Special Education Needs: Differences between First Class Pre-K Students and Non-First Class Pre-K Students and Potential Cost Savings

Background
The mission of the Alabama Department of Early Childhood Education (DECE) is to provide state leadership that identifies, promotes, and coordinates efforts and programs for children, their families, and communities. Housed within the Department of Early Childhood Education, the Office of School Readiness administers Alabama’s diverse delivery, voluntary, high quality Pre-K program. Classrooms are funded through a grant process in which programs must meet specific quality standards and abide by rigorous operating guidelines. Alabama’s First Class Pre-K program has been awarded the highest quality rating by the National Institute for Early Education Research (NIEER) for the past 12 years.

Introduction
Special education is specially designed instruction provided to meet the unique needs of children with disabilities. Special education services include classroom instruction as well as related services such as speech-language pathology, physical therapy, occupational therapy, audiology, and psychological services that assist children with disabilities in benefitting from the educational experience. Children are eligible for special education services in Alabama based on disability categories recognized by the Individuals with Disabilities Education Act and receive services through an Individualized Education Program. Special education services have additional costs above those for general education. The purpose of this issue brief is to examine differences in special educational needs between students who received First Class Pre-K and those who did not.

Methods
Data include all Alabama children (58,760) who entered Kindergarten in 2010 and who were followed through 5th Grade into the 2016-2017 school year. Data were analyzed with regard to whether the children received a state-funded First Class Pre-K experience in the 2009-2010 school year and whether the children received special education services in any or all school years. A difference in special education need was calculated based on the number of First Class Pre-K students who would have required special education, assuming they had special education rates equal to those observed for the non-First Class Pre-K group. Cost savings from reduced special education were calculated based on the additional cost for special education above that for general education per student per year ($8,262 in 2016) multiplied by the reduction in the number of students requiring special education (rounded up to next whole number). For example, in 5th grade, the difference between rates of special education for First Class Pre-K and Non-First Class Pre-K indicates that 45 additional children would have needed special education (45 x $8,262 = $371,790). Projected total cost savings are the sum of the actual savings for K-5th and projected for 6th-12th assuming similar trends.

Findings
Overall, a smaller percentage of children who went to First Class Pre-K started Kindergarten with disabilities than children who did not attend Pre-K. Even as the number of children identified with disabilities increases through the grades, this percentage increase is smaller in every grade. The percentage is for ALL children in the school year, so a 1% increase equals roughly 587 more children per grade. At each grade, children who received First Class Pre-K had lower percentages of special education.
Implications

At each grade observed in the study, children who received First Class Pre-K needed special education at lower rates compared to children who did not receive First Class Pre-K. By 5th grade, there were 7% fewer students requiring special education services among children who received First Class Pre-K. Whether a child receives special educational services by the end of 3rd grade has been associated with greater deficits in reading and general academic performance. Further, reductions in the need for special education translate into cost savings. These findings are for one group of children who received First Class Pre-K prior to attending Kindergarten – representing just 5% of the total number of children who started Kindergarten in 2010 – and apply across all racial, ethnic, and income status groups. Expanding First Class Pre-K is expected to result in significantly more cost savings from reduced special education.

References: