

Abcdefg



Building the Path to
Reading Proficiency

ADDRESSING EARLY CHILDHOOD IN GEORGIA

Table of Contents

Introduction	2
Why Does Early Childhood Matter?	
Population Factors for School Readiness and Achievement	4
What Affects a Child's Ability to Read?	
Neighborhood and System Factors	8
How Do Communities Affect a Child's Ability to Read?	
Best and Promising Practices in Georgia	14
What Can Communities Do?	
Tips to Get Children on the Path to Literacy	20
What Can I Do?	
Endnotes/References	24
Resources	27
Where Do I Go for More Information?	

This compendium—just one of the products of our collaboration—provides a useful tool for parents, educators, health professionals, community and business leaders, legislators, and investors to use in their sphere of influence to make a difference for Georgia's children, families, and communities.

FOR MORE INFORMATION, VISIT:



GEORGIA
family connection
PARTNERSHIP

gafcp.org

OR CONTACT:

Georgia Family Connection Partnership

communications@gafcp.org

404-527-7394

OR

Rebekah Hudgins, M.A., M.P.H.

Early Childhood—Grade-Level Reading

Initiative Project Coordinator

rhudgins@anthroeval.org

OR

Valerie Hutcherson, Ph.D.

Early Childhood—Grade-Level Reading

Initiative Evaluator

vrhutcherson@bellsouth.net



GET GEORGIA
READING

CAMPAIGN FOR GRADE LEVEL READING

Make Up Your Mind

When reading scores in America were on the decline in 1954, author John Hersey took on the national crisis in an article he wrote for Life magazine. He said children couldn't read because they were bored, and called for a fresh approach to reading. Theodor Seuss Geisel responded with The Cat in the Hat and got the country's school children—and adults—excited about reading again.

Fifty-eight years later, low reading scores continue to beleaguer our nation and our state. Children can't read because their bodies and brains lack proper nutrition, and they don't have access to early education, healthy classroom environments, books, and involved adults. This time it is Dr. Seuss who is calling for a fresh approach from his latest book, *What Pet Should I Get?*, published more than two decades after his death and just weeks ahead of this compendium. The story's central message, make up your mind before time runs out, tells us we need to approach this crisis in a new way—today.

Most of Georgia's children are failing to meet the basic standard in reading by the end of third grade, and that has significant and long-term consequences for all Georgians. Low achievement in reading translates to struggles in school and lifelong health issues. Children who grow up without reading skills struggle to be productive adults and are costly to our state in terms of remediation and Georgia's ability to compete in a global economy.

It's time to make up our minds to redesign Georgia's approach to language and literacy instruction. Georgia Family Connection Partnership is working with the Get Georgia Reading Campaign and county Collaboratives across the state to get every child on the path to literacy. This is a daunting task, but we can succeed if we take one more lesson from Dr. Seuss.

When Houghton Mifflin challenged Dr. Seuss to write a story that first-graders

couldn't put down, the publisher instructed him to limit it to 225 words from a standard first grader's vocabulary list. Dr. Seuss, who said a child's idea of tragedy is when "someone says you can't do that," returned with a story that uses 223 different words and 13 words he invented. Like Dr. Seuss, we are working with limited resources in Georgia, but we have an obligation to our children and to our state to tap every resource and seize every opportunity. We must work together in our own communities where new ideas come to life.

So let's take a stand. Like the boy in *What Pet Should I Get?* said: "I will do it right now. I will do it! I will make up the mind that is in my head."



**GAYE SMITH, EXECUTIVE DIRECTOR
GEORGIA FAMILY CONNECTION PARTNERSHIP**



Why Does Early Childhood Matter?

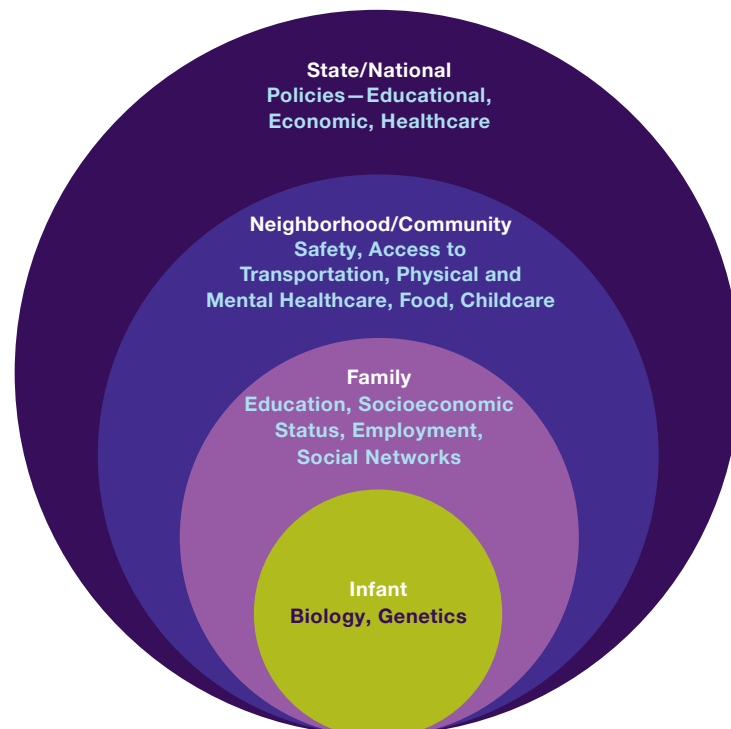


Infant and early childhood experiences reflect and foreshadow a community's health and well-being. If we want to assess and predict the health and prosperity of any community—and our state—we might simply begin with the traditional greeting that passes between the mighty Maasai warriors from Africa: “Kasserian Ingera,” which means, “How are the children?”

We have work to do in Georgia before we can give the traditional Maasai reply, “All the children are well,” which means the first and foremost priority is watching over the young and vulnerable. But all children in Georgia are not well. Close to 70 percent of our children are not reading proficiently by fourth grade.¹ This sets them up to struggle in school as they become increasingly dependent on reading skills to learn across all subject areas. And while third-grade reading is an important indicator and predictor of our children's well-being, designing interventions to improve outcomes requires looking at other indicators as well.

The intertwining of childhood health and education is well established in the research literature. We know that children perform better in school when they are physically and emotionally healthy. We also know that social, environmental, economic, and genetic factors influence health and well-being, providing an array of opportunities to intervene. The socio-ecological model shows the dynamic interactions among these factors (Figure 1).

Figure 1
SOCIO-ECOLOGICAL MODEL FOR EARLY CHILDHOOD — GRADE-LEVEL READING



“Vocabulary is the cornerstone of a child’s development, but underserved children are far behind their peers in learning new words. It’s so important for everyone to step up and help our children get a good start.”

**—Eddie Meyers,
PNC Bank Regional President
for Georgia**

Beyond the socio-ecological model, research in behavioral pediatrics deepens our understanding of these complex interactions. The question is no longer, “Is it nature or nurture?” The new question is, “How do the interactions of genetics, biology, environment, and experience promote or hinder health during childhood and adulthood?” One highly regarded approach is a scientifically grounded eco-bio-developmental (EBD) framework that challenges us to think about health and disease prevention during childhood and beyond.²

A critical factor in the EBD framework is toxic stress, the “strong, frequent, or prolonged activation of the body’s stress response systems in the absence of the buffering protection of a supportive, adult relationship.”² Toxic stress disrupts brain circuitry and creates other anatomic “precursors of later impairments in learning and behavior, as well as the roots of chronic stress-related physical and mental illness.”² One well-known study, the Adverse Childhood Experiences (ACE), investigated multiple childhood stressors—such as child abuse or neglect, parental substance abuse, and maternal depression—and their links to

later health. Analyses revealed strong associations among traumatic or abusive childhood events and an extensive array of later life conditions, including cardiovascular disease, chronic lung disease, cancer, depression, alcoholism, and drug abuse.^{3,4} Another study found that as the number of adverse childhood experiences increases, the risk of later life diseases also sharply increases.⁵ Simply put, childhood experiences create biological memory that affects educational attainment, and mental and physical health into adulthood.

There is no simple cause-effect relationship between any one specific risk or protective factor and academic outcomes. These outcomes are determined by an array of factors. However, we know of many interventions that alleviate risk or promote protective factors. Viewing child health and education through the socio-ecological model and the EBD framework expands our thinking and opens the door to a myriad of creative solutions. This compendium is designed to help communities and organizations identify and implement best and promising practices that help our children live in safe, supportive, nurturing environments leading to the best possible opportunities for success.



What Affects a Child's Ability to Read?



Children who fall behind at third grade endure serious consequences for the rest of their lives. For example, they are four times more likely to drop out of high school.⁶ Getting ahead or falling behind can begin in the first days of life. A child is born to learn, and the brain's structure is full of possibility. Rapid changes occur in early childhood as the brain forms a complex network of connections among neurons. These connections are shaped by experiences, making the earliest years a critical time to lay the groundwork for a child's future success. Although pruning or selecting active neural connections takes place throughout life, it is far more common in early childhood. The most critical period for language-learning ends around age 5.⁷ Both verbal and non-verbal communication in the first few years trigger connections related to language skills. Some skills can be permanently stunted without this exposure. In fact, a child's brain increases to 80 percent of the adult weight in the first three years of life, laying the groundwork for all subsequent development.⁷

It is clear that language abilities and subsequent literacy development are driven by a complex combination of early-childhood experiences and factors, including child and maternal health, maternal education, familial

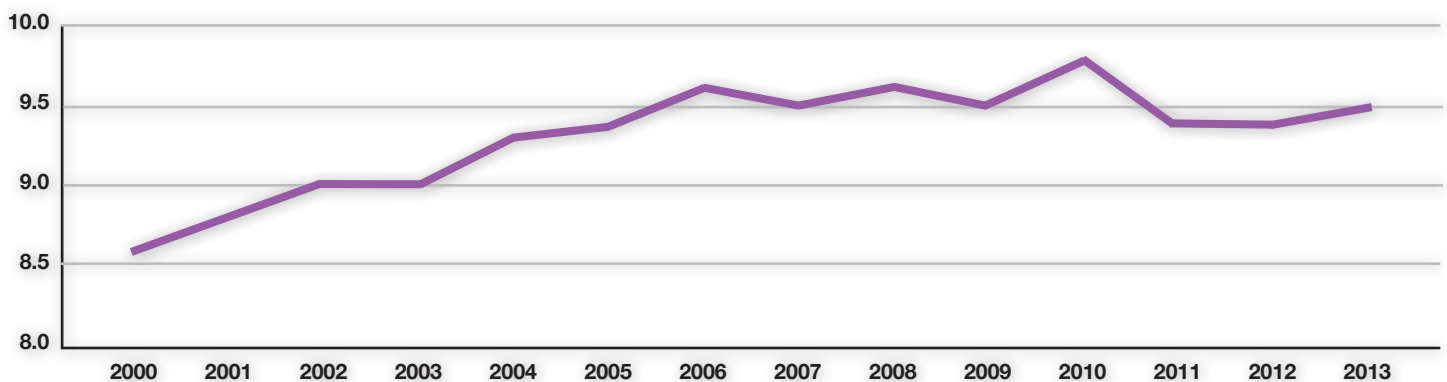
factors such as poverty and socioeconomic status, caregiver-child interactions and bonding, and neighborhood and environmental systems. Though these factors are examined separately, it is important to note that each factor influences the others.

