preschool policy standards and strengthening educational requirements for preschool teachers. California has not been at the forefront of this effort. California does face more challenges than most states—more children five and younger and more of them living in poverty. California is also incredibly diverse; rich in languages and cultures, and home to the largest population of dual language learners in the nation.

Recent actions at the highest levels of state government indicate that California is at a pivotal moment for improving the quality of preschool programs. In his first state budget plan, Governor Gavin Newsom proposed \$1.8 billion in additional funding for early childhood education (ECE) and called for universal preschool for all low-income 4-year-olds.² The California Commission on Teacher Credentialing (CTC) approved the state's first performance expectations for people seeking a permit to teach in state preschool.³ A state Assembly Blue Ribbon Commission on Early Childhood Education released an 84-page draft of recommendations for ensuring that all children from birth to age five have access to high-quality early care and education programs.⁴ State legislators have introduced more than two dozen bills to, among other things, create an office of early childhood education, increase reimbursement rates to state-funded preschools to help boost salaries, and offer financial incentives for staff to pursue ongoing training.







Child advocates welcome these efforts. But at PACE's annual conference in February 2019, these experts on preschool education and policy noted that reforms are years, billions of dollars, and many challenges away from what is needed. Just defining what quality looks like in preschool is no easy task. It is a set of multifaceted and interconnected elements that create rich learning environments that are nurturing, stimulating, and culturally appropriate. There is also a tangled bureaucracy overseeing funding, licensing, and regulating of the programs and the workforce. In California, at least 17 government agencies within nearly a dozen departments serve about 1.2 million children ages five and younger. The goal of universal preschool is daunting given that enrollment in the state-funded preschool program, which serves 3- and 4-year-olds, is 139,000; barely a quarter of eligible children, according to the 2018 State Preschool Yearbook, compiled by the National Institute for Early Education Research (NIEER).⁵

NIEER has synthesized quality in state-funded preschool programs into ten measures covering health and safety, class size, teacher training and continuing

professional development, and curriculum. California’s state-funded preschool program met six of the ten benchmarks in the most recent nationwide assessment (See Table 1).

In this brief, panel members at the PACE session on “Quality Teaching and Learning in Pre-K Classrooms: What it Takes”— Deborah Stipek, Professor of Education, Stanford Graduate School of Education; Beth Meloy, senior researcher and policy analyst at the Learning Policy Institute; Anna Arambula, coach of the Fresno Language Project in the Fresno Unified School District; Vickie Ramos Harris, associate director of educational equity policy at the Advancement Project California; and moderator Lisa Guernsey, senior advisor to the Early and Elementary Education Policy Program at New America — discuss the policy proposals, examples of successful reforms, and ongoing challenges.

Table 1. California Progress on NIEER Preschool Quality Benchmarks

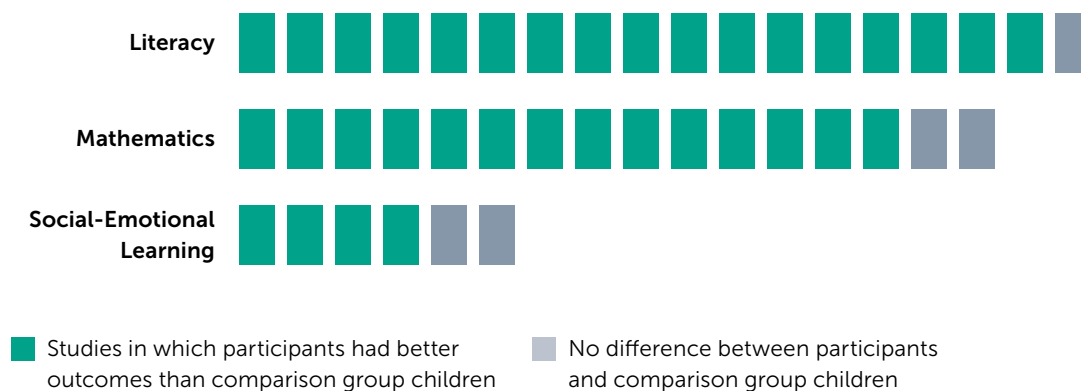
Policy	California State Preschool Program Requirements	NIEER Benchmark	Meets NIEER Benchmark
Early Learning and Development Standards	Comprehensive, aligned, supported, culturally sensitive	Comprehensive, aligned, supported, culturally sensitive	
Curriculum Supports	Approval process and supports	Approval process and supports	
Teacher Degree	24 units of college-level work in ECE, including designated core courses: <ul style="list-style-type: none"> • Child/human growth and development • Child, family and community or child and family relations Programs/curriculum	BA degree	
Teacher Specialized Training	ECE, Child Development Associate Credential (CDA)	Specializing in pre-K	
Assistant Teacher Degree	6 units of college-level work in ECE	CDA or equivalent	
Staff Professional Development	105 hours/5 years	For teachers and assistants: at least 15 hours/year; individual PD plans; coaching	
Maximum Class Size	No limit (3- and 4-year-olds)	20 or lower	
Staff–Child Ratio	1:8 (3- and 4-year-olds)	1:10 or better	
Screening And Referral	Vision, hearing, health and more; support services	Vision, hearing, and health screenings; referral	
Monitoring/Continuous Quality Improvement System	Structured classroom observations; data used for program improvement	Structured classroom observation; program improvement plan	
Total Met			6

