

PUBLIC LAW 115-307—DEC. 11, 2018

NATIONAL EARTHQUAKE HAZARDS  
REDUCTION PROGRAM REAUTHORIZATION  
ACT OF 2018

Public Law 115–307  
115th Congress

An Act

Dec. 11, 2018  
[S. 1768]

To reauthorize and amend the National Earthquake Hazards Reduction Program,  
and for other purposes.

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

National  
Earthquake  
Hazards  
Reduction  
Program  
Reauthorization  
Act of 2018.  
42 USC 7701  
note.

**SECTION 1. SHORT TITLE.**

This Act may be cited as the “National Earthquake Hazards  
Reduction Program Reauthorization Act of 2018”.

**SEC. 2. MODIFICATION OF FINDINGS AND PURPOSE.**

(a) **FINDINGS.**—Section 2 of the Earthquake Hazards Reduction  
Act of 1977 (42 U.S.C. 7701) is amended—

(1) in paragraph (1)—

(A) by inserting “, and the Commonwealth of Puerto  
Rico,” after “States”;

(B) by inserting “Oregon,” after “New York,”; and

(C) by inserting “Tennessee,” after “South Carolina”;

(2) in paragraph (2), by striking “prediction techniques  
and”;

(3) by striking paragraph (4) and inserting the following:

“(4) A well-funded seismological research program could  
provide the scientific understanding needed to fully implement  
an effective earthquake early warning system.”;

(4) in paragraphs (6) and (7), by striking “lifelines” each  
place it appears and inserting “lifeline infrastructure”; and

(5) by adding at the end the following:

“(12) The built environment has generally been constructed  
and maintained to meet the needs of the users under normal  
conditions. When earthquakes occur, the built environment is  
generally designed to prevent severe injuries or loss of human  
life and is not expected to remain operational or able to recover  
under any specified schedule.

“(13) The National Research Council published a study  
on reducing hazards and risks associated with earthquakes  
based on the goals and objectives for achieving national earth-  
quake resilience described in the strategic plan entitled ‘Strat-  
egic Plan for the National Earthquake Hazards Reduction  
Program’. The study and an accompanying report called for  
work in 18 tasks focused on research, preparedness, and mitiga-  
tion and annual funding of approximately \$300,000,000 per  
year for 20 years.”.

(b) **PURPOSE.**—Section 3 of such Act (42 U.S.C. 7702) is  
amended—

(1) in the matter preceding paragraph (1), in the first sentence, by inserting “and increase the resilience of communities” after “future earthquakes”;

(2) in paragraph (1), by inserting “to individuals and the communities” after “an earthquake”;

(3) in paragraph (2), by striking “in time of disaster” and inserting “to facilitate community-wide post-earthquake recovery and in times of disaster”;

(4) in paragraph (3), by striking “for predicting damaging earthquakes and”;

(5) in paragraph (4), by inserting “and planning” after “model building”; and

(6) in paragraph (5), by striking “reconstruction” and inserting “re-occupancy, recovery, reconstruction.”

(c) DEFINITIONS.—

(1) LIFELINE INFRASTRUCTURE.—

(A) IN GENERAL.—Section 4(6) of such Act (42 U.S.C. 7703(6)) is amended by striking “lifelines” and inserting “lifeline infrastructure”.

(B) CONFORMING AMENDMENT.—Such Act (42 U.S.C. 7701 et seq.) is amended by striking “lifelines” each place it appears and inserting “lifeline infrastructure”.

(2) COMMUNITY RESILIENCE.—Section 4 of such Act (42 U.S.C. 7703) is amended by adding at the end the following:

“(10) The term ‘community resilience’ means the ability of a community to prepare and plan for, absorb, recover from, and more successfully adapt to adverse seismic events.”

### SEC. 3. MODIFICATION OF NATIONAL EARTHQUAKE HAZARDS REDUCTION PROGRAM.

(a) MODIFICATION OF PROGRAM ACTIVITIES.—Subsection (a)(2) of section 5 of the Earthquake Hazards Reduction Act of 1977 (42 U.S.C. 7704) is amended—

(1) in subparagraph (B)—

(A) in clause (iii), by inserting “, community resilience,” after “seismic risk”; and

(B) by adding at the end the following:

“(iv) publishing a systematic set of maps of active faults and folds, liquefaction susceptibility, susceptibility for earthquake induced landslides, and other seismically induced hazards; and”; and

(2) in subparagraph (D), by striking “develop, operate” and all that follows through “7708,” and inserting “continue the development of the Advanced National Seismic System, including earthquake early warning capabilities”.

