concepts

Using what we know to improve education



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Judith A. Rizzo, Ed.D. Executive Director

April D. White, Editor Director of Communication: awhite@hunt-institute.org

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1000 Park Forty Plaza Suite 280 Durham, NC 27713 p: 919.425.4160 f: 919.425.4175 www.hunt-institute.org

INTEGRATED SERVICES: KEY TO ACADEMIC SUCCESS

In order to be competitive in today's world, it is necessary for North Carolina to have a well-educated workforce. Quality schools, including effective leadership, excellent teachers, and improved academic standards and rigor, are undeniably a major factor in these endeavors. However, what is often overlooked is that good schooling starts well before a student ever steps foot into a classroom. The tools needed for academic success start developing in infancy, and once a child falls behind, it is extremely difficult to catch up.

The obstacles facing at-risk children are further magnified by the hardships ahead. The achievement gap between students from low-socioeconomic backgrounds and those from higher socioeconomic backgrounds exists before students ever enter school. Research shows that low-income students enter school behind their middle and upper-income peers on dimensions of cognitive and social development and are in poorer health. Sound judgment would dictate that we have to give these students more attention and intervention to compensate for this early disadvantage, but often these students continue to receive less as they travel through our K-12 system. Less qualified teachers, larger class sizes, less rigor, lower expectations—the list goes on—all add up to a cumulative effect of poverty that is detrimental to the success of many students.

The disadvantages faced by these students should neither be seen as an excuse for the low quality of schools that serve this population, nor should they be seen as a reason to lower standards. Nevertheless, if we are to truly close the achievement gap and ensure that all students are able to compete in the global economy, we cannot ignore these disadvantages either. Rather, we must find ways to help these students compensate for the disadvantages that they are already facing, as well as develop programs to ensure that future students enter school at the same level as their more advantaged peers.

This inaugural issue of **coNCepts** discusses integrated services for students in North Carolina and why they are key to the academic success of North Carolina's at-risk children.



Understanding the Challenge

Research shows that by the time children enter school, sizeable gaps already exist between low-income children and their more advantaged peers. Low socioeconomic status, poor health, disruptive communities, uncertain housing situations, and lack of parental education can negatively affect not only children's readiness for school, but also their academic success in later years.

Children's socioeconomic backgrounds have a large effect on their readiness for school. Reading to young children early and encouraging them to read on their own provides a strong foundation for literacy. Parents with higher levels of education typically read to their children more often than parents with less education, giving their children a better chance than their less advantaged peers for academic success.

In general, low-income parents also interact differently with their children. While middle and upper-income parents speak more frequently to their children from a very early age, lower-income families are less likely to engage preverbal children in conversation due to differences in parenting styles. Researchers Betty Hart and Todd Risley conducted a longitudinal study on language acquisition and found that three-year-old children from highsocioeconomic backgrounds had vocabularies that were nearly 50 percent greater than children from middle and low-socioeconomic backgrounds, and twice as large as those of children whose families received welfare. Another study found that low-income children began school more than a year behind middleincome children.

In addition to socioeconomic and cultural differences, low-income children have more health problems. Low-income children lack access to quality medical care and have a higher prevalence of medical conditions, such as asthma and lead exposure, that can affect their performance in school. Nationally, 11 percent of children are uninsured,

Health Challenges and Student Performance for Low-Income Children

Below are descriptions of health challenges commonly faced by low-income students and their effects on school performance.

VISION

Low-income children are much more likely to have vision problems that remain undiagnosed and have severe vision impairments at twice the normal rate. Approximately **50 percent of minority and poor children have vision problems that affect their academic performance**.

Uncorrected vision problems can have an enormous effect on school performance. Children with poor vision have difficulty reading and seeing the board, leading to frustration and disengagement with school. In addition, young students with poor vision may have difficulty recognizing letters and learning to read.