Infant and Child Factors

Two key factors in child health are weight and gestational age at birth. Preterm birth or low birthweight (LBW) can have lasting effects on social and cognitive development.⁸ LBW is defined as an infant born weighing less than 2,500 grams (5 pounds, 8 ounces). All LBW babies are either born preterm (before the 37th week of pregnancy) or suffer from delays in fetal development, termed intrauterine growth restriction (IUGR).

The 2013 rate of LBW infants in the United States was 8 percent, while in Georgia the rate was 9.5 percent.⁹ According to the national 2015 KIDS COUNT Data Book, Georgia ranks 46th out of 50 states. The LBW rate in Georgia increased from 2000 to 2010 and has returned to the 2007 level (Figure 2). The rate of preterm births in Georgia also is alarming, with more than 16,000 born at less than 37 weeks gestation in 2013. Georgia-specific research revealed increased odds of failure on each component of the Criterion-

Figure 2
GEORGIA LBW RATE, ALL BIRTHS, 2000 - 2013



Referenced Competency Test (CRCT) in first grade for children born late preterm versus full term (Figure 3).⁸ Other conditions at the time of birth, such as birth defects, may also have lasting effects. About one of every 33 children is born with a structural birth defect, making them at high risk for illness and long-term disability.

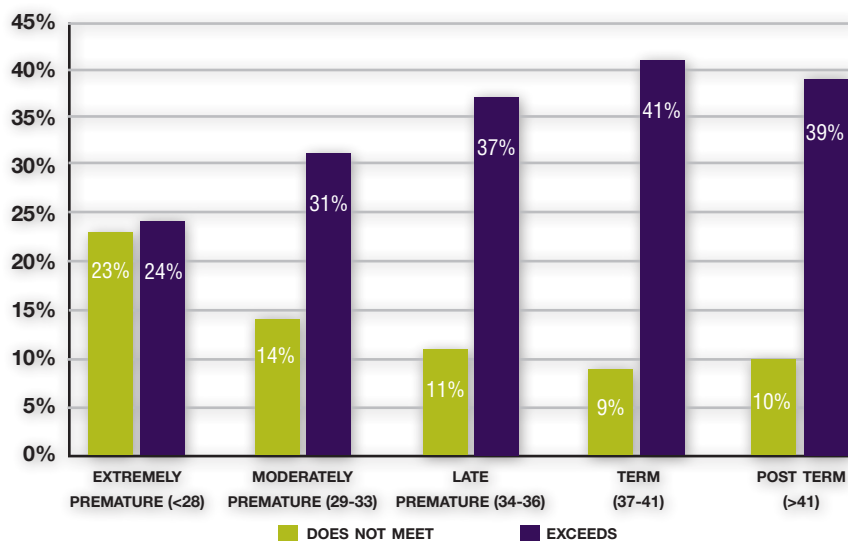
The scientific research is clear: unhealthy children are at higher risk for school problems. Poor health interferes with learning through various physical and behavioral pathways, including school attendance. Chronic health conditions—including obesity, chronic heart disease, and asthma—have been directly linked with poor academic performance.

Childhood obesity has serious consequences for long-term health, including high cholesterol or blood pressure, diabetes and pre-diabetes, heart disease, type 2 diabetes, strokes, osteoarthritis, and many types of cancer.¹¹ Hunger and poor nutrition also interfere with learning, since 20 percent of our daily calories go to powering our brains. Prolonged hunger is associated with learning delays,

behavioral difficulties, and lower academic achievement. A review of the research found that in addition to physical consequences, obesity can lead to social and psychological problems—including low self-esteem, depression, and eating disorders—and may also affect cognition and academic achievement.¹²

Other chronic health conditions also have been linked to diminished academic performance. One study showed that educational attainment was impaired for long-term congenital health defect survivors.¹³ Asthma is associated with poor school performance due to high rates of school absenteeism and inadequate sleep.¹⁴ The link between poor outcomes and asthma is particularly alarming, since it is one of the most common long-term diseases of childhood. Children age 9 and younger in Georgia visited emergency rooms more than 76,000 times due to asthma from 2010 to 2013.¹⁵ The prevalence of childhood asthma was higher for Georgia than the United States between 2006 and 2010, and more than two times higher among African-American children than white children.¹⁶ These illnesses, and other chronic health conditions, increase a child's risk of having emotional or behavioral problems, of having to repeat a grade, and of being placed in special education.¹⁴

Figure 3
FIRST-GRADE READING SCORES BY GESTATIONAL AGE



Parental and Familial Factors

The home environment shapes a child's view of learning. Parental interactions, beliefs, and expectations about education have a profound early impact on a child's development. The ability and willingness to devote resources and time on early literacy development has been clearly linked to a child's later success. Families that engage in everyday learning activities with very young children help them develop lifelong motivation, persistence, and a love of learning.¹⁷ Warm, sensitive, and responsive caregiving provides the foundation for healthy brain development that leads to success in school.^{17,18}

What Affects a Child’s Ability to Read?

In contrast, familial factors such as extreme poverty, parental drug abuse, and childhood neglect can lead to mental, physical, learning, behavior, and health problems.²⁰

A child in the United States has a one-in-five chance of being poor, and the highest percentage of poverty is found in families with the youngest children. More than 655,000 children in Georgia—more than one in every four—were living in poverty in 2013, though the rates differ widely by county (Figure 4). Concentrated poverty puts children at risk. Children living in high poverty areas are more likely to experience crime and violence, as well as physical health, mental health, and parental unemployment issues.²¹ According to the 2009 - 2013 American Community Survey (ACS), more than 800,000 children in Georgia (33 percent) live in households in which no parent is securely employed, and 17 percent live in high poverty areas.²²

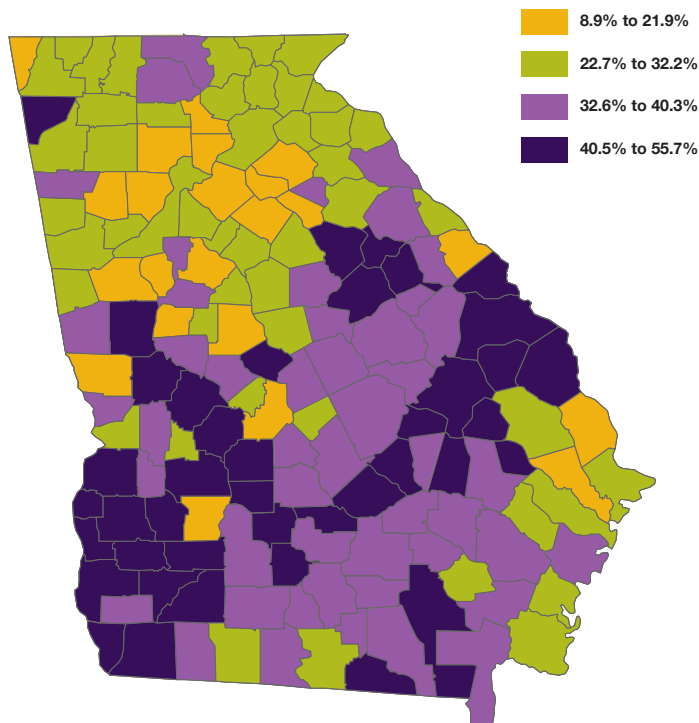
Poverty affects child development, parent-child interactions, and family functioning. When families are isolated, lack resources, live with greater stress and instability, or view their child’s temperament as difficult, there is higher risk of negative child health and behavioral outcomes.^{25,26} These risk factors also affect children’s language, cognitive, and social-emotional development.^{25,26}

Poverty also affects the association between parent-child communication and healthy language development.²⁷ Children who grow up in a low socioeconomic status (SES) household often experience decreased levels of literary activities with their parents.^{28,29} For example, low SES mothers often have lower education levels, spend less time at home with their children, and are less likely to read books alongside their children. In one well-known study, 3-year-old children in low-income families had heard, on average, 30 million fewer words than children in more affluent families.³⁰ This inequality in early language exposure, referred to as the “word gap,” has been shown to result in language disparities and cognitive outcomes as early as 18 months (Figure 5).^{31,32}

Children living in households where English is the second language often fall behind their peers in English reading skills. Approximately 7 percent of the 2014 Georgia K-12 population (about 134,000 students) was characterized as “limited English proficient.” Only 28 percent of English language learners were reading proficiently by third grade in 2014.³³ A child’s vocabulary at age 3 is a key predictor of that child’s ability to read by third grade.^{34,35,36} In fact, a child’s language skills predict third-grade reading comprehension more reliably than parent income, ethnicity, or parental education level.³⁴

The interaction between a mother and her developing child has profound academic implications.³⁷ Characteristics such as maternal education level, maternal parenting style, and maternal smoking have been associated with their children’s academic outcomes. Maternal

Figure 4
CHILDREN LIVING IN POVERTY, 2013



education was found to be the strongest risk factor for failure on each component of the first-grade CRCT. Although the percentage of births to mothers with less than 12 years of education has steadily declined since 2009, at the same time these infants account for close to 120,000 children, 18.9 percent of all births.¹⁵ One well-known study found that maternal age

at the time of birth was associated with the child's first-grade test performance. Younger maternal age is associated with poor performance by their children on all three components of the CRCT. Although teen birth rates have declined in Georgia, in 2013 there were close to 5,000 children born to mothers under age 20 who had not finished high school.¹⁵ Infants whose mothers smoked during pregnancy are at risk of poor academic development.³⁸ While these data are most likely an underrepresentation of reality, 7,000 women in Georgia (7.5 percent of births) reported smoking during their pregnancy in 2013.¹⁵

The importance of maternal-infant bonding cannot be overstated, and breastfeeding is the earliest opportunity for bonding following birth. Breastfeeding offers physical closeness, as well as immense nutritional and immunological benefits. Studies have found a positive association among length of exclusive breastfeeding, cognitive ability, and school performance.³⁹

Limited research has been conducted regarding paternal impact on children's lives. Some findings suggest that children raised in homes with an involved paternal figure report higher grades and education attainment goals.⁴⁰ Research also suggests that the strength of the parents' relationship, and their ability to co-parent, play large roles in their children's academic achievements.⁴¹

Child abuse and neglect is a critical source of toxic stress with damaging and long-lasting effects. Maltreatment during the early, most vulnerable years, birth to 3, can trigger significant changes in brain circuitry, creating a weak foundation for learning, behavior, and health. In Georgia, the rate of maltreatment for children birth to 3 is markedly higher than that for children age 4 and older (Figure 6).⁴² Georgia's 2014 child abuse and neglect rate was 10.2 per 1,000. Neglect accounts for close to 90 percent of all these cases, with a rate of 9.3 per 1,000.

