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Recommendations from 2nd UNESCO-IOC Global Tsunami Symposium

Banda Aceh, 11-14 November 2024

Harkunti Pertiwi Rahayu
Srinivasa Kumar Tummala

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Overview

The 2nd UNESCO-IOC Global Tsunami Symposium, held in Banda Aceh, Indonesia from 11–14 November 2024, brought together over 700 experts, policymakers, and disaster risk reduction practitioners from 37 countries to reflect on two decades of advancements since the 2004 Indian Ocean Tsunami.

Key discussions emphasized strengthening early warning systems, advancing hazard assessments, integrating emerging technologies, and achieving 100% tsunami-ready communities by 2030.

The event featured seven technical sessions, pre-conference meetings, and engaging side events, including exhibitions and interactive learning experiences.

The symposium concluded with the Banda Aceh Statement, urging nations to drastically increase investments in tsunami mitigation and resilience-building efforts.

With a focus on transformation and innovation, the symposium reaffirmed the global commitment to safeguarding coastal communities and advancing scientific, technological, and societal approaches to tsunami risk reduction.

Recommendations

Strengthening Tsunami Monitoring and Forecasting

- Expand real-time seismic and sea-level monitoring infrastructure, integrating emerging technologies such as GNSS, cable-based deep-ocean sensors, and machine learning for enhanced tsunami detection and forecasting.
- Improve monitoring networks to better detect and issue warnings for tsunamis generated by non-seismic sources, including volcanic eruptions, landslides, and meteotsunamis.
- Enhance data-sharing mechanisms to allow more timely and accurate tsunami threat assessments.
- Reduce dissemination times for tsunami warnings, ensuring communities receive actionable alerts promptly.
- Develop mechanisms to ensure warnings are people-centered, inclusive, and accessible to all, including vulnerable populations.
- Establish optimal global tsunami monitoring networks capable of detecting all tsunamis within ten minutes of generation.

Recommendations

Advancing Hazard and Risk Assessment

- Broaden tsunami hazard models to include non-seismic and complex tsunami sources.
- Acquire and disseminate high-resolution shallow water bathymetry and topography data for more accurate forecasting, inundation modelling, and evacuation planning.
- Strengthen paleo-tsunami studies to improve long-term hazard assessments.

Achieving 100% Tsunami Ready Communities by 2030

- Accelerate implementation of the UNESCO-IOC Tsunami Ready Recognition Programme, ensuring all at-risk coastal communities achieve preparedness milestones.
- Promote stronger integration between tsunami early warning efforts and global initiatives such as the UN Ocean Decade, Early Warning for All (EW4All), and the Sendai Framework for Disaster Risk Reduction.
- Secure funding and partnerships to support community resilience programs, particularly in Small Island Developing States (SIDS) and vulnerable coastal areas.

Recommendations

Enhancing Global Collaboration and Innovation

- Foster international cooperation to advance multi-hazard early warning systems and comprehensive risk management strategies.
- Strengthen coordination between governments, research institutions, and disaster management agencies to streamline preparedness and response efforts.
- Encourage transdisciplinary collaboration to integrate social sciences, governance frameworks, and technological advancements into tsunami preparedness strategies.

Through transformation and innovation, we can build a more resilient future where communities worldwide are safeguarded against the devastating impacts of tsunamis. UNESCO, its partners, and the global tsunami community call on all stakeholders to commit to scaling up investments and efforts to ensure the safety of coastal populations and ecosystems.

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