

119TH CONGRESS
1ST SESSION

S. _____

To establish the National Institute for Space Research, and for other purposes.

IN THE SENATE OF THE UNITED STATES

Mr. CORNYN (for himself, Mr. HICKENLOOPER, Mr. WICKER, Mr. LUJÁN, and Mr. KELLY) introduced the following bill; which was read twice and referred to the Committee on _____

A BILL

To establish the National Institute for Space Research, 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 “Space Research And
5 Continuing Exploration Act” or “Space RACE Act”.

6 **SEC. 2. DEFINITIONS.**

7 In this Act:

8 (1) ADMINISTRATOR.—The term “Adminis-
9 trator” means the Administrator of the National
10 Aeronautics and Space Administration.

1 (2) INSTITUTE.—The term “Institute” means
2 the National Institute for Space Research estab-
3 lished under section 3.

4 (3) ISS.—The term “ISS” means the Inter-
5 national Space Station.

6 (4) MICROGRAVITY RESEARCH.—The term
7 “microgravity research” means research and devel-
8 opment conducted while in orbit in space.

9 (5) QUALIFIED NATIONAL MICROGRAVITY
10 PROJECT.—The term “qualified national micro-
11 gravity project”—

12 (A) means a project led by a nongovern-
13 mental entity using a next-generation micro-
14 gravity platform that reflects 1 or more micro-
15 gravity research and development priorities of
16 the United States Government, as identified by
17 the Institute; and

18 (B) includes a project with United States
19 Government funding or subsidy that—

20 (i) is led by 1 or more—

21 (I) institutions of higher edu-
22 cation (as defined in section 101 of
23 the Higher Education Act of 1965 (20
24 U.S.C. 1001));

25 (II) students; or

1 (III) nonprofit organizations; or

2 (ii) is—

3 (I) a commercial venture; or

4 (II) a joint project with the
5 United States Government, of which
6 the United States Government—

7 (aa) is not the lead party for
8 the project; and

9 (bb) serves in a supporting
10 role.

11 (6) RESEARCH PROJECT.—The term “research
12 project” means an in-space research and develop-
13 ment project that—

14 (A) uses a next-generation microgravity
15 platform;

16 (B) reflects national priorities of the
17 United States; and

18 (C) is led, funded, or sponsored by a de-
19 partment or agency of the United States Gov-
20 ernment other than the National Aeronautics
21 and Space Administration.

22 (7) SPECIAL GOVERNMENT EMPLOYEE.—The
23 term “special Government employee” has the mean-
24 ing given the term in section 202(a) of title 18,
25 United States Code, except that for purposes of this

1 Act, such an employee may be retained, designated,
2 appointed, or employed to perform, with or without
3 compensation, for more than 130 days during a 365-
4 day period.

5 **SEC. 3. NATIONAL INSTITUTE FOR SPACE RESEARCH.**

6 (a) ESTABLISHMENT.—Not earlier than January 1,
7 2026, and subject to appropriations, the Administrator
8 may establish a National Institute for Space Research,
9 which shall be operated by a non-Federal entity under a
10 contractual agreement with the Administrator, to sup-
11 port—

12 (1) the use of in-space research and develop-
13 ment capabilities and facilities available on next-gen-
14 eration microgravity platforms;

15 (2) the use of in-space research and develop-
16 ment capabilities for United States national security
17 purposes;

18 (3) the United States microgravity ecosystem in
19 preparation for the decommissioning of the ISS;

20 (4) education and workforce development in the
21 United States with respect to space research; and

22 (5) the transition of United States microgravity
23 research and development from the ISS to next-gen-
24 eration microgravity platforms.

25 (b) BOARD OF DIRECTORS.—

1 (1) IN GENERAL.—The Institute shall have a
2 Board of Directors (referred to in this section as the
3 “Board”).

4 (2) MEMBERSHIP.—The Board shall be com-
5 posed of the following:

6 (A) An employee of the National Aero-
7 nautics and Space Administration, who shall—

8 (i) be appointed by the Administrator;
9 and

10 (ii) serve as Chairperson of the Board.

11 (B) An employee of the Office of Science
12 and Technology Policy, appointed by the
13 Science Advisor to the President.