Figure 5
CUMULATIVE VOCABULARY BY CHILD'S AGE—THE WORD GAP

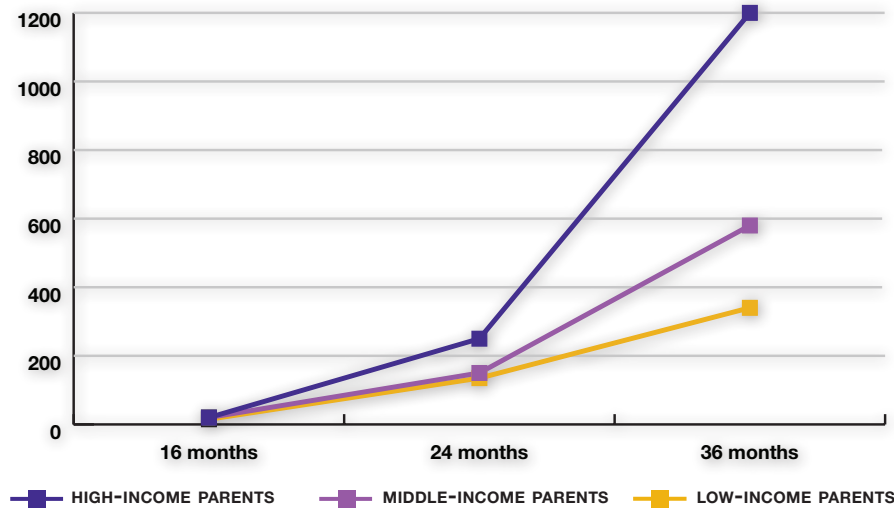
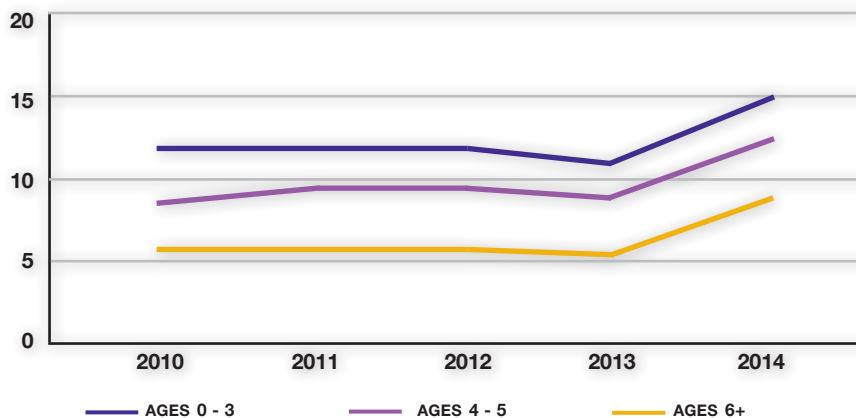


Figure 6
MALTREATMENT RATE, PER 1,000, BY AGE GROUPS



How Do Communities Affect a Child's Ability to Read?

“High-quality, parent-focused, early childhood development programs that begin at birth can make an extraordinary difference in outcomes both for the child and society. You must invest at birth and you must do it right.”

— Art Rolnick, Senior Vice President and Director of Research at the Federal Reserve Bank of Minneapolis and an associate economist with the Federal Open Market Committee



Systemic issues such as neighborhood and community environment; access to services, including quality early childhood education, early intervention, physical and mental healthcare; school climate; absenteeism; and teacher preparation all play a role in supporting or hindering intellectual development and academic success.

The neighborhood or community is the first place to begin addressing systemic issues. Evidence from numerous studies suggests that ensuring healthy child development, and therefore successful educational outcomes, requires reducing children's exposure to neighborhood stressors and increasing the quality of caregiver functioning.^{2,43} Studies have linked neighborhood disadvantages to poor educational attainment and a variety of health issues, including obesity, depression, smoking, risky or early sex, and alcohol use.⁴³

Neighborhood factors influence child development through numerous avenues, including exposure to violence, physiological hazards such as lead poisoning, and limited access to resources. Neighborhoods have been

described as a potent source of unequal opportunity.⁴⁴ Lower SES neighborhoods typically have fewer resources that support health and education.^{45,46} Some research has found that disadvantaged neighborhoods are more likely to have inferior schools that spend less time on teaching and learning, and more time disciplining students.⁴⁷ Poor-quality schools with few resources often hinder community members' and children's investment in, and attachment to, school. Community development that includes a focus on school improvement can help improve educational attainment.

Researchers have described five interrelated mechanisms through which neighborhood characteristics have an effect on school performance: collective socialization, social control, social capital, differential occupational opportunity, and institutional (i.e. school) characteristics.⁴⁵ All of these mechanisms contribute to the level of stress children and youth experience. The most prominent in the literature is collective socialization, defined as youth modeling what they see within surrounding communities

“The body and mind of a child are not in different places. If we are going to be successful in this endeavor to make sure reading is a universal ability of all our children, we must remember that. And we must tend to both.”

— Brenda Fitzgerald, M.D.
Commissioner, Georgia
Department of Public Health

and neighborhoods.⁴⁵ Children’s ability to interact positively with peers and teachers affects their transition to school.⁴⁸ Young children exposed to violence, another significant stressor, often exhibit post-traumatic stress and aggression, depression, anxiety, and behavioral disorders.^{49,50,51}

The work undertaken to improve child well-being and educational attainment has a lasting effect on communities. “Ask any CEO or business manager about the most important factor that affects their bottom line and they will tell you it is human capital—the quality of the work force.”⁵² James Heckman, Nobel laureate economist at the University of Chicago said, “Enriching the early years will promote the productivity of schools by giving teachers better-quality students. Improving the schools will in turn improve the quality of the workforce.”^{53,54} The high rate of return in early childhood investments accrues not only through labor productivity, but also through reducing costs related to remedial education, crime, and poor health. Several longitudinal evaluations found that for every \$1 invested more than \$8 are saved.⁵⁵

Language Nutrition

Just as children require an adequate amount of food for physical growth, they require adequate language for brain development. Ensuring that children receive a language-rich environment starts with families. However, the importance of language nutrition extends beyond the home environment. Most systems that come into contact with young children and their families play a role in promoting language nutrition. Among the promising practices in this area is Talk With Me Baby, a program that works with healthcare providers to increase parents’ knowledge and language nutrition skills and provides training to providers and early childhood educators. This model has the potential to provide language nutrition to almost all children in Georgia because more than 99 percent of expectant mothers, new parents, and their children are seen by nurses; more than 80 percent of low-income expectant mothers, new parents, and their children are seen by Women, Infants and Children (WIC) nutritionists; and about 33 percent of children birth to 3 attend early-childhood education programs.



How Do Communities Affect a Child's Ability to Read?

Access

Studies show that the quality of early care a very young child receives establishes the foundation for future success. Young children exposed to high-quality care geared toward their social, emotional, and intellectual development exhibit better language, cognitive, and social skills, and develop better relationships with classmates than do children in low-quality care. Programs that address families' needs and connect families to resources help strengthen parents' relationships with their children and reduce stress. Early childhood education programs such as Head Start and Early Head Start, provide social supports for parents that improve parent-child relationships and children's social-emotional outcomes.⁵⁶ With increased social support and less stress, parents engage their children more often and are more sensitive to their needs.²⁷ Successful transition into school is more likely when parents engage children in joint literacy activities, such as reading together and engaging in conversations about educational topics.⁵⁷ Research on Early Head Start Programs revealed that stimulating play interactions between mothers or fathers and their children predicted children's fifth-grade math and reading abilities.⁵⁸

For more than a decade, half of Georgia's 3- and 4-year-olds have not attended a preschool program.⁵⁹ The ability for many parents to enroll their children in childcare rests on two issues: access and cost. In some areas there are simply not enough, if any, quality early-childhood-education programs available. That said, federal, state, and community partners have worked together to increase access to higher-quality learning environments. While these efforts have been most apparent in services for 4-year olds, mainly due to Georgia's universal Pre-K and Head Start, there are other programs and resources that are helping move the needle in terms of access. At the end of June 2015, 638 childcare programs and Family Day Care Homes (10.3 percent) received a 1-, 2-, or 3-star rating in Georgia's Quality Rated.⁶⁰ Challenges remain despite these efforts. In some communities there are not enough Georgia Pre-K slots to meet demand. While participation in Quality Rated has been growing, there are still neighborhoods across the state without a Quality Rated provider.

Even when quality care is available, Georgia's most vulnerable families can't afford to pay for it. Some providers are not eligible—or willing—to accept state childcare assistance funds. Limited funding and high demand for subsidies hinder access to quality early-education programs. Childcare and Parent Services (CAPS) in Georgia are provided to about 61,000 children in an average month. Many states choose to cover more families instead of increasing the value of subsidies and, as a result, subsidies often don't cover the cost of high-quality care. Moreover, subsidies reimburse providers (or pay parents) below the providers' going rates with the aim of increasing access.⁶¹ If providers cannot charge local families enough to provide high-quality care, then subsidy recipients will continue to use the available low-quality care. Finally, because ongoing eligibility for subsidies is based on parents' income and employment, and because



“Providing a positive learning climate is a quality-of-life gift, because without it students are more likely to drop out of school and face a lifetime of economic, physical, and mental health stress.”

— Garry McGiboney,
Deputy Superintendent,
External Affairs
Georgia Department of Education

the process of proving ongoing eligibility can be complex and time-consuming, many families receive only short-term subsidies.^{62,63} Lack of continuity in subsidy receipt can cause instability in childcare arrangements, which in turn limits parents’ access to high-quality care.⁶¹ Lack of continuity also means that brief time spent in high-quality care will have limited impact on children’s overall quality of care and developmental outcomes.

Lack of access to quality healthcare also affects a child’s development and future school success. Low SES and accompanying low employment stability often lead to limited or infrequent access to healthcare, which can contribute to low school attendance among younger children. Despite federal programs to make medical insurance available to low-income families, there remain gaps in access and utilization. Reducing health disparities and increasing healthcare access are becoming fundamental parts of school reform.

