Auditing of Tsunami Funds with Geophysical and Environmental Perspectives

By

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MYANMAR (Burma)
CHINA
Taiwan
LAOS
THAILAND
Paracel Is.
VIETNAM
CAMBODIA
PACIFIC OCEAN
PHILIPPINES
Spratly Is.
INDIA
FED. STATES OF MICRONESIA
PALAU
South China Sea
Banda Aceh
Lhokseumawe
Natuna Is.
BRUNEI
Medan
MALAYSIA
Meulaboh
Tarakan
Sangihe Is.
Talaud Is.
Pematangsiantar
Rantauprapat
Dumai
SINGAPORE
MALAYSIA
Celebes Sea
Tanjungredep
Manado
Padangsidempuan
Gorontalo
Halmahera
Pekanbaru
Batam
Tembilahan
Pontianak
Borneo
Samarinda
Ternate
Molucca Sea
Manokwari
Jambi
Bangka
Balikpapan
Palu
Sorong
Biak
Padang
Palangkaraya
Celebes
Mentawai Is.
Sungailiat
Sumatra
Palopo
MOLUCCAS
Ceram
Jayapura
Bengkulu
Palembang
Parepare
Kendari
Banjarmasin
Buru
Ambon
Lahat
Makassar
New Guinea
Bandar Lampung
Java Sea
INDONESIA
Ujungbulu
Baubau
Banda Sea
Tual
Jakarta
Semarang
Surabaya
Aru Is.
Bandung
Java
Bali
Flores Sea
Raba
Flores
Yogyakarta
Malang
Denpasar
Ende
Dili
Tanimbar Is.
Merauke
EAST TIMOR
Sumba
Kupang
Timor
Timor Sea
Arafura Sea
Christmas I. (Aust.)
Cocos Is. (Aust.)
(Keeling Is.)
Ashmore & Cartier Is. (Aust.)
INDIAN OCEAN
PAPUA NEW GUINEA
© World Sites Atlas
(sitesatlas.com)
AUSTRALIA
Indonesia & East Timor
0
1000 km

Background

- International features of 26 December tsunami:
  1. The world's first global natural disaster, covering countries in Asia and Africa
  2. Global responses, involving private sector, non governmental organizations, governments, and international institutions

USGS

Northeast Indian Ocean Region
Tectonic Setting

Background (cont.)

- December 26, 2005 Tsunami
  - Massive earthquake at 9.0 richter scale
  - Epicenter was on Australia-Asia tectonic plate
  - 150 km south of Meulaboh and 250 km from Banda Aceh, Indonesia
  - Set off a string powerful tidal waves at speed up to 800 km per hour
  - Impacting coastal areas of Asian and African continents
  - Tsunami crashed into western coast of Sumatra and northern part of Aceh in Indonesia within 20 minutes after the earthquake

ACEH
SUMATRA
N
SABANG
BEUEHI.
BANDA ACEH
Sigli
Blangbintang Airport
Jantho
Lhokseumawe
MALAKA STRAIT
mt.peuetsagoe
mt.geureudong
Peureulak
Lake Tawar
Takengon
Langsa
Meulaboh
INDIAN OCEAN
Gunung Leuser National Park
mt. Leuser
NORTH SUMATRA
Kutacane
Tapaktuan
Simeulau Reserve
SIMEULE IS.
Singlik Barat Reserve
Singkilbaru
BANYAK IS.

Background (cont.)

- The water flushed away entire parts in a width 6 km inland and length 300 km along the west coast of NAD and North Sumatra
- The red zone illustrated salt water penetration from the ocean caused by tsunami

- Coastal landscapes and habitants at numerous location have been completely washed away

Background (cont.)

- Worst affected areas:
  - Banda Aceh, Meulaboh, Calang
  - Towns and villages along the northwest and northern coast of NAD

Background (cont.)

- Government of Indonesia declared a national disaster on December 26, 2004
- March 28, 2005 Earthquake in Nias
  - Massive earthquake at 8.7 richter scale
  - Epicenter was also on Australia-Asia tectonic plate
  - Between the island of Nias and Simeleu
  - 200 km northwest of Medan, the capital city of North Sumatra

Background (cont.)