(b) AMENDMENTS RELATING TO INTERAGENCY COORDINATING COMMITTEE ON EARTHQUAKE HAZARDS REDUCTION.—

(1) CLARIFICATION REGARDING MEMBERSHIP.—Subparagraph (B) of subsection (a)(3) of such section is amended, in the matter preceding clause (i), by striking “The committee” and inserting “In addition to the Director, the committee”.

(2) REDUCTION IN MINIMUM FREQUENCY OF MEETINGS OF INTERAGENCY COORDINATING COMMITTEE ON EARTHQUAKE HAZARDS REDUCTION.—Subparagraph (C) of such subsection is amended by striking “not less than 3 times a year” and inserting “not less frequently than once each year”.

Publication.  
Maps.

(3) EXPANSION OF DUTIES.—Subparagraph (D) of such subsection is amended to read as follows:

“(D) DUTIES.—

“(i) GENERAL DUTY.—The Interagency Coordinating Committee shall oversee the planning, management, and coordination of the Program.

“(ii) SPECIFIC DUTIES.—The duties of the Interagency Coordinating Committee include the following:

“(I) Developing, not later than 6 months after the date of the enactment of the National Earthquake Hazards Reduction Program Reauthorization Act of 2004 and updating periodically—

“(aa) a strategic plan that establishes goals and priorities for the Program activities described under subsection (a)(2); and

“(bb) a detailed management plan to implement such strategic plan.

“(II) Developing a coordinated interagency budget for the Program that will ensure appropriate balance among the Program activities described under subsection (a)(2), and, in accordance with the plans developed under subclause (I), submitting such budget to the Director of the Office of Management and Budget at the time designated by the Director for agencies to submit biennial budgets.

“(III) Developing interagency memorandums of understanding with any relevant Federal agencies on data sharing and resource commitment in the event of an earthquake disaster.

“(IV) Coordinating with the Interagency Coordinating Committee on Windstorm Impact Reduction and other natural hazards coordination committees as the Director determines appropriate to share data and best practices.

“(V) Coordinating with the Administrator of the National Aeronautics and Space Administration and the Administrator of the National Oceanic and Atmospheric Administration on data sharing and resource allocation to ensure judicious use of Government resources and the free-flowing exchange of information related to earthquakes.

“(VI) Coordinating with the Secretary of Agriculture and the Secretary of the Interior on the use of public lands for earthquake monitoring and research stations, and related data collection.

“(VII) Coordinating with the Secretary of Transportation and the Secretary of Housing and Urban Development on the effects of earthquakes on transportation and housing stocks.

“(iii) ASSISTANCE FROM SECRETARY OF AGRICULTURE AND SECRETARY OF THE INTERIOR.—To the extent practicable, the Secretary of Agriculture and the Secretary of the Interior shall expedite any request for a permit to use public land under clause (ii)(VI).”.

Deadline.  
Plans.

Memorandums.

## (4) REDUCTION IN FREQUENCY OF REPORTING BY INTER-AGENCY COORDINATING COMMITTEE ON EARTHQUAKE HAZARDS REDUCTION.—

(A) IN GENERAL.—Subsection (a)(4) of such section is amended—

(i) in the paragraph heading, by striking “ANNUAL” and inserting “BIENNIAL”;

(ii) by redesignating subparagraphs (A) through (F) as clauses (i) through (vi), respectively, and adjusting the indentation of the margin of such clauses, as so redesignated, two ems to the right;

(iii) in clause (v), as so redesignated, by striking “; and” and inserting a semicolon;

(iv) in clause (vi), as so redesignated, by striking the period at the end and inserting “; and”;

(v) by inserting after clause (vi), as so redesignated, the following:

“(vii) a statement regarding whether the Administrator of the Federal Emergency Management Agency has lowered or waived the cost share requirement for assistance provided under subsection (b)(2)(A)(i).”;

