



December 22, 2025

Michael Kratsios, Director
Office of Science and Technology Policy (OSTP)
Executive Office of the President
Eisenhower Executive Office Building
1650 Pennsylvania Avenue
Washington, D.C. 20504

Re: Docket ID number OSTP-TECH-2025-0100; Request for Information on Accelerating the American Scientific Enterprise

Dear Director Kratsios,

The American Council on Education (ACE) and the undersigned higher education associations submit these comments in response to the request for information (RFI) on federal policy to accelerate the American scientific enterprise. We appreciate the opportunity to engage with OSTP and the administration in this thoughtful exercise to strengthen the scientific enterprise in the United States. The longstanding partnership between the federal government and colleges and universities has made American higher education the envy of the world and an engine of national progress and prosperity. All Americans, whether they went to college or not, have benefited from this partnership and those results are embedded in the smartphones they hold in their hands, the cars they drive, the medical care they receive when they need it most, and the inventions that power our world-leading economy. As partners in the research enterprise, our institutions have made significant investments in infrastructure, equipment, researchers, and staff to pursue groundbreaking scientific research, relying in large part on research grants secured through the competitive funding processes and the stability those processes provide.

These comments focus on the broad impacts of the federal partnership with institutions of higher education in the scientific enterprise in support of our nation, as well as its impact on the larger higher education community, including under resourced institutions, those institutions that are R-2s, research colleges and universities, and emerging research institutions.¹ In addition, we support the comments being submitted by our member institutions, as well as the Association of American Universities, the Association of Public and Land-grant Universities, and COGR.

¹ In 2022, Carnegie Foundation for the Advancement of Teaching and ACE partnered to re-envision the future of the Carnegie Classifications, the leading framework for recognizing and describing institutional diversity in U.S. higher education. As part of that agreement, the Universal and Elective Classifications have been brought together under a single organizational home at ACE. In 2025, the Carnegie Classifications announced changes to the classifications of R-1s and R-2s, and created a new category known as “Research Colleges and Universities.” For additional information see: <https://carnegieclassifications.acenet.edu/carnegie-classification/classification-methodology/2025-research-activity-designations/research-designations-faqs/>

As part of the RFI, OSTP is requesting responses to specific questions. Below we offer comments on several of those questions.

- (i) What policy changes to Federal funding mechanisms, procurement processes, or partnership authorities would enable stronger public-private collaboration and allow America to tap into its vast private sector to better drive use-inspired basic and early-stage applied research?

This year, colleges and universities across the country have struggled to navigate the ongoing uncertainty around the availability and distribution of federal funding for new and existing research projects. This has been extremely harmful to the overall scientific enterprise across the United States, resulting in wasted research efforts and taxpayer dollars. Additionally, federal agencies have been slow to distribute funds, leaving institutions and researchers to anxiously wait for communication on the status of funding for new grants and contracts. This has also impacted short- and long-term planning at our institutions of higher education. This frustration has also resulted in some researchers being recruited, along with their labs and research projects, to do their important work in other countries, including scientific competitors like China.² Because this uncertainty has led to long term, detrimental impacts on the overall U.S. scientific enterprise, we encourage the administration to work with Congress to deliver on sustained and consistent federal funding for the research enterprise.

- (ii) How can the Federal government better support the translation of scientific discoveries from academia, national laboratories, and other research institutions into practical applications? Specifically, what changes to technology transfer policies, translational programs, or commercial incentives would accelerate the path from laboratory to market?

Since passage of the Bayh-Dole Act of 1980, universities have increasingly licensed the fruits of their research to the private sector for commercialization. This academic institution technology transfer process provides a rich return on public and private funding for basic research, in the form of countless innovative products and processes that benefit the public, create jobs, and contribute to U.S. economic competitiveness and technological leadership internationally. According to the National Science Foundation (NSF), startups created by licensed university technology have grown by more than 80 percent, increasing from 554 startups in 2006 to over a thousand startups in recent years.³

The CT scan, MRI, FluMist and many other commonly used vaccines, GPS, bar codes, Doppler radar, web browsers, and the Internet are some of the best-known academic institution innovations. The Bayh-Dole Act has been responsible for the creation and fostering of a robust technology transfer ecosystem in the United States and serves as a global model, having been adopted in similar fashion in more than sixteen countries, including Norway, the United Kingdom, Malaysia, Korea, the Philippines, Japan, Singapore, Denmark, Finland, and Brazil.

