I

117TH CONGRESS
1ST SESSION

H. R. 1748

To assess and improve the competitiveness of American civilian nuclear commerce, to expedite Department of Energy review of certain nuclear technology exports, and for other purposes.

IN THE HOUSE OF REPRESENTATIVES

MARCH 10, 2021

Mr. JOHNSON of Ohio (for himself and Mr. GONZALEZ of Ohio) introduced the following bill; which was referred to the Committee on Energy and Commerce, and in addition to the Committee on Foreign Affairs, for a period to be subsequently determined by the Speaker, in each case for consideration of such provisions as fall within the jurisdiction of the committee concerned

---

A BILL

To assess and improve the competitiveness of American civilian nuclear commerce, to expedite Department of Energy review of certain nuclear technology exports, and for other purposes.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled,

SECTION 1. SHORT TITLE.

This Act may be cited as the ''Strengthening American Nuclear Competitiveness Act''.

SEC. 2. COMPETITIVENESS OF NUCLEAR COMMERCE.

(a) REPORT.—Not later than 180 days after the date of enactment of this Act, the Secretary of Energy shall develop and submit to Congress a report on United States civilian nuclear commerce.

(b) CONSULTATION.—In developing the report required under subsection (a), the Secretary of Energy shall consult with—

(1) the Secretary of State;

(2) the Secretary of Commerce;

(3) the Administrator of the Environmental Protection Agency; and

(4) the Nuclear Regulatory Commission.

(c) CONTENTS.—The report required under subsection (a) shall include—

(1) an assessment of—

(A) legal and regulatory requirements and policies of, and commercial practices in, the United States with respect to the civilian nuclear industry of the United States;

(B) the effects of such practices on such civilian nuclear industry in domestic and foreign commerce;

(C) the role of emerging United States nuclear technologies and applications of such tech-

nologies, including nonelectric applications of those technologies; and

(D) the effects of advanced manufacturing and construction methods for nuclear technologies on the costs of such technologies and the civilian nuclear industry of the United States;

(2) a comparison of the matters assessed in paragraph (1) with respect to the United States to an assessment of such matters as they apply with respect to foreign countries;

(3) recommendations to improve the competitiveness of United States civilian nuclear commerce; and

(4) recommendations relating to the application of section 170 of the Atomic Energy Act of 1954 (42 U.S.C. 2210) with respect to advanced nuclear technologies.

SEC. 3. EXPEDITING NUCLEAR TECHNOLOGY EXPORTS.

(a) EXPEDITED PROCEDURES.—Section 57 of the Atomic Energy Act of 1954 (42 U.S.C. 2077) is amended by adding at the end the following new subsection:

''(f) EXPEDITED PROCEDURES.—

''(1) ESTABLISHMENT.—In carrying out subsection b.(2), the Secretary of Energy shall establish

procedures for expedited consideration of requests for authorizations regarding the transfer of a technology that involves a low-proliferation-risk reactor activity described in paragraph (2) of this subsection to a foreign country described in paragraph (3) of this subsection.

''(2) ACTIVITIES.—A low-proliferation-risk reactor activity described in this paragraph is an activity that meets each of following criteria:

''(A) The activity is listed in section 810.2(b) of title 10, Code of Federal Regulations, as in effect on the date of enactment of this Act.

''(B) The activity is not an activity requiring a specific authorization pursuant to section 810.7(c) of such title, as in effect on such date.

''(C) The Secretary determines that the transfer (or retransfer) of a technology that involves the activity will not result in a significant increase of the risk of proliferation beyond such risk that exists at the time that the authorization is requested.

''(3) FOREIGN COUNTRIES.—A foreign country described in this paragraph is a foreign country—

''(A) that is not a nuclear-weapon State, as defined by Article IX of the Treaty on the Non-Proliferation of Nuclear Weapons, signed at Washington, London, and Moscow on July 1, 1968, other than the United Kingdom or France; and

''(B) with respect to which the Secretary determines under subsection b.(2) that a transfer to the country of a technology that involves a low-proliferation-risk reactor activity described in paragraph (2) of this subsection will not be inimical to the interest of the United States.

