Practical Application of Research in Science Education (PARSE) – A New Collaboration for K-12 Science Teacher Professional Development

ANDREW ZWICKER, Princeton Plasma Physics Laboratory, JOSE LOPEZ, JAMES CLAYTON, St. Peters College — A new collaboration between PPPL, St. Peter’s College, the Liberty Science Center, and the Jersey City Public School District was formed in order to create a unique K-12 teacher professional development program. St. Peter’s College, located in Jersey City, NJ, is a liberal arts college in an urban setting. The Liberty Science Center (LSC) is the largest education resource in the New Jersey-New York City region. The Jersey City School District has 28,000 students of which approximately 90% are from populations traditionally under-represented in science. The new program is centered upon topics surrounding energy and the environment. In the first year, beginning in 2009, 15-20 teachers will participate in a pilot course that includes hands-on research at PPPL and St. Peter’s, the creation of new curricular materials, and pedagogical techniques. Scientists, master teachers, and education professors will teach the course. In subsequent years, the number of participants will be significantly expanded and the curricular material disseminated to other school districts. In addition, an outside evaluator will measure the educational outcome throughout the project.

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