Positive Learning Climate

The National School Climate Center defines school climate as “the quality and character of school life based on the patterns of students’, parents’, and school personnel’s experiences.” Research has found that schools with positive school climates have better test scores and graduation rates.⁶⁴ A positive school climate is also associated with socio-emotional well-being and healthy behavioral outcomes.^{65,66} Conversely, schools with negative climates are associated with lower teacher retention and students who miss a lot of school, have more disciplinary infractions, and underperform academically.

Georgia is the first state in the nation to include school climate in its set of academic accountability measures, the College and Career Ready Performance Index (CCRPI). The CCRPI is a diagnostic tool to determine if a school is on the right path to school improvement, and is calculated using data from the Georgia Student Health

Survey 2.0; Georgia School Personnel Survey; Georgia Parent Survey; student discipline data; and attendance records for students, teachers, staff, and administrators. The School Climate Star Rating provides school-level data on school climate, student discipline, safe and substance-free learning environments, and attendance, and it has potential to clearly identify areas within schools that need improvement.

Implementing Positive Behavior Interventions and Supports (PBIS) is a key strategy in Georgia for improving school climate and academic outcomes. The premise of PBIS is that “continual teaching, combined with acknowledgement or feedback of positive student behavior, will reduce unnecessary discipline and promote a climate of greater productivity, safety, and learning” in classrooms and across schools.⁶⁷ As of the 2014-2015 school year, PBIS was implemented in 30 counties across the state. These efforts to improve school climate contributed to an 11-point increase in the state graduation rate and a 3-point increase in grade-level reading since 2009.⁶⁷

School attendance also significantly contributes to literacy development, future school success, and other academic outcomes.⁶⁸ Regular attendance is critical for school interest, social adjustment, and scholastic achievement. Prompt arrival and regular school attendance is a habit developed in the preschool and early elementary school years. These formative years are when children gain the basic social and academic skills critical to ongoing academic and social success. Research shows “early absenteeism in kindergarten through the third grade is clearly associated with poor achievement, truancy in middle school, school dropout, delinquency, and substance abuse.”⁶⁹ Kindergarten absences negatively affect student achievement, and the long-term effects in reading are particularly significant.

Excused and unexcused absences have the same negative effect on student learning. Most school systems only track average daily attendance

“From birth to 5 years old, a child’s brain can make 700 new connections per second and a high-quality early education program can partner with parents to build a foundation for success in these critical early years. Quality Rated is our community-powered childcare rating system that identifies which early education programs are using best practices to help prepare children for success in kindergarten and beyond.”

— Sandra Deal
Georgia First Lady

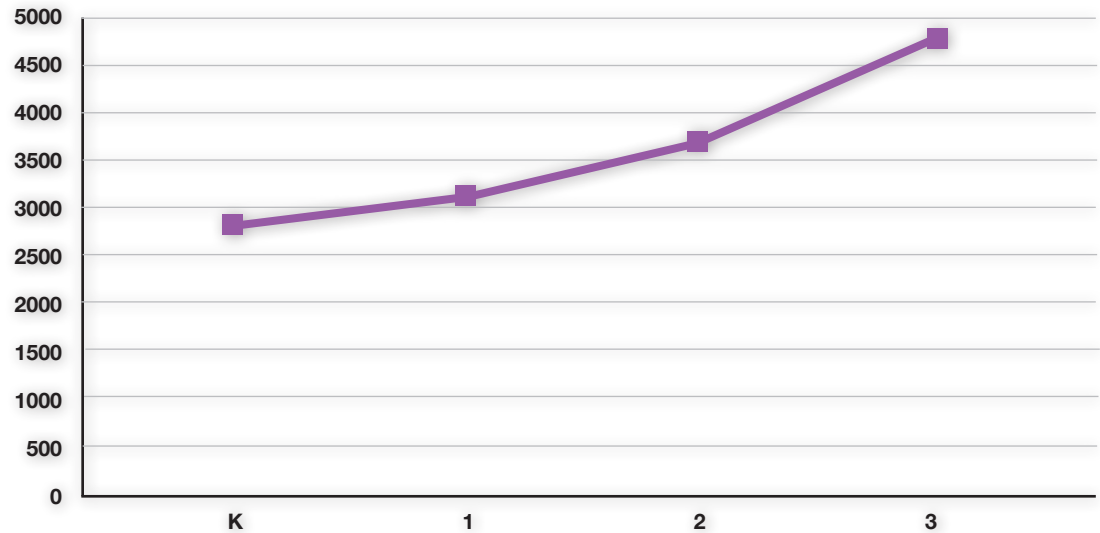
and truancy (number of unexcused absences defined by each state) to measure absenteeism rather than chronic absence. However, research shows chronic absenteeism—missing 10 percent or more of the school year, regardless of the reason for the absence—leads to lower academic performance. The impact of chronic absence is two times greater for students from low-income families. One study found that children from low-income families who are chronically absent from kindergarten had the lowest levels of achievement in fifth grade. Another study found that chronically absent children gained 14 percent fewer literacy skills in kindergarten than those who attended more regularly. Low-income children who attended school regularly appeared to benefit more than the higher income peers. Data has shown that low-income children gained 8 percent more literacy skills in kindergarten and nearly 7 percent more in first grade than their peers from higher-income families, narrowing the reading gap between these economic groups by nearly a third.⁶⁸

Research from the Georgia Department of Education (GADOE) found that standardized test

scores in elementary schools are significantly affected by students’ attendance patterns. The biggest impact was found to be for students who missed between five and 10 days of school, suggesting that missing even a week or two can have a significant negative impact on achievement.⁷⁰ One analysis suggested that just a 3-percent improvement in attendance, five additional days, would have led more than 10,000 students in grades three through eight to pass end-of-year standardized tests in reading, more than 15,000 to pass English, and more than 31,000 to pass mathematics. The attendance effect continues into high school where eighth-grade students missing 15 or more days of school had a graduation rate of only 38 percent, compared to 82 percent for those with no absences.⁷⁰

We cannot meet our expectation of preparing all students for college, careers, and civic life without first creating safe schools where effective teaching and learning can take place, but relying on suspensions and expulsions is not the best way to create a safe environment. More than 14,000 Georgia students in kindergarten through

Figure 7
NUMBER OF STUDENTS WITH OUT-OF-SCHOOL SUSPENSIONS, 2014



“Achieving and sustaining gains in third-grade reading proficiency will require sustained diligence, continuing bipartisan effort, and effective collaboration across sectors, agencies, and constituencies.”

— Ralph Smith,
Managing Director,
The Campaign for
Grade-Level Reading,
The Annie E. Casey Foundation

third grade missed school in 2014 due to out-of-school suspensions. The number of students given out-of-school suspensions increased substantially with each grade level (Figure 7). Exclusionary discipline practices occur at high rates in preschool settings and at even higher rates for young boys and children of color.⁷¹ Boys receive more than three out of four out-of-school preschool suspensions. Boys represent 54 percent of the preschool population yet 79 percent of those suspended once and 82 percent of those suspended multiple times. African-American children make up 18 percent of preschool enrollment, but 48 percent of those suspended more than once. African-American, Native Hawaiian, or other Pacific Islander girls also are suspended at higher rates than girls within other racial or ethnic groups.⁷²

President Barak Obama’s My Brother’s Keeper initiative encourages states, early childhood programs, and families to partner in preventing, reducing, and eventually eliminating the expulsion and suspension of young children from early-learning programs. The initiative also encourages communities to implement a coherent cradle-to-college-and-career strategy to ensure that all young people reach their full potential.

Teacher Preparation and Effectiveness

It is widely believed that promoting teacher quality is a key to improving primary and secondary education in the United States. Teacher preparation and effectiveness are essential to building the language skills foundation on which rest students’ reading skills. One of the primary goals of the No-Child-Left-Behind law is to have a “highly qualified teacher” in every classroom. Despite decades of research, however, there is no consensus on which factors enhance, or even signal, teacher quality.

One framework emerging as a successful approach to improving the quality of children’s early learning opportunities is the Pre-K–third grade (P-3) approach. The P-3 framework crosses traditional boundaries of birth-to-5 and K-12 education by aiming for diverse practice and policy changes (e.g., professional development, accountability, and data) at multiple levels (e.g., classrooms, schools, districts, and communities). While improving children’s learning and development is the ultimate objective, P-3 reforms must first accomplish multi-faceted changes within and across multiple groups of adults (e.g., teachers, education leaders, and families).

Another emerging approach for improving teacher preparation and effectiveness is Read Right from the Start, a program of the Rollins Center for Language & Literacy at the Atlanta Speech School. This research-based program exposes educators to effective classroom strategies for developing language skills in young children. An evaluation in Georgia revealed that more than 70 percent of participating preschoolers performed above average in vocabulary, print, and alphabet knowledge, oral language and reading readiness, and phonological awareness and reading readiness.⁷³

Teacher preparation and effectiveness at this critical juncture are essential to getting children ready for school success. Children must be prepared to meet or exceed grade-level reading requirements by the end of third grade in order to increase their likelihood of success in other content areas. A broad array of research has shown that children without sufficient reading skills rarely catch up. It is essential that teachers employ strategies in their classrooms that build language and vocabulary skills to ensure that children can communicate effectively and acquire the foundation for reading and comprehension. Without appropriate vocabulary and language development, children struggle in school and are at risk of eventually dropping out.

What Can Communities Do?



“The charge to society is to blend the skepticism of a scientist, the passion of an advocate, the pragmatism of a policy maker, the creativity of a practitioner, and the devotion of a parent—and to use existing knowledge to ensure both a decent quality of life for all of our children and a productive future for the nation.”

– Jack P. Shonkoff and Deborah A. Phillips,
From Neurons to Neighborhoods, Committee on Integrating the Science of Early Childhood Development

No individual community sector can change outcomes for children and families. Families must work together with schools, childcare and healthcare providers, faith community, local civic and nonprofit organizations, and businesses to build strong neighborhoods and communities that provide the best possible environments where children thrive. Evidence-based and evidence-informed practices in place nationally and in Georgia have shown positive results for children and families. These programs are organized here by those that most directly influence the family or home environment, childcare or school environment, and healthcare and community environment.

The Centers for Disease Control and Prevention (CDC) has identified the “Essentials for Childhood” that focus on the key role of safe, stable, nurturing relationships. In essence, “health outcomes from positive experiences may be just as important as toxic outcomes from adverse experiences.” Working to help ensure these “positive experiences” requires attention to more than just

programs – we must strive to improve community systems. System change efforts focus on policies, processes, and relationships across multiple organizations. All programs, supports, and systems changes should focus on helping families and communities create the context for healthy children.