² September 2025 CNN article “In the race to attract the world’s smartest minds, China is gaining on the U.S.” <https://www.cnn.com/2025/09/29/china/china-reverse-brain-drain-science-tech-competition-us-intl-hnk>

³ <https://nces.nsf.gov/pubs/nsb20241/figure/INV-13>

We don't believe any changes to the Bayh-Dole Act are necessary, but if there are any changes sought by the administration they should seek to strengthen this important policy rather than weaken it. Bayh-Dole was established by statute over 40 years ago and has been successful in allowing for the development of important intellectual property and inventions arising from federally funded research, most of which happens at our member institutions. Because of this success, and the importance of allowing this work to continue, the statute should be considered to enshrine a set of core principles that must be protected.

- (iii) What policies would encourage the formation and scaling of regional innovation ecosystems that connect local businesses, universities, educational institutions, and the local workforce—particularly in areas where the Federal government has existing research assets like national laboratories or federally-funded research centers?

The federal science agencies should continue to encourage partnerships with non-R-1 institutions, as well as the larger community, as a way to extend the reach of taxpayer dollars. Programs such as the Small Business Innovation Research and Small Business Technology Transfer programs have been extremely successful in partnering university research with small businesses and moving federal funded research towards commercialization. We are disappointed that congressional authority for those important programs has expired and we urge the administration to work with Congress to quickly re-authorize those important programs. We also urge support of NSF Technology, Innovation, and Partnership, Regional Innovation Engines, and U.S. Economic Development Administration Regional Technology and Innovation Hubs, established programs that encourage regional innovation activities and partnerships.

In addition, we urge the administration to support the broader impact work for the federal research agencies that can incorporate and spread the work of federally funded research into K-12 classrooms and encourage students to pursue STEM careers. While the broader impacts priorities have recently changed, including at NSF⁴, we encourage the administration to continue support for this important aspect of federally funded research.

- (iv) What reforms will enable the American scientific enterprise to pursue more high-risk, high-reward research that could transform our scientific understanding and unlock new technologies, while sustaining the incremental science essential for cumulative production of knowledge?

We are concerned with the administration's proposals to change the traditional, peer-review system, which has ensured that the best proposals be funded based on merit, to a politicized process, such as the proposal included in the administration's "Compact for Academic Excellence in Higher Education"⁵ to provide preferential funding status to those institutions

⁴ August 2025 NSF Funding Agency Update, Changes to broader impacts priorities: <https://proposaldev.ucdavis.edu/news/funding-agency-update-nsf>

⁵ October 1, 2025 letter to UVA regarding Compact "This assurance will yield multiple positive benefits for the school, including allowance for increased overhead payments where feasible, substantial and meaningful federal grants, and other federal partnerships. In short, this Compact will renew and strengthen the vital,

that agree to a wide-ranging list of broad issues not directly related to scientific research. The integrity of the peer review process contributes significantly to the trustworthiness of the scientific enterprise and in turn ensures that taxpayer dollars are awarded to the best and most trusted science.⁶

There are concerns that the peer review process is costly and risk averse; however we believe those concerns are better addressed through successful and established high risk, high reward federal programs within the research agencies, such as DARPA at Department of Defense or NIH Transformative Research Awards at the National Institutes of Health. We therefore ask that any actions the administration takes to change the current system of awarding federal grants seeks to strengthen the peer review system. If changes are sought to create more high risk, high reward federal grants, the administration should look to lessons learned in those existing federal programs.

- (vii) How can the Federal government support novel institutional models for research that complement traditional university structures and enable projects that require vast resources, interdisciplinary coordination, or extended timelines?

