

### **Roundtable Meetings**

Λn

Innovations in Technologies for Disaster Rescue Efforts amongst ASEM countries

Ŀ

Inauguration of the Virtual Knowledge Portal (VKP) and Meeting of the 24x7 PoCs of the EAS countries

Venue: Vigyan Bhawan, Hall No. 5 & 6, New Delhi, India Date: December 04-05, 2014

# **Concept Paper**

### **Background Note**

At the EAS Foreign Ministers' Consultations in Bali on July 22, 2011, most of the countries had emphasized the need to improve coordination amongst EAS member countries on disaster management and relief. Taking cue from the East Asia Summit (EAS) in November 19, 2011, at Bali, Indonesia and successful organization of 1<sup>st</sup> EAS-India Workshop-2012 in New Delhi, followed by Asia-Europe Meeting (ASEM) Foreign Ministers Meeting (FMM11) in New Delhi in November 2013, an initiative for Roundtables on Disaster Management for ASEM/EAS/ASEAN countries has emerged. The main objective is to setting up of an East Asia Centre for Natural Disaster Management and Relief in India, as part of India's Look East Policy. It was suggested that a meeting be convened of the Heads of National Disaster Management Agencies among ASEM partners.

Some of the specific aspects in multilateral-coordination are: (i) establishment of clear channels of communication for international assistance; (ii) compilation and creation of a database of individual countries disaster response capabilities pre-cleared for rapid deployment in order to ensure efficient management of collective resources; (iii) certification of procedures for quick deployment of medical practitioners, relief volunteers, dog squads and custom facilitation for aid material; and (iv) pre-positioning of material to shorten response time.

The importance of India in building up its capacities towards international cooperation in disaster management has been highlighted so that it could contribute substantially in the region towards this cause.

### 1.2 Risk Profile of ASEAN Member States

The countries of the Association of Southeast Asian Nations (ASEAN), which comprises Brunei, Cambodia, Indonesia, Laos, Malaysia, Myanmar, Philippines, Singapore, Thailand, and Vietnam, is geographically located in one of the most disaster prone regions of the world. The ASEAN region is situated between several tectonic plates causing earthquakes, volcanic eruptions and tsunamis. The region is also located in between two great oceans namely the Pacific and the Indian oceans causing seasonal typhoons and in some areas, tsunamis. The countries of the region have a history of devastating disasters that have caused economic and human losses across the region. Almost all types of natural hazards are present, including typhoons (strong tropical cyclones), floods, earthquakes, tsunamis, volcanic eruptions, landslides, forest-fires, and epidemics that threaten life and property, and droughts that leave serious lingering effects. Typhoons are the most prevalent hazard in the region, causing destruction to human life, buildings, agriculture and infrastructure alike, while causing flooding and landslides/mudslides.

The region provides compelling evidence of the destructive power of such disasters. For example, the tropical cyclone Nargis of May 2008 in Myanmar killed over 133 thousand people, affected over 2.4 million people and caused an estimated economic loss of over \$ 4 billion. Over 600 thousand hectares of agriculture land was flooded, killing about 50 per cent of the draught animals. In the same year, on June 21, 2008, Typhoon Fenghsen in the Philippines killed 573 and affected at least 4 million people in just four hours. In October 2009, cyclone Pepang (Parma) in the Philippines killed 539 people, affected 4.5 million and caused an estimated economic loss of \$592 million.

Some of the major disasters of recent times in the region are: the September 16, 1990 Luzon earthquake (Philippines), December 26, 2004 Indian Ocean tsunami, May 26, 2006 Yogyakarta earthquake (Indonesia), June 1991 volcanic eruption of Mount Pinatubo (Philippines), 2005 (Thailand), and 1997 (Vietnam) droughts, September 2009 cyclone Ketsana (known as Ondoy in the Philippines), catastrophic flood of October 2008, and January 2007 flood (Vietnam), September 1997 forest-fire (Indonesia), Uttarakhand natural disaster (India), 15<sup>th</sup> -16<sup>th</sup> June, 2013 9<sup>th</sup> November, 2013, Haiyan, a category 5 super typhoon (Philippines) and many others. Climate change is expected to exacerbate disasters associated with hydro-meteorological hazards. Often these disasters transcend national borders and overwhelm the capacities of individual countries to manage them. Most countries in the region have limited financial resources and physical resilience. Furthermore, the level of preparedness and prevention varies from country to country and regional cooperation does not exist to the extent necessary. Because of high vulnerability and the relatively small size of most of the ASEAN countries, it will be more efficient and economically prudent for the countries to cooperate in the areas of civil protection, and disaster preparedness and prevention.

