K. E. LITTLE AND THE TEXAS STARBASE EXPERIENCE. David Bonett (K.E. Little Elementary), Gail Whittemore-Smith (Texas Starbase Program).

K.E. Little Elementary School is the largest elementary school in the Dickinson Independent School District. Located in Bacliff, Texas, K.E. Little serves a diverse student population of 950 students grades PreK-5th. K.E. Little is a Chapter 1 school with 88% of its student population socio-economically disadvantaged. A 31% transitory student population, coupled with a large At-Risk student population, creates unique challenges in this rural school setting near Johnson Space Center.

The fifth grade class selected for this educational experience has a student population of 25: 11 boys and 14 girls. Twenty percent of this class population are minority students who were ESL/LEP students in previous grades. Sixty-eight percent are identified as socio-economically disadvantaged. Eighty-four percent of the students have been identified as At-Risk. Twelve percent of this class has been identified as Learning Disabled.

The STARBASE program is designed to provide five-week academies for 4th-7th grade students. The academies are conducted one day each week at Ellington Field in Houston. During their STARBASE experience, students have access to the unique resources available at Ellington. These facilities provide varied and exciting environments in which to implement the STARBASE curriculum, giving students a new perception of science, math, and technology outside the classroom. The curriculum is comprised of hands-on interactive activities, experiments, and on-site tours of National Guard, Coast Guard, and NASA aviation facilities. Instruction includes Newton’s Three Laws of Motion, the four forces of flight, Bernoulli’s Principal of Lift, aircraft control surfaces, model rocketry, properties and states of matter, flight simulation, robotics, space exploration, and the development, innovation and use of technology. Certified educators teach the curriculum with assistance from Guard and community volunteers with technical and content expertise.