- Official casualty figures as of May 20, 2005:
  - 129,738 people buried
  - 37,090 people missing
  - 517,278 people displaced

Damage & Losses Assessment

- 63% (around US$ 2.8 billions) - damage and losses from private sector
- 25% (around US$ 1.1 billions) - damage and losses from public sector
- 12% (around US$ 0.55 billions) - damage and losses from environmental damages (coral reef, mangrove swamps, loss on land use)
- Total US$ 4.45 billions

Source: World Bank, January 2005

Environmental Damages

- Includes damage to the mangrove, coral reef, and seaweed cultivation, rice field, loss of livestock, water pollution, air pollution, and solid waste
- 654 in 18 districts/cities in Aceh and North Sumatra are estimated to have been affected by the disaster
  - 20,101 ha of rice fields
  - 113,929 ha of plantation
  - 91,517 ha of state-owned land
  - 44,312 ha of housing
  - 1,714 ha of industrial complexes

(Source: National Development Planning Agency, April 2005)

Assistances

- Came in the form of cash and in kind
- Indonesia receiving contribution from the domestic and international community:
  - Domestic:
    - » Totaling almost US$ 140 million

    (source: Supervision and Development Agency, March 22, 2005)
  - International
    - » Multidonor Trust Fund
    - » US$ 444 million pledges (from 8 donors, include the World Bank)
    - » Debt Moratorium worth US$2.6 billion until the end 2005 (the Paris Club)
    - » Over one hundred international NGOs, with a total committed assistance amounted US$920 million

BPK Initiatives

- Audit of Aceh Tsunami Fund
  - Financial Audit
    - » Relief period (Dec 26, 2004 – April 30, 2005)
      - Financial Statement of the Indonesian Emergency Relief Coordination Agency (Bakornas)
    - » Rehabilitation and reconstruction period (May 1, 2005-Dec 31, 2009)
      - Financial Statement of the Rehabilitation and Reconstruction Agency of Aceh and Nias (BRR)
      - BRR is an agency tasked to coordinate community driven rehabilitation and reconstruction in Aceh and Nias
  - Others (performance audit, investigative/fraud audit)

BPK Initiatives (cont.)

- International Conference
  - Promoting Financial Accountability in Managing Funds Related to Tsunami, Conflict, and Other Disasters
  - Jakarta, 25-27 April 2005
  - Attended by 142 delegates from SAIs of donor and tsunami-hit countries, auditors from regional and international organizations.
  - Purpose: to enhance financial accountability and transparency in managing funds related to tsunami, conflict and other disasters

BPK Initiatives (cont.)

- International Conference (cont)
  - Audit of conflict area was included as Aceh and Sri Lanka were both in state of military conflict when tsunami struck. Military conflict is a man made disaster.
  - The tsunami has been a catalyst for peace agreement in Aceh with the secessionists/ separatists, ending a civil war that had been ranging for the last 30 years.
  - MoU between the Government of Indonesia and the Free Aceh Movement (GAM) signed in Helsinki on August 15, 2005.

BPK Initiatives (cont.)

- Opening of a Representative Office in Aceh
- Joint audit (as UN auditor team in conflict areas)
- Performance audit with environmental perspective
  - Audit on the Planning of Mangroves and Coastal Forests Rehabilitation Program in Aceh
  - Technical assistance from the Office of Auditor General of Norway
  - Results will be presented in parallel session

Recommendations to Support the Reconstruction of the Environmental in Aceh

- Integrated environmental considerations for sustainable reconstruction. Natural buffers or greenbelts should be used in earthquake and tsunami prone areas.
- Land-use policy should take into consideration geophysical factors. Seismic zoning and building codes must be used and enforced.
- Environmentally-friendly and disaster resilient spatial planning.
- Environmentally-sound planning of temporary housing & other installation.
- Participatory rebuilding of the environment.

Recommendations to support reconstruction of Aceh's …….(cont.)

- Ecosystem-based restoration.
- A comprehensive environmental assessment of disaster damages should be conducted as a follow up to preliminary assessment.

Conclusion

- The State Audit Board pursues 3 key objectives in the rehabilitation and reconstruction of Aceh:
  - To ensure that the tsunami funds are properly accounted for and used efficiently and effectively for the purposes intended
  - To ensure that geophysical, geological and seismological information and environmental concerns and issues of sustainable development are considered in all rehabilitations and reconstructions efforts
  - To engage the hearts and minds of the local population in reconstruction efforts