NUTRITION

Nationwide, **12.6** million children live in households that experience hunger or the risk of hunger. Poor nutrition and unhealthy eating habits are also an issue for low-income students. Obesity rates for both low-income and minority children have been consistently higher than the rates for all children over the past several decades.

The relationship between good nutrition and academic performance is recognized; some school districts even boost the caloric content of school lunch offerings on testing days. Poor nutrition can cause iron deficient anemia which affects cognitive ability. In addition, while many students are eligible to receive subsidized lunches, participation in the Free and Reduced Lunch Program often declines in the high school years as students begin to feel stigmatized.

LEAD EXPOSURE

While regulations now exist to limit lead exposure, poor children still face much higher exposure rates than middle-class children, as they often live in older buildings and attend older schools. Low-income children have high blood lead levels at five times the rate of middle class children.

The effects of lead poisoning on cognitive ability are well-documented. Lead dust can harm cognitive functioning and cause behaviorial problems in school. High lead levels have also been connected to hearing loss.

ASTHMA

Low-income children, particularly those who live in densely populated city neighborhoods, are much more likely to contract asthma. In addition to higher prevalence, low-income children are also less likely to receive treatments.

When untreated, asthma keeps children up at night, which leads to drowsiness and inattentiveness at school. Low-income children with asthma are almost **80 percent more likely** than middle-class children with asthma to **miss more than 7 days of school per year**. A recent report by the Centers for Disease Control and Prevention estimates that **asthma accounts for 14 million lost school days each year**.

leaving them unlikely to receive preventative care. In North Carolina, 14 percent of all children are uninsured. Of that 14 percent, 63 percent are from low-income families.

With a higher prevalence for many health issues and less access to preventative care, poor children miss school more often than their peers. Chronic absenteeism causes students to fall behind, and after a certain point it becomes very difficult for them to catch

up. Studies have also found connections between high absenteeism and dropping out. Robert Balfanz, a researcher at Johns Hopkins University, and his colleagues found that among other academic and educational engagement factors, low attendance (80 percent or below) in the sixth and eighth grades and the first 30 days of the ninth grade were highly predictive risk factors for dropping out.



Health Issues and School Performance for Low-Income Children

Housing is another issue that affects many low-income students. In both urban and rural areas, the quality of housing for low-income families is inadequate. Students live in poor and often crowded conditions, which can make it difficult for them to get the proper amount of sleep or find a quiet space to study and do their homework. Students from low-socioeconomic backgrounds tend to move more frequently and attend schools with higher mobility rates. A 1998 study by the U.S. Department of Education found that 43 percent of low-income fourth-graders had changed schools in the past two years, compared to only 26 percent of their peers.

When children change schools midyear, even within districts, it is likely that their new classes will not be at the same point in the curriculum as their previous classes. Transfer students who are ahead of their new classes in the curriculum may become bored and disengaged. while those who are behind are not likely to catch up. High school students who move in the middle of the school year may not gain enrollment in the same classes. In addition, research has shown that highly mobile students are more likely to experience psychological and/or behavioral problems than students who did not move or who moved less frequently. High mobility rates affect even those students who have stable housing, as their classrooms are frequently disrupted or reconstituted to accommodate the new students. One study in California found that average test scores for non-mobile students were significantly lower at high schools with high mobility rates.

With the current economic conditions, student mobility is likely to remain an issue for many of our students, and if current economic trends continue, we will also face a rise in the number of homeless students. Nationally, 10 percent of poor children are likely to

experience homelessness in the span of a year. While federal legislation has significantly increased access to education for homeless children, the law is still not fully funded. Even when homeless children are enrolled in school, they attend school less regularly and move around more frequently, putting them at a significant disadvantage.

Any one of these factors would have a profound effect on most children, but our low-income students deal with most, if not all, of these challenges every day.