''(4) CONCURRENCE AND CONSULTATION.—The Secretary of Energy shall establish the procedures under paragraph (1) with the concurrence of the Department of State and after consultation with the Nuclear Regulatory Commission, the Department of Commerce, and the Department of Defense.

''(5) TIMING AND AVAILABILITY.—The procedures established under paragraph (1) shall—

''(A) ensure that each request is approved or denied by not later than 45 days after the later of—

''(i) the date on which the foreign country transmits any required assurances to the Department of State; or

''(ii) the date on which the interagency review under subsection b. is completed; and

''(B) be publicly available.''.

(b) ASSURANCES.—Section 57(b) of such Act (42 U.S.C. 2077(b)) is amended by inserting after ''mechanisms.'' the following new sentence: ''To the extent practicable, the Secretary of Energy shall continue to process such requests during such interagency review in a manner that enables the Secretary to make such determination as soon as practicable after the receipt of assurances by a foreign country to the Department of State, if any such assurances are required.''.

SEC. 4. LICENSING DOMESTIC NUCLEAR PROJECTS IN WHICH UNITED STATES ALLIES INVEST.

(a) IN GENERAL.—The prohibitions against issuing certain licenses for utilization facilities to certain corporations and other entities described in the second sentence of section 103 d. of the Atomic Energy Act of 1954 (42. U.S.C. 2133(d)) and the second sentence of section 104 d. of that Act (42 U.S.C. 2134(d)) shall not apply to an entity described in subsection (b) of this section if the Nu-

clear Regulatory Commission determines that issuance of the applicable license to that entity is not inimical to—

(1) the common defense and security; or

(2) the health and safety of the public.

(b) ENTITIES DESCRIBED.—An entity described in this subsection is a corporation or other entity that is owned, controlled, or dominated by—

(1) the government of—

(A) a country that is a member of the Group of Seven as of November 25, 2020, which includes the United Kingdom, Germany, Canada, Japan, France, and Italy; or

(B) the Republic of Korea;

(2) a corporation that is incorporated in a country described in paragraph (1); or

(3) an alien who is a national of a country described in paragraph (1).

(c) TECHNICAL AMENDMENT.—Section 103 d. of the Atomic Energy Act of 1954 (42 U.S.C. 2133(d)) is amended, in the second sentence, by striking ''any any'' and inserting ''any''.

(d) SAVINGS CLAUSE.—Nothing in this section affects the requirements of section 721 of the Defense Production Act of 1950 (50 U.S.C. 4565).

SEC. 5. LICENSING CONSIDERATIONS RELATING TO USE OF NUCLEAR ENERGY FOR NONELECTRIC APPLICATIONS.

(a) IN GENERAL.—Not later than 1 year after the date of enactment of this Act, the Nuclear Regulatory Commission (in this section referred to as the ''Commission'') shall submit to the Committee on Energy and Commerce of the House of Representatives and the Committee on Environment and Public Works of the Senate a report addressing any unique licensing issues or requirements relating to—

(1) the flexible operation of advanced nuclear reactors, such as ramping power output and switching between electricity generation and nonelectric applications;

(2) the use of advanced nuclear reactors exclusively for nonelectric applications; and

(3) the collocation of advanced nuclear reactors with industrial plants or other facilities.

(b) STAKEHOLDER INPUT.—In developing the report, the Commission shall seek input from—

(1) the Secretary of Energy;

(2) the nuclear energy industry;

(3) technology developers;

(4) the industrial, chemical, and medical sectors;

(5) nongovernmental organizations; and

(6) other public stakeholders.