Evidenced-Based Programs and Practices

Evidence-based programs (EBP) are comprised of a set of coordinated services and activities that demonstrate effectiveness based on credible research in improving outcomes for children, youth, and families. These programs undergo a rigorous research design, show that the observed impact was likely due to the intervention under study, and meet stringent criteria on a number of dimensions. EBPs may incorporate a number of evidence-based practices in the delivery of services. An evidence-based practice is an approach, framework, collection of ideas or

concepts, adopted principles, and strategies supported by research.

Evidence-Informed Programs and Practices

Evidence-informed programs ensure that practice is guided by the best research, data, and information available. Although there is not yet conclusive evidence of effectiveness, good evidence identifies the potential benefits, harms, and costs of an intervention. Building the evidence base occurs when evidence informs the planning process and work, and when evidence is an outcome of a properly evaluated action.

Systems Change

Several systems change efforts have shown positive results or are considered promising practices for change. We have provided both systems change practices and programs here to guide communities as we work together to make a difference.

EVIDENCE-INFORMED:

Attendance Works

Attendance Works is a national and state initiative that promotes better policy and practice around school attendance. The initiative promotes tracking chronic absence data for each student beginning in kindergarten or earlier and partnering with families and community agencies to intervene when poor attendance is a problem for students or schools.

Great Start Georgia

The mission of Great Start Georgia (GSG) is to provide families and children with wide-ranging support services and the information and resources they require for a great start in life. The system is focused on creating a community culture of care, encouragement, and support for all expectant parents and children birth to age 5 and their families.

Strengthening Families

Strengthening Families is an approach designed to increase family strengths, enhance child development, and reduce the likelihood of child abuse and neglect. It is based on engaging families, programs, and communities in building five protective factors: parental resilience, social connections, concrete supports, knowledge of parenting and child development, and social and emotional competence of children.

Quality Rated Program

Quality Rated is Georgia's system to determine, improve, and communicate the level of quality in programs that care for children during school

hours and after school. Quality Rated assigns a one-, two-, or three-star rating to early education and school-age care programs that meet certain standards over and above the minimum state requirements.

Family and Home Environment

Secure parent-child attachment, stimulation through warm and responsive parenting, and exposure to diverse opportunities for safe exploration of the world all create a supportive home environment for early child development. Parents and caregivers are their children's first teachers, coaches, and advocates. Supporting their roles and the home environment is the key to changing outcomes for children.

EVIDENCE-BASED:

Early Head Start-Home Based Option

Targeting low-income pregnant women and families with children birth to 3, the Early Head Start-Home Based Option (EHS-HBO) model provides high-quality, culturally competent child development and parent support services with an emphasis on the parent's role as the child's first, and most important, teacher. This model is implemented in four sites as part of Great Start Georgia in Clarke, DeKalb, Fayette, and Burke counties.

Healthy Families Georgia

Healthy Families Georgia promotes child well-being and prevents child abuse and neglect through the provision of quality, long-term, intensive home visitation services. Services are designed to strengthen families with children—beginning prenatally up to age 5. This model is implemented in Clarke, Crisp, Glynn, Madison, Muscogee, Murray, Oconee, Oglethorpe, and Whitfield counties.

Nurse Family Partnership

Nurse Family Partnership empowers first-time mothers living in poverty to improve maternal, prenatal, and early childhood health through

evidence-based nurse home visiting. This model is implemented in Houston and Muscogee counties.

Parents as Teachers

Parents as Teachers (PAT) is an international parent education and family support program designed to foster nurturing relationships between parents and their children, birth to age 5. PAT local programs are implemented in Bartow, Bibb, Butts, Catoosa, Clayton, Cobb, Coweta, DeKalb, Dougherty, Elbert, Fulton, Gordon, Gwinnett, Habersham, Heard, Lowndes, Meriwether, Muscogee, Murray, Pickens, Richmond, Rockdale, Troup, Turner, Whitfield, and Wilkes counties.

Raising A Reader

Raising A Reader engages caregivers in a routine of book sharing with their children, from birth through age 8, to foster healthy brain development, healthy relationships, a love of reading, and the literacy skills critical for school success. Raising A Reader is in place in three locations in metro Atlanta.

Childcare and School Environment

Children should be cared for in a safe, healthy, and developmentally appropriate environment, where they feel confident to fully explore and discover. Children in quality care have improved social skills, less need for special education instruction during subsequent school years, better grades, and enhanced attention spans. Quality care focuses attention on the individual child and family.

EVIDENCE-BASED:

Early Head Start

Federally funded Early Head Start, a comprehensive early childhood program, serves low-income children birth to age 3, pregnant women, and their families. The program addresses the needs of low-income infants and toddlers and pregnant women by providing high-quality early education, nutrition and

mental health services, and medical and dental referrals, and by fostering healthy family relationships. Early Head Start programs are in place in 49 Georgia counties.

Educare Atlanta

Educare is a comprehensive early childhood program aimed at preventing the achievement gap that takes root between children in poverty and their middle-income peers long before they enter kindergarten. Educare Atlanta joined the network of Educare centers across the United States in 2012, two years after Sheltering Arms Early Education & Family Centers, Atlanta Public Schools, and The Annie E. Casey Foundation opened Dunbar Elementary school. Dunbar Elementary serves low-income young children and families in Atlanta's Mechanicsville neighborhood.

Head Start

Head Start, a federally funded comprehensive early childhood program for low-income preschool children and their families, delivers early education, medical and dental screenings and referrals, nutrition services, mental health services, family engagement activities, and social service referrals during the two years before kindergarten. Head Start services are provided to children in 146 Georgia counties.

Positive-Behavioral Intervention and Supports

Positive-Behavioral Intervention and Supports (PBIS) is a prevention-oriented, data-driven framework for helping school personnel adopt evidence-based behavioral intervention practices, improve implementation, and maximize academic and social outcomes for all students. Georgia has 36 active PBIS districts in 33 counties.

Reading Recovery

Reading Recovery is a short-term intervention for first graders having extreme difficulty with early reading and writing. Specially trained teachers

work individually with students to help them read on grade level. Reading Recovery is in place throughout Georgia.

Rising Pre-K Summer Transition Program

Bright from the Start: Department of Early Care and Learning (DECAL) offers a Rising Pre-K Summer Transition Program to children whose home language is Spanish, in certain areas of the state, who are registered to enter Georgia's Pre-K or Head Start and would like additional academic support before entering Pre-K.

Rising K Summer Transition Program

DECAL offers the Summer Transition Program (STP) for children from families who meet CCDF eligibility requirements who didn't attend a Georgia Pre-K or Head Start, or who did attend one of these programs, but need additional academic support before entering kindergarten. The STP is a six-week program during June and July offering high-quality instruction with a focus on language, literacy, and math, and serves families that meet Childcare and Parent Services (CAPS) eligibility requirements.

State-funded Pre-Kindergarten Programs

State-funded Pre-K programs for children ages 3 and 4 are available in 40 states, with 28 percent of 4-year-olds and 4 percent of 3-year-olds enrolled nationwide. During the 2014-2015 school year, 80,430 4-year-olds were enrolled in Georgia's voluntary, universal, lottery-funded program, which is in place in all 159 counties.

Smart Start Georgia

Smart Start Georgia is a statewide organization supported by the United Way of Greater Atlanta, focusing on Metropolitan Atlanta, partnering with the public and private sectors, childcare providers, and parents to improve the quality of care and education for all children birth through 5 years old.

EVIDENCE-INFORMED:

Georgia Program for Infant and Toddler Care

Georgia Program for Infant and Toddler Care offers training and technical assistance to directors and teachers who serve children birth to 3 years old in centers or family childcare homes across Georgia. Infant/toddler specialists provide on-site services that include state-approved trainings on a variety of topics that focus on infant/toddler care and development, director support, and in-classroom coaching.

LIFE Path

United Way of Greater Atlanta, in partnership with several other organizations, created Leading Innovations in Family Engagement (LIFE) Path, an approach to family engagement to improve children's access to education, school readiness, and academic progress. LIFE Path project is centered around two community hubs in DeKalb and Clayton counties and serves families with children birth to age 3.

PACE i3 Investing in Innovation

The PACE i3: Investing in Innovation project is designed to implement a continuum of parent and family engagement from Pre-K (ages 3 to 5) to grade three to improve student outcomes; equip parents, families, and teachers with the skills to work together in support of child development; and determine whether high-need students' educational and developmental outcomes improve from Pre-K to grade three. PACEi3 in Georgia focuses on families in the diverse community of Clarkston.

PNC Grow Up Great

PNC Grow Up Great and PNC Crezca con Éxito form a program dedicated to helping prepare America's youngest children from birth to age 5 for great things in school and life. The

What Can Communities Do?



three-year Atlanta PNC Grow Up Great initiative focuses on 530 at-risk preschool children and their families to increase learning in science and the arts. The program also partners with the Quality Rated program to support professional development opportunities that help early childhood educators attain quality ratings goals under Georgia's Quality Rated system.

READ and TALK Strategies

The Rollins Center for Language & Literacy at the Atlanta Speech School developed READ and TALK strategies to provide teachers of infants and toddlers across Georgia with evidence-based approaches to building vocabulary, language, and comprehension and critical thinking skills.

Read Right from the Start and the Cox Campus

The Cox Campus synthesizes the work of the nation's leading literacy experts and provides onsite training, as well as free online access to research-based professional development for all Georgia preschool and pre-K teachers of children birth to age 8 via the Cox Campus portal.

Sheltering Arms

Sheltering Arms uses The Creative Curriculum, the country's leading scientifically based, comprehensive curriculum for programs serving

children from birth to age 5. The curriculum aligns with Sheltering Arms' educational philosophy in that it is integrated with high-quality assessment, professional development, and families' connection to resources to create a program that addresses the needs of early childhood education professionals, children, and their families. Sheltering Arms has 12 centers throughout metro Atlanta.

United Way Partners Advancing Childhood Education

United Way Partners Advancing Childhood Education (PACE) is a school readiness initiative funded by United Way of Greater Atlanta, which provides the 13 counties in Metropolitan Atlanta with technical assistance and resources to address children's early learning needs by implementing a parent engagement and school transition program model, coordinating services, and advocating for policy and systems change.

Health and Community Environment

All children and their families deserve access to supportive services for healthy development and learning. Access to services, including quality early childhood education, early intervention, physical and mental healthcare, school climate, absenteeism, and teacher preparation, all play a role in supporting or hindering intellectual development.