Disasters do not respect national boundaries and there is an urgent need to assess the impact of such trans-boundary disaster risks in terms of projected losses in the absence of mitigation measures, climate change, population growth, economic development, and urban expansion. More often than not, response efforts from respective Governments need support from non-government levels as also from members of the international community. The immediate predicament in all instances is capacity sufficiency in disaster rescue efforts. Recently a document was prepared in collaboration with the World Bank and the United Nations International Strategy for Disaster Reduction (UNISDR), through the Global Facility for Disaster Risk

Reduction (GFDRR), and within an assignment concluded under the ASEAN Agreement for Disaster Management Emergency Response (AADMER) to promote sustainable development in ASEAN region, a regional legally binding agreement that binds ASEAN Member States together to promote regional cooperation and collaboration in reducing disaster losses and intensifying joint emergency response to disasters in the ASEAN region.

#### 1.3 Need of the Hour

Following Indian Ocean Tsunami (2004) and the establishment of a tsunami warning system in the Indian Ocean at Hyderabad in 2007, it is essential now to have effective utilisation of relevant existing institutions and mechanisms in ASEAN countries such as the ASEAN Earthquake Information Centre (AEIC), ASEAN Specialised Meteorological Centre (ASMC) and Asian Disaster Preparedness Center (ADPC). It would be useful to attempt effective and optimal utilisation of existing capacities and capabilities in the region. In case of major earthquakes in the ASEAN region, it is very much needed to address specific aspects such as, (i) establishment of clear channels of communication for international assistance; (ii) compilation and creation of a database of individual countries' disaster response capabilities pre-cleared for rapid deployment in order to ensure efficient management of collective resources; (iii) certification of procedures for quick deployment of medical practitioners, relief volunteers, dog squads and custom facilitation for aid material; and (iv) pre-positioning of material to shorten response time.

In this Roundtables an attempt shall be made to focus on multilateral coordination in areas such as: 1) logistic challenges in the relief and rescue operation, 2) multi-agency coordination, 3) exchanging earthquake resistant technology/knowhow and 4) protocol in the emergency services information dissemination, to name a few.

# 1.4 Regional Cooperation

Realizing the threats of increasing frequency of disasters, the Asia-Europe Meeting (ASEM) Partners in its 11th Foreign Ministers' Meeting (FMM11), held in New Delhi, India from 11-12 November 2013, had called upon to step up and match the unparalleled effects of mega disasters with an exceptional Asia-Europe multilateral cooperation to ensure substantial reduction of losses of lives and assets. Areas of cooperation included are: Disaster Management and Mitigation, Building Rescue and Relief Capacities, Technologies and Innovations in Rescue Equipments and Techniques. The Ministers specifically supported greater collaboration and coordination in disaster risk reduction and management and mitigation among ASEM member countries.

National programmes for disaster response and mitigation in ASEM member countries, therefore, seek to enhance multilateral disaster response capacity for effective and timely disaster rescue efforts as a first priority. Many ASEM countries have national level plans and specific capacities and mechanisms oriented to timely rescue efforts in the face of both natural and manmade disasters. Past and current national strategies have tended to accord an incrementally greater role to innovations in technology and establishment of systems so as to increase the efficacy of

rescue efforts. This also calls for a sharing of ideas, expertise, knowledge and technology between ASEM partner countries.

### 1.5 Indian Government Initiatives

India hosted the "EAS-India Workshop 2012: Building Regional Framework for Earthquake Risk Management" from November 8-9, 2012 in New Delhi. As a follow up to the outcome of the workshop, the Government of India has established EAS-ERR Centre in February 2013, which is now hosted at the National Institute of Disaster Management, New Delhi. At the 3<sup>rd</sup> East Asia Summit Foreign Ministers Meeting (EAS FMM) held in Jul 2013, India proposed setting up of a network of 24x7 Points of Contact (PoC) among the National Disaster Response Agencies of the 18 EAS member countries to facilitate coordinated and speedy response to earthquake. The network of 24x7 PoCs of 18 EAS countries is envisaged to be the first point of contact in case of a disaster. Individual/institution designated as 24x7 PoC of a particular country would have to be integrated with disaster response institutions and mechanisms in his/her country to ensure quick and effective delivery. Recently India has sought contact information for two PoCs, one for administration and the other disaster emergency communication and data sharing.

India also proposed setting up a Virtual Knowledge Portal (VKP) as a web based tool to share knowledge and best practices related to natural disaster risk assessment, mitigation and response, and also to provide web services for multilateral coordination following earthquake and other natural disasters in East Asia. The portal is being created and hosted by East Asia Summit Earthquake Risk Reduction (EAS-ERR) Centre at the National Institute of Disaster Management (NIDM) in New Delhi, India. The Centre would be a cooperation framework under the East Asia Countries with the aim to consolidate and strengthen the network providers and users of earthquake disaster information in order to provide reliable and accurate alerts and impact estimations after sudden-onset of earthquake in particular and to improve the cooperation of international responders in the immediate aftermath of major natural, technological and environmental disasters. The network of 24x7 POCs and VKP would be complementary to each other.