(vi) in the matter preceding clause (i), as so redesignated, by striking “The Interagency” and all that follows through “Senate” and inserting the following:

“(A) IN GENERAL.—Not less frequently than once every two years, the Interagency Coordinating Committee shall submit to the Committee on Commerce, Science, and Transportation, the Committee on Energy and Natural Resources, and the Committee on Homeland Security and Governmental Affairs of the Senate and the Committee on Science, Space, and Technology, the Committee on Energy and Commerce, the Committee on Natural Resources, and the Committee on Homeland Security of the House of Representatives a report on the Program”; and

(vii) by adding at the end the following:

“(B) SUPPORT FOR PREPARATION OF REPORT.—Each head of a Program agency shall submit to the Director of the National Institute of Standards and Technology such information as the Director may request for the preparation of a report under subparagraph (A) not later than 90 days after the date on which the Director requests such information.”.

Deadline.

(B) EFFECTIVE DATE.—The amendments made by subparagraph (A) shall take effect on the first day of the first fiscal year beginning after the date of the enactment of this Act.

42 USC 7704 note.

## (c) MODIFICATION OF RESPONSIBILITIES OF NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY.—Subsection (b) of such section is amended—

(1) in paragraph (1)—

(A) in subparagraph (A), by striking “and constructing,” and inserting “constructing, evaluating, and retrofitting”; and

(B) in subparagraph (D), by inserting “provide new and” after “research to”; and

(2) in paragraph (5), in the matter preceding subparagraph (A), in the first sentence, by inserting “community resilience through” after “improve”.

(d) MODIFICATION OF RESPONSIBILITIES OF FEDERAL EMERGENCY MANAGEMENT AGENCY.—Paragraph (2) of subsection (b) of such section is amended to read as follows:

“(2) DEPARTMENT OF HOMELAND SECURITY; FEDERAL EMERGENCY MANAGEMENT AGENCY.—

“(A) PROGRAM RESPONSIBILITIES.—The Administrator of the Federal Emergency Management Agency—

Grants.

“(i) shall operate a program of grants and assistance to enable States to develop mitigation, preparedness, and response plans, purchase necessary instrumentation, prepare inventories and conduct seismic safety inspections of critical structures and lifeline infrastructure, update building, land use planning, and zoning codes and ordinances to enhance seismic safety, increase earthquake awareness and education, and provide assistance to multi-State groups for such purposes;

“(ii) shall support the implementation of a comprehensive earthquake education, outreach, and public awareness program, including development of materials and their wide dissemination to all appropriate audiences and support public access to locality-specific information that may assist the public in preparing for, mitigating against, responding to and recovering from earthquakes and related disasters;

Guidelines.

“(iii) shall, in conjunction with the Director of the National Institute of Standards and Technology, other Federal agencies, and private sector groups, use research results to support the preparation, maintenance, and wide dissemination of seismic resistant design guidance and related information on building codes, standards, and practices for new and existing buildings, structures, and lifeline infrastructure, aid in the development of performance-based design guidelines and methodologies, and support model codes that are cost effective and affordable in order to promote better practices within the design and construction industry and reduce losses from earthquakes;

Contracts.

“(iv) shall enter into cooperative agreements or contracts with States and local jurisdictions and other Federal agencies to establish demonstration projects on earthquake hazard mitigation, to link earthquake research and mitigation efforts with emergency management programs, or to prepare educational materials for national distribution; and

“(v) shall support the Director of the National Institute of Standards and Technology in the completion of programmatic goals.

“(B) STATE ASSISTANCE PROGRAM CRITERIA.—In order to qualify for assistance under subparagraph (A)(i), a State must—

“(i) demonstrate that the assistance will result in enhanced seismic safety in the State;

“(ii) provide 25 percent of the costs of the activities for which assistance is being given, except that the Administrator may lower or waive the cost-share requirement for these activities for a small impoverished community, as defined in section 203 of the Disaster Relief Act of 1974 (42 U.S.C. 5133(a)); and

“(iii) meet such other requirements as the Administrator shall prescribe.”.

