

The Cost of Cutting Federal Investments in Basic Science

Federal investments in scientific research catalyze economic growth, spur innovation, and drive American prosperity. A new analysis from economists at American University reveals the adverse impacts that come from reducing our nation's longstanding and bipartisan outlays for basic and applied scientific research and development.

The study, "Preliminary Estimates of the Macroeconomic Costs of Cutting Federal Funding for Scientific Research" quantifies the long-term economic impacts of cutting government funding for basic scientific research. A new analysis from economists at American University reveals the adverse impacts of reducing our nation's longstanding and bipartisan outlays for fundamental scientific research at colleges and universities across the country.

ECONOMIC IMPACTS AT A GLANCE

Scenario	GDP Impact	Revenue Impact	Average Income Lost in the Long Run*	Private Sector Impact
25% R&D Funding Cut	-3.8%	-4.3%	\$5,000	Less private R&D, jobs lost
50% R&D Funding Cut	-7.6%	-8.6%	\$10,000	Larger drop in innovation Less private R&D, jobs lost

WHAT DOES THIS MEAN FOR AMERICANS?

These numbers are not abstract—they represent smaller paychecks and less wealth creation for American workers, families, and communities.

- A drop in GDP translates to less economic activity, fewer jobs, and stagnant wages.
- Lost innovation means fewer breakthroughs in medicine, energy, artificial intelligence, quantum computing, and other emerging technologies, ceding ground to our competitors and losing our world-class edge in science and technology.

MORE THAN A DOLLAR LOST

Federal investments in scientific research at American higher education institutions have led to some of the most transformative discoveries in history - from the internet and GPS to life-saving medical treatments. Many of today's most important innovations exist, for our collective benefit, because of sustained federal support.

*The long run is considered approximately 25–30 years.

All figures and findings are sourced from "Preliminary Estimates of the Macroeconomic Costs of Cutting Federal Funding for Scientific Research" (González, Montecino, Ramaswamy, Institute for Macroeconomic & Policy Analysis, American University, 2025)