### 1.6 Two days Roundtables

The two-day Roundtables projects to bring together stakeholders in Technologies and Innovations in Rescue Equipments & Techniques for Disaster Rescue and Relief followed by a Roundtable meeting of the 24x7 PoCs of the East Asia Summit (EAS) member countries.

# 1.7 Objectives

The main objectives of two days Round table Meetings would be to:

- 1. Focus ASEM attention on how innovations in technology can be utilized to save lives and reduce effective response time by Governments and how ASEM countries can contribute to capacity building on both Continents through a sharing of systems of best practices.
- 2. Facilitate building partnerships amongst interested ASEM member countries and their Industry in the context of efforts towards building disaster rescue and relief capacities, including through development of joint ventures.
- 3. Introduce the VKP and allow the 24x7 PoCs of the EAS member countries to deliberate and finalize their ToRs.

### 1.8 Scope of the Roundtables

The workshop envisages to:

- 1. Bring all EAS member countries, for a two day summit in Delhi to discuss and draw mechanism for cross border assistance following a major earthquake
- 2. Discuss the issues providing international assistance across borders in affected countries and to develop emergency response framework.
- 3. Provide road map for coordinating multidimensional measures against the danger of earthquakes and identifies a to-do list under independent sub-projects.
- 4. Dialog with major international organisations working in disaster response such as UNOCHA, IFRC as well as Major UN Humanitarian aid Agencies and NGOs.

### 1.9 Strategy

The following strategy is proposed for achieving the objectives:

Two-day Roundtables to be held in Delhi from 04-05 December, 2014

### Day1

- Would focus on building capacity specifically in the area of disaster rescue and relief through adoption of innovations and relevant technologies as also best practices and systems.
- Interested ASEM countries would make presentations with specific emphasis on technologies to be transferred/ shared. Industry representatives of ASEM countries would be given space for e-demonstration of their technologies.
- Participants would include ASEM partner countries interested in demonstrating best practices and transferring technologies to attend this Roundtable as also those ASEM members seeking to build capacities.
- International organizations such as the World Bank, IFC, ADB, etc. would be invited to share their ideas on the cost benefit analysis, identification and selection of local partners and the methodology for evolving an innovative mechanism to take

- this approach forward.
- The Roundtable would also deliberate on the methodology for promoting partnerships in this sector through joint ventures (instead of only sale/transfer of technology) between private sector organizations in ASEM countries.
- The promotion of joint ventures based on transfer of technology could continue beyond 2014 to increase the availability of competitively priced and affordable equipments required for disaster rescue and relief work in ASEM countries.
- The outcome of this roundtable could feed into similar Roundtables- or Workshops on the subject, to be hosted thereafter by interested ASEM partner countries.
- This could become a continuous process in ASEM and the outcome of such Roundtables/Workshops could feed into the <u>10<sup>th</sup> ASEM</u> Summit and future ASEM FMMs/ Summits/Meetings.
- Inauguration of the Virtual Knowledge Portal (VKP).

# Day 2

- Would be oriented to EAS members.
- Meeting of the 24x7 POCs of the EAS member countries to deliberate and finalize their Terms of Reference (ToRs).
- Industry representatives of ASEM countries could continue their display/ demonstration of technologies and their B2B meeting

### 1.10 Date and Venue

The Roundtables would be held for two days in New Delhi, India, from December 04-5, 2014.

# 1.11 Participation

- Target participants are senior officials from national and local governments, senior representatives from regional and international organizations, captains of industry, experts and scientists principally from ASEM member countries.
- At least 2 participants from each ASEM member country comprising one Government official and one representative from Industry.
- 24x7 PoCs of EAS member countries.
- The Host, India, would invite representatives and special guests from other international organizations such as the UNISDR, GFDRR, ADRC, ADPC, World Bank, IFC and ADB as also representatives of the national and state level Disaster Management Authorities, Institutes, scientific and technical wings dealing with Disaster managements in India.

### 1.12 Expected Outcomes

The expected outcomes of the Roundtables are to:

- Develop a comprehensive roadmap on regional framework for earthquake risk management for mutual benefit of ASEM Member Countries.
- Build a regional response to earthquakes and related disasters.
- Endorse mechanisms for strengthening collaboration between research and knowledge-based institutions in the region;
- Develop institutional framework for pre, during and post-earthquake response and coordination in the region; and
- Evolve strategy for training, capacity development on importance of response preparedness in the region leading to effective disaster risk reduction (DRR) strategies and implementation of related issued based projects at regional levels.

\*\*\*\*