

Congress of the United States
House of Representatives

COMMITTEE ON SCIENCE, SPACE, AND TECHNOLOGY

2321 RAYBURN HOUSE OFFICE BUILDING

WASHINGTON, DC 20515-6301

(202) 225-6371

www.science.house.gov

May 9, 2023

The Honorable Jennifer Granholm
U.S. Department of Energy
1000 Independence Avenue, SW
Washington, D.C. 20585

Dear Secretary Granholm:

As members of the House Committee on Science, Space, and Technology, which has jurisdiction over all civilian R&D activities at the Department of Energy (DOE, the Department), we write to express our serious concerns with DOE's ongoing lack of robust and consistent support for its Office of Science and urge you to prioritize this essential core research agency.

The DOE Office of Science is the nation's largest federal sponsor of basic research in the physical sciences. It oversees 10 world-leading national laboratories and maintains and operates 28 scientific user facilities, which serve as essential resources for the U.S. research enterprise. The mission of this office is "to deliver scientific discoveries and major scientific tools to transform our understanding of nature and advance the energy, economic, and national security of the United States."¹ While this mission is essential to DOE's overall mandate, the Department, through its budget proposals and administrative actions, continues to demonstrate an indifference to this central responsibility. Rather than taking a balanced approach to its research and development portfolio, the Department appears to consistently prioritize applied energy activities, often at the expense of the Office of Science and its research infrastructure.

While the Office of Science accounts for nearly 20% of DOE's annual funding profile, it received less than 2% of DOE's Infrastructure Investment and Jobs Act (IIJA) and Inflation Reduction Act (IRA) appropriations.^{2,3}

¹ "Mission." *Energy.gov*, www.energy.gov/science/mission. Accessed 2 May 2023.

² "H.R.5376 - 117th Congress (2021-2022): Inflation Reduction Act of 2022." *Congress.gov*, Library of Congress, 16 August 2022, <https://www.congress.gov/bill/117th-congress/house-bill/5376>.

³ "H.R.3684 - 117th Congress (2021-2022): Infrastructure Investment and Jobs Act." *Congress.gov*, Library of Congress, 15 November 2021, <https://www.congress.gov/bill/117th-congress/house-bill/3684>.

The majority of this \$100 billion expansion of DOE programs went to clean energy deployment and applied energy activities like those carried out through the Office of Energy Efficiency and Renewable Energy (EERE) and the Office of Clean Energy Demonstrations (OCED).⁴ Rather than address this massive disparity, the Department, through the President's fiscal year 2024 budget request, further exacerbates the imbalance by continuing to prioritize these extremely well-funded activities: requesting higher percentage funding increases for EERE and OCED than for the Office of Science.⁵

Unlike applied research, which the private sector is capable of funding and conducting, the Office of Science supports the kind of fundamental research and specialized research infrastructure that is uniquely stewarded by the federal government. We can't expect industry to build the next generation of advanced light sources, develop a long-range plan for high energy physics, or administer and maintain national quantum research centers. In a constrained budget environment, DOE's skewed priorities put U.S. leadership in critical emerging technologies like material sciences, advanced computing, and fusion energy sciences at risk.

The Committee is concerned that DOE's neglect of the Office of Science is already having a detrimental effect, which is showing up as cracks in its workforce. Recently, as members of the scientific community have become increasingly frustrated with the DOE's lack of adequate support for this office, we have seen an unprecedented exodus of senior career Office of Science employees. In the past year, five senior program leadership roles in the Office of Science were vacated, and, as of the date of this letter, only one has been successfully filled. These include the departures of the Principal Deputy Director - the Office of Science's top civil service position; the Associate Director for Advanced Scientific Computing Research (ASCR); the Associate Director for Biological & Environmental Research (BER); the Associate Director for Fusion Energy Sciences (FES); and the Associate Director for High Energy Physics (HEP).^{6,7,8,9}

⁴ "H.R.3684 - 117th Congress (2021-2022): Infrastructure Investment and Jobs Act." *Congress.gov*, Library of Congress, 15 November 2021, <https://www.congress.gov/bill/117th-congress/house-bill/3684>.

⁵ "FY 2024 Budget Justification." *Energy.gov*, 13 Mar. 2023, www.energy.gov/cfo/articles/fy-2024-budget-justification. Accessed 2 May 2023.

⁶ "The Week of April 10, 2023." *Www.aip.org*, 10 Apr. 2023, www.aip.org/fyi/fyi-this-week/week-april-10-2023. Accessed 2 May 2023.

⁷ staff. "Call for Nominations to Replace ASCR's Barb Helland." *High-Performance Computing News Analysis | InsideHPC*, 13 Jan. 2023, insidehpc.com/2023/01/call-for-nominations-to-replace-ascrs-barb-helland/. Accessed 2 May 2023.

⁸ Kerr, Jackie. "Biological and Environmental Research Leadership Transition." *Environmental System Science Program*, 1 July 2022, ess.science.energy.gov/biological-and-environmental-research-leadership-transition/. Accessed 2 May 2023.

