



United Nations  
Educational, Scientific and  
Cultural Organization



Intergovernmental  
Oceanographic  
Commission



ICG/PTWS-XXIV  
Beijing, China , 24-27 May 2011

# Agenda 4.2

## PTWS Exercise Task Team

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# **PTWS Exercise Task Team –**

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## **Terms of Reference**

- (i) Review the PACWAVE08 evaluation report
- (ii) Identify lessons learned from PACWAVE08
- (iii) Design and carry out a third end-to-end Pacific-wide exercise

## **Members:**

PTWC, JMA NWPTAC, France, Indonesia, New Zealand (GNS, MCDEM), Nicaragua, Papua New Guinea, Philippines, Russian Federation, Southeast Pacific representative (TBD?), PTWS Secretariat

# **PacWave08 Lessons Learned for PacWave11**

## **(1/4)**

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- **Tsunami Warning Focal Point contact data**  
**Issue: TWFP contact information incorrect**  
**=> Countries regularly review / confirm to IOC**
- **Conduct exercises in real time**  
**Issue: Positive in their feedback for real time**  
**=> Regular Pacific-wide exercises to be in real time**
- **Exercise announcements**  
**Issue: Insufficient time to prepare**  
**=> IOC officially announce 6 months / distribute documents 3 months prior**

# **PacWave08 Lessons Learned for PacWave11**

## **(2/4)**

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- **Local community preparedness**

**Issue: Not generally known how successful locally (timely alert and actual evacuation)**

**⇒ Increase emphasis on local community-based preparedness, training, and “last mile” exercises**

- **Tsunami plans and standard operating procedures**

**Issue: Countries did not assemble management group during exercise (but would in a real event). Unclear how many countries pre-determined tsunami plans.**

**⇒ For fast tsunami response, need end-to-end SOPs. PTWS WG 3 to survey; if training priority, incl training budget in annual natl budget request.**

# **PacWave08 Lessons Learned for PacWave11**

## **(3/4)**

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- **Warning systems**

**Issue: Communication to local jurisdictions insufficient for immediate response of coastal communities.**

**⇒ Conduct feasibility study to identify and evaluate relevant warning systems. Australia (AusAID) PIC Tsunami Capacity Assessments (2009) and PTWS WG 3 survey providing input. PTWS Emergency Communications TT assist in identifying technologies available.**

# **PacWave08 Lessons Learned for PacWave11**

**(4/4)**

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- **Post-exercise evaluation / Regional Recommendations in context of PTWS Medium Term Strategy**

**Issues 1: Large number of questions unanswered so difficult to draw conclusions as part of evaluation process, e.g., regional (PTWS) common priorities of action too specific / did not address PTWS MTS**

**=> Simpler evaluation questionnaire / electronic online.**

**=> How to Plan, Conduct, and Evaluate Tsunami Exercises guidance manual developed (also TOWS Inter-ICG TT)**

**=> Evaluation directly correlate to - measure PTWS MTS**

# **PacWave11 – Date and Objective 1**

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- **IOC Circular Letter 2390 issued 13 May 2011**
  - **9-10 Nov 2011 - multi-scenario local / regional tsunami; during APEC offering high visibility**
  - **Nominate PacWave11 focal point by 10 June 2011.**
- **Objectives**
- **1. To validate understanding and use of PTWS Experimental Products. Proposed to be tested in PacWave11 through 2013**
  - **Utilise PTWC experimental products, incl forecast models /science info => timely hazard assessment.**
  - **Validate advice issuance from PTWC JMA/NWPTAC**
  - **Validate advice receipt by Pacific country TWFPs.**

# **PacWave 1 1 – Objective 2**

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- **Objective 2.**
- **To validate readiness for local/regional source tsunami**
  - **Improve operational readiness (ensure appropriate tools / response plan(s), incl public education**
  - **Conduct pre-exercise public education on response**
  - **Validate dissemination of NTWC in-country agencies.**
  - **Validate decision-making on warnings / evacuations.**
  - **Validate methods to notify and instruct public.**
  - **Assess elapsed time until public notified**
  - **Validate public information material –**  
**Useable/actionable, clear, concise and timely.**