The Preschool Bump

Research is clear that children who attend high-quality preschools are better prepared academically, socially, and emotionally for kindergarten than their classmates with no preschool.⁶ As Figure 2 shows, an analysis of 21 evaluations of public preschools by the Learning Policy Institute (LPI) found consistent significant benefits of preschool on children’s early literacy and mathematics skills when they enter kindergarten, a lower rate of children being held back a grade in elementary school, and early identification of children with special needs.⁷

The research does raise questions about inconsistent impacts of preschool on children’s reading and mathematics scores as they move through elementary school. Some programs show enduring effects; others find that the effects disappear over the early elementary grades. This so-called “fade out” of preschool benefits has been a source of much debate in the early care and education field. LPI took a deep dive into those studies and concluded that “just attending preschool is not enough,” said panelist Beth Meloy, co-author of the report. To maintain the benefits of preschool, Meloy said programs must not only be high quality, they must be aligned with what children are taught in elementary school.

Figure 1. Impacts of Preschool at School Entry



Source: *Untangling the Evidence on Preschool Effectiveness: Insight for Policymakers*. Research brief, Learning Policy Institute. January 2019.

Note: Evaluations usually include many measures of childhood outcomes across different domains. Additional domains not included here are described in the full report.

LPI and other organizations and researchers have been focusing much of their work on identifying the components of good preschools, understanding what gets in the way of quality, and profiling programs that work. These four elements are key:

- *Improve alignment between pre-K and elementary school:* Designing seamless curricula from preschool through third grade that include supporting the whole child with developmentally appropriate and culturally and linguistically responsive practice.
- *Strengthen quality standards:* Strengthening standards of practice, including educational requirements for preschool teachers.
- *Increase support for teachers:* Providing professional development and continuing education once teachers are on the job.
- *Provide competitive salaries:* Increasing subsidies to state preschool to pay teachers a living wage.

Alignment: Seamless Curricula From Preschool Through Third Grade

Preschool and K–12 education are bifurcated systems. Funding sources and funding levels, regulations, standards and assessments, and teacher requirements are different. Practitioners in the two sectors often see themselves as having different missions, and curricula typically are not aligned. Research nationally suggests that kindergarten repeats much of what children already learned in pre-K, thus failing to support children’s continued growth after preschool.

There are also few opportunities for preschool and elementary school teachers to communicate and engage in professional development together. Even when preschools are located on elementary school campuses, the pre-K and elementary school teachers may have little contact with each other, and principals who oversee preschools usually don’t have a background in early childhood education leaving them unprepared to guide preschool educators.

Panelist Vickie Ramos Harris with the Advancement Project California, told the story of a principal who visited a prekindergarten class in his district, saw the children playing, and asked the teacher when he should return to observe them learning. “The learning is happening now,” replied the teacher.

Several pilot projects are testing different strategies to foster communication and collaboration between preschool and elementary school teachers and leaders. Fresno Unified School District, for example, addressed the challenge through training institutes on early childhood education for elementary school principals so they can help pre-K and elementary teachers improve continuity of knowledge and skills, language and literacy, mathematics, and social-emotional development across grade levels.⁸

PACE studied initiatives to improve early math education by bringing together pre-K and elementary school teachers at six schools in two California districts. Researchers sorted the schools into three levels of alignment based on how well each district did at

building a continuous curriculum and aligning instructional policy with the curricula (see Table 2).

Table 2. Levels of Alignment for Teacher and School Leader Professional Development

Level	Definition
Tightly Aligned	Consistent and explicit messages about instructional strategies, math content, math knowledge needed for teaching, AND curriculum use (procedural)
Moderately Aligned	Mostly consistent messages about instructional strategies, OR content, OR curriculum use (procedural)
Somewhat Aligned	Emphasis is mostly on curriculum use (procedural) or indirect messages about general instructional strategies absent specific references to content (i.e., instructional leadership advice about how to give feedback to teachers)

Source: *Fostering Pre-K to Elementary Alignment and Continuity in Mathematics in Urban School Districts: Challenges and Possibilities*. PACE, December 2018.

