



Photograph (above): The CABARET team meet at De La Salle University in Manila, the Philippines, for the 3rd capacity building workshop on multi-hazard early warning and coastal resilience

### 3rd International Workshop on MHEW and Coastal Resilience held in Manila

More than 60 scientists and practitioners from Asia and the Europe participated to the 3rd International Workshop on Multi-Hazard Early Warning and Coastal Resilience in Manila, the Philippines during 25th to 29th March 2019. This five-day event was organised by the De La Salle University. The university is in the capital of the Philippines, Manila where the city is located on the eastern shores of Manila Bay.

This event took place as an outcome of CABARET, a 36-month EU funded action that seeks to build capacity for international and regional cooperation between HEIs in Asia and Europe, and among Asian HEIs themselves, to improve multi-hazard early warning and increase disaster resilience among coastal communities.

The workshop aimed at academic and non-academic staff at the CABARET partner Higher Education Institutes (HEIs) who involve in multi-hazard early warning and/or disaster resilience. It further aimed to help strengthening the ability of staff at the HEIs to respond to their research needs in multi-hazard early warning. The workshop mainly

provided individuals and organisations with the skills, competencies and credentials needed to pursue research, and to lead research at institutions in partner countries, and hence aimed at reducing disasters impact.

The workshop began with a keynote address delivered by Dr. Renato U. Solidum, Jr., the Undersecretary for Disaster Risk Reduction and Climate Change of the Philippines, the Department of Science and Technology (DOST). He is also the Officer-In-Charge of the Philippine Institute of Volcanology and Seismology (PHIVOLCS) where he has worked since 1984 and became its Director in 2003 up to February 2017. He explained the present disaster risk in the Philippines highlighting his experience working in the volcanic risk reduction in the Philippines.

At the workshop, Dr Harkunti Rahayu from the Institute of Technology Bandung presented the challenges associated with present early warning systems in Indonesia. She presented evidence from the Palu and Sulawesi incidents reported from Indonesia with practical difficulties and challenges faced during the two events. This session was complemented by Ms Fathimath Shadiya from the Maldives National University and Prof Seinn Lei from the University of Yangon presenting governance structure of the

upstream and downstream interface in an end-to-end tsunami early warning system. Prof Dilanthi Amaraturunga from the University of Huddersfield further elaborated the issues related with the on a common understanding of multi-hazard early warning systems.

The second day of the workshop was started with a keynote address delivered by Dr. Enrico Paringit. He is the Executive Director of the Philippines Council for Industry, Energy and Emerging Technology Research and Development (DOST). In addition, participants presented their ongoing activities related to their sandpit activities on multi-hazard early warning systems from their countries' perspectives. Those sandpit events aimed at developing multi-disciplinary and international research proposals to strengthen multi-hazard early warning and resilience building. During the workshop, two side events were organized with the intention of future research and institutional collaborations.

A panel discussion was convened on MHEW and use of technology in communicating early warnings. The session was chaired by Prof Richard Haigh representing the University of Huddersfield. Prof Ranjith Dissanayake from the University of Peradeniya, Dr Chandana Siriwardene from the University of Moratuwa, Dr Harkunti



Photograph (above): The workshop included a panel discussion on the use of technology for multi-hazard early warning. The session explored the differences between the five Asian countries, including Indonesia, Maldives, Myanmar, the Philippines and Sri Lanka

Rahayu from the Institute of Technology Bandung, Pro Seinn Lei from the University of Yangon, Ms Fathimath Shadiya from the Maldives National University, and Dr Marlon Era from the De La Salle University were the panellists of the event.

### CABARET team participate in secondment activity with the city of Lian, the Philippines

A secondment activity was organized in the city of Lian Batangas, the Philippines as a side event to the five-day workshop. The Mayor, Isagani Bolompo, members and officers from the Lian Batangas and CABARET members participated in the event marking more than 100 participants together. Mr Joselito Castro presented the current status of multi-hazard early warning systems (MHEWS) in Batangas province. Dr Ruben Paul Borg and Dr Boyko Rangelov, University of Malta, Malta and Mining and Geology University, Bulgaria respectively presented an overview of the current and emerging international standards on MHEWS. In addition, Dr Harkinti Rahayu, from the Institute of Technology Bandung, talked about the best practices of MHEWS for tsunami, earthquake and volcanic eruption and guidance on how to improve existing systems. Dr Edgardo Vallar and Dr Ignacio Aguirre Ayerbe, from the University of Malta, Malta and IHC, Spain were the facilitators of the secondment activity conducted at the Lian Batangas event.