(e) MODIFICATION OF RESPONSIBILITIES OF UNITED STATES GEOLOGICAL SURVEY.—Subsection (b)(3) of such section is amended—

(1) in the matter preceding subparagraph (A), in the first sentence—

(A) by inserting “report on significant domestic and international earthquakes and” after “Survey shall”; and

(B) by striking “predictions.” and inserting “forecasts.”;

(2) in subparagraph (C), by striking “predictions, including aftershock advisories” and inserting “alerts and early warnings”;

(3) by striking subparagraph (D) and inserting the following:

“(D) issue when necessary and feasible, and notify the Administrator of the Federal Emergency Management Agency, the Director of the National Institute of Standards and Technology, and State and local officials, an alert and an earthquake warning;”;

Notification.

(4) in subparagraph (E), in the matter preceding clause (i), by striking “using” and inserting “including”;

(5) in subparagraph (I), by striking “; and” and inserting a semicolon;

(6) in subparagraph (J)—

(A) by inserting “and data” after “hazard maps”; and

(B) by striking the period at the end and inserting “; and”; and

(7) by adding at the end the following:

“(K) support the Director of the National Institute of Standards and Technology in the completion of programmatic goals.”.

(f) MODIFICATION OF RESPONSIBILITIES OF NATIONAL SCIENCE FOUNDATION.—Subsection (b)(4) of such section is amended—

(1) in subparagraph (B), by inserting “, State agencies, State geological surveys,” after “consortia”;

(2) in subparagraph (C), by inserting “to support applied science in the production of a systematic series of earthquake-related geologic hazard maps, and” after “Survey”;

(3) in subparagraph (D), by striking “large-scale experimental and computational facilities of the George E. Brown Jr. Network for Earthquake Engineering Simulation and other institutions engaged in research and the implementation of the National Earthquake Hazards Reduction Program” and inserting “experimental and computational facilities”;

(4) in subparagraph (G), by striking “; and” and inserting a semicolon;

(5) in subparagraph (H), by striking the period at the end and inserting “; and”;

(6) by adding at the end the following:

“(I) support the Director of the National Institute of Standards and Technology in the completion of programmatic goals.”;

(7) by redesignating subparagraphs (A) through (I) as clauses (i) through (ix), respectively, and indenting such clauses accordingly;

(8) in the matter before clause (i), as redesignated by paragraph (7), in the first sentence, by striking “The National Science Foundation” and inserting the following:

“(A) IN GENERAL.—The National Science Foundation”;

and

(9) by adding at the end the following:

“(B) IDENTIFICATION OF FUNDING.—The National Science Foundation shall—

“(i) to the extent practicable, note in any notice of Program funding or other funding possibilities under the Program that the funds are part of the Program;

“(ii) to the extent practicable, track the awarding of Federal funds through the Program; and

“(iii) not less frequently than once every 2 years, submit to the director of the Program a report specifying the amount of Federal funds awarded to conduct research that enhances the understanding of earthquake science.”.

Reports.

**SEC. 4. REVIEW OF THE NATIONAL EARTHQUAKE HAZARD REDUCTION PROGRAM.**

Deadline.

(a) IN GENERAL.—As soon as practicable, but not later than such date as is necessary for the Comptroller General of the United States to submit the report required by subsection (c) in accordance with such subsection, the Comptroller General shall complete a review of Federal earthquake hazard risk reduction efforts.

(b) ELEMENTS.—The review conducted under subsection (a) shall include the following:

Assessment.

(1) A comprehensive assessment of—

(A) the extent to which the United States Geological Survey has identified the risks and hazards to the United States posed by earthquakes, including risks and hazards resulting from tsunamis and landslides that are generated by earthquakes;

(B) the efforts of the Federal Emergency Management Agency and the National Institute of Standards and Technology to improve the resilience of the United States to earthquakes and to identify important gaps in the resilience of the United States to earthquakes;

(C) the progress made by the National Institute of Standards and Technology and the Interagency Coordinating Committee (as defined in section 4 the Earthquake Hazards Reduction Act of 1977 of the Earthquake Hazards Reduction Act of 1977 (42 U.S.C. 7703)) to coordinate effectively the budget and activities of the Program agencies (as defined in such section 4) in advancing the plans and goals of the Program (as defined in such section 4) and how coordination among the Program agencies may be improved;

(D) the extent to which the results of research in earthquake risk and hazards reduction supported by the



National Science Foundation during the 40 years of the Program has been effectively disseminated to Federal, State, local, and private sector stakeholders; and

(E) the extent to which the research done during the 40 years of the Program has been applied to both public and private earthquake risk and hazards reduction.

