Suspend the Rules and Pass the Bill, H.R. 2988, With an Amendment

(The amendment strikes all after the enacting clause and inserts a new text)

118TH CONGRESS 1ST SESSION H. R. 2988

To provide for Department of Energy and National Aeronautics and Space Administration research and development coordination, and for other purposes.

IN THE HOUSE OF REPRESENTATIVES

April 27, 2023

Mr. WILLIAMS of New York (for himself and Mr. Sorensen) introduced the following bill; which was referred to the Committee on Science, Space, and Technology

A BILL

To provide for Department of Energy and National Aeronautics and Space Administration research and development coordination, and for other purposes.

- 1 Be it enacted by the Senate and House of Representa-
- 2 tives of the United States of America in Congress assembled,
- 3 SECTION 1. SHORT TITLE.
- 4 This Act may be cited as the "DOE and NASA Inter-
- 5 agency Research Coordination Act".

| 1 | SEC. 2. DEPARTMENT OF ENERGY AND NATIONAL AERO- |
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| 2 | NAUTICS AND SPACE ADMINISTRATION RE- |
| 3 | SEARCH AND DEVELOPMENT COORDINA- |
| 4 | TION. |
| 5 | (a) In General.—The Secretary of Energy (in this |
| 6 | section referred to as the "Secretary") and the Adminis- |
| 7 | trator of the National Aeronautics and Space Administra- |
| 8 | tion (in this section referred to as the "Administrator") |
| 9 | may carry out, as practicable, cross-cutting and collabo- |
| 10 | rative research and development activities to support the |
| 11 | advancement of Department of Energy and National Aer- |
| 12 | onautics and Space Administration mission requirements |
| 13 | and priorities. The Secretary and Administrator, in ac- |
| 14 | cordance with subsection (e), may make competitive |
| 15 | awards to carry out such activities. |
| 16 | (b) Memoranda of Understanding.—The Sec- |
| 17 | retary and the Administrator shall coordinate the activi- |
| 18 | ties under subsection (a) through memoranda of under- |
| 19 | standing, or other appropriate interagency agreements. |
| 20 | (c) Coordination.—In carrying out the activities |
| 21 | under subsection (a), the Secretary and the Administrator |
| 22 | may— |
| 23 | (1) conduct collaborative research and develop- |
| 24 | ment activities in a variety of focus areas that may |
| 25 | include— |

| 1 | (A) propulsion systems and components, |
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| 2 | including nuclear thermal and nuclear electric |
| 3 | propulsion, radioisotope power systems, thermo- |
| 4 | electric generators, advanced nuclear fuels, and |
| 5 | heater units; |
| 6 | (B) modeling and simulation, machine |
| 7 | learning, data assimilation, large scale data |
| 8 | analytics, and predictive analysis in order to op- |
| 9 | timize algorithms for mission-related purposes; |
| 10 | (C) fundamental high energy physics, as- |
| 11 | trophysics, and cosmology, including the nature |
| 12 | of dark energy and dark matter, in accordance |
| 13 | with section 305 of the Department of Energy |
| 14 | Research and Innovation Act (42 U.S.C. |
| 15 | 18643); |
| 16 | (D) fundamental earth and environmental |
| 17 | sciences, in accordance with section 306 of the |
| 18 | Department of Energy Research and Innovation |
| 19 | Act (42 U.S.C. 18644) and section 60501 of |
| 20 | title 51, United States Code; |
| 21 | (E) quantum information sciences, includ- |
| 22 | ing quantum computing and quantum network |
| 23 | infrastructure, in accordance with sections 403 |
| 24 | and 404 of the National Quantum Initiative Act |
| 25 | (15 U.S.C. 8853 and 8854); |

| 1 | (F) radiation health effects, in accordance |
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| 2 | with section 306 of the Department of Energy |
| 3 | Research and Innovation Act (42 U.S.C. |
| 4 | 18644); |
| 5 | (G) ground- and space-based technology |
| 6 | necessary for the transmission to the Earth's |
| 7 | surface of solar energy collected in space; and |
| 8 | (H) other areas of potential research and |
| 9 | development collaboration the Secretary and the |
| 10 | Administrator determine important to achieving |
| 11 | agency missions and objectives; |
| 12 | (2) develop methods to accommodate large vol- |
| 13 | untary data sets on space and aeronautical informa- |
| 14 | tion on high-performance computing systems with |
| 15 | variable quality and scale; |
| 16 | (3) promote collaboration and data and infor- |
| 17 | mation sharing between the Department of Energy, |
| 18 | National Aeronautics and Space Administration, the |
| 19 | National Laboratories, and other appropriate enti- |
| 20 | ties by providing the necessary access and secure |
| 21 | data and information transfer capabilities; and |
| 22 | (4) support the Administration's access to the |
| 23 | Department's research infrastructure and capabili- |
| 24 | ties, as practicable. |

| 1 | (d) Agreements.—In carrying out the activities |
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| 2 | under subsection (a), the Secretary and the Administrator |
| 3 | are authorized to— |
| 4 | (1) carry out reimbursable and non-reimburs- |
| 5 | able agreements between the Department of Energy |
| 6 | and the National Aeronautics and Space Administra- |
| 7 | tion; and |
| 8 | (2) collaborate with other Federal agencies, as |
| 9 | appropriate. |
| 10 | (e) Merit Review Process.—The Secretary and |
| 11 | the Administrator shall ensure any competitive awards |
| 12 | made to carry out the activities under section (a) shall |
| 13 | follow all appropriate laws and agency policies, including |
| 14 | the following: |
| 15 | (1) Selection by merit-review-based processes. |
| 16 | (2) Consideration of applications from Federal |
| 17 | agencies, National Laboratories, institutions of high- |
| 18 | er education, non-profit institutions, and other ap- |
| 19 | propriate entities. |
| 20 | (f) Report.—Not later than two years after the date |
| 21 | of the enactment of this section, the Secretary and the |
| 22 | Administrator shall submit to the Committee on Science, |
| 23 | Space, and Technology of the House of Representatives |
| 24 | and the Committee on Energy and Natural Resources and |

| 1 | the Committee on Commerce, Science, and Transportation |
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| 2 | of the Senate, a report detailing the following: |
| 3 | (1) Interagency research and development co- |
| 4 | ordination activities between the Department of En- |
| 5 | ergy and the National Aeronautics and Space Ad- |
| 6 | ministration carried out under this section. |
| 7 | (2) How such coordination activities expand the |
| 8 | technical capabilities of the Department and the Ad- |
| 9 | ministration. |
| 10 | (3) Collaborative research and development |
| 11 | achievements. |
| 12 | (4) Areas of future mutually beneficial activi- |
| 13 | ties, including potential applications of clean energy |
| 14 | technologies, such as marine energy. |
| 15 | (5) Continuation of coordination activities be- |
| 16 | tween the Department of Energy and the National |
| 17 | Aeronautics and Space Administration. |
| 18 | (g) Research Security.—The activities authorized |
| 19 | under this section shall be applied in a manner consistent |
| 20 | with subtitle D of title VI of the Research and Develop- |
| 21 | ment, Competition, and Innovation Act (enacted as divi- |
| 22 | sion B Public Law 117–167; 42 U.S.C. 19231 et seq.). |