EVIDENCE-BASED:

Babies Can't Wait

Babies Can't Wait Part C provides a coordinated, comprehensive, and integrated system of services for infants and toddlers with special needs and their families. The program offers early identification and screening in all 159 Georgia counties for children with developmental delays and chronic health conditions. It aims to improve their developmental potential, and enhances the capacity of families to meet their child's special needs.

Centering Pregnancy

Centering Pregnancy is a model for delivering group prenatal care facilitated by credentialed health providers. It includes assessment, education, and support. Centering Georgia sites are supported by a variety of partners. There are eight sites in Georgia: All Women’s Health in Savannah, ARC Community Partnership-Augusta Partnership for Children, Athens Regional Nurse Midwifery Practice, Dougherty County Health Department in Albany, Farm Worker Health Program—Southwest Georgia Public Health District in Ellenton, New Millennium OB-GYN in Riverdale, Providence Women’s Healthcare in Roswell, and Grady Health Systems in Atlanta.

Partners for Equity in Child and Adolescent Health: Georgia School-based Health

The Emory University Dept. of Pediatrics’ Urban Health Program supports school-based healthcare centers that are staffed by multidisciplinary teams and provide comprehensive preventive and primary healthcare services to students on campus. Emory Pediatric Urban Health Program has awarded planning grants to 29 counties in Georgia. The school-based health centers in Fulton, Dougherty, Catoosa, Clayton, and Johnson counties are staffed and are providing comprehensive healthcare services to students.

Reach Out and Read

Reach Out and Read is a literacy-promotion service based in pediatric primary care offices,

and serving children age 6 months to 5 years old. Reach Out and Read serves more than 4 million children and their families annually in all 50 states, including 78,405 children in 28 counties in Georgia.

EVIDENCE-INFORMED:

Library Summer Reading Programs

The American Library Association’s (ALA) Library Service to Children offers several grant opportunities to encourage reading programs for children in public libraries. Libraries in all Georgia counties host summer reading programs.

Library Summer Reading and Meals Programs

The National League of Cities Institute, Cities Combating Hunger through Afterschool and Summer Meal Programs (CHAMPS) initiative provides pass-through funding, capacity-building support, technical assistance, best practice recommendations, and intensive training to cities to expand access to afterschool meals in their communities.

Talk With Me Baby

Talk With Me Baby coaches parents to be conversational with their babies. The Atlanta-area campaign targets parents and nurses to prevent language delays, especially among at-risk children, by coaching parents to talk more to their infants. A curriculum to train nurses about the importance of social interaction with babies—inside and outside of the womb—is in early stages of implementation.

Learn more about these best and promising practices at gafcp.org

What Can I Do?

PARENTS

Find a medical home for your family and ensure your child gets all well-child checkups and recommended immunizations.

- Determine your eligibility for Medicaid, PeachCare for Kids, WIC, and other programs that support your own health and your children's health.
- Take advantage of developmental screenings for your children, and seek services, such as Babies Can't Wait, for support.

Talk with your children, tell them stories, and read to them at all ages, beginning before birth.

- Access programs like Talk With Me Baby, Reach Out and Read, Get Ready to Read,

Raising A Reader, and First Books that help you effectively do these activities with your children.

- Visit your local library and participate in fun reading and storytelling programs with your children.

Find quality childcare centers for your children.

- Choose a Quality Rated childcare program. Call 877-ALL-GA-KIDS or go to allgakids.org to find a Quality Rated program that meets your needs.
- Explore your eligibility for Head Start/Early Head Start. 877-ALL-GA-KIDS can direct you to Head Start/Early Head Start programs in your community.
- Don't miss the deadline to register your 4-year-old for the free Georgia Pre-K program. 877-ALL-GA-KIDS can help find the programs in your community.

Enroll your child in a high-quality preschool or Pre-K program that supports you and your child.

- Check into evidence-based and Quality Rated programs, including Sheltering Arms, Educare Atlanta, Early Head Start, Head Start, and Georgia Pre-K that prepare children for success in school.
- Check into the Pre-K Summer Transition Program if your child did not attend a quality preschool or Pre-K program and needs additional academic support to enter kindergarten.



EDUCATORS

Participate in technical assistance and educational opportunities designed to enhance your early learning and literacy development skills

- Participate in a Better Brains for Babies workshop to learn more about the importance of early brain development in the healthy growth and development of infants and young children.
- Take advantage of educational opportunities available from the Rollins Center for Language and Literacy, and online professional development via the Cox Campus portal.
- Contact Quality Care for Children or your local Childcare Resource and Referral for free training and technical assistance.

Utilize best practice curricula and high-quality practices in your classroom.

- Seek more information on the evidenced-based and evidenced-informed practices.
- Join and support state and national professional organizations, including Georgia Association on Young Children, Georgia PTA, Prevent Child Abuse Georgia, and National Center for Families Learning.

Engage parents in their children's educational process.

- Learn more about systems change efforts such as Great Start Georgia, Strengthening Families, and United Way's Pace strategies that engage, partner with, and equip parents to better support their children's development and learning.



- Coach and empower your students' parents on the best ways to participate in their children's education.

Nurture a culture of school attendance and a climate of school safety.

- Learn about Attendance Works and how you can help parents better understand the importance of their children coming to school on time every day, especially in the early grades.
- Partner with parents, school systems, and community organizations to implement Positive Behavioral Interventions and Supports (PBIS) that create a safe school environment and encourage optimal learning and teaching.

HEALTH PROFESSIONALS

Simplify access and expand outreach, training, and data use that will maximize participation of low-income, at-risk families and their children in healthcare services.

- Support and participate in health-related associations—Georgia Perinatal Association, Georgia Public Health Association, Georgia Rural Health Association, Healthy Mothers Healthy Babies Coalition of Georgia—working across the state to improve access and better health outcomes.
- Educate families about the necessity of timely and ongoing prenatal, physical, and dental healthcare for themselves and their children.
- Partner with families and help them access health services.

Provide screening, assessment, and appropriate follow-up for social-emotional development, developmental delays and disabilities.

- Work with early learning, home visiting, and childcare programs, including Early Head Start and Head Start, to provide a key access point for conducting health and dental screening, evaluations, and referrals for conditions such as impaired vision, hearing, and developmental delays.
 - Share data and resources, particularly the ACE Study, regarding the associations between child maltreatment and the likelihood of developmental delays, and the impact of childhood stress on life-long health and well-being.
- Teach families and children** at every age about nutrition and healthy eating habits—and provide resources.
- Suggest proven models for teaching and training mothers during pregnancy and after the birth of their children—like Centering Pregnancy—to help them form good health and nutritional habits.

- Recommend supplemental nutrition programs (WIC and SNAP) and Library Summer Reading and Meals programs that can provide the healthy nutrition necessary to support learning and reading.

Partner with community organizations to identify and deliver healthcare services, and remove financial barriers.

- Support the expansion of high-quality, school-based health centers that provide access to primary and preventive healthcare, improve nutrition and health outcomes, and increase school attendance.
- Participate in collaborative efforts, local health fairs, and other health-related activities that your local Georgia Family Connection Collaborative or community health centers host to promote better nutrition, healthy living, and fitness.

COMMUNITY AND BUSINESS LEADERS

Connect and foster relationships between local community, business, education, and government leaders.

- Bring partners together to address community system-level changes regarding chronic school absence, school environment, child safety and protection, and family economic well-being.
- Make a commitment to work with other counties over time for long-term sustainable changes.
- Connect partners with local and state data, and align the resources they need to support change.
- Partner with families throughout these systems-change efforts.

Communicate the impact of your community efforts to improve early care and learning.

- Share data, research, stories, and evaluation findings with local representatives and the media.
- Use social media to start conversations by sharing your community's powerful stories about successes and challenges.

Learn more about volunteering or getting your corporation or organization involved to help get all Georgia children reading proficiently.

- Support affordable educational opportunities for parents of all backgrounds to help equip them as their child's first teacher.
- Employ evidenced-based practices and approaches to coach and mentor children, especially low-income, minority, and special-needs children, who are struggling to learn to read.
- Explore competitive federal-level grant programs to fund state-level initiatives that close reading achievement gaps.



LEGISLATORS AND INVESTORS

Continue to invest in—and expand—quality, evidenced-based early-care and childhood programs, including Quality Rated, universal Pre-K, and summer learning opportunities.

- Request community- and state-level research, data, and evaluation findings of early care and learning's impact on citizens and the economy to help guide policy decisions.
- Continue to fund and support proven approaches to quality care, including family, friend, and neighbor care, family childcare homes, and childcare centers.
- Continue to invest in, and support, proven approaches to family literacy, particularly for low-income children, including two-generation approaches to literacy and job readiness.

Promote a seamless system that supports the pathway of learning from early childhood through high school to postsecondary education.

- Continue to support Georgia Early-Education Alliance for Ready Students, Georgia Partnership for Excellence in Education, Georgia Head Start Association, Georgia Family Connection Partnership, and other organizations that are working with business, education, community, and government leaders to ensure that all children grow up healthy and ready to succeed in school and work.
- Support a research-based framework with professional development standards and guidelines for the provision of training to early childcare and education staff who provide service to the birth to age 8 population.

Support policies that increase access for young children and their families to medical insurance, nutrition, and health education and care.

- Support and expand health and related services to all children, including those with special needs.
- Support school-based and community-based healthcare as a means to provide affordable, quality care for children and families.
- Create opportunities for healthcare providers to be available in medically underserved areas through loan forgiveness and scholarships for professionals, provision of licensed telemedicine services, and recruitment and provision of culturally and linguistically appropriate services to women and children.