(2) Recommendations to improve the Program and the resiliency of the United States to earthquake risks.

Recommendations.

(c) REPORT.—As soon as practicable, but not later than 3 years after the date of the enactment of this Act, the Comptroller General shall submit to the Committee on Commerce, Science, and Transportation, the Committee on Energy and Natural Resources, and the Committee on Homeland Security and Governmental Affairs of the Senate and the Committee on Science, Space, and Technology, the Committee on Natural Resources, and the Committee on Homeland Security of the House of Representatives a report on the findings of the Comptroller General with respect to the review completed under subsection (a).

#### SEC. 5. SEISMIC STANDARDS.

Section 8 of the Earthquake Hazards Reduction Act of 1977 (42 U.S.C. 7705b) is amended to read as follows:

#### “SEC. 8. SEISMIC STANDARDS.

“(a) ASSESSMENT AND RECOMMENDATIONS.—Not later than December 1, 2019, the Director of the National Institute of Standards and Technology and the Administrator of the Federal Emergency Management Agency shall jointly convene a committee of experts from Federal agencies, nongovernmental organizations, private sector entities, disaster management professional associations, engineering professional associations, and professional construction and homebuilding industry associations, to assess and recommend options for improving the built environment and critical infrastructure to reflect performance goals stated in terms of post-earthquake reoccupancy and functional recovery time.

Deadline.

“(b) REPORT TO CONGRESS.—Not later than June 30, 2020, the committee convened under paragraph (1) shall submit to the Committee on Commerce, Science, and Transportation, the Committee on Energy and Natural Resources, and the Committee on Homeland Security and Governmental Affairs of the Senate and the Committee on Science, Space, and Technology, the Committee on Natural Resources, and the Committee on Homeland Security of the House of Representatives a report on recommended options for improving the built environment and critical infrastructure to reflect performance goals stated in terms of post-earthquake reoccupancy and functional recovery time.”.

#### SEC. 6. MANAGEMENT PLAN FOR ADVANCED NATIONAL SEISMIC SYSTEM.

(a) PLAN REQUIRED.—Not later than 1 year after the date of the enactment of this Act, the United States Geological Survey shall submit to Congress a 5-year management plan for the continued operation of the Advanced National Seismic System.

Deadline.

(b) ELEMENTS.—The plan required by subsection (a) shall include the following:

(1) Strategies to continue the development of an earthquake early warning system.

Strategies.

(2) A mechanism for securing the participation of State and regional level earthquake monitoring entities, including those defunded by the Advanced National Seismic System in the last five years.

(3) A plan to encourage and support the integration of geodetic and geospatial data products into earthquake monitoring in regions experiencing large earthquakes.

(4) A plan to identify and evaluate existing data sets available across commercial, civil, and defense entities to determine if there are additional data sources to inform the development and deployment of the Advanced National Seismic System and an earthquake early warning system.

(5) A plan to ensure that there is an active, geographically diverse, management and advisory structure for the Advanced National Seismic System.

#### SEC. 7. AUTHORIZATION OF APPROPRIATIONS.

Section 12 of the Earthquake Hazards Reduction Act of 1977 (42 U.S.C. 7706) is amended—

(1) in subsection (a)(8)—

(A) in subparagraph (D), by striking “and” at the end; and

(B) by inserting before the language following subparagraph (E) the following:

“(F) \$8,758,000 for fiscal year 2019,

“(G) \$8,758,000 for fiscal year 2020,

“(H) \$8,758,000 for fiscal year 2021,

“(I) \$8,758,000 for fiscal year 2022, and

“(J) \$8,758,000 for fiscal year 2023.”;

(2) in subsection (b)(2)—

(A) in subparagraph (D), by striking “; and” and inserting a semicolon;

