

Archived Information

Burroughs Wellcome Fund Science Education Initiatives

Goal area of the activity: Developing a Research Base

Summary: The Burroughs Wellcome Fund (BWF) has an interest in changing the education system in North Carolina to improve the way science, mathematics, and technology are taught and learned. Engaging students in hands-on science inquiry has been the primary focus of the BWF science education program since the Fund became an independent private foundation in 1994. During this time, despite clearly evident advances in K-12 education, a number of educational advisors who work with BWF lamented at the lack of a champion for SMT education in North Carolina. Also, findings in a consensus report, The State of Disconnectedness: An Examination of Mathematics and Science Instruction in the North Carolina Public Schools, developed by the N.C. Public School Forum in 1995, showed that poor communication, blurred lines of accountability, and a failure to marshal the wealth of resources has lessened the likelihood that substantial progress will be made in the areas of science, mathematics, and technology education in North Carolina. Therefore, the Burroughs Wellcome Fund has served as the catalyst for the creation of the North Carolina Science, Mathematics, and Technology Education Center. The mission of the Center is to systematically improve performance in science, mathematics, and technology pre K-12 education as a means of providing all children in North Carolina with the necessary knowledge and skills in science, mathematics, and technology to have successful careers, be good citizens, and advance the economy of the state. The philosophy of the Center is to bring together the many successful programs in North Carolina to work towards a common goal and to advocate for research-based and comprehensive programs of instruction.

Purpose: The goals of the NC SMT Education Center are to:

- To articulate a vision for science, mathematics, and technology education in North Carolina to broaden awareness of the need for a scientifically literate workforce and to solicit support for high quality programs of instruction;
- To work with government, industry, the education community and parents to connect and facilitate achieving continuously improving level of performance in science, mathematics, and technology by all children in pre K-12; and to advocate for equitable and adequate resources for all pre K-12 children;
- To mobilize expertise and leverage resources to reach all pre K-12 children in each of North Carolina's 117 school systems to foster comprehensive and challenging programs of instruction in science, mathematics, and technology instruction including the dissemination of effective tools and learning methods and the provision of technical assistance to educational leaders (including principals and teachers); and
- To work with existing organizations to research, develop, and disseminate information on the state of science, mathematics, and technology pre K-12 education to policymakers and the media in order to improve decision-making and to identify gaps that need to be addressed.

Accomplishments: The Center is a newly created organization that held the first board meeting in June 2002 and whose first President and CEO came aboard on March 3, 2003. The Center's Board has identified three focus areas that include educating the public on the importance of science, mathematics, and technology (SMT) education for all children; building the capacity of teachers in SMT education; and recognizing successful schools for their efforts in SMT education and disseminating proven strategies.

Plans for the next 12 months: The Center will be developing a strategic plan that will focus on the three above mentioned focus areas. An important component of the Center's plan will be to advocate for research-based and comprehensive programs of instruction and for state policies that are supportive of the advancement of improved teaching and learning in science, mathematics, and technology education. The Center will serve as a catalyst for change through underwriting commissioned research and development projects and distributing results through a variety of print and non-print media. The Burroughs Wellcome Fund will continue to play a convener role and serve as a neutral organizational force.