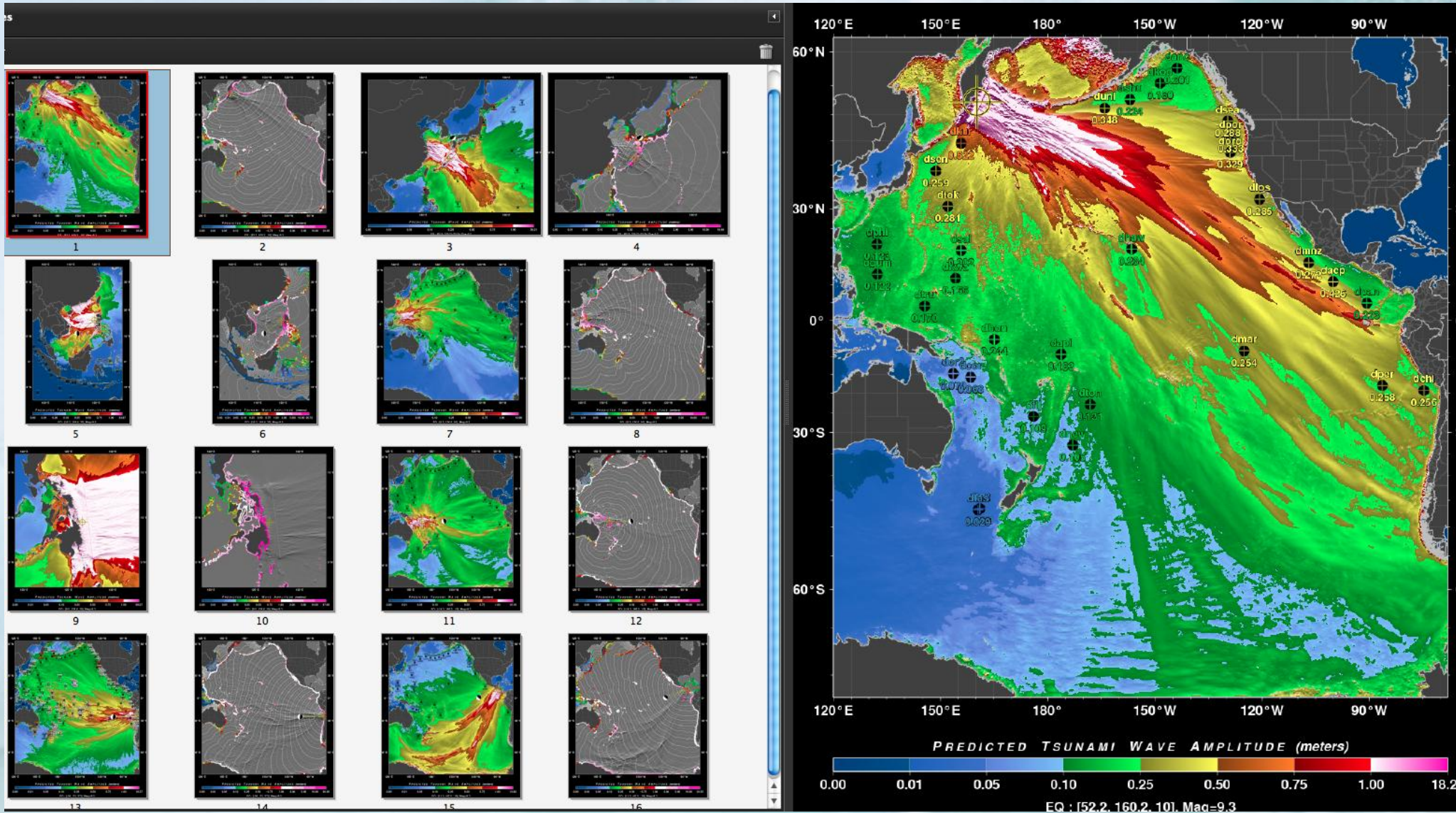


# **PacWave1 1 - Scenarios**

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- **The scenarios**
  - **Kamchatka (Kuril-Kamchatka Trench)**
  - **Ryukyu Islands (Nansei-Shoto Trench)**
  - **Philippines - South China Sea (Manila Trench)**
  - **Philippines - Pacific Ocean (Philippines Trench)**
  - **Vanuatu (New Hebrides Trench)**
  - **Northern Chile (Peru-Chile Trench)**
  - **Ecuador (Colombia – Ecuador Trench)**
  - **Central America (Middle America Trench)**
  - **Aleutian Islands (Aleutian Trench)**