14 (C) An employee of the Department of
15 Commerce, appointed by the Secretary of Com-
16 merce, to represent perspectives of the National
17 Institute of Standards and Technology and the
18 National Oceanic and Atmospheric Administra-
19 tion.

20 (D) An employee of the Department of
21 Education, appointed by the Secretary of Edu-
22 cation.

23 (E) An employee of the National Science
24 Foundation, appointed by the Director of the
25 National Science Foundation.

1 (F) An employee of the National Institutes
2 of Health, appointed by the Director of the Na-
3 tional Institutes of Health.

4 (G) An employee appointed by the Presi-
5 dent of the National Academy of Sciences and
6 who shall be considered a special government
7 employee.

8 (H) An employee of the Food and Drug
9 Administration, appointed by the Commissioner
10 of the Food and Drug Administration.

11 (I) An employee of the Department of En-
12 ergy, appointed by the Secretary of Energy.

13 (J) An employee of the Department of De-
14 fense, appointed by the Secretary of Defense.

15 (K) A qualified scientist with professional
16 experience in space research and development,
17 who shall be—

18 (i) appointed by the Chairperson; and

19 (ii) considered a special Government
20 employee.

21 (L) A qualified professional with executive
22 management experience in the aerospace indus-
23 try, who shall be—

24 (i) appointed by the Chairperson; and

1 (ii) considered a special government
2 employee.

3 (3) TERMS.—A member of the Board shall be
4 appointed for a term of 6 years, except that of the
5 members first appointed, so as to stagger the
6 terms—

7 (A) the Chairperson shall be appointed for
8 a term of 6 years;

9 (B) each member appointed under sub-
10 paragraphs (B) through (E) of paragraph (2)
11 shall be appointed for a term of 2 years;

12 (C) each member appointed under sub-
13 paragraphs (F) through (J) of paragraph (2)
14 shall be appointed for a term of 4 years; and

15 (D) each remaining member shall be ap-
16 pointed for a term of 6 years.

17 (4) CONFLICTS OF INTEREST.—

18 (A) IN GENERAL.—No member of the
19 Board shall have a financial interest (including
20 an employment relationship) in an entity seek-
21 ing a grant or cooperative agreement under this
22 section.

23 (B) CODE OF CONDUCT.—The Board shall
24 establish a code of conduct to govern the behav-
25 ior of the Board, which shall—

1 (i) include avoidance of conflicts of in-
2 terest; and

3 (ii) use the Federal Standards of Con-
4 duct for all members of the Board.

5 (5) VACANCIES.—

6 (A) IN GENERAL.—In the case of a va-
7 cancy on the Board, not later than 90 days
8 after the vacancy occurs, the vacancy shall be
9 filled in the manner in which the original ap-
10 pointment was made.

11 (B) FILLING UNEXPIRED TERM.—An indi-
12 vidual chosen to fill a vacancy shall be ap-
13 pointed for the unexpired term of the member
14 replaced.

15 (6) DUTIES.—

16 (A) IN GENERAL.—The duties of the
17 Board shall be—

18 (i) to develop all budget requests, poli-
19 cies, and standard operating procedures of
20 the Institute;

21 (ii) to supervise the operations of the
22 Institute;

23 (iii) to appoint and supervise an Exec-
24 utive Director for the Institute;

1 (iv) to set research priorities for the
2 Institute; and

3 (v) for fiscal year 2028 and each fis-
4 cal year thereafter, to submit to the appro-
5 priate committees of Congress a budget re-
6 quest for Institute operations, including
7 grants or cooperative agreements under
8 subsection (e).

9 (B) APPROPRIATE COMMITTEES OF CON-
10 GRESS DEFINED.—In this paragraph, the term
11 “appropriate committees of Congress” means—

12 (i) the Committee on Appropriations
13 and the Committee on Commerce, Science,
14 and Transportation of the Senate; and

15 (ii) the Committee on Appropriations
16 and the Committee on Science, Space, and
17 Technology of the House of Representa-
18 tives.

19 (7) PROHIBITION ON USE OF FUNDS FOR COM-
20 PENSATION.—None of the amounts made available
21 for the Institute may be used to provide compensa-
22 tion to any member of the Board.

