

NATIONAL SCIENCE BOARD**\$4,030,000**

Since FY 2003, the activities of the National Science Board (NSB) have been funded through a separate appropriation. This was initially established in the National Science Foundation (NSF) Authorization Act of 2002, and the recently enacted America COMPETES Act of 2007 similarly included a separate appropriation for the NSB. Accordingly, this FY 2009 Budget Request identifies the resources needed to support the Board, including amounts for personnel compensation and benefits, authorized travel, employment of external experts and consultants, and other appropriate expenses. The FY 2009 Request is \$4.03 million, an increase of \$61,000, or 1.5 percent, over the FY 2008 Estimate of \$3.97 million. The FY 2009 Budget Request will continue to enable the Board to fulfill its policy-making and oversight responsibilities for NSF and provide independent advice to the President and the Congress on significant national policy issues in science and engineering (S&E) research and education.

National Science Board Funding

(Dollars in Millions)

	FY 2007 Actual	FY 2008 Estimate	FY 2009 Request	Change over FY 2008 Estimate	
				Amount	Percent
Personnel Compensation and Benefits	\$1.87	\$1.86	\$1.92	\$0.06	3.2%
Other Operating Expenses	1.78	2.11	2.11	-	-
Total	\$3.65	\$3.97	\$4.03	\$0.06	1.5%
Full-Time Equivalent Employment	15	14	14	-	-

Totals may not add due to rounding.

Appropriation Language

For necessary expenses (including payment of salaries, authorized travel, hire of passenger motor vehicles, the rental of conference rooms in the District of Columbia, and the employment of experts and consultants under section 3109 of title 5, United States Code) involved in carrying out section 4 of the National Science Foundation Act of 1950, as amended (42 U.S.C. 1863) and Public Law 86-209 (42 U.S.C. 1880 et seq.), ~~\$3,969,000~~ **\$4,030,000**: *Provided*, That not to exceed ~~\$9,000~~ **\$2,500** shall be available for official reception and representation expenses. (*Science Appropriations Act, 2008.*)

**National Science Board
FY 2009 Summary Statement**

(Dollars in Millions)

	Enacted/ Request	P.L. 110-161 Rescission	Expired	Total Resources	Obligations Incurred/Est.
FY 2007 Appropriation	\$3.97	-	-\$0.32	\$3.65	\$3.65
FY 2008 Estimate	3.97	-	-	3.97	3.97
FY 2009 Request	4.03	-	-	4.03	4.03
\$ Change from FY 2008					\$0.06
% Change from FY 2008					1.5%

Adjustment to Base

Within the Office of the National Science Board FY 2007 appropriation, a total unobligated balance of \$314,068 expired.

Background on the National Science Board

As an independent federal agency, NSF does not fall under any cabinet department; rather NSF's activities are guided by the Board. The Board was established by the Congress both to serve as a national science policy body, and to oversee and guide the activities of NSF. It has dual responsibilities to: a) provide independent national science policy advice to the President and the Congress; and b) establish policies for NSF. The Board has 24 Members appointed by the President and confirmed by the Senate. Board Members, who serve 6-year terms in intermittent appointments, are drawn from industry and universities, and represent a variety of S&E disciplines and geographic areas. They are selected for their preeminence in research, education, or public service. The NSF Director is also a full voting member (*ex officio*) of the Board.

In recent years, the Board has met six times a year to review and approve major NSF awards and new programs, oversee and provide policy direction to NSF, and deal with significant science and engineering related national policy issues. It initiates and conducts studies and reports on a broad range of policy topics, and publishes occasional policy papers or statements on issues of importance to U.S. science and engineering. The Board analyzes NSF's budget to ensure progress and consistency along the strategic direction set for NSF and to ensure balance between new investments and core programs. It also identifies issues that are critical to NSF's future, and approves NSF's strategic budget directions and the annual budget submission to the Office of Management and Budget (OMB).

National Science Board Activities

Because it is required to establish the Foundation's policies within the framework of applicable national policies as set forth by the President and Congress, the Board supports the strategic Government Performance and Results Act (GPRA) goals of the Foundation and those identified in the President's Management Agenda (PMA). The Board conducts continuous assessment of the quality, relevance, and performance of the Foundation's award making, as called for in the Research and Development Investment Criteria of the PMA. The Board has received reports from the chairmen of the Foundation's Advisory Committee on GPRA Performance Assessment, reviews the summary results of the Foundation's annual performance goals, and approves the NSF Strategic Plans. The NSF Director's report on merit review is presented to the Board each year, allowing the Board to monitor the quality and effectiveness of this keystone Foundation process.