Photograph (above): Secondment activity organised in the city of Lian Batangas

### Mentoring for resilience event organised by the Ateneo De Manila University, Manila, the Philippines



Another one-day post-workshop activity for graduate students was organised by the Ateneo De Manila University, the Philippines on 01st April 2018. This session was organised to create opportunities for postgraduate students at the Ateneo De Manila University to present and receive feedback for their research activities from CABARET experts. The session was organized as students' presentation followed by one to one session with disaster resilience experts from the CABARET group.

The session began with a guest speaker Dir. Glenn Banaguas, Executive Director, Environmental and Climate Change Research Institute (ECCRI), De La Salle University. He presented his experience on the Climate Smart Philippines: HEIs and Policy Actors. At the event, more than 30 postgraduate students' research works were presented. This session will be further helped for future networking opportunities among HEIs members and students in the disaster resilience field of study. This ensures the sustainability of the work initiated by the project CABARET. Mandalay Technological University host CABARET project team

CABARET partners Huddersfield and ITB are shortlisted for 2019 Newton Prize with Indonesia



The Newton Prize celebrates outstanding international research partnerships and is an annual £1 million fund award

CABARET partners, Professors Haigh and Amaratunga from the University of Huddersfield and Dr Harkunti Rahayu from ITB have been shortlisted in the prestigious Newton Prize 2019 awards for their research to protect communities in Indonesia and across the Indian Ocean from tsunami and other coastal dangers.

The Newton Prize celebrates outstanding international research partnerships and is an annual £1 million fund awarded for the best research or innovation that promotes the economic development and social welfare of Newton Fund partner countries. Eligible prize countries for the Newton Prize 2019 are China, Indonesia and the Philippines.

"Being shortlisted for this prestigious award is the culmination of a five-year partnership with Dr Harkunti Rahayu's team at the Institute of Technology Bandung," explained Professor Haigh.

"The Newton Institutional Links grant we acquired provided a platform for us to work with Indonesia and other countries across the Indian Ocean, and help them to develop improved standard operating procedures involved in receiving and processing regional tsunami warning and monitoring information. Proceeding that we disseminate that warning information to communities at risk," he said.

The Newton Prize enables international research partners to continue working together on solutions to some of the world's key challenges such as human health, food security and climate change. Research and innovation is a highly effective way to achieve international development goals, tackle global challenges and improve quality of life for people in developing countries as well as the UK.

The shortlisted projects tackle a range of Sustainable Development Goals and have been peer-reviewed and will be judged by the Newton Prize Committee, chaired by Professor Alice Gast, President of Imperial College.



## CABARET panel discussion held at International Conference in Sri Lanka

A panel discussion was organized by the CABARET team at the ASCENT Festival held in Colombo, Sri Lanka on 16th January 2019.

The panel discussion was chaired by Prof Richard Haigh and included contributions by CABARET experts and industry stakeholders. The panel mainly focused on integrating technology in delivering MHEW messages among communities at risk. Mr Charitha Ratwatte Jr, the Head - Group Sustainability at Dialog Axiata PLC represented the largest telecommunication network provider in Sri Lanka. He presented his experience introducing a disaster alert software, DEWN in Sri Lanka and its present usage and complexities when communicating early warnings to communities. Mr Chathura Liyanaarachchi represented the Disaster Management Centre in Sri Lanka at the panel discussion. Mr Sarath Premalal, the former Director General of Meteorology, Sri Lanka & Secretary of ADRiMP discussed the current status and challenges of MHEW in Sri Lanka while Dr Senaka Basnayake, Director, Climate Resilience Department, Asian Disaster Preparedness Center discussed the current status and challenges of MHEW in across Asia. Prof Ranjith Dissanayake, Dr Chandana Siriwardene and Dr Chaminda Bandara also explained the difficulties they identified when communicating and evacuating communities at risk through their fieldwork experiences. This forum clearly exhibited the importance of coordination between HEIs, policy making body and industry links towards an effective MHEW delivery mechanism.

## International Conference on CAPACITY BUILDING FOR RESEARCH AND INNOVATION IN DISASTER RESILIENCE

### BOOK OF ABSTRACTS AND PROCEEDINGS

14<sup>th</sup>-18<sup>th</sup> January 2019

Cinnamon Lakeside | University of Moratuwa | University of Colombo  
Colombo-Sri Lanka

Organised by:



University of Moratuwa & University of Colombo

Programme Lead:



Partners:



Technical Partner:



Photograph (above): Professor Amarathunga attends the 7th Steering Committee meeting of the UNISDR campaign on Making Cities Resilient, in Barcelona, Spain

## Prof Dilanthy Amarathunga attends UNISDR making cities resilient campaign

Prof Dilanthy Amarathunga, attended the 7th Steering Committee Meeting of the United Nations International Strategy for Disaster Risk Reduction (UNISDR)/UNHABITAT Making Urban Cities Resilient Campaign.