The Status of Children in North Carolina

From 2001 to 2006, the number of children under age six living in poverty in North Carolina increased more quickly than the population of children under age six as a whole. During that same fiveyear period, the percentage of students enrolled in free or reduced lunch increased from 47 percent to 55 percent. In 2007, approximately 20 percent of all North Carolina children were living below the federal poverty line, compared to 18 percent nationwide. The numbers are even more distressing when broken down by racial or ethnic groups: 34 percent of African-American children and 32 percent of Hispanic children living in poverty in North Carolina. Forty-three percent of all children in North Carolina are from low-income families, which equates to 200 percent of the federal poverty line or below.

Despite statewide efforts in early childhood education, only 46 percent of three and four-year-olds in North Carolina were enrolled in a preschool program, and only 26 percent of all children under six were enrolled in regulated early care and education programs in 2006. Of those children who were enrolled, only 51 percent of children under age three and 62 percent of children ages three to five were enrolled in four or five-star centers. Currently, over 36,000 North Carolina families are on waiting lists to receive childcare subsidies.

In 2001, North Carolina produced a study of school readiness among a sample of kindergartners. The study found that, on average, North Carolina kindergartners scored lower on their understanding of spoken words than kindergartners nationwide. In addition to having a lower average score, North Carolina had fewer children scoring very high and more children scoring very low than the nation as a whole. Perhaps unsurprisingly, the study also found that low-income students scored much lower on all measures of language development and communication. This pattern persisted across other indicators of school readiness, including general knowledge, math development, social development, and approaches to learning. With this study, North Carolina led the way in focusing on school readiness; however, North Carolina has not published a comprehensive report on school readiness indicators since 2001.

Approximately 14 percent of all North Carolina children are uninsured; 63.6 percent of those children are from lowincome families. Low-income children in North Carolina face the same health problems of their low-income counterparts in urban and rural areas across the country, including higher rates of asthma and obesity. In 2007, 15.7 percent of North Carolina children were diagnosed with asthma. Our nation's growing childhood obesity epidemic has also struck North Carolina. Almost onethird of low-income middle and high school students and one quarter of lowincome elementary students in North Carolina are overweight or obese. Also, in 2007. North Carolina ranked fifth in the nation for the highest rate of overweight children. Lack of physical activity and poor nutrition are two contributors to this epidemic. In a survey of North Carolina parents, one out of three parents reported that their child eats fast food two or more times per week. The prevalence of childhood diabetes is also growing in North Carolina. During the 2005-2006 school year, more than 4,000 North Carolina



Collaboration at the State Level: The New Mexico Children's Cabinet

In 2003, New Mexico Governor Bill Richardson issued an Executive Order establishing the New Mexico Children's Cabinet. The purpose of the Cabinet was to create a venue for collaboration across departments in order to maximize resource allocation and to track the well-being of children and youth in New Mexico. During his campaign in 2002, Governor Richardson committed to prioritize an agenda which promoted the well-being of children in New Mexico, and the creation of the Cabinet was viewed by advocates as a first step towards fulfilling that commitment.

Following the Executive Order, New Mexico Lieutenant Governor Diane Denish and the Cabinet members held a retreat and established five outcome areas on which to focus their work.

- Physical and mental health
- Safety and support in families and communities
- Readiness for, and success in, school
- Transitions to employment and adulthood
- Active participation of youth in their communities

The New Mexico Children's Cabinet is chaired by the Lieutenant Governor and comprised of 15 Cabinet secretaries, as well as representatives from three agencies and the judiciary. Sustaining legislation was passed in 2005, establishing the New Mexico Children's Cabinet in statute.

At a 2005 Children's Cabinet Roundtable, hosted by The Forum for Youth Investment, Lieutenant Governor Denish outlined several examples of the Cabinet's success. First, she noted that the Children's Cabinet director position is funded jointly by each state department. Denish explained that this ensures that "all departments have a stake in the position's success" and the position is more neutral than if it were funded by one department. Second, Denish praised the "solid buy-in" of the agency directors on the Cabinet. Finally, Denish acknowledged the importance of broad stakeholder engagement. The New Mexico Children's Cabinet has had wide support among philanthropic and non-profit organizations, as well as the business community, which has contributed to its success.