Standards of Practice: Strengthening Educational Requirements for Preschool Teachers

Brain development is “lightning fast” during the first few years of a child’s life, with more than one million new neural connections forming every second, according to researchers at the Center on the Developing Child at Harvard University.⁹ Experiences during this period, good or bad, influence the brain’s circuitry and lay the foundation for a child’s development, including capacity to learn, behavior, and physical and mental health.

These advances in understanding brain development and its impact on young children prompted advocates and policymakers nationwide to rethink educational requirements for preschool teachers. California’s standards are modest compared to other states. Twenty-nine states have at least one state-funded pre-K program that requires the lead teacher to have a BA degree and, of those, 25 also require teaching certification.¹⁰ In California, the most rigorous standards for lead teachers at state-subsidized preschools are 24 units of college-level child development and ECE courses and another 16 college-level units in general education.¹¹

The debate over the number of college courses required or whether teachers need a bachelor’s degree “misses an important point,” said Deborah Stipek of Stanford University. It’s the content that really matters. The college-level courses required in California are mostly foundational classes on child growth and development, child and family relations, and curriculum. They don’t typically prepare anyone to teach or manage a group of children. Stipek said one teacher described the preparation as so lacking that when she walked into her first class, she thought, “Yikes! What do I do?”

College students earning a K-12 teaching credential are required to student teach, but there's no comparable field experience required to teach preschool. "Human beings learn by doing," said Meloy. Preschool teachers need practice to fulfill the mission of state-subsidized preschools of closing the gap for children from low-income communities by developing their literacy, math, and social-emotional skills. With experience, the best preschool teachers learn to: 1) understand each student's learning needs and interests; 2) know that 3- and 4-year-olds learn best through play, exploration, and experimentation; and 3) design curricula that support children's home languages and cultures.

The third point is often given short shrift, but is critical to learning, growing, and preserving family connections, explained Ramos Harris. When children are taught to speak only English, they lose the rich conversations and family stories told by parents and grandparents. "The home language is the language of love, it's the language that connects them to families," said Ramos Harris. Some studies also show that different neural connections that develop in bilingual children allow them to focus better on certain difficult tasks.¹²

Preschool teachers don't learn how to support dual language learners in California's preparation programs. The California Assembly's Blue Ribbon Commission report calls on the California Commission on Teaching Credentialing to develop performance indicators for preschool staff to demonstrate their readiness to teach. The CTC was already on it, and approved new preparation standards just weeks after release of the Blue Ribbon report.

Using the latest research as a guide, CTC commissioners asked themselves "what is it [teachers] need to know and be able to do, how should they be prepared in order to do this work effectively, and how can that become the basis for issuing a permit," explained CTC Executive Director Mary Vixie Sandy, who attended the PACE conference. But the process is lengthy and Sandy anticipates another three to five years for the CTC to develop a new permitting system and for colleges to revamp their preparation programs to help students achieve more rigorous standards.

Professional Development: Supporting Teachers Once They're on the Job

Professional development (PD) is an essential part of teaching. It is built into public schools, often with onsite coaches. Many K-12 schools have a short day for students once a week to provide PD for teachers, and they bring in substitutes so teachers can attend all-day training programs. These continuing education opportunities for teachers to improve and refine their skills are not the norm for preschool teachers, usually due to structural and financial challenges. Some preschools run from early morning through

late afternoon to accommodate working parents and don't have the budget for outside training or substitutes.

The Fresno Language Project is one model of how additional resources can be used to bring PD to preschools.¹³ The Fresno County Superintendent of Schools, the Fresno Economic Opportunities Commission's Head Start/Early Head Start programs, and the Children Services Network are collaborating to ensure all children have a strong foundation in both English and their home language upon entering kindergarten. Fresno's project is also an example of how preschool teachers can learn to embrace and teach to the strengths of California's diverse population — 60 percent of children five and younger speak a language other than English at home and the vast majority are children of color: 52 percent Latinx, 5 percent African American, 11 percent Asian, 26 percent non-Latinx/ White.¹⁴

In Fresno Unified, about 70 percent of students are Latinx and one in three kindergarteners is an English learner.¹⁵ Five Saturdays a year, 79 ECE teachers, assistant teachers, site supervisors, licensed home-care providers, and administrators from the multi-agency collaborative gather for professional development. They learn concrete strategies developed by experts in dual language education for helping children's English language development while also supporting their home language. Teachers tell Anna Arambula, the project coach, that they value learning alongside each other and are energized by the sessions. "The bottom line is, if you really want quality, they all have to come together," said Arambula.

What happens between PD sessions is also key to the program's success. Typically, as one teacher explained to Arambula, "We go to these great trainings, but then we come back and we have a ton of questions. Who do we ask?" Arambula follows every training by visiting each program to work one-on-one with teachers. All educators receive a minimum of three individual coaching contacts a month.