23 (8) RULE OF CONSTRUCTION.—Nothing in this
24 section may be construed to authorize the Institute
25 to regulate, review, or otherwise oversee a micro-

1 gravity project of an private entity unless the private
2 entity is a recipient of Federal funds.

3 (c) EXECUTIVE DIRECTOR.—

4 (1) IN GENERAL.—The Institute shall be head-
5 ed by an Executive Director, who—

6 (A) shall be knowledgeable in matters re-
7 lating to microgravity research opportunities;

8 (B) shall be appointed and supervised by
9 the Board; and

10 (C) shall serve at the pleasure of the
11 Board until such time as the Board considers
12 appropriate.

13 (2) APPOINTMENT.—In making an appointment
14 for the Executive Director, the Board shall consider
15 an individual's technical qualifications, professional
16 standing, and demonstrated knowledge in the field of
17 health, advanced manufacturing, research, or engi-
18 neering.

19 (3) DUTIES.—The Executive Director shall—

20 (A) ensure the efficient and transparent
21 implementation of this Act; and

22 (B) in coordination with the Board, carry
23 out activities of the Institute.

24 (4) APPOINTMENT OF STAFF.—The Executive
25 Director may enter into a contract with a non-

1 governmental entity to staff additional personnel to
2 implement and oversee the activities carried out by
3 the Institute under subsection (d).

4 (5) COMPENSATION.—The Chairperson of the
5 Board may fix the compensation of the Executive
6 Director.

7 (d) ACTIVITIES.—The Institute shall—

8 (1) identify, publish, and maintain a current
9 list of next-generation microgravity platforms avail-
10 able for use by the Institute;

11 (2) develop and implement guidelines and
12 project selection criteria, and engage with relevant
13 entities, for use of next-generation microgravity plat-
14 forms by all microgravity research projects and
15 qualified national microgravity projects of Govern-
16 ment agencies;

17 (3) provide competitively awarded grants or co-
18 operative agreements to facilitate the development of
19 research projects and qualified national microgravity
20 projects, with matching funds, as described in sub-
21 section (e);

22 (4) facilitate cooperation among the National
23 Aeronautics and Space Administration, other Gov-
24 ernment departments and agencies, the States, and

1 academia so as to ensure the enhancement and sus-
2 tained operations of the Institute;

3 (5) coordinate flight opportunities on next-gen-
4 eration microgravity platforms, subject to the avail-
5 ability of appropriations, for any research project or
6 qualified national microgravity project—

7 (A) considered to be sensitive to the na-
8 tional interest of the United States; and

9 (B) that reflects the microgravity priorities
10 of the United States; and

11 (6) coordinate with the National Aeronautics
12 and Space Administration, the ISS National Labora-
13 tory, next-generation microgravity platform pro-
14 viders, and researchers to gather lessons learned
15 that may be used to support the transition of United
16 States microgravity research and development from
17 the ISS National Laboratory to a new structure.

18 (e) GRANTS OR COOPERATIVE AGREEMENTS.—

19 (1) COORDINATION OF PROJECTS.—The Insti-
20 tute, in coordination with Government entities rep-
21 resented on the Board, shall coordinate microgravity
22 research projects and qualified national microgravity
23 projects on next generation microgravity platforms.

24 (2) AWARD OF GRANTS.—Subject to the avail-
25 ability appropriations, the Institute may award any

1 appropriated grants to, or enter into cooperative
2 agreements with, eligible entities on a competitive
3 basis for the purpose of conducting microgravity re-
4 search and development projects using next-genera-
5 tion microgravity platforms.

6 (3) APPLICATIONS.—

7 (A) SUBMISSION OF MATERIALS.—

(i) IN GENERAL.—An entity seeking a grant under this subsection for any research project or qualified national microgravity project shall submit to the Institute an application at such time, in such a manner, and containing such information as may be reasonably required and made available to the public on the internet website of the Institute

(ii) EXCEPTION.—With respect to a proposed research project or qualified national microgravity project for which an entity submits an application under this subsection, the Institute shall not make application information available to the public under clause (i) if—

24 (I) disclosure of such information
25 presents a national security risk; or

1 (II) the application contains pro-
2 prietary information.