In addition, the Children's Cabinet has worked hard to align policies and programs for children to better meet its goals. The publication of the annual report cards and budget reports has helped to demonstrate the Cabinet's value to the public, and town hall meetings have helped to build demand and invest communities across the state. Finally, the active leadership of Lieutenant Governor Denish has rallied public support for the cause, engaging state and community stakeholders in the Cabinet's work and writing editorials for local papers to reach out to more constituents on children's issues.

students were identified as having diabetes. One study estimates that the annual cost to North Carolina of childhood obesity related expenses is almost 16 million dollars.

The *Kids Count* project at the Annie E. Casey Foundation ranks states on 10 child wellness indicators, including the child poverty rate and the high school dropout rate. While North Carolina has moved up in the overall rankings over the past several years, in 2005-2006 the state was ranked 38th.

The Effects of Starting Behind

Children who begin their K-12 careers developmentally behind continue to fall

behind as they move through school. Research has shown that entering children's cognitive skills are highly predictive of later achievement in school and early adulthood. Children who start school behind are more likely to drop out, become teen parents, or engage in criminal activities.

With this in mind, we must consider the costs of not investing in our state's poor children, both in the early years and as they progress through school. By all accounts, increasing academic achievement and graduation rates will have positive economic benefits for the state. A study by the Alliance for Excellent Education found that a five percent increase in the high school

graduation rate for North Carolina would result in more than \$200 million in benefits to the state economy.

Ensuring that all of our children are receiving preventative health care and early education will save the state money on more costly interventions and services through childhood and adulthood.

Current Efforts in North Carolina

There are numerous initiatives underway to address these problems in North Carolina. Recognized as an early leader in programs of its kind, *Smart Start* is a nationally recognized early childhood initiative, first started in 1993. Operating as a public-private partnership, *Smart Start* has received annual state



TATE	TITLE OF CABINET	YEAR ESTABLISHED	
Arizona	Governor's Children's Cabinet	2003	
Connecticut	Early Childhood Education Cabinet	2005	
Florida	Children and Youth Cabinet	2007	
Georgia	First Lady's Children's Cabinet	2004	
lowa	Collaboration for Youth Development	1999	
Kansas	Children's Cabinet and Trust Fund	1999	
Kentucky	Youth Development Coordinating Council	2006	
Louisiana	Governor's Children's Cabinet	1998	
Maryland	Children's Cabinet and Governor's Office for Children	1988	
Maine	Governor's Children's Cabinet	1995	
Michigan	Children's Cabinet	2002	
Montana	Governor's Council on Families	1996	
New Jersey	Governor's Cabinet for Children	2003	
New York	Children's Cabinet	2007	
Ohio	Family and Children First Cabinet Council	1993	
Oklahoma	Commission on Children and Youth	1982	
Oregon	Commission on Children and Families	1993	
Pennsylvania	Governor's Cabinet on Children and Families	2003	
Rhode Island	Children's Cabinet	1991	
Tennessee	Children's Cabinet	2003	
Utah	Families, Agencies, and Communities Together	1989	
Washington, DC	Interagency Collaboration and Services Integration Commission	2007	
West Virginia	Governor's Cabinet on Children and Families	1999	

appropriations from the North Carolina General Assembly and raised more than \$319 million in private contributions during the past 15 years. This money is invested in all 100 counties through local partnerships. Other early childhood initiatives in North Carolina include *Even Start*, which incorporates early childhood education with adult literacy and parenting classes, and *More at Four*, which provides full-day, year-round pre-K to at-risk students.

