

CRISIS MANAGEMENT CONFERENCE 2019

INTERNATIONAL BAYANHAN : UNITY IN THE FACE OF DISASTERS





CMC
2019
PHILIPPINES

MESSAGE FROM THE MMDA CHAIRMAN



It is with great honor that I welcome all the delegates of the Crisis Management Conference 2019. May we all make full use of this opportunity to discuss our knowledge and efforts on disaster management and preparedness, as well as learn from one another. I am certain that through collaboration and cooperation amongst each other and with all sectors, nothing is impossible when it comes to addressing the needs of our people, particularly in upholding their safety and protection in times of disasters.

Public safety is the concern of all and each of us should be actively taking part in strengthening the quality of our services before, during, and after times of disasters. Public safety is, in fact, everybody's responsibility. One crisis after the other, we have learned the hard way that these calamities cause a disruption in the everyday life of our people.

But while these disasters are now a reality, our capabilities for response and management makes all the difference in preventing tragic incidents, saving lives, and safeguarding the stability of our nations.

We at the Metropolitan Manila Development Authority are proud and pleased to host this gathering for members of our network from all over the globe. We recognize that as we integrate our ideas and actions, we can move forward and make necessary improvements in the way we respond to crises and disasters. May we be innovative as we are resilient. With this year's theme, "International *Bayanihan*: Unity in the Face of Disasters," we emphasize the significance of partnerships and working together among cities, regions, and countries, and the private sector.

I trust that the sessions during this event will be beneficial and have practical value to all the participants, so I am encouraging everyone to share their insights as this will contribute to further enhancing our respective cities' crisis management capabilities. Let us maximize this platform and aim for sustainable and collaborative solutions. Let us take on the challenge of working together, creating an unbreakable bond that will withstand any calamity, no matter how strong or how many.

Thank you very much.

DANILO DELAPUZ LIM

Chairman

Metropolitan Manila Development Authority

ABOUT THE CONFERENCE

The Crisis Management Conference is an annual conference, organized by the Tokyo Metropolitan Government and hosted by its member cities, which is collectively known as the Network for Crisis Management.

During the event, disaster management officials from member cities from various parts of the world gather for knowledge sharing on their experience and expertise in the field of disaster management and preparedness. The main objective of the Conference is to enhance the crisis management capabilities and to develop human resources for the member cities and the region as a whole.



Useo, Frisco S, San Juan Jr., and Dir. Michael M. Gison, MMDA, Commissioner Huang De Ching and Mr Ching Yun Cheng, New Taipei City Government Fire Department

Member Cities: Bangkok, Delhi, Hanoi, Jakarta, Kuala Lumpur, London, Metropolitan Manila, New Taipei, Seoul, Singapore, Taipei, Tokyo, Ulaanbaatar, Yangon



ABOUT CMC 2019

CMC 2019 was hosted by Metro Manila, Philippines with the Metropolitan Manila Development Authority as the event organizer and host. This in support to the Authority's mandate in Public Safety and its unending and unfaltering dedication in providing Metro Manila with quality services before, during and after times of crises and disasters.

CMC 2019 aims be a platform for cooperation amongst participating countries in improving the network for crisis management. This year's conference highlights the importance of all the sectors, both public and private, in responding to various crises facing metropolises, including man-made and natural disasters.

It was held on 13-15 November 2019 at Fairmont Makati Hotel in Makati City, Metro Manila and at various command centers across the metropolis.

This year's conference was attended by over 200 participants, including representatives from nine (9) member



From left: Mr. Hironaga Suzuki, Tokyo; Mr. Yil Lee, Seoul; Mr. Tri Indarawan, Jakarta; Mr. Ismail Bin Mahedin, Kuala Lumpur

cities: Jakarta, Kuala Lumpur, Metropolitan Manila, New Taipei, Seoul, Singapore, Taipei, Tokyo, and Ulaanbaatar; and one (1) observer city, Brussels.

Local participants include representatives from Metropolitan Manila Development Authority (MMDA), local government units (LGUs), City Disaster Risk Reduction and Management Offices (CRDDMOs), response clusters, and the private sector.



CONFERENCE THEME:

"International Bayanihan : Unity in the Face of Disasters"



Since the Network for Crisis Management aims to achieve mutual enhancement of crisis management capabilities through partnership and cooperation among cities, the theme for this year's conference is "International *Bayanihan*: Unity in the Face of Disasters". This is in recognition of the importance of collaborations among the different sectors, both public and private, starting with inter-city (regional level), inter-region (national level) and inter-country (international level), supporting one another and banking on each and everyone's strength in achieving a single goal.

The term "*Bayanihan*" refers to the spirit of unity and cooperation in the community. It traces back to an old Filipino tradition where neighbors come together to accomplish a task normally impossible for an individual to achieve by himself. One such act of *Bayanihan* is when the community helps a family relocate their home into a new town by lifting the family's entire *bahay kubo* (native Filipino house) to its new destination. *Bayanihan* shows the spirit of mutual assistance, providing a helping hand to those in need, without asking for anything in return. The spirit of *Bayanihan* is especially necessary in times of disasters.