# PacWave11 Scenarios – Example Preliminary Forecast Models (RIFT)



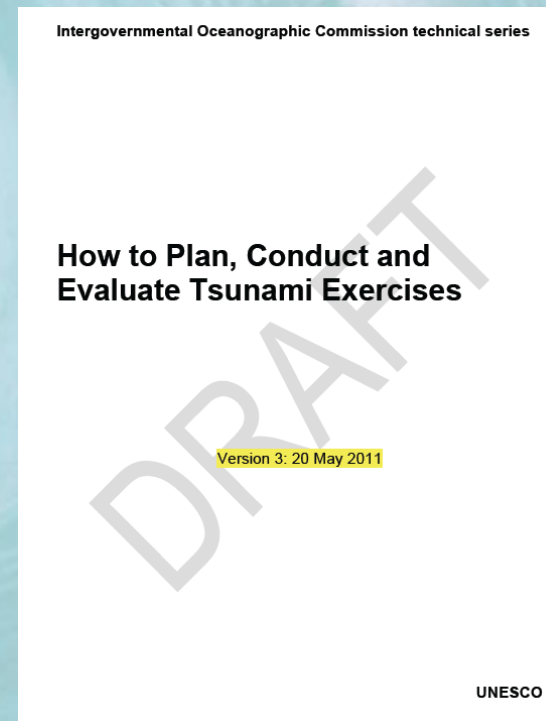
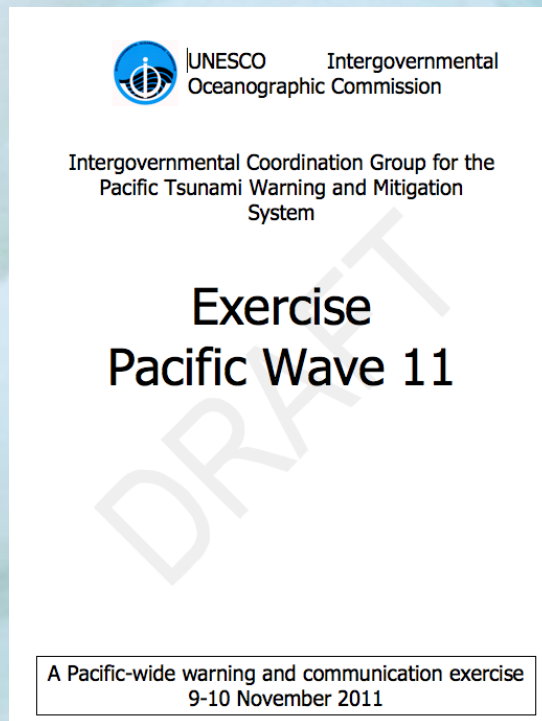
# **PacWave11 – Conduct: Start, Messages, Guidance**

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- Time of Event:
  - SW Pacific requested during the day.
  - Other regions provide input
- International TWC Messages
  - Only 1<sup>st</sup> Exercise Start message
  - All available on secure web site (save money)
- Exercise Manual - available 9 August with details
- How to Plan, Conduct, and Evaluate Tsunami Exercise
  - available July 2011 – use for training and briefings

# Conduct – Manual and Guidance

- Exercise Manual – available 9 August with details
- How to Plan, Conduct, and Evaluate Tsunami Exercise available July 2011 use for training and briefings



# **Conduct – Evaluation, TOWS, Training**

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- **Post-Exercise Evaluation**
  - Focus on plans, policies, procedures, assessment capabilities, communication, resources and inter-agency/inter-jurisdictional relationships
  - Aligned with PTWS MTS and its activities
- **Consistency Globally for Exercise**
  - IOWave11 – same methodology and questionnaire
  - Next CaribeEWS?
- **PacWave11 briefings and training**
  - On request – possible partnered trainings
  - ITP-Hawaii 2011 (22 Aug -2 Sept) – IOC CL early June

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# **Questions - Feedback**



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# Thank You

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Laura Kong

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International Tsunami Information Center