Endnotes/References

1. Georgia Department of Education. (2013). Testing Brief: National Assessment of Educational Progress (NAEP)—Reading, January 27-March 7, 2013.
2. Shonkoff, Jack P., M.D., Garner, Andrew S., M.D., Ph.D., and The Committee on Psychosocial Aspects of Child and Family Health, Committee on Early Childhood, Adoption and Dependent Care, and Section on Developmental and Behavioral Pediatrics. (2012). The Lifelong Effects of Early Childhood Adversity and Toxic Stress, *Pediatrics*, doi:10.1542/peds.2011-2663.
3. Felitti, V.J., Anda, R.F., Nordenberg, D., et al. (1998). Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults: The Adverse Childhood Experiences (ACE) study. *American Journal of Preventive Medicine*, 14(4), 245-258.
4. Edwards, V.J., Holden, G.W., Felitti, V.J., and Anda, R.F. (2003). Relationship between multiple forms of child maltreatment and adult mental health in community respondents: Results from the Adverse Childhood Experiences study. *American Journal of Psychiatry*, 160(8), 1453-1460.
5. Anda, R.F., Felitti V.J., Bremner J.D., et al. (2006). The enduring effects of abuse and related adverse experiences in childhood. A convergence of evidence from neurobiology and epidemiology. *European Archives of Psychiatry Clinical Neuroscience*, 256(3): 174-186.
6. The Annie E. Casey Foundation. (2010). *Early Warning! Why Reading by the End of Third Grade Matters*.
7. Zero to Three. Early Experiences Matter. main.zerotothree.org/site/PageServer?pagename=ter_key_brainFAQ&JServSessionIdr009=ei0w5pblp3.app2a#critical.
8. Williams, B.L., Dunlop, A.L., Kramer, M., Dever, B.V., Hogue, C, and Jain, L. (2013). Perinatal origins of first-grade academic failure: Role of prematurity and maternal factors. *Pediatrics*, 131(4), 693-700.
9. The Annie E. Casey Foundation. (2015). *KIDS COUNT Data Book*.
10. Centers for Disease Control and Prevention, Morbidity and Mortality Weekly Report, January 11, 2008 / 57(01).
11. Centers for Disease Control and Prevention. (2015). Childhood Obesity Facts. cdc.gov/healthyouth/obesity/facts.htm.
12. Naticchioni, Kayla. (2013). The Relationship between Obesity and Academic Achievement of School-Aged Children. *Senior Honors Projects*, Paper 9.
13. Olsen, M., Hjortdal, V.E., Mortensen, L.H., Christensen, T.D., Sorensen, H.T., and Pedersen, L. (2011). Educational achievement among long-term survivors of congenital heart defects: a Danish population-based follow-up study. *Cardiology in the Young*. 21(2):197-203. doi:10.1017/S1047951110001769.
14. Grant, R. and Brito, A. (2010). Chronic Illness and School Performance: A Literature Review Focusing on Asthma and Mental Health Conditions. *Children's Health Fund Monograph*.
15. Georgia Department of Public Health. (2015). Office of Health Information and Policy (OHIP).
16. Annor, F., Bayakly, A., Vajani, M., Drenzek, C., Lopez, F., O'Connor, J., Yancey, M. (2013). *Georgia Asthma Prevalence Report*. Georgia Department of Public Health, Health Protection, Epidemiology, Chronic Disease, Healthy Behaviors and Injury Epidemiology Section, December.
17. Dunst, C.J., Trivette, C.M., Hamby, D.W., and Bruder, M.B. (2006). Influences of contrasting natural learning environment experiences on child, parent and family well-being [Electronic version]. *Journal of Developmental and Physical Disabilities*, 18(2), 235-250.
18. National Scientific Council on the Developing Child. (2004). Young children develop in an environment of relationships: Working Paper No. 1. Retrieved from developingchild.harvard.edu.
19. Wolff, M.S., and Ijzendoorn, M.H. (1997). Sensitivity and attachment: A meta-analysis on parental antecedents of infant attachment. *Child Development*, 68(4), 571-591.
20. Shonkoff, J.P., and Bales, S.N. (2011). Science does not speak for itself: Translating child development research for the public and its policymakers. *Child Development*, 82(1), 17-32. doi: 10.1111/j.1467-8624.2010.01538.x.
21. The Annie E. Casey Foundation. (2012). Data Snapshot on High Poverty Communities. Baltimore, MD. Retrieved from aecf.org.
22. American Community Survey. (2015). Retrieved from www.factfinder.census.gov.
23. Duncan, G.J., Brooks-Gunn, J. (2000). Family Poverty, Welfare Reform, and Child Development. *Child Development*. 71(1), 188-196.
24. Hess, C., Teti, D., Hussey-Gardner, B. (2004). Self-efficacy and Parenting of High-Risk Infants: The Moderating Role of Parent Knowledge on Infant Development. *Journal of Applied Developmental Psychology*, 25: 423-443.
25. Ayoub, C., O'Connor, E., Rappolt-Schlichtmann, G., Vallotton, C., Raikes, H., and Chazan-Cohen, R. (2009). Cognitive skill performance among young children living in poverty: Risk, change,

- and the promotive effects of Early Head Start. *Early Childhood Research Quarterly*, 24:289-305.
26. Ayoub, C., Valloton, C.D., and Mastergeorge, A. M. (2011). Developmental pathways to integrated social skills: The roles of parenting and early intervention. *Child Development*, 82(2), 583-600.
 27. Caskey, M., Stephens, B., Tucker, R., and Vohr, B. (2011). Importance of parent talk on the development of preterm infant vocalizations. *Pediatrics*, 128(5), 910-916. doi: 10.1542/peds.2011-0609.
 28. Lee, K.S., and Kim, S.H. (2012). Socioeconomic background, maternal parenting style, and the language ability of five- and six-year-old children. *Social Behavior and Personality*, 40(5), 767-782. doi: 10.2224/sbp.2012.40.5.767.
 29. Merry, J.J. (2013). Tracing the U.S. deficit in PISA reading skills to early childhood: Evidence from the United States and Canada. *Sociology of Education*, 86(3), 234-252.
 30. Hart, B, Risley, T. (1995). *Meaningful differences in the everyday experiences of young American children*. Baltimore: Brookes.
 31. Fernald, A., Marchman, V.A., Weisleder, A. (2013). SES differences in language processing skill and vocabulary are evident at 18 months. *Developmental Science*. Mar. 16(2):234-248.
 32. Halle, T., Forry, N., Hair, E., et al. (2009). *Disparities in early learning and development: Lessons from the Early Childhood Longitudinal Study-Birth Cohort*. Washington DC.
 33. Governor's Office of Student Achievement. (2015). Georgia. Retrieved from gosa.georgia.gov/report-card.
 34. Dickinson, D.K., Porche, M.V. (2011). Relation between language experiences in preschool classrooms and children's kindergarten and fourth-grade language and reading abilities. *Child Development*. 82(3):870-886.
 35. Fiester, L, Smith, R. (2010). *Early warning: Why reading by the end of third grade matters*. Baltimore, MD: The Annie E. Casey Foundation.
 36. Rowe, M.L., Raudenbush, S.W., and Goldin-Meadow, S. (2012). The pace of vocabulary growth helps predict later vocabulary skill. *Child Development*. Mar-Apr. 83(2):508-525.
 37. Feng, J., Kramer, M.R., Dever, B.V., Dunlop, A.L., Williams, B., and Jain, L. (2013). Maternal Smoking During Pregnancy and Failure of the Georgia First Grade Criterion-Referenced Competency Test. *Paediatric and Perinatal Epidemiology*, 27(3), 275-282. doi: 10.1111/ppe.12044.
 38. Martin, R.P., Dombrowski, S.C., Mullis, C., Wisenbaker, J., and Huttunen, M.O. (2006). Smoking During Pregnancy: Association with Childhood Temperament, Behavior, and Academic Performance. *Journal of Pediatric Psychology*, 31(5), 490-500. doi: 10.1093/jpepsy/jsj041.
 39. Child Trends. (2014). *Data Bank: Breastfeeding: Indicators on Children and Youth*. Bethesda, MD.
 40. Williams, E., and Radin, N. (1993). Paternal involvement, maternal employment, and adolescents' academic achievement: An 11-year follow-up. *American Journal of Orthopsychiatry*, 63(2), 306-312. doi: 10.1037/h0079415.
 41. Knox, V., Cowan, P.A., Pape Cowan, C., and Bildner, E. (2011). Policies that strengthen fatherhood and family relationships: What do we know and what do we need to know? *Annals of the American Academy of Political and Social Science*, 635(1), 216-239. doi: 10.1177/0002716210394769.
 42. Data Analysis Audits and Reporting. (2015). Georgia Division of Family and Children Services.
 43. Jütte, S., Bentley, H., Miller, P., and Jetha, N. (2014). *How safe are our children?* London: NSPCC.
 44. Brooks-Gunn, J., Duncan, G.J., Klebanov, P. K., Seland, N. (1993). Do neighborhoods influence child and adolescent development? *American Journal of Sociology*, 99, 2, pp. 353-395.
 45. Ainsworth, J.W. (2002). Why does it take a village? The mediation of neighborhood effects on educational achievement. *Social Forces*, 81(1), 117-152. doi: 10.1353/sof.2002.0038.
 46. Duncan, G.J., Brooks-Gunn, J., and Klebanov, P.K. (1994). Economic deprivation and early childhood development. *Child Development*, 65(2), 296-318. doi: 10.2307/1131385.
 47. Wacquant, L. (1996). Red belt, black belt: racial division, class inequality and the state in the French urban periphery and the American ghetto, in: E. Mingione (Ed.) *Urban Poverty and the Underclass*, pp. 234-274.
 48. Duncan, G.J., Dowsett, C.J., Claessens, A., Magnuson, K., Huston, A.C., Klebanov, P., and Japel, C. (2007). School readiness and later achievement. *Developmental Psychology*, 43(6), 1428-1446. doi: 10.1037/0012-1649.43.6.1428.
 49. Singer, M.I., Anglin, T.M., Song, L., and Lunghofer, L. (1995). Adolescents' exposure to violence and associated symptoms of psychological trauma. *JAMA*, 273, 477-482.
 50. Shonkoff, Jack P. (Editor), Phillips, Deborah A. (Editor), Committee on Integrating the Science of Early Childhood Development.

