SUMMARY

This legislation responds to the recommendations contained in the National Innovation Initiative Report published by the Council on Competitiveness. In responding to the report, this legislation focuses on three primary areas of importance to maintaining and improving United States’ innovation in the 21st Century: (1) research investment, (2) increasing science and technology talent, and (3) developing an innovation infrastructure. This bill:

- Establishes the President’s Council on Innovation to develop a comprehensive agenda to promote innovation in the public and private sectors. In consultation with the Office of Management and Budget, this Council would develop and use metrics to assess the impact of existing and proposed laws that affect innovation in the United States. In addition, the Council would help to coordinate the various federal efforts that support innovation, and use metrics to assess the performance of the federal innovation programs located in different administrative agencies, and submit an annual report to the President and to the Congress on how the Federal Government can best support innovation.

Research Investment

- Establishes the Innovation Acceleration Grants Program which encourages federal agencies funding research in science and technology to allocate 3% of their Research and Development (R&D) budgets to grants directed toward high-risk frontier research. Although this provision sets 3% of R&D budgets as a strategic goal for allocation to high-risk frontier research projects, it does not mandate that the agencies spend at least 3% of their budgets in this manner. All grants provided to this program will be assessed with metrics and no grants will be renewed unless the agency distributing the grant determines that all metrics have been satisfied.

- Increases the national commitment to basic research by nearly doubling research funding for the National Science Foundation (NSF) by FY 2011.

- Makes permanent the Research and Experimentation (R&E) tax credit with modifications expanding eligibility for incentives to a greater number of firms.
Science and Technology Talent

- Expands existing educational programs in the physical sciences and engineering by increasing funding for NSF graduate research fellowship programs as well as Department of Defense science and engineering scholarship programs. These fellowships provide an incentive for more American students to pursue post-graduate degrees in the sciences, technology, engineering, or mathematics.

- Authorizes the Department of Defense to create a competitive traineeship program for undergraduate and graduate students in defense science and engineering that focuses on multidisciplinary learning and innovation-oriented studies.

- Authorizes funding for new and existing Professional Science Master’s Degree Programs to increase the number of qualified scientists and engineers entering the workforce.

Innovation Infrastructure

- Authorizes the Department of Commerce to promote the development and implementation of state-of-the-art advanced manufacturing systems and to support up to three Pilot Test Beds of Excellence for such systems. The Secretary of Commerce will conduct a competition to select the Pilot Test Beds based on objective criteria and metrics.

- Encourages the development of regional clusters ("hot spots") of technology innovation throughout the United States.

- Empowers the Department of Defense to identify and accelerate the transition of advanced manufacturing technologies and processes that will improve productivity of the defense manufacturing base.