

Thinking Big: A View from the Top President Obama's 2011 Plan for Science

By Julia Ransohoff

Progress in science and research requires not only technical and conceptual expertise, but also “big picture” policy and planning. Science develops in the halls of Congress and Federal agencies as well as in laboratories and universities. On February 1st, President Obama released his budget for the 2011 fiscal year. Obama's proposed budget reflects a renewed investment in scientific research and promises



Figure 1. President Obama

to catalyze progress in a variety of areas. The proposal is remarkable in that, despite the economic downturn and the financial turmoil of the past year and a half, it nevertheless preserves and enhances scientific progress as a preeminent national goal. With \$147.7 billion earmarked for research, and \$66 billion of that proposed amount unrelated to national defense, science funding is to be increased by 5.9% over the prior fiscal year (1). While Obama's proposal remains to be modified and debated by Congress, several noteworthy aims can be discerned from its current form.

First, with \$108 million proposed for the Department of Energy, the budget demonstrates a new, clear focus on the development of renewable and geothermal power

sources, and on advancement in research to reduce dependence on fossil fuels. A further \$197 million is proposed for research

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on safer nuclear waste disposal. The 2011 fiscal year will mark the halting of decades-long work on Nevada's Yucca Mountain as a site for nuclear waste disposal. According to Secretary of Energy Eric Chu, Obama's decision in this respect provides the opportunity “to take a deep breath . . . and to really look at this dispassionately and plot the best path forward,” as the existing nuclear waste is deemed un-hazardous for fifty years to come, providing time and space for development of safer disposal methods (1).

For the National Institutes of Health, Obama has increased funding by \$1 billion over his 2010 budget, and the NIH will continue to benefit from the funding of last year's Recovery Act. According to the NIH, the proposed funding increase will contribute to the realization of “[i]nnovative high throughput technologies, including DNA sequencing, imaging, and computational biology, [which] represent areas of exceptional promise” (2). The report emphasizes the government's goal of making the most of

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funding opportunities, stating that “[v]igorous U.S. support of biomedical research in all these areas promises to save lives, reduce the burden of chronic illness, stimulate the economy, empower new and more effective prevention strategies, and reduce health care costs” (2). Specific aims include expansion of research into determining feasibility of personalized medicine, in which diagnostic

of preserving the United States’ position as an international leader in research and scientific progress. While providing an immediate boost to current research, the budget will have its most profound effects on stimulating long term projects in science and improving the healthcare landscape of the nation. **H**

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and treatment methods are prescribed based on a patient’s individual profile and needs, as well as continued progress in stem cell research, particularly in its applications to address Parkinson’s disease, spinal cord injuries, and type 1 diabetes (2).

The Department of Health and Human Services will receive a proposed \$81.3 billion in funding to serve the health needs of all Americans. Notable funding breakdowns include \$2.5 billion to support healthcare provisions for underserved and uninsured patient populations, as well as support for Medicare and Medicaid projects that will “provide higher quality care at lower costs, improve beneficiary education and understanding of benefits offered, and better align provider payments with costs and outcomes,” according to the White House’s Office of Management and Budget press release (3).

Although the budget will undoubtedly be modified by Congress before final approval and project initiation, its preliminary outlines indicate the administration’s goal

References

1. A Modest Proposal for Federal Science Spending. Science News. http://www.sciencenews.org/view/generic/id/55922/title/A_modest_proposal_for_federal_science_spending.
2. National Institutes of Health: Summary of the FY 2011 President’s Budget. National Institutes of Health. <http://officeofbudget.od.nih.gov/pdfs/FY11/Summary%20of%20the%20FY%202011%20Presidents%20Budget.pdf>.
3. Department of Health and Human Services: Funding Highlights. Office of Management and Budget. <http://www.whitehouse.gov/omb/budget/fy2011/assets/health.pdf>.
4. Office of Science and Technology Policy <http://www.whitehouse.gov/administration/eop/ostp>.

