



seeding success

Communities across Tennessee are looking for ways to improve academic outcomes, particularly within the context of early literacy. It is in this spirit that an analysis of academic and non-academic variables was conducted for approximately 19,000 children who were enrolled, for some length, in Books from Birth (BfB) during their first five years of life, and later enrolled in Shelby County Schools. The analysis matched Kindergarten through Fourth Grade students who were enrolled in Shelby County Schools between the academic years 2013/14 and 2015/16.

The findings of the analysis suggest that children who were enrolled longer in BfB had statistically significantly higher academic scores on the SAT 10 assessment areas given in First and Second Grade :

- Word Study Skills ($R^2 = 0.03$; $P < 0.0001$)
- Math Problem Solving ($R^2 = 0.04$; $P < 0.0001$)
- Combined Reading and Math ($R^2 = 0.05$; $P < 0.0001$)

Additionally, Lexile scores, across all grades, had a statistically significant positive relationship with duration of enrollment in BfB.

- Kindergarten ($R^2 = 0.2$; $P = 0.01$)
- First Grade ($R^2 = 0.03$; $P < 0.0001$)
- Second Grade ($R^2 = 0.05$; $P < 0.0001$)
- Third Grade ($R^2 = 0.04$; $P < 0.0001$)
- Fourth Grade ($R^2 = 0.07$; $P < 0.0001$)

The non-academic variables that were analyzed included student attendance and suspensions as these are nationally recognized indicators of academic progress (Balfanz, Wang & Byrnes, 2010. Early Warning Indicators Analysis: Tennessee.) The relationship between length of time enrolled in BfB and Attendance was positive and statistically significant ($R^2 = 0.01$; $P < 0.0001$). The relationship between length of enrollment in BfB and number of Suspensions was inverse and statistically significant ($R^2 = 0.005$; $P < 0.0001$).

Overall, the analysis suggests that children who are enrolled in Books from Birth for longer periods of time during their five years of life are more likely to score higher on academic assessments through early grades. Further, those students are more likely to attend school more often and less likely to be suspended. These findings suggest that even in Memphis, where many children live in poverty and school outcomes are some of the lowest in the State, Books from Birth can be a critical part of efforts to improve the lives of children and the economic progress of the State.