
CONCLUSIONS

Although a significant amount of progress has been made in recent years to improve the Tsunami Warning System in the Pacific, much still remains to be done to effectively mitigate the hazard posed by local and distant tsunamis in all parts of the Pacific Basin. Areas for work that are especially important for improving the TWSP and should receive the highest priority for action by ITSU in the coming years are the following:

Runup Maps - Use numerical model and historical data to create potential runup maps as the basis for hazard assessment, for evacuation maps and plans, and to motivate other key mitigation activities on the local level including public education, land use planning, and engineering efforts.

Historical Data - Put historical data into a common database format, and develop tools that make those data readily available to persons and offices that need them in the mitigation and research communities.

Tsunami Education - Continue to develop educational materials and programs that will improve tsunami awareness and education among the public, warning center operators, emergency managers, and policy makers.

Warning Centers - Establish new regional warning centers for the local tsunami threat in areas without coverage, and develop technologies and methodologies to improve the speed, accuracy, and reliability of all tsunami warning centers.

Water Level Instrumentation - Improve the strategic coverage of water level instruments and the quality of signals they record for both warning and research purposes.

Operational Actions – Local authorities, observatories, and warning centers need to send tsunami observations immediately to their national warning centers, and in turn those centers must send that information immediately to PTWC.

New Tsunamis - Collect and archive all water level gauge data as well as runup and inundation measurements following each large earthquake and/or tsunami. The absence of a tsunami signal on a record is also important, and those records should be saved as well.

Communications - Keep abreast of new communications systems that may be more effective for warning center and other purposes, and adopt them for use in the TWSP as appropriate.

Research - Encourage and support research on tsunamis and all tsunami-related topics with the potential to improve mitigation.

The key components of the tsunami mitigation plan - hazard assessment, warning, preparedness, and research - must be highly interactive and well coordinated to be effective. ITSU, as a coordinating body of scientists, emergency managers, emergency planners, and warning center operators, with representatives from each affected nation, is well designed to successfully implement this plan.

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List of Acronyms

AFTN	Aeronautical Fixed Telecommunications Network
AGSO	Australian Geological Survey Organization (Australia)
AOR	Area of Responsibility
DHN	Dirección de Hidrografía y Navegación del Perú (Peru)
ETDB	Expert Tsunami Database
ETOS	Earthquake and Tsunami Observation System
GMS	Geostationary Meteorological Satellite (Japan)
GOES	Geostationary Operational Environmental Satellite (USA)
GTS	Global Telecommunications System
HTDB	Historical Tsunami Database
ICG/ITSU	(or ITSU) International Coordination Group for the Tsunami Warning System in the Pacific
INETER	Instituto Nicaraguense de Estudios Territoriales (Nicaragua)
IOC	Intergovernmental Oceanographic Commission
ITIC	International Tsunami Information Center
ITSU	(or ICG/ITSU) International Coordination Group for the Tsunami Warning System in the Pacific
IUGG	International Union of Geodesy and Geophysics
JMA	Japan Meteorological Agency (Japan)
K-12	Kindergarten through 12 th Grade
KMA	Korea Meteorological Administration (Republic of Korea)
NGDC	National Geophysical Data Center (USA)
NOAA	National Oceanic and Atmospheric Administration (USA)
NTF	National Tidal Facility (Australia)
NWS	National Weather Service (USA)
OSSO	Observatorio Sismológico del Suroccidente (Colombia)
PTWC	Pacific Tsunami Warning Center
SHOA	Hydrographic and Oceanographic Service of the Chilean Navy (Chile)
SNAM	Sistema Nacional de Alarma de Maremotos (Chile)
TIME	Tsunami Inundation Modeling Exchange
TREMORS	Tsunami Risk Evaluation through seismic MOment from a Real-time System
TWSP	Tsunami Warning System in the Pacific
UNESCO	United Nations Educational, Scientific, and Cultural Organization
VHF	Very High Frequency Radio
WC/ATWC	West Coast / Alaska Tsunami Warning Center (USA)
WDC-A	World Data Center – A
WMO	World Meteorological Organization