The Board issues policy guidance in the form of official statements and resolutions, and reports to the President and Congress dealing with topics such as the Foundation's merit review criteria, cost sharing with universities, science and engineering education, the science and technology workforce, and funding and oversight of major research infrastructure projects. The Board is responsible for direct review and approval of the largest Foundation awards, and is responsible for the review and approval of major research infrastructure projects at all stages of development, including budget planning, review of proposals and management effectiveness, and approval of awards.

The Board is authorized to establish committees, which advise the full Board as it exercises its statutory powers and functions. The standing Committee on Audit and Oversight oversees the operations of the Foundation's Office of Inspector General (OIG), as well as NSF compliance with new procedures for financial accountability and information technology security. The members of the Committee on Programs and Plans (CPP) review proposals for major awards, the health of the Foundation's peer review system, and

program performance and accountability. The Board monitors the critical infrastructure that supports research in Antarctica through the CPP Subcommittee on Polar Issues.

The Board established a Committee on Strategy and Budget (CSB) in 2001 to focus on strategic planning and new investments for NSF. Review of the Foundation's budget request is also vested in CSB. The Committee on Education and Human Resources (EHR) focuses on Foundation activities in such priority areas as S&E workforce development, math and science education, and underrepresented populations and regions in S&E programs. The EHR Subcommittee on S&E Indicators manages the process for development and review of the Board's biennial statistical report, *Science and Engineering Indicators*. In FY 2008, the Board delivered *Science and Engineering Indicators 2008* to the President and to Congress, in keeping with its statutory responsibility.

During the last year, the Board accomplished a great deal in terms of its mission to provide oversight and policy directions to the Foundation, including: reviewed and endorsed the OIG Semi-annual Reports to Congress and approved NSF management responses; approved the NSF FY 2009 Budget Submission for transmittal to OMB; approved the Foundation's annual Merit Review Report; and provided review and decisions on major awards or proposal funding requests. In addition, the Board's report, *Enhancing Support of Transformative Research at the National Science Foundation* ([NSB-07-32](#)), provided guidance on the creation of a new NSF Transformative Research Initiative.

In terms of advice to the President and the Congress, the Board approved, published, and distributed the report, *HURRICANE WARNING: The Critical Need for a National Hurricane Research Initiative* ([NSB-06-115](#)). This report provides broad recommendations regarding our Nation's hurricane research enterprise, as well as specific guidance for the role that NSF should play in these efforts. The Board also received the report of its Commission on 21st Century Education in Science, Technology, Engineering and Mathematics (STEM) and developed a Board national action plan for addressing the critical STEM education needs of our Nation while providing specific guidance for the role of NSF in the national STEM education enterprise. The Board completed its national and international hearings and roundtable discussions to support its examination of the role of the federal government in supporting international S&E partnerships and plans to publish its findings and recommendations in FY 2008. The Board has provided testimony to Congress; interacted with the White House Office of Science and Technology Policy in meetings and forums on science and engineering issues; and responded to specific questions and inquiries from Senators and Representatives. Board meetings and deliberations continue to be open in accord with the Government in the Sunshine Act, as directed by the NSF Act of 2002. The Board continues to improve its outreach and communications with the Congress, other agencies, various interest groups and the outside science and engineering research and education community.

During FY 2008, the Subcommittee on Science and Engineering Indicators prepared a policy statement Companion Piece to *Science and Engineering Indicators 2008*, and produced a pilot volume of a Science and Engineering Indicators Digest, which will highlight a small selection of core and topical S&T, and serve as a portal to the electronic version of *Science and Engineering Indicators 2008*. The purpose of this new publication is to expand the audience for *Indicators*, make it more useful to policy-makers and facilitate access to data of interest in the main volumes of *Indicators*.

National Science Board FY 2009 Budget Request

The Board's FY 2009 Budget Request seeks resources to carry out its statutory authority and to strengthen the Board's oversight responsibilities for the Foundation. Enhanced Board responsibilities established in the NSF Authorization Act of 2002 (H.R. 4664), directed by Congressional report language and the NSF Authorization Act of 2007 (H.R. 2272), include the continued expanding role in prioritizing and approving

MREFC projects, audits for Sunshine Act Compliance, review of NSF policy with respect to cost sharing requirements in NSF awards, large facility pre-construction development, construction and post-construction operations and management costs, support for interdisciplinary research, and review of NSF policies limiting proposal submissions by institutions. In addition, by August 2010 the Board must submit to Congress a summary report of its findings, including any recommendations regarding changes to, the termination of, or the continuation of the NSF pilot program of grants for new investigators established under the 2007 Authorization.

