

Understanding and Responding to Global Climate Change

The U.S. Global Change Research Program in the 2015 Budget

"Over the past eight years, the United States has reduced our total carbon pollution more than any other nation on Earth. But we have to act with more urgency -- because a changing climate is already harming Western communities struggling with drought, and coastal cities dealing with floods... The shift to a cleaner energy economy won't happen overnight, and it will require some tough choices along the way. But the debate is settled. Climate change is a fact."

 President Barack Obama January 2014

The 2015 Budget reflects the President's commitment to global-change research by sustaining coordinated, government-wide research to understand, assess, predict, and respond to global change, including climate change, and to inform the Nation's transition to a clean-energy economy. Investments in global-change science through the U.S. Global Change Research Program (USGCRP) over the past several decades have significantly expanded our knowledge of Earth's past and present climate, enhanced our ability to project future climate change, and improved our understanding of the impacts and risks associated with climate change. The 2015 Budget provides approximately \$2.5 billion for the multiagency USGCRP (see Table). (All comparisons in text between 2014 and the 2015 Budget are in current, not-adjusted-for-inflation dollars. Figure 1 shows historical trends in inflation-adjusted dollars.)

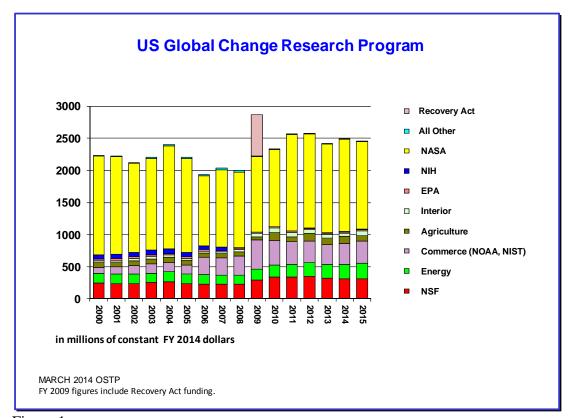


Figure 1.

The USGCRP coordinates and integrates Federal research and applications to assist the Nation and the world in understanding, assessing, predicting, and responding to human-induced and natural processes of global change and their related impacts. The 2015 Budget provides for coordinated, interagency investments to support the goals set forth in the program's 2012-2021 Strategic Plan, which include: advancing scientific knowledge of the integrated natural and human components of the Earth system; providing the scientific basis to inform and enable timely decisions on adaptation and mitigation; building sustained assessment capacity that improves the United States' ability to document changes on the regional, landscape, and local level in order to understand, anticipate, and respond to global change impacts and vulnerabilities; and advancing communications and education to broaden public understanding of global change.

The 2015 Budget also supports an integrated suite of climate-change observations, process-based research, modeling and assessment, and adaptation science activities. These activities support the creation of timely information products including technical reports, impact and vulnerability assessments, and adaptation response strategies, for use by a wide array of public- and private-sector stakeholders. These activities are essential elements of the USGCRP 2012-2021 strategic plan and also support the President's Climate Action Plan.

USGCRP reports and general information about the Program are available on the program's website, www.globalchange.gov.

Table. U.S. Global Change Research Program (discretionary budget authority in millions)

	FY 2013	FY 2014	FY 2015	Change FY 14-15	
	Actual	Estimate	Budget	Amount	Percent
U.S. Global Change Research Program (USGCRP)					
National Science Foundation	316	313	318	5	1.5%
Energy	209	217	246	29	13.4%
Commerce (NOAA, NIST)	301	329	348	19	5.9%
Agriculture	107	111	88	-23	-20.7%
Interior (USGS)	55	54	72	18	34.3%
Environ. Protection Agency	17	18	20	2	11.0%
National Institutes of Health	10	8	8	0	0.0%
NASA	1,355	1,431	1,392	-39	-2.7%
Smithsonian	8	8	8	0	0.0%
DOT	1	1	1	0	0.0%
Total USGCRP	2,379	2,489	2,501	12	0.5%
[non-add:]					
[State]	3	3	3	0	0.0%
[Int'l Assistance/USAID]	11	11	8	-3	-25.0%