⁹ Roe, Natalie. "Transition in DOE Office of High Energy Physics." *Research.lbl.gov*, 3 Feb. 2022, research.lbl.gov/2022/02/03/transition-in-doe-office-of-high-energy-physics/. Accessed 2 May 2023. <https://www.llnl.gov/news/lawrence-livermore-national-laboratory-achieves-fusion-ignition>

This wide-ranging and sudden talent loss from Office of Science research directorates is deeply alarming and could have a lasting impact on U.S. research priorities and milestones. For example, in December, during a historic time for fusion energy sciences with the achievement of ignition at Lawrence Livermore National Laboratory, the DOE Associate Director for Fusion Energy Sciences position remained vacant.^{10,11} With no one at the helm to guide the FES program during this pivotal time, there is a high potential for missed opportunities and squandered momentum. Further, as many Office of Science activities like ASCR's Exascale Computing Program and critical Office of Science construction projects like HEP's Long Baseline Neutrino Facility/Deep Underground Neutrino Experiment are long-term multiyear endeavors, the implications of this leadership vacuum could be felt for years to come.

The House Science Committee has a longstanding history of bipartisan support for bold funding and long-term program direction for the Office of Science. Over the years, the Committee has clearly communicated these priorities to the Department through various bipartisan hearings, letters, and legislative initiatives, including the enactment of the 2018 Department of Energy Research and Innovation Act and the CHIPS and Science Act of 2022.^{12,13} These laws provide the Department with a well-vetted and strategic roadmap to accelerate U.S. competitiveness in industries of the future by doubling down on funding for the DOE Office of Science and its National Laboratories.

Yet, despite the broad, bipartisan, and bicameral support for sustained Office of Science growth, this Administration continues to demonstrate a lack of commitment to this office and its world-leading facilities. This Department's leadership team appears to be more concerned with serving industry interests and scoring politically expedient points than advancing key fundamental research programs and capabilities.¹⁴ The Office of Science is the engine that drives breakthrough scientific discoveries. It is an essential part of the federal research enterprise, and we urge the Department to start treating it as such.

¹⁰ Bishop, Breanna. "Lawrence Livermore National Laboratory Achieves Fusion Ignition | Lawrence Livermore National Laboratory." *Www.llnl.gov*, 14 Dec. 2022, www.llnl.gov/news/lawrence-livermore-national-laboratory-achieves-fusion-ignition. Accessed 2 May 2023.

¹¹ Department of Energy. "U.S. Fusion Head Jim van Dam to Retire September 10." *Qedfusion.org*, 26 July 2022, qedfusion.org/FPA/ARC22/fpn22-35.shtml. Accessed 2 May 2023.

¹² "H.R.589 - 115th Congress (2017-2018): Department of Energy Research and Innovation Act." *Congress.gov*, Library of Congress, 28 September 2018, <https://www.congress.gov/bill/115th-congress/house-bill/589>.

¹³ "H.R.4346 - 117th Congress (2021-2022): Chips and Science Act." *Congress.gov*, Library of Congress, 9 August 2022, <https://www.congress.gov/bill/117th-congress/house-bill/4346>.

¹⁴ Board, The Editorial. "Opinion | Banning Gas Stoves by Regulation." *WSJ*, www.wsj.com/articles/energy-department-regulations-gas-stoves-ban-jennifer-granholm-biden-administration-11675457600. Accessed 2 May 2023.

Thank you for your attention to these important matters. We look forward to working with you to reprioritize support for this office and for the U.S. research community.

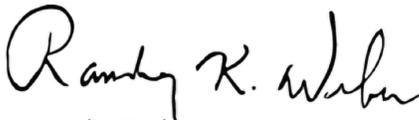
Sincerely,



Frank Lucas
Chairman
House Committee on
Science, Space, and Technology



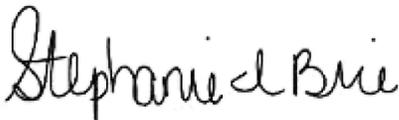
Brandon Williams
Chairman
Subcommittee on Energy
House Committee on
Science, Space, and Technology



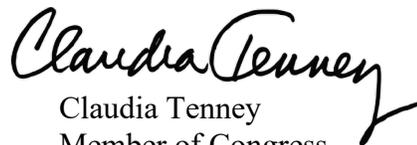
Randy Weber
Member of Congress



Jim Baird
Member of Congress



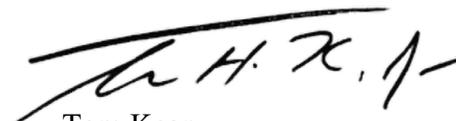
Stephanie Bice
Member of Congress



Claudia Tenney
Member of Congress



Max Miller
Chairman
Subcommittee on Environment
House Committee on Science, Space,
and Technology



Tom Kean
Member of Congress

cc:
The Honorable Zoe Lofgren
Ranking Member
House Committee on Science, Space, & Technology