(c) CONTENTS.—

(1) IN GENERAL.—The report shall describe—

(A) any unique licensing issues or requirements relating to the matters described in paragraphs (1) through (3) of subsection (a), including, with respect to the nonelectric applications referred to in paragraphs (1) and (2) of that subsection, any licensing issues or requirements relating to the use of nuclear energy—

(i) for hydrogen or other liquid and gaseous fuel or chemical production;

(ii) for water desalination and wastewater treatment;

(iii) for heat used in industrial processes;

(iv) for district heating;

(v) in relation to energy storage;

(vi) for industrial or medical isotope production; and

(vii) other applications, as identified by the Commission;

(B) options for addressing those issues or requirements—

(i) within the existing regulatory framework;

(ii) through the technology-inclusive, regulatory framework to be established under section 103(a)(4) of the Nuclear Energy Innovation and Modernization Act (42 U.S.C. 2133 note; Public Law 115–439); or

(iii) through a new rulemaking;

(C) the extent to which Commission action is needed to implement any matter described in the report; and

(D) cost estimates, proposed budgets, and proposed timeframes for implementing risk-informed and performance-based regulatory guidance for licensing advanced nuclear reactors for nonelectric applications.

SEC. 6. REPORT ON ADVANCED METHODS OF MANUFACTURING AND CONSTRUCTION FOR NUCLEAR ENERGY PROJECTS.

(a) IN GENERAL.—Not later than 180 days after the date of enactment of this Act, the Nuclear Regulatory Commission (in this section referred to as the ''Commission'') shall submit to the Committee on Energy and Commerce of the House of Representatives and the Committee

on Environment and Public Works of the Senate a report on manufacturing and construction for nuclear energy projects.

(b) STAKEHOLDER INPUT.—In developing the report, the Commission shall seek input from—

(1) the Secretary of Energy;

(2) the nuclear energy industry;

(3) the National Laboratories;

(4) institutions of higher education;

(5) nuclear and manufacturing technology developers;

(6) the manufacturing and construction industries;

(7) standards development organizations;

(8) labor unions;

(9) nongovernmental organizations; and

(10) other public stakeholders.

(c) CONTENTS.—

(1) IN GENERAL.—The report shall—

(A) examine any unique licensing issues or requirements relating to the use of—

(i) advanced manufacturing techniques; and

(ii) advanced construction techniques;

(B) examine—

(i) the requirements for nuclear-grade components in manufacturing and construction for nuclear energy projects;

(ii) opportunities to use standard materials, parts, or components in manufacturing and construction for nuclear energy applications; and

(iii) opportunities to use standard materials that are in compliance with existing codes to provide acceptable approaches to support or encapsulate new materials that do not yet have applicable codes;

(C) identify safety aspects of advanced manufacturing processes and advanced construction techniques that are not addressed by existing codes and standards, so that generic guidance may be updated or created as necessary by the Commission;

(D) identify options for addressing the issues, requirements, and opportunities examined under subparagraphs (A) and (B)—

(i) within the existing regulatory framework; or

(ii) through a new rulemaking; and

(E) describe the extent to which Commission action is needed to implement any matter described in the report.

(2) COST ESTIMATES, BUDGETS, AND TIMEFRAMES.—The report shall include cost estimates, proposed budgets, and proposed timeframes for implementing risk-informed and performance-based regulatory guidance for advanced manufacturing and construction of nuclear energy projects.

SEC. 7. RISK POOLING PROGRAM ASSESSMENT.

(a) REPORT.—Not later than 1 year after the date of enactment of this Act, the Comptroller General shall carry out a review of, and submit to the Committee on Energy and Commerce of the House of Representatives and the Committee on Environment and Public Works of the Senate a report on, the Secretary of Energy's actions with respect to the program described in section 934(e) of the Energy Independence and Security Act of 2007 (42 U.S.C. 17373(e)).

(b) CONTENTS.—The report described in subsection (a) shall include—

(1) an evaluation of the Secretary of Energy's actions to determine the risk-informed assessment formula under section 934(e)(2)(C) of the Energy

Independence and Security Act of 2007 (42 U.S.C. 17373(e)(2)(C)); and

(2) a review of the Secretary of Energy's methodology to collect information to determine and implement the formula.

○