With the theme "International *Bayanihan*: Unity in the Face of Disasters", this year's Crisis Management Conference will emphasize the significance of the partnerships among cities, regions and countries, and the private sector, creating an unbreakable bond that will withstand any calamity, no matter how strong or how many.

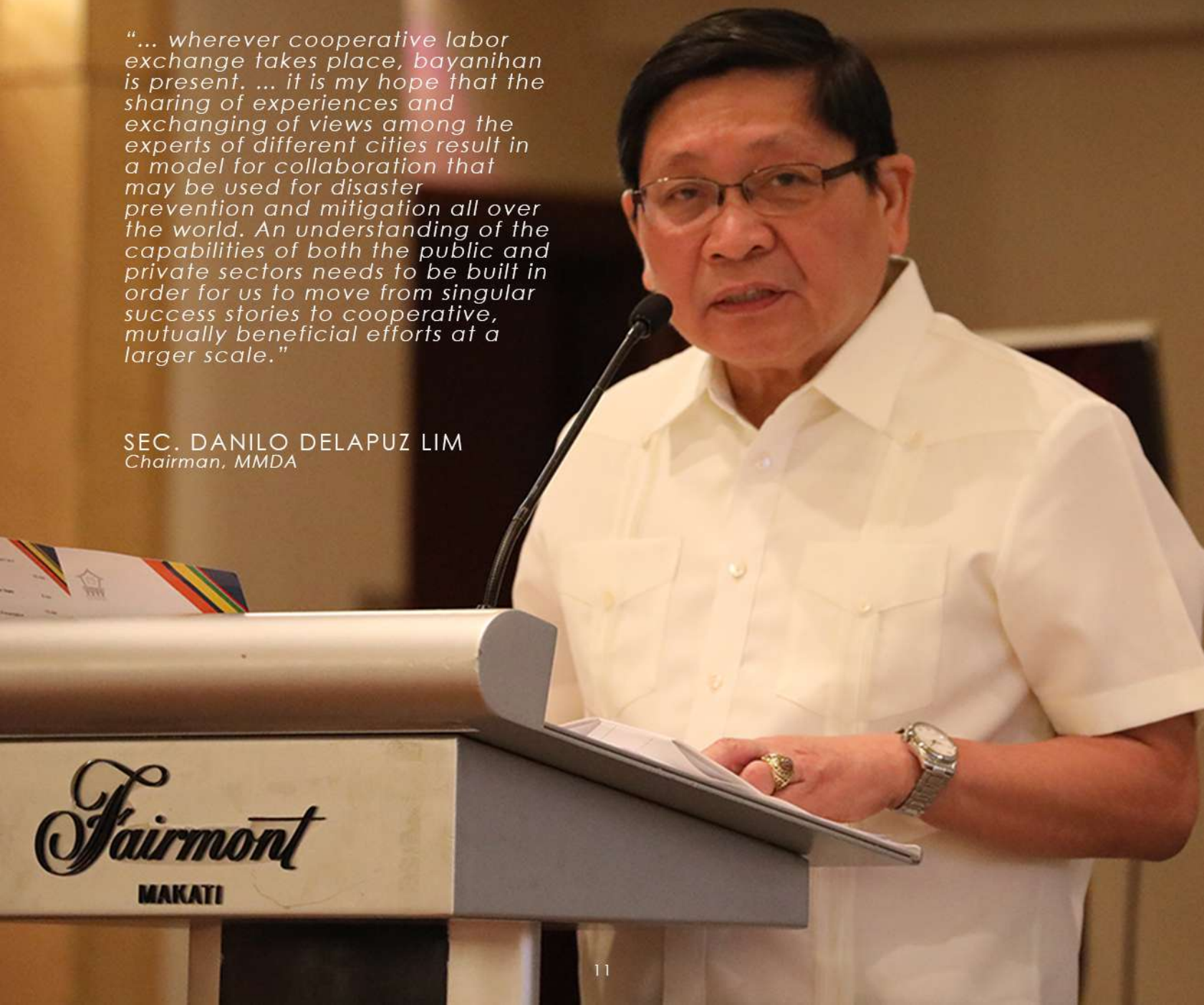
Sub-Themes

- The Strength of Public-Private Partnerships
- The Role of the Local Government in Disaster Management
- The Efforts of the National Government towards Disaster Resilience
- The Importance of the Network for Crisis Management and other International Partnerships

OPENING REMARKS

"... wherever cooperative labor exchange takes place, bayanihan is present. ... it is my hope that the sharing of experiences and exchanging of views among the experts of different cities result in a model for collaboration that may be used for disaster prevention and mitigation all over the world. An understanding of the capabilities of both the public and private sectors needs to be built in order for us to move from singular success stories to cooperative, mutually beneficial efforts at a larger scale."