The event was convened in Barcelona, Spain during 24th - 25th April 2019. She has contributed to the development of 2020 - 2030 Global Urban City Resilient strategy in facilitating cities and nations to achieve Sendai Framework for Disaster Risk Reduction and Sustainable Development Goals.

The Campaign has been very successful in raising awareness and political profile for disaster risk reduction and urban resilience during the last decade.

Professor Amarathunga used the opportunity to share details of the CABARET project and some of the findings that emerged from the national and regional position papers on multi-hazard early warning. The CABARET team has been keen to align with and support major global campaigns.

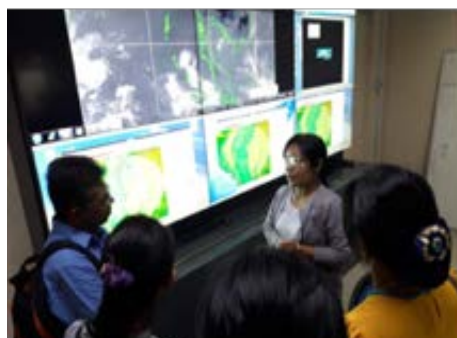




### Joint scientific mission conducted by CABARET members representing Sri Lanka and Myanmar

Members from the University of Peradeniya and University of Moratuwa conducted a joint research work with the university of Yangon in Myanmar. More than 10 members from three HEIs of CABARET conducted a research in Myanmar to evaluate present coastal evacuation, coastal disaster resilience and understanding the disaster management framework of Myanmar. The team visited the Department of Disaster Management and visits to two villages. At the visit to the Department of Disaster Management, a round table discussion was held with the Deputy Director General, Li Than Htut Swe and four other Directors. Initial discussion was on understanding the Organizational purpose and activities in disaster management and followed by Identifying the gaps in disaster management framework at the department. In addition, an observation to emergency operations centres were introduced to the participants. This was mainly carried out to identify their specific roles. As a result, key challenges were identified:

Issues related to integrity in identifying the roles of each organization, friction in language and communication and hard to acquire information. Two village visits were conducted with the intervention of the village leaders. An open open discussion to determine the governance, organizational structure, the village level disaster management policy and structure. The two villages were visited were Bu Gwe and Thazin in Myanmar.



Photographs (above): The Sri Lankan teams from CABARET visit their colleagues in Myanmar, as well as key disaster management agencies in the country

### Symposium at the Maldives National University, Male

Sri Lankan partners of CABARET took part at the Engineering Symposium 2019 of the Maldives National University which was held in Male on 29th July 2019. Prof. P.B.R Dissanayake and Dr. Chaminda Bandara conducted two key note speeches as well as participated for a panel discussion on Green Innovation and Entrepreneurship,

Sustainable building practices and about the green rating tools with the importance of integrating Disaster Risk Reduction (DRR) and Disaster Resilient in Green rating tools. During their speeches and the panel discussion the practises and the gaps in both construction industry as well as disaster management aspects were discussed while proposing the new initiatives to the Maldivian audience who were present there.



## Collaborative study between Sri Lanka and Maldives to understand the disaster management framework

Another joint research mission was conducted by three CABARET partners representing the University of Peradeniya and University of Moratuwa from Sri Lanka and Maldives National University from the Maldives. They conducted a collaborative study during 28th to 30th July 2018 in Maamigili and Male in the Maldives to understand the disaster management framework of the Maldives.

Prof Ranjith Dissanayaka and Dr Chandana Siriwardana and their team took part in this exercise with the team from the Maldives National University. In this joint effort, the support and commitment from the Maldivian government officials of National Disaster Management Authority (NDMA), Maldivian Meteorological Department and Parliament members are to be worth mentioning in the process of taking actions to protect their beautiful island nation and islanders from disasters.

The study revealed many challenges in the present disaster management system in the Maldives. For example, National Disaster Management Plan (NDMP) has not been published yet due to many reasons for example, waiting for Sendai Framework and after publishing of Sendai framework waited for National Guidance document from the Sendai Framework. Currently, working with National Development Plan. Therefore, NDMP will be included in the National

Development Plan as no need of several documents. But it's a must to have a NDMP in the country according to the law and it has to be reviewed every five years' time and has to be integrated with the National Development Plan (NDP).

## CABARET support International Symposium on Multi-Hazard Early Warning and Disaster Risk Reduction

Experience over recent years of the impacts of tsunamis, cyclones, flooding and other major natural hazards has shown that inadequate preparation for, and response to, emergency situations have contributed to widespread damage and the avoidable loss of lives and livelihoods.

