

## **Abstract**

This study presents a conceptual framework, nested logic models, and an exploratory analysis of readily available administrative data for the Established Program to Stimulate Competitive Research (EPSCoR). The conceptual framework—called the Academic Research Excellence and Competitiveness (AREC) framework—was based on the scholarly literature, program documents, and conversations with EPSCoR leadership and staff. The framework illustrates the multiple levels where EPSCoR strategies are deployed (program, jurisdiction, institution, team, and individual) and the multiple dimensions of the research competitiveness outcome (resource acquisition, knowledge production, attractiveness, visibility/reputation, economic development, human capital, and diversity). Using program and national data sources, a set of jurisdiction and institution level indicators that capture some of these dimensions are used to explore the feasibility and utility of structural equation modelling and other statistical techniques to generate evidence of the relationships hypothesized by the AREC framework and related logic models. Findings from the exploratory analyses show that the EPSCoR jurisdictions vary greatly from each other and from non-EPSCoR jurisdictions in the context of implementation, strategies deployed, and outcomes achieved. This study includes a substantial technical appendix and may serve as a foundation for additional analysis and future evaluation of the EPSCoR program.