Identifying Connections and Potential Synergies among IUPUI STEM Education Initiatives

Andy Gavrin,1,3 Grant Fore,3 Brandon Sorge2,3

1School of Science
2School of Engineering and Technology
3STEM Education Research Institute

Indiana University – Purdue University Indianapolis

Abstract

SERI is the new STEM Education Research Institute at IUPUI. One of its initial projects is a search for potential synergies among the many STEM education initiatives ongoing at IUPUI. The ultimate goal of this project is to establish best practices for identifying and implementing such synergistic connections among STEM education initiatives within a single large campus or consortium of geographically connected smaller campuses. The project will be implemented in three phases. During Phase 1, which is currently underway, SERI researchers will non-intrusively identify and categorize campus STEM education initiatives through IUPUI websites, institutional reports, and funding reports from foundations such as NSF and NIH. In Phase 2, researchers will both conduct fact-checking interviews with IUPUI faculty/staff and develop a comprehensive and accessible database of current STEM education initiatives across campus. With Phase 3, researchers will conduct an analysis of IUPUI’s initiatives using the database and, when needed, additional faculty/staff interviews both to assess internal synergy and cost-saving and to identify the potential for additional synergistic development at IUPUI. Following the completion of this tripartite process, results will be gathered and assembled into an NIH or NSF proposal requesting funding to formalize the process and expand it to a sample of other campuses.