(B) in subparagraph (E), by striking the period at the end and inserting a semicolon; and

(C) by adding at the end the following:

“(F) \$83,403,000 for fiscal year 2019, of which not less than \$30,000,000 shall be made available for completion of the Advanced National Seismic System established under section 7707 of this title;

“(G) \$83,403,000 for fiscal year 2020, of which not less than \$30,000,000 shall be made available for completion of the Advanced National Seismic System established under section 7707 of this title;

“(H) \$83,403,000 for fiscal year 2021, of which not less than \$30,000,000 shall be made available for completion of the Advanced National Seismic System established under section 7707 of this title;

“(I) \$83,403,000 for fiscal year 2022, of which not less than \$30,000,000 shall be made available for completion of the Advanced National Seismic System established under section 7707 of this title; and

“(J) \$83,403,000 for fiscal year 2023, of which not less than \$30,000,000 shall be made available for completion of the Advanced National Seismic System established under section 7707 of this title.”;

(3) in subsection (c)(2)—

(A) in subparagraph (D), by striking “and” at the end;

(B) in subparagraph (E), by striking the period at the end and inserting a semicolon; and

(C) by adding at the end the following:

“(F) \$54,000,000 for fiscal year 2019,

“(G) \$54,000,000 for fiscal year 2020,

“(H) \$54,000,000 for fiscal year 2021,

“(I) \$54,000,000 for fiscal year 2022, and

“(J) \$54,000,000 for fiscal year 2023.”; and

(4) in subsection (d)(2)—

(A) in subparagraph (D), by striking “and” at the end; and

(B) by inserting before the language following subparagraph (E) the following:

“(F) \$5,900,000 for fiscal year 2019,

“(G) \$5,900,000 for fiscal year 2020,

“(H) \$5,900,000 for fiscal year 2021,

“(I) \$5,900,000 for fiscal year 2022, and

“(J) \$5,900,000 for fiscal year 2023.”.

#### SEC. 8. TECHNICAL CORRECTIONS.

(a) CORRECTION OF TITLE OF ADMINISTRATOR OF THE FEDERAL EMERGENCY MANAGEMENT AGENCY.—The Earthquake Hazards Reduction Act of 1977 (42 U.S.C. 7701 et seq.) is amended—

(1) in section 5 (42 U.S.C. 7704)—

(A) in subsection (a)(3)(B), as amended by section 3(b)(1) of this Act—

(i) in the matter preceding clause (i), by striking “the directors of”;

(ii) in clause (i), by inserting “the Administrator of” before “the”; and

(iii) in clauses (ii) through (v), by inserting “the Director of” before “the” each place it appears; and

(B) in subsection (b)(3)(C), as amended by section 3(e), by striking “Director of the Federal” and inserting “Administrator of the Federal”; and

(2) in section 9 (42 U.S.C. 7705c), by striking “Director of the Agency” and inserting “Administrator of the Federal Emergency Management Agency” each place it appears.

(b) REFERENCES TO THE ADVANCED NATIONAL SEISMIC SYSTEM.—Such Act is amended—

(1) in section 13 (42 U.S.C. 7707), in the section heading, by striking “ADVANCED NATIONAL SEISMIC RESEARCH AND MONITORING SYSTEM” and inserting “ADVANCED NATIONAL SEISMIC SYSTEM”; and

(2) by striking “Advanced National Seismic Research and Monitoring System” each place it appears and inserting “Advanced National Seismic System”.

(c) INCORRECT CROSS-REFERENCES.—Paragraph (4) of section 5(a) of such Act (42 U.S.C. 7704(a)), as amended by section 3(b)(4)(A) of this Act, is amended—

(1) in clauses (i) and (ii) of subparagraph (A), as redesignated by such section 3(b)(4)(A), by striking “subparagraph (3)(A)” both places it appears and inserting “paragraph (3)(D)(i)(I)”; and

(2) in clause (iii), as so redesignated, by striking “under (3)(A)” and inserting “under paragraph (3)(D)(i)(I)”.

Approved December 11, 2018.

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**LEGISLATIVE HISTORY—S. 1768:**

**SENATE REPORTS:** No. 115–336 (Comm. on Commerce, Science, and Transportation).

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