Effective communications and interactions with our constituencies contribute to the Board's work of identifying priority science and technology issues, and developing policy advice and recommendations to the President and Congress. To this end, the Board will continue to increase communication and outreach with the university, industry, and the broader science and engineering research and education community, Congress, federal science and technology agencies, and the public. The Board's activities will aim to support U.S. global leadership in discovery and innovation based on a continually expanding and evolving science and technology enterprise in this country, and will ensure a principal role for NSF programs in providing a critical foundation for science and engineering research and education.

Several endeavors that the Board expects to formally complete by the end of FY 2008 will require significant follow-up outreach efforts by the Board in FY 2009 to ensure the desired impacts are realized. For example, lessons learned by the Board's experience with its 1982 STEM Education Commission report and the 2001 report on the role of the federal government in supporting international science, have provided clear and strong lessons on the importance of the Board undertaking significant follow-up efforts to ensure action based on their reports. While the Board will complete its Action Plan on 21st Century STEM Education in FY 2008, it is clear that much follow-up outreach by the Board will be required throughout FY 2009 to ensure the work of the Commission and the Board have the highest possible impact. Although many of these recommendations will be at a national system level, a number will focus specifically on the role NSF can and should play in supporting the development of an adequate and diverse science and engineering workforce and science literate population. The Board expects to be significantly engaged with oversight of NSF implementation of components of the Action Plan for STEM Education. The Board will also continue to review and approve NSF's actions for creating major NSF programs and funding, and expects new efforts to be implemented regarding enhancement of NSF support for potentially transformative research as a result of new Board guidance. Likewise, the Board's task force to review international S&E partnerships will complete its work in FY 2008, but will require significant follow-up by the Board in FY 2009.

The Board's new Digest for its biennial *S&E Indicators* report in FY 2008 requires significant new outreach efforts on the part of the Board, as will the Board's policy statement Companion Piece accompanying the FY 2008 *Indicators*. Further, the Board will begin considering new content and indices for *Science and Engineering Indicators for 2010*, which will require significant efforts in 2009. Moreover, the Board will likely begin a new review effort focused on the S&E challenges related to development of alternative sustainable energy that will be continuing in FY 2009. In addition, the Board will continue to review and approve NSF's actions for creating major NSF programs and funding large projects, as well as dealing with evolving NSF policy issues. Experience has demonstrated that the Board will receive a number of requests from Congress asking that the Board examine and report quickly on a wide range of national policy topics related to S&E research and education. The Board welcomes such requests from Congress and the Administration, and will itself continue to identify high priority topics focused specifically on NSF, or more broadly on national S&E policy issues that it feels it should examine in FY 2009.

Essential to the conduct of Board business is a small and independent core of full-time senior policy, clerical, and operations staff, supplemented by temporary contractual support as needed for various Board endeavors.

In addition to the Board Office's essential and independent resources and capabilities, external advisory and assistance services continue to be critical to support production of Board reports and supplement the Board Office staff's general research and administration services to the Board. These external services provide the Board and its Office with the flexibility to respond independently, accurately, and quickly to requests from Congress and the President, and to address issues raised by the Board itself.

By statute the Board is authorized five professional positions and other clerical staff as necessary. In consultation with Congress, the Board has defined these five professional positions as Board Office senior S&E policy staff, and the clerical positions as Board Office staff that support operations and related activities associated with the conduct of Board meetings and oversight responsibilities. The Board Executive Officer, who reports directly to the Board Chairman, also serves as the Director of the Board Office. The Board Office staff provides both the independent resources and capabilities for coordinating and implementing S&E policy analyses and development, and the operational support that are essential for the Board to fulfill its mission.

Personnel Compensation and Benefits and General Operating Expenses

(Dollars in Thousands)

	FY 2007 Actual	FY 2008 Estimate	FY 2009 Request	Change over FY 2008 Estimate	
				Amount	Percent
Personnel Compensation and Benefits	\$1,870	\$1,862	\$1,920	\$58	3.1%
Staff Development & Training	8	25	9	-16	-64.0%
Advisory & Assistance Services	707	1,218	1,371	153	12.6%
Other Services	549	180	166	-14	-7.8%
Travel & Transportation of Persons	383	500	500	0	-
Communications, Supplies and Equipment	128	175	61	-114	-65.1%
Representation Costs	9	9	3	-6	-66.7%
Total	\$3,654	\$3,969	\$4,030	\$61	1.5%

Totals may not add due to rounding.