As members of the Joint Associations Group on Indirect Costs (JAG) we support the community efforts to develop a new, more transparent model for ensuring that institutions' essential research costs are adequately supported. The federal government's investment in research leads to cures, transformative technologies, and new industries that save lives, improve Americans' health, create new jobs, and help ensure national security. Expenses like physical lab operation and maintenance, utility costs, security, data processing, regulatory compliance, and other needs (currently collectively known as "indirect costs" or "facilities and administrative" or "F&A" support) are essential to conduct research and inseparable from support for research itself. Efforts to cut support for these essential research costs undoubtedly would lead to less research in this country, undermining our global leadership in science and ultimately reducing the number of American-made scientific and technological driven innovations resulting from federally funded research. We believe the proposed Financial Accountability in Research (FAIR) model developed by JAG will provide more transparency and clarity regarding the costs of carrying out federally funded research, and if there are changes made to the traditional indirect cost structure, the federal government should consider adopting the FAIR model.

- (viii) How can the Federal government leverage and prepare for advances in AI systems that may transform scientific research—including automated hypothesis generation, experimental design, literature synthesis, and autonomous experimentation? What infrastructure investments, organizational models, and workforce development strategies are needed to realize these capabilities while maintaining scientific rigor and research integrity?

Mutually beneficial relationship between the U.S. government and higher education that is essential to our nation's future and success."

⁶ Feb 21, 2024 "Peer Review in Research" <https://www.turnitin.com/blog/peer-review-in-research-navigating-its-role-in-quality-and-integrity>

A recent survey published by EDUCAUSE demonstrates that the resource gap between large and small institutions can limit the ability of institutions to realize the full scope of AI technology for student and faculty support.⁷ With a limited capacity to incorporate AI on campus, smaller institutions could be impacted by mandates that require the use of AI across the higher education sector. In addition, smaller institutions may need guardrails or a safety net of regulations to feel comfortable or help ease entry of smaller players into incorporation of AI on campuses. As part of any efforts to support an increased use of AI in research and development, there should be a recognition of the difference in resource capacity, ensuring that AI can be effectively utilized by the entire sector. In addition, it could be helpful for institutions of higher education to encourage pilot programs, perhaps through a Department of Education experimental site initiative, to monitor and experiment with AI deployment in campus settings.

- (ix) What specific Federal statutes, regulations, or policies create unnecessary barriers to scientific research or the deployment of research outcomes? Please describe the barrier, its impact on scientific progress, and potential remedies that would preserve legitimate policy objectives while enabling innovation.

Recently, the Department of Homeland Security proposed a new duration of status rule, which would place a four-year limit on F-1 and J-1 visas, currently used by international graduate and medical students in the United States.⁸ We believe the proposed rule is unworkable for J-1 research scholars who are currently permitted up to five years by the Department of State to complete their research, including those in STEM fields. The proposed rule would also have a disproportionately negative impact on international students seeking medical training, as well as foreign national physicians participating in U.S. medical residencies and fellowships as J-1 exchange visitors, whose programs can last from one to seven years depending on the medical specialty or subspecialty being pursued. The proposed rule also would have an impact on international scholars seeking postdoctoral research experiences.

It is important to note that international graduate students and postdocs are critical to the fundamental scientific research that takes place at America's colleges and universities. These researchers not only contribute toward groundbreaking research but also toward developing the next generation of experts in their fields. Limiting the supply of highly skilled researchers risks our status as the global leader in innovation. In 2023, roughly 10 percent of resident physicians training in this country were sponsored under J visas. In future years, we would expect 203,000 applications for an extension of stay (EOS) from international physicians on J visas. Given the size of this population, it is likely that resident and fellow physicians with J visas will experience significant delays in EOS processing time. A one-size fits-all, fixed time

⁷ “2025 EDUCAUSE AI Landscape Study: Into the Digital AI Divide—Special Focus: The Digital AI Divide Between Institutions”: <https://www.educause.edu/content/2025/2025-educause-ai-landscape-study/specialfocus-the-digital-ai-divide-between-institutions>

⁸ August 28, 2025 “Establishing a Fixed Time Period of Admission and an Extension of Stay Procedure for Nonimmigrant Academic Students, Exchange Visitors, and Representatives of Foreign Information Media” <https://www.federalregister.gov/documents/2025/08/28/2025-16554/establishing-a-fixed-time-period-of-admission-and-an-extension-of-stay-procedure-for-nonimmigrant>

frame for J visa authorization does not meet the complex needs of training programs.⁹ We continue to urge the administration to withdraw this problematic proposed rule.

