



SCIENCE ADVISORY BOARD

August 18, 2023

Dr. Richard W. Spinrad
Under Secretary of Commerce for Oceans and
Atmosphere & NOAA Administrator
Herbert C. Hoover Building, Room 6811
14th Street & Constitution Avenue, NW
Washington, DC 20230

Dear Dr. Spinrad:

Subject: Transmittal of the TSTAP Statement on the Need for National Tsunami Hazard Mapping and Improved Tsunami Characterization in FEMA's National Risk Index

On behalf of the NOAA Science Advisory Board (SAB), I am pleased to transmit to you the *Tsunami Science and Technology Advisory Panel's Statement on the Need for National Tsunami Hazard Mapping and Improved Tsunami Characterization in FEMA's National Risk Index*. The TSTAP's parent committee, the Environmental Information Services Working Group (EISWG) reviewed and approved the statement prior to submission to the SAB. This report was presented to and approved by the SAB at its meeting on July 27, 2023.

The TSTAP developed this statement based on concerns that FEMA's National Risk Index's (NRI) treatment of tsunami hazards underestimates actual levels of risk from tsunamis relative to other hazards. This could lead to coastal communities with significant tsunami threats being excluded from potential Community Disaster Resilience Zones Act (CDRZA) financial and technical assistance as well as a national misrepresentation of tsunami risk.

In its statement, the TSTAP recommends that NOAA:

1. **Communicates to FEMA leadership** and Federal decision makers that the NRI currently misrepresents tsunami risk and that these errors can have negative impacts to community preparedness, local and county planning, mitigation funding opportunities, access to funding, and policy making.
2. **Supports its Federal, state, and territory partners** to develop interim tsunami hazard maps for local and distant tsunami sources for NRI use based on subject matter expertise that includes consistent hazard mapping assumptions and includes attributes relevant to the NRI (e.g., threat levels, annualized frequencies, and historic loss ratios).

3. **Works with its partners** to develop national probabilistic tsunami maps for local and distant tsunami sources that are updated every four years to align with the building code cycle and the USGS National Seismic Hazard Map.

As FEMA recently closed [its public comment period regarding its activities and implementation of the CDRZA](#), the TSTAP urges NOAA to transmit concerns about the NRI's characterization of tsunami risk directly to FEMA as soon as possible, such that these issues might be considered and incorporated into FEMA's implementation of the CDRZA.

Finally, the SAB notes FEMA's National Risk Index includes hazard maps for many other meteorological hazards. As TSTAP, EISWG, and SAB all concluded FEMA misrepresents tsunami risk, SAB asked the question if FEMA correctly assessed other meteorological risks for their national hazard maps. Because of the importance of FEMA's national hazard maps, the SAB recommends NOAA evaluate FEMA processes and resulting hazard maps for other meteorological hazards to avoid misrepresentation for other hazards.

The SAB and TSTAP appreciate the opportunity to provide this input and look forward to receiving an update on any NOAA actions in response to these recommendations at the Fall 2023 SAB meeting.

Very respectfully,



John R. Kreider
SAB Chair

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| Cc: | Sarah Kapnick | Rocky Lopes |
| | Karen Hyun | Corina Allen |
| | Michael Weiss | Casey Stewart |
| | Kenneth Graham | Karin Bucht |
| | Michelle Mainelli | Katherine Longmire |
| | Mike Angove | Viviane Silva |

Attachment: TSTAP Statement on the Need for National Tsunami Hazard Mapping and Improved Tsunami Characterization in FEMA's National Risk Index