The Fresno Language Project and similar programs model how high-quality preschools support dual language learners and cultural diversity. They need to be expanded statewide, said Ramos Harris, but to do that, she added, the programs need to be codified in law because few districts will develop them voluntarily.

Competitive Salaries: Increasing Subsidies to Pay a Living Wage

Money isn't always the answer to education reform, but it is essential to improve preschool quality. Preschool teachers in California, and many other states, earn much less than other professionals with comparable education levels. The median hourly wages shown in Table 3 are even lower when adjusted for the cost of living.

Recommendations from the Blue Ribbon Commission on Early Childhood Education mention better compensation 39 times and conclude that “Standards for the ECE workforce cannot be increased until compensation levels are raised.”¹⁶

Table 3. Earnings Per Hour by Occupation in California

Occupation	Median Wage
Preschool Teacher	\$16.19
Center Director	\$23.91
Kindergarten Teacher	\$38.33
Elementary Teacher	\$45.17
All Workers	\$19.70

• For preschool teachers, the median wage in 2017 was \$16.19, **a 3% increase since 2015**.
 • For preschool or child-care center directors, the median wage in 2017 was \$23.91, **a 6% decrease since 2015**.

Data: Early Childhood Workforce Index 2018, California Profile.

Given what they earn, preschool teachers have no incentive to pursue an associate or bachelor’s degree. A report comparing salaries of preschool and kindergarten teachers with BAs in California, found that “despite some pay gains in publicly funded programs, a pre-K teacher in a public school could still be paid 40 % less than a kindergarten teacher, even when the demands and education and training requirements of these occupations are similar.”¹⁷

In actual dollars, California pre-K teachers earned a mean salary of \$32,240 in 2015, compared to \$63,940 for kindergarten teachers. It’s not much better anywhere else. Just four of the 29 states that require lead teachers in public preschools to hold a bachelor’s degree also require them to be paid on the same salary schedule as K-3 elementary school teachers.¹⁸

A disquieting consequence of the wage gap is that 58 percent of California childcare providers rely on some form of public assistance—nearly three times the national average¹⁹.

“That’s just not okay,” said Stipek. “It’s not okay from a humanitarian perspective, it’s not okay from supporting young children’s development, because people who are worried about getting food on their tables and paying the rent for their own families are not going to be in the best position to provide loving, caring, nurturing care for young children.”

Stipek supports more rigorous standards, but says they must be coupled with higher pay, benefits, and strong professional development. Turnover rates are already high in California’s ECE workforce, averaging 22 percent a year for teachers and 26 percent for assistant teachers, and there’s a serious shortage of people going into early childhood education.²⁰ Expecting them to pay for more college without getting much in return will

exacerbate the problem, said Stipek. “You can’t demand BA-level preparation and then pay them a poverty wage.”

Conclusion

High-quality preschool holds promises and possibilities for California’s 3- and 4-year-olds. It can help equalize the knowledge and skills gap among different populations of children; develop their language, literacy, math, and social-emotional readiness for kindergarten; and instill confidence and excitement for learning.

Reaching that goal is a mammoth undertaking. Although almost two-thirds of the state’s 4-year-olds attended part- or full-day preschool in 2016, access to high-quality, affordable preschool varies significantly by county and family income.²¹ Other significant barriers to improving the quality of pre-K education identified by panelists include better preparation and higher salaries for teachers, more collaboration between Pre-K and elementary school teachers to align curriculum and pedagogy, regular professional development, and better understanding of how to teach to the strengths of the state’s diverse students.

From Governor Newsom and state lawmakers to the Assembly Blue Ribbon Commission on Early Childhood Education and the California Commission on Teacher Credentialing, momentum is building for providing money, resources, and time to reform the state preschool system.

Endnotes

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Related Publications

David N. Plank and Deborah Stipek. ***Making Early Education a Priority: Evidence from the 2019 PACE/USC Rossier Voter Poll.*** PACE. 2019.

Morgan S. Polikoff, Heather Hough, Julie A. Marsh, David N. Plank. ***Californians and Public Education: Views from the 2019 PACE/USC Rossier Poll.*** PACE. 2019.

Deborah Stipek. ***Early Childhood Education in California. Getting Down to Facts II.*** PACE. 2018.

Heather Hough and Jeannie Myung. ***The Governor's Budget Proposal and Getting Down to Facts II: Evidence to Inform Policy.*** PACE. 2019.

Cynthia Coburn, Elizabeth Friedmann, Kelly McMahon, Graciela Borsato, Abigail Stein, Natalie Jou, Seenae Chong, Rebekah LeMahieu, Megan Franke, Sonia Ibarra, Deborah J. Stipek. ***Fostering Pre-K to Elementary Alignment and Continuity in Mathematics in Urban School Districts: Challenges and Possibilities.*** PACE. 2018.



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