

Abstract Submitted
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Evaluating Effectiveness of an Inquiry Curriculum using FCI and CLASS as Assessment Tools J. RUSSELL HARKAY, New England Section, APS, AAPT — The Force Concept Inventory¹ and Colorado Learning Attitudes about Science Survey² were administered to students enrolled in inquiry and traditional algebra-based courses both before and after completion of courses using the NSF-sponsored Phenomenal Physics curriculum developed by Harkay, et. al. Results are used to interpret course effectiveness in the areas of retention of concepts, knowledge of basic physics, and student attitudes toward physics and learning physics. Information from CLASS is used to probe how student beliefs impact and are impacted by their educational experience. Normalized gains indicate that the inquiry curriculum is both robust and effective. Both of the instruments are well-established and validated using reliability studies and extensive statistical analysis of responses.

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