In addition, H-1B visa holders working for institutions of higher education are doing work that is crucial to the U.S. scientific enterprise and national security. Recent data from the College and University Professional Association for Human Resources (CUPA-HR) show that, among faculty working in the United States on H-1B visas, over 70 percent hold tenure-track or tenured positions, with contracts that typically extend well beyond one year. CUPA-HR data also show that the top five disciplines employing H-1B faculty include: business (13.6 percent), engineering (12.3 percent), health professions (9.2 percent), computer science (9.1 percent), and physical sciences (7.2 percent).¹⁰ The role of institutions in preparing students to enter the U.S. workforce has never been more critical. Given the fact that H-1B beneficiaries working at our institutions train and educate domestic students for these high-demand occupations, conduct essential research, provide critical patient care, and support the core infrastructure of our universities, we therefore ask that higher education be considered exempted from the \$100,000 fee requirement. We hope the administration will consider this request as part of the process to accelerate the American scientific enterprise.

The academic research and development labor force relies on graduate students and postdoctoral fellows to support the output of high-quality research. In recognition of student contributions to the institutional research model, the federal government often supports student and postdoc involvement in research initiatives, with about half of all science and engineering postdocs in 2021 being supported by federal funding.¹¹ However, recent policies may influence the availability of the student-based research workforce that institutional research requires. The One Big Beautiful Bill (OB BB) introduced changes to graduate loan borrowing caps and eliminated Grad PLUS loans, decreasing the amount of federally available graduate loans students can access.¹² An increased financial burden has the potential to limit the ability of students to pursue a graduate education and, thus, provide support for innovative, high-quality research efforts. The potential disruption to the science and research workforce could serve as a significant barrier to scientific research and the deployment of research outcomes.

(xiii) How can the Federal government strengthen research security to protect sensitive technologies and dual-use research while minimizing compliance burdens on researchers?

We appreciate the efforts of OSTP to coordinate across the federal agencies on addressing research security concerns, while seeking to engage with the larger community. We believe the

⁹ September 29, 2025 ACE, higher education comments on DHS proposed rule:

<https://www.acenet.edu/Documents/Comments-Duration-of-Status-092925.pdf>

¹⁰ September 29, 2025 CUPA-HR “Data on H-1B Status for Faculty and Professionals”

<https://www.cupahr.org/resource/data-on-h-1b-status-for-faculty-and-professionals/>

¹¹ National Center for Science and Engineering Statistics, Academic Research and Development:

<https://nces.nsf.gov/pubs/nsb202326/>

¹² November 6, 2025 “U.S. Department of Education Concludes Negotiated Rulemaking Session to Implement the One Big Beautiful Bill Act’s Loan Provisions” <https://www.ed.gov/about/news/press-release/us-department-of-education-concludes-negotiated-rulemaking-session-implement-one-big-beautiful-bill-acts-loan-provisions>

administration's efforts to create and implement NSPM-33 helped to ensure there was coordination across agencies and successfully educated the larger research community about the national security concerns, while also balancing the need to coordinate scientific inquiry with trusted, global partners. We hope OSTP will continue these efforts.

In conclusion, we appreciate the proactive engagement from OSTP on seeking feedback from the larger stakeholder community on the national scientific enterprise. We look forward to continuing to engage with the administration on these issues impacting our institutions of higher education, as well as the rest of our nation.

Sincerely,

A handwritten signature in black ink, appearing to read "Ted Mitchell".

Ted Mitchell, President

On behalf of:

American Association of Colleges and Universities
American Association of Colleges for Teacher Education
American Association of Veterinary Medical Colleges
American Council on Education
Association of Governing Boards of Universities and Colleges
Association of Jesuit Colleges and Universities
College and University Professional Association for Human Resources
Council for Christian Colleges & Universities
Council of Graduate Schools
Council of Independent Colleges
Council on Social Work Education
EDUCAUSE
National Association for College Admission Counseling
National Association of College and University Business Officers
National Association of Independent Colleges and Universities
National Council of University Research Administrators