- (2000). From Neurons to Neighborhoods: *The Science of Early Childhood Development*. Washington, DC, USA: National Academies Press, p 39.
51. Johnsona, R.M., Kotch, J.B., Catellier, D.J., Winsor, J.R., Dufort, V., Hunter, W., and Amaya-Jackson, L. (2002). Adverse Behavioral and Emotional Outcomes from Child Abuse and Witnessed Violence. *Child Maltreatment*, 7(3), 179-186. Doi: 10.1177/1077559502007003001.
 52. Rolnik, A. (2005). *Q&A on Early Childhood Development: Economic Development with a High Public Return*. YMCA, December.
 53. Rolnick, A.J., Grunewald, R. (2011). Early Childhood Development is High-Return Economic Development. *Children and Families Subcommittee, Health Education, Labor, and Pensions (HELP) Committee*. June 9.
 54. Heckman, J. (2008). Return on Investments: Cost vs Benefits. heckmanequation.org.
 55. Heckman, J., Grunewald R., and Reynolds, A. (2006). The Dollars and Cents of Investing Early: Cost-Benefit Analysis in Early Care and Education. *Zero to Three*, 26(6), 10-17.
 56. Ramey, C., Campbell, F., Burchinal, M., Skinner, M., Gardner, D., and Ramey, S. (2000). Persistent Effects of Early Childhood Education on High-Risk Children and Their Mothers. *Applied Developmental Science*, 4(1), 2-14.
 57. McWayne, C., Fantuzzo, J., Cohen, H.L., and Sekino, Y. (2004). A multivariate examination of parent involvement and the social and academic competencies of urban kindergarten children. *Psychology in the Schools*, 41(3), 363-377.
 58. Cook, G.A., Roggman, L.A., and Boyce, L.K. (2011). Fathers' and mothers' cognitive stimulation in early play with toddlers: Predictors of 5th grade reading and math. *Family Science*, 2(2), 131-145.
 59. Georgia KIDS COUNT. (2015). Georgia Family Connection Partnership. Atlanta. www.gafcp.org.
 60. Georgia Department of Early Care and Learning (DECAL). (2015). Research and Policy Analysis Unit.
 61. Adams, G., and Rohacek, M. (2002). More than a work support? Issues around integrating child development goals into the childcare subsidy system. *Early Childhood Research Quarterly*, 17, 418-440.
 62. Chaudry, A. (2004). *Putting children first: How low-wage working mothers manage childcare*. New York: Russell Sage Foundation.
 63. Meyers, M., Peck, L.R., Collins, A., Kreader, J.L., Georges, A., Davis, E.E., and Olson, J.A. (2001). *The dynamics of childcare subsidy use: A collaborative study of five states*. New York: National Center for Children in Poverty.
 64. Georgia Department of Education. (2015). gadoe.org/External-Affairs-and-Policy/Policy/Pages/School-Climate.aspx.
 65. Brand, S., Felner, R., Shim, M., Seitsinger, A., and Dumas, T. (2003). Middle school improvement and reform: Development and validation of a school-level assessment of climate, cultural pluralism, and school safety. *Journal of Educational Psychology*, 95(3), 570-588.
 66. Patton, G.C., Bond, L., Carlin, J.B., Thomas, L., Butler, H., Glover, S., Catalano, R., and Bowes, G. (2006). Promoting social inclusion in schools: A group-randomized trial of effects on student health risk behavior and well-being. *American Journal of Public Health*, 96(9), 1582-1587.
 67. Georgia Department of Education. (2015). Retrieved from: gadoe.org/Curriculum-Instruction-and-Assessment/Special-Education-Services/Pages/Positive-Behavioral-Interventions-and-Support.aspx.
 68. Ready, D.D. (2010). Socioeconomic disadvantage, school attendance, and early cognitive development: The differential effects of school exposure. *Sociology of Education*, 83(4), 271-286. doi: 10.1177/0038040710383520.
 69. McCluskey, C.P., Bynum, T.S., and Patchin, J.W. (2004). Reducing chronic absenteeism: An assessment of an early truancy initiative. *Crime & Delinquency*, 50(2), 214-234.
 70. McGibboney, G. (2013). School Absences: Changing the Conversation. Georgia Department of Education.
 71. U.S. Department of Health and Human Services, U.S. Department of Education. (2014). Policy Statement on Expulsion and Suspension Policies in Early Childhood Settings.
 72. U.S. Department of Education Office for Civil Rights. (2014). Data Snapshot: Early Childhood Education.
 73. Rollins Center for Language and Literacy. (2015). Read Right from the Start, Retrieved from: readrightfromthestart.org/results.
 74. Sege, R. and Linkenbach, J. (2014). Essentials for Childhood: Promoting Healthy Outcomes from Positive Experiences. *Pediatrics*, 133; e1489; doi: 10.1542/peds.2013-3425.

RESOURCES

Where Do I Go for More Information?

Georgia Data

Georgia Department of Education
gadoe.org

Georgia KIDS COUNT
gafcp.org/kidscount

Georgia Office of Student Achievement
gosa.georgia.gov

Georgia's Online Analytical Statistical
Information System
oasis.state.ga.us

GEEARS Blueprint
gears.org/initiatives/blueprint

Neighborhood Nexus
neighborhoodnexus.org

Quality Care for Children's Georgia
Childcare and Early Education Data
qccdata.org/qcc-cd-county-profiles.php

National Data

Centers for Disease Control Vital Stats
cdc.gov/nchs/VitalStats.htm

Child Trends DataBank
childtrendsdatabank.org

Data Resource Center for Child and
Adolescent Health: NSCH CHSCN
childhealthdata.org

Kaiser Family Foundation, State
Health Facts
statehealthfacts.org

KIDS COUNT Data Center
kidscount.org/datacenter

Georgia State Agencies

Georgia Department of Community Health
dch.georgia.gov

Georgia Department of Early Care
and Learning
dec.al.ga.gov

Georgia Early Learning Development
and Standards
gelds.dec.al.ga.gov

Georgia Division of Family and
Children Services
dfcs.dhr.georgia.gov/portal/site/DHR-DFCS

Georgia Department of Public Health
dph.georgia.gov

Associations and Organizations

Georgia

All Georgia Kids
allgakids.org

Better Brains for Babies
bbbgeorgia.org/aboutUs.php

Childcare Resource and Referral System
dec.al.ga.gov/ChildCareServices/CCRRSystem.aspx

First Foundation for Childhood Literacy
firstbooks.com

Georgia Association on Young Children
gayconline.org

Georgia Early Education Alliance for
Ready Students
gears.org

Georgia Chapter American Academy of
Pediatrics
gaaap.org

The Georgia Head Start Association, Inc.
georgiaheadstart.org

Georgia Partnership for Excellence
in Education
gpee.org

Georgia Pathway to Language and Literacy
georgialiteracy.org

Georgia Perinatal Association
georgiaperinatal.org

Georgia Parent Teacher Association
georgiapta.org

Georgia Public Health Association
gapha.org

Georgia Public Library Service
georgialibraries.org

Georgia Rural Health Association
grhainfo.org

Healthy Mothers Healthy Babies Coalition
of Georgia
hmhbga.org

New American Pathways
newamericanpathways.org

Prevent Child Abuse Georgia
abuse.publichealth.gsu.edu/about

Quality Care for Children
qualitycareforchildren.org

National

American Academy of Pediatrics
aap.org

American Library Association
ala.org

Centers for Disease Control
Injury Prevention and Control, Division of
Violence Prevention
cdc.gov/violenceprevention/acestudy/index.html

Center for the Study of Social Policy
Strengthening Families America
cssp.org/reform/strengtheningfamilies

Where do I go for more information?

Children's Defense Fund
childrensdefense.org

Get Ready to Read
getreadytoread.org

Harvard Center for the Developing Child
developingchild.harvard.edu

National Association for the Education
of Young Children
naeyc.org

National Center for Children in Poverty
nccp.org

National Center for Families Learning
familieslearning.org

Prevent Child Abuse America
preventchildabuse.org

RAND Corporation
rand.org/research_areas/children

Trust for America's Health
healthyamericans.org

U.S. Department of Health and Human
Services Administration for Children
and Families
acf.hhs.gov

U.S. Department of Health and Human
Services Health Resources and Services
Administration School-Based Health
Centers
hrsa.gov/ourstories/schoolhealthcenters

U.S. Department of Health and Human
Services Office of Minority Health
minorityhealth.hhs.gov

ZERO TO THREE
zerotothree.org

Foundations and Grantmakers

Georgia

Aflac Foundation
[aflac.com/us/en/aboutaflac/
communityinvolvement.aspx](http://aflac.com/us/en/aboutaflac/communityinvolvement.aspx)

AMERIGROUP Georgia
[myamerigroup.com/ga/pages/
welcome.aspx](http://myamerigroup.com/ga/pages/welcome.aspx)

The Arthur M. Blank Family Foundation
blankfoundation.org

Community Foundations
tgci.com/funding-sources/GA/community

Georgia Health Foundation
gahealthfdn.org

Healthcare Georgia Foundation
healthcaregeorgia.org

Kaiser Permanente— Georgia
xnet.kp.org/ga/giving/CGPoverview.html

March of Dimes— Georgia Chapter
marchofdimes.com/georgia

Peachcare for Kids
peachcare.org

PNC Bank
www1.pnc.com/pncfoundation/index.html

The James M. Cox Foundation
[coxenterprises.com/corporate-
responsibility/giving/foundations.aspx#.VXtVFPIVhBc](http://coxenterprises.com/corporate-responsibility/giving/foundations.aspx#.VXtVFPIVhBc)

WellCare
georgia.wellcare.com

National

Allen Foundation, Inc.
[allenfoundation.org/commoninfo/aboutus.
asp](http://allenfoundation.org/commoninfo/aboutus.asp)

AMA Foundation
[ama-assn.org/ama/pub/about-ama/our-
people/affiliated-groups/ama-foundation.
shtml](http://ama-assn.org/ama/pub/about-ama/our-people/affiliated-groups/ama-foundation.shtml)

The Annie E. Casey Foundation
aecf.org/about/grant-making

AMERIGROUP Foundation
[amerigroupcorp.com/about/vision/Pages/
Foundation.aspx](http://amerigroupcorp.com/about/vision/Pages/Foundation.aspx)

Kaiser Permanente— National
info.kp.org/communitybenefit/html/index.html

March of Dimes— National
marchofdimes.com

Robert Wood Johnson Foundation
rwjf.org/about

Acknowledgments

Thank you to our advisory committee members for their time, guidance, thoughtful discussions, and other help in creating this compendium.

Diane Bellem
Sheltering Arms Early Education and Family Centers

Maria Fernandez
Georgia Department of Public Health

Hanah Goldberg
Georgia Early Education Alliance for Ready Students

Veda Johnson, M.D.
Department of Pediatrics
Emory University School of Medicine

Garry W. McGiboney
Georgia Department of Education

Bentley D. Ponder
Georgia Department of Early Care and Learning

Dana Rickman
Georgia Partnership for Excellence in Education

Bruce Roaden
City Schools of Decatur

Pam Runkle
Quality Care for Children

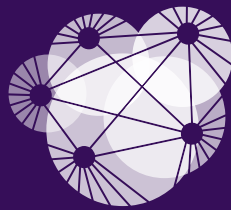
Jennifer Stapel-Wax
Department of Pediatrics
Emory University School of Medicine
Marcus Autism Center
Children's Healthcare of Atlanta

Pam Tatum
Quality Care for Children

Special thanks go to John Carter and Gordon Freymann of the Georgia Department of Public Health, Office of Health Indicators for Planning, and to Danny Ayoubi of the Georgia Department of Education for providing data for this report.

Every photo in this compendium portrays children and adults in Georgia. We are grateful to Scott Dean, Georgia Department of Education, Bright from the Start: Georgia Department of Early Care and Learning, and Georgia Family Connection for providing photos.

FUNDED BY
THE ANNIE E. CASEY FOUNDATION AND
GEORGIA FAMILY CONNECTION PARTNERSHIP



GEORGIA
family connection
PARTNERSHIP

235 Peachtree Street, Suite 1600
Atlanta, GA 30303
404-527-7394

gafcp.org

© 2016 Georgia Family Connection Partnership
Second printing