3 (B) CONTENTS.—To be approved for a
4 grant under this subsection, an application for
5 proposed project shall demonstrate the manner
6 in which the project advances sound scientific
7 principles and aligns with the national scientific
8 priorities and interests of the Government.

9 (4) ELIGIBLE ENTITIES.—Entities eligible for a
10 grant under this subsection include domestic—

11 (A) public entities;

12 (B) private entities;

13 (C) nonprofit organizations; and

14 (D) for-profit organizations.

15 (5) PARTNERSHIPS.—The Institute, in con-
16 sultation with the Board, may partner with Govern-
17 ment entities to co-fund (or otherwise support
18 grants awarded by other Government entities), on a
19 competitive basis and subject to the availability of
20 appropriations, research projects and qualified na-
21 tional microgravity projects for the purpose of pro-
22 moting microgravity research and development
23 projects using next-generation microgravity plat-
24 forms.

1 (6) USE OF NEXT-GENERATION MICROGRAVITY
2 PLATFORMS.—

3 (A) IN GENERAL.—The recipient of a
4 grant under this subsection may contract with
5 any next-generation microgravity platform un-
6 less the Board determines that the project con-
7 cerned is sensitive to the national interest of
8 the United States.

9 (B) COORDINATION.—

10 (i) IN GENERAL.—In the case of a de-
11 termination that such a project is sensitive
12 to the national interest of the United
13 States, in the Administrator shall coordi-
14 nate with the grant recipient and the Insti-
15 tute to allow the grant recipient to use the
16 allocated crew time of the National Aero-
17 nautics and Space Administration onboard
18 a next-generation microgravity platform, as
19 available.

20 (ii) LIMITATION.—Use by a grant re-
21 cipient of allocated crew time under clause
22 (i) may exceed 50 percent of such crew
23 time.

24 (7) FEDERAL GRANTS AND CONSULTATION.—
25 The head of a Government agency may—

1 (A) within an appropriated grant, award to
2 the Institute or an eligible entity described in
3 paragraph (3) 1 or more subgrants for space
4 research; and

5 (B) consult with the Institute for technical
6 assistance, enter into a partnership with the In-
7 stitute, and coordinate with the Institute for
8 purposes of evaluate microgravity research and
9 development projects.

10 (f) PROHIBITION ON INTERFERENCE WITH GOVERN-
11 MENT-FUNDED ACTIVITIES.—Notwithstanding any other
12 provision of law, the Institute shall not interfere with any
13 agreement between the United States Government and a
14 microgravity platform provider with respect to the conduct
15 of research and development activities in partnership with
16 any Federal entity other than the Institute.

17 (g) MINIMIZING COSTS, CONSTRAINTS AND BUR-
18 DENS ON OTHER ACTIVITIES.—The Institute shall, to the
19 extent practicable, implement a policy that seeks to admin-
20 ister the activities of the Institute in a manner that places
21 minimal costs, constraints, and burdens on other author-
22 ized activities.

23 (h) RULE OF CONSTRUCTION.—Notwithstanding any
24 other provision of law, nothing in this section may be con-
25 strued to constrain a department or agency of the United

1 States Government from entering into an agreement with
2 a next-generation microgravity platform provider other
3 than through a grant provided by the Institute.

4 (i) FUNDS AUTHORIZED.—

5 (1) IN GENERAL.—The Administrator is au-
6 thorized to provide funds for the implementation of
7 the activities described in this section, subject to ap-
8 propriations and compliance with this Act.

9 (2) ADMINISTRATIVE EXPENSES.—Not more
10 than 5 percent of the amounts provided pursuant to
11 paragraph (1) may be used for administrative ex-
12 penses of the Institute, including staff salaries.

13 **SEC. 4. ISS NATIONAL LABORATORY AND ISS COOPERATIVE**
14 **AGREEMENT.**

15 Not later than 180 days after ISS research oper-
16 ations have ceased, the Administrator shall terminate the
17 ISS National Laboratory and the cooperative agreement
18 with the ISS management entity under section 504(a) of
19 the National Aeronautics and Space Administration Au-
20 thorization Act of 2010 (42 U.S.C. 18354(a)).