There are increasing calls for strengthened risk assessment and mitigation, community awareness and preparedness, and multi-hazard early warning systems at all levels. As emphasised by the Sendai Framework for Disaster Risk Reduction (SFDRR 2015-2030), this requires an integrated and holistic approach to early warning for multiple hazards, and for risks tailored to user needs across sectors and community awareness. Together these will help to mainstream disaster risk reduction and to support efforts towards the Sustainable Development Goals by 2030.

This high-level, international symposium, which will be organised in collaboration with Disaster Management Centre, Sri Lanka; Global Disaster Resilience Centre, University of Huddersfield, UK; IOCUNESCO

IOTWMS, WG 1 on Tsunami Risk, Community Awareness and Preparedness, and other partners will be held to recognise achievements, and to highlight work that still needs to be done. It will promote collaboration among academia, research institutions and disaster management offices, and encourage multidisciplinary and multi sectoral interaction.

Keynote speakers at the event include Dr Srinivasa Kumar Tummala, Head of The International Oceanographic Commission of UNESCO (IOC-UNESCO) Intergovernmental Coordination Group for the Indian Ocean Tsunami Warning and Mitigation System (ICG/IOTWMS), CABARET's Dr Harkunti Rahayu, Chair of Intergovernmental Coordination Group for the Indian Ocean Tsunami Warning and Mitigation System (ICG/IOTWMS) ICG/IOTWMS WG 1 on Tsunami Risk Community Awareness and Preparedness), Professor Priyan Dias, Senior Professor at the Department of Civil Engineering, Faculty of Engineering, University of Moratuwa, Sri Lanka, and Dr Ananada Mallawathanthri, Country Representative for International Union for Conservation of Nature (IUCN) in Sri Lanka.

The event, which aims to promote the availability and application of research, science and technology to support implementation of Sendai Framework for Disaster Risk Reduction 2015-2030, will be held from 16th - 18th March 2020, at Cinnamon Grand, Colombo, Sri Lanka.

Further details are available on the CABARET website: [http://cabaret.buildresilience.org/2020\\_Symposium/](http://cabaret.buildresilience.org/2020_Symposium/)

Photograph (below): The Sri Lankan teams from CABARET visit the Maldives to understand the disaster management framework of the country



## Write for CABARET Newsletter

The CABARET project provides an opportunity for people to share knowledge and experience. This newsletter is written by the CABARET membership for the CABARET membership, and also for other readers working with national and international NGOs, UN agencies, government and donor institutions, academics, and independent consultants.

We, the Editors of CABARET newsletter, welcome contributions from CABARET partners and associate partners. We are also pleased to consider articles submitted by anyone involved in research capacity building within the context of disaster resilience among coastal communities.

If you have knowledge and experience to share, please consider making a contribution.

The scope of contributions should be consistent with the aims of CABARET.

Typically, we welcome contributions in the following categories (word counts are advisory):

- News and reports from activities and events linked to the project (100 - 500 words)
- Reports on developments in the field / projects that are being investigated by partners – these do not have to be activities directly linked to the project, but should be relevant to project partner institutions (100 - 500 words)
- Useful Resources – relevant publications, websites (up to 20 - 40 words)
- Upcoming events (20 words)

We welcome suggestions for alternative types / styles of contribution.

If you have an idea for an article that you would like to develop, the Editors would be pleased to discuss it with you - send an email to Ms Kinkini Hemachandra (K.Hemachandra2@hud.ac.uk)

The Editors reserve the right to edit any contribution



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[www.disaster-resilience.net/cabaret](http://www.disaster-resilience.net/cabaret)

### European partners

University of Huddersfield  
University of Central Lancashire  
University of Cantabria  
University of Mining and Geology  
University of Malta  
Riga Technical University

United Kingdom (Lead Institution)  
United Kingdom  
Spain  
Bulgaria  
Malta  
Latvia

### Asian partners

University of Moratuwa  
University of Peradeniya  
Bandung Technical Institute  
Andalas University  
Maldives National University  
De La Salle University  
Ateneo de Manila University  
Mandalay Technological University  
University of Yangon

Sri Lanka  
Sri Lanka  
Indonesia  
Indonesia  
Maldives  
Philippines  
Philippines  
Myanmar  
Myanmar

### Associate partners

IOC-UNESCO  
Asian Disaster Preparedness Center  
Federation of Sri Lankan Local Government Authorities

### Further information

For further information on the CABARET project, contact Professor Richard Haigh (r.haigh@hud.ac.uk) and Professor Dilanthi Amaratunga (d.amaratunga@hud.ac.uk).

[www.disaster-resilience.net/cabaret](http://www.disaster-resilience.net/cabaret)