

Reauthorization of the National Earthquake Hazards Reduction Program (NEHRP)

Statement by SSA Board of Directors on the Reauthorization of the National Earthquake Hazards **Reduction Program (NEHRP)**

The Seismological Society of America supports the reauthorization of the National Earthquake Hazards Reduction Program (NEHRP) and urges Congress to reauthorize and fully fund this critical public safety legislation.

Seventy-five percent of the United States population is exposed to significant risks from earthquakes. Damage to buildings by earthquakes was recently estimated to average \$14.7 billion per year, nationally, with total annualized losses to the economy from earthquakes estimated to be much larger [FEMA Publication P-366, 2023; link below].

NEHRP is the federal government's coordinated, nationwide program to reduce risks to life and property resulting from earthquakes, and to facilitate social, economic and industrial recovery after a major earthquake. NEHRP addresses this mission through the development of effective practices and policies for earthquake loss reduction, the improvement of techniques for identifying and reducing earthquake vulnerabilities, and targeted research to improve the understanding of earthquakes and their effects.

NEHRP is essential for coordinating the work of the key federal agencies that address earthquake-related issues (FEMA, NIST, NSF and USGS). It focuses the efforts of these agencies on the activities that our nation most needs to improve its earthquake resilience. The NEHRP agencies partner to perform a national service that cannot be duplicated by others, with each agency fulfilling its unique role without overlapping with the roles of its partners or the private sector. The agencies also deliver reliable, real-time assessments of earthquake activity in the US and worldwide for effective emergency response, and to protect both domestic and global US economic and societal interests.

The NEHRP agencies collaborate extensively with the academic, public, and private sectors to produce critical research and data that directly support improvements to building codes, and for community and commercial planning. NEHRP research has contributed to the development of seismic design standards that are now widely adopted in the construction industry. These

standards have resulted in more earthquake-resilient buildings, which in turn have saved lives and reduced economic losses.

NEHRP has played a pivotal role in advancing our understanding of earthquakes. Research funded by NEHRP agencies has led to significant discoveries in seismology, geology and structural engineering, discoveries which have significantly enhanced our preparedness and response to seismic events. The program has been instrumental in raising awareness on earthquake risk and promoting community preparedness. Public safety drills, such as the annual ShakeOut exercises, have educated millions of people about earthquake safety and provided valuable guidance for responding to seismic events.

The National Academy of Sciences report, "National Earthquake Resilience: Research, Implementation, and Outreach", outlines a program of research, preparedness and mitigation by the NEHRP agencies that is fundamental to making our nation earthquake-resilient. Reauthorization of NEHRP is therefore critical to the full implementation, including the successful translation of research into actions and results that will protect the nation from the devastating effects of a major earthquake.

NEHRP has proven a resounding success in reducing earthquake-related losses in the United States. Its achievements in research, public awareness and building safety improvements have made the nation more resilient. Continued authorization and funding are crucial to maintain this progress. For these reasons, and for the future safety, wealth, and security of the nation, SSA strongly encourages Congress to act on the reauthorization of NEHRP.

Approved by the SSA Board of Directors, January 2024

For more information, follow these links:

A Report from the Advisory Committee on Earthquake Hazards Reduction on NEHRP Effectiveness for FY22-23 (Sept. 2023).

<u>Hazus Estimated Annualized Earthquake Losses for the United States FEMA P-366 (April 2023).</u>

National Earthquake Resilience - Research, Implementation, and Outreach (2011).

NEHRP, Strategic Plan for the National Earthquake Hazards Reduction Program, Fiscal Years 2022-2029 (April 2023)