The *Child and Family Support Teams* project is a joint initiative between the Department of Public Instruction and the Department of Health and Human

Services that provides a full-time nurse and social worker to selected schools to help connect families to needed services. Currently, teams are serving at-risk students in 101 schools in 21 counties. The project is now in its third year of the pilot phase and is being evaluated by a team of researchers at Duke University's Center for Child and Family Policy.

There are also numerous efforts underway across the state to try to curtail the dropout epidemic. Many organizations and local schools and districts are working to improve graduation rates. The North Carolina General Assembly provided \$7 million in dropout

prevention grant funding in 2007 and another \$15 million in 2008.

North Carolina is making steps in the right direction to ensure that all students can and will succeed. Many different agencies and entities are working towards improving outcomes for children; however, in a time of ever tightening budgets, it would be a powerful, efficient use of state resources to consider ways in which state agencies could collaborate on issues of joint concern and focus their collective will to find policy solutions.



Implications

Considering how students are viewed and how money is spent is critical to improving student achievement. A collaborative system views students according to their needs and ensures that they are getting the integrated services necessary for success in school. As resources continue to decline, it is even more crucial to look closely at ways in which cooperation and integration are inadvertently discouraged. If educational opportunities and outcomes for all students are to truly improve, then state agencies must collaborate to meet the needs of all children. In moving towards such a system, it is important to consider the following implications.

1. Avoiding funding silos is critical.

It is important for states to look at the programs that serve children in terms of student needs and move away from the boundaries of existing agency frameworks. One way to accomplish this is to create a **cross-agency children's budget** that looks at the various funding streams for each of a state's student priorities. The New Mexico Children's Cabinet produces an annual children's budget to "provide a clear picture of where investments are made across departments and programs." New Mexico uses this document to guide future policymaking and inform service delivery. Producing an annual children's budget also allows states to look at their spending in different areas over time.

2. Thorough and frequent gap analyses are vital.

The need to compete for state resources drives state agencies to produce results. However, without communication, agencies might end up focusing on the same issues. Therefore, it is important for states to be aware of **critical gaps in services**. By consistently examining what services are provided across agencies, states can identify these gaps and agencies can work cooperatively to ensure that all needs are being met. Using a children's budget as described above can be a valuable tool in gap analysis, as it highlights redundancies and identifies areas that are underserved.

3. Evaluation is key.

It is important for policymakers to remain vigilant about looking at outcomes, rather than programs. With issues such as the achievement gap or the dropout rate, a state's drive and enthusiasm for finding a solution might tend towards focusing on the "means" instead of the "ends." In order to create a system in which all children can succeed, states must scrutinize programs based on the outcomes they achieve. This means building in **strong evaluation guidelines** when funding new initiatives, and then following through when a program shows itself to be ineffective. In addition to the Children's Budget report, the New Mexico Children's Cabinet also produces an annual Children's Report Card. The Report Card tracks outcomes for children along the Cabinet's priorities and demonstrates New Mexico's progress over time, as well as how the state is doing.

4. Tracking individual students is essential.

A unique student identifier shared across agencies will allow states to track individual students and connect them to both their classrooms and the various programs that serve them. This will allow states to identify promising programs, as well as those initiatives which are not effective. It will also make it easier to connect students to the services they need and to identify students who are at-risk of, or are, falling behind early in their academic careers.

Final Thoughts

North Carolina has made great strides in improving educational quality for children and has been a leader in state education reform. Clearly, North Carolina is a state in which policymakers care for children and are passionate about their future success. Therefore, it is important to remain vigilant in providing equitable opportunities and outcomes for all students. In tight economic times, low-income families are often hit the hardest, and policymakers must be especially mindful of disadvantaged students as they will feel the impact more dramatically than the rest of the student population. Finding opportunities for cooperation and collaboration will allow states to focus money on children in the areas in which they need it most.

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1000 Park Forty Plaza | Suite 280 | Durham, NC 27713 | p: 919.425.4160 | f: 919.425.4175 www.hunt-institute.org