SEC. DANILO DELAPUZ LIM
Chairman, MMDA



OPENING REMARKS

In the recent years, disasters have been striking more often and with a greater impact. A number of trends are changing our world: climate change; population growth; increasing urbanization, industrial development, and terrorism. This help explain the dramatic rise in the frequency and intensity of both natural and man-made disasters.

With losses and damages along with the humanitarian challenges due to disasters increasing globally, collaboration at the local, regional, inter-regional, national and international level have become paramount in disaster management. As the world's most disaster-prone region, cooperation in disaster response and management in Asia is very critical.

The primary and greatest responsibility lies within the states which should put in place effective systems for disaster response and, even more importantly, implement measures to reduce risks and eliminate consequences of disasters.

Public managers are under increasing pressure to develop and operate physical infrastructure systems that prove resilient in the face of natural calamities. However, the financial burden of disasters is something that the government alone cannot handle, thus, drawing attention to public-private partnerships (PPP) as a mechanism for delivering infrastructure.

Therefore, there is a great necessity for private sector participation in crisis management. Additionally, scientific and disaster mitigation organizations should seek to develop working relationships based on mutual trust and the recognition of differing characteristics, goals and needs. Regular contact among the different groups before, during, and after the disasters would greatly enhance this potential.

Cooperation and coordination are the lynchpins on which effective emergency management depends. Despite the need, or perhaps because of it, there is great variability concerning the level of cooperation and coordination that exists at all levels. This situation then calls for a need to develop a solid coordination mechanism in order to be able to respond more effectively to disasters. As it is a multi-sectoral activity, it needs cooperation and coordination among stakeholders – a sharing of experiences, exchanging views and knowledge to help minimize losses and damages.

To that end, in the case of the ASEAN member states, the ASEAN Agreement on Disaster Management and Emergency Response (AADMER) came into force. The AADMER is a legally binding agreement. As a regional framework that has been ratified by all member states, it provides mechanisms to reduce loss of life and assets resulting from disasters in Southeast Asia. It also aims to facilitate joint responses to disasters through concerted national efforts and intensified regional and international cooperation.

In this year's theme, "International *Bayanihan*: Unity in the Face of Disasters," the conference brings together members of the network for crisis management, emphasizing the significance of partnerships among cities, regions, countries, and the private sector.

Derived from the Filipino word "*bayan*", which means nation, town or community, *Bayanihan* is a core essence of the Filipino culture. Also known as *tulungan* or *damayan* meaning help or aid, *Bayanihan* is a system of mutual help and concern which has become the backbone of family and village life throughout the Philippine archipelago. It refers to a group or a community coming together and helping one another to achieve a common, greater goal, promoting a culture of collaboration and the empowerment of every individual through teamwork, innovation and action.

As anthropologists stress, bayanihan is a practical response to both individual and community needs which, under certain circumstances, would be difficult to achieve if people with meagre means do not organize themselves and pool together their resources. In fact, wherever cooperative labor exchange takes place, *bayanihan* is present. By working together, a proactive plan can be formulated for future disaster management activities among cities and countries.

As we open this conference, it is my hope that the sharing of experiences and exchanging of views among the experts of different cities result in a model for collaboration that may be used for disaster prevention and mitigation all over the world. An understanding of the capabilities of both the public and private sectors needs to be built in order for us to move from singular success stories to cooperative, mutually beneficial efforts at a larger scale. Let us maximize this platform and aim for sustainable and collaborative solutions. Let us take on the challenge of working together, creating an unbreakable bond that will withstand any calamity, no matter how strong or how many.

Thank you. *Maraming salamat, at mabuhay tayong lahat!*

WELCOME REMARKS

"Our journey to disaster preparedness and true resilience has driven us farther than our original plans. It has transformed our framework of governance beyond being a mere vision, but what struck me the most about our DRRM journey is the genuine support and cooperation of our community."

HON. MONIQUE LAGDAMEO

*Vice Mayor, Makati City
Metro Manila*



WELCOME REMARKS

To our honorable Chairman Danilo Lim, to all the guests and participants of the conference, it is an honor to welcome you all to the Crisis Management Conference 2019, held here in our beloved city, Makati.

Years bear witness to how Makati has transformed from a vast swamp land into a business district, and trend setter in local government's programs and social services. Now, we are further upgrading our systems in delivering services that best fit the needs of our constituents in the 21st century.

About seven years ago, the Makati Disaster Risk Reduction and Management Office was established. After the country's pioneer response team, the Makati Rescue, the Makati Command and Control and Communications Center were integrated under this office. This milestone allowed us to prosper fruitful collaborations and set benchmarks for disaster preparedness among local government units in Metro Manila and the rest of the Philippines.

We are proud to say that under my administration, Makati has purchased 141 DRRM response vehicles, installed 136 automatic external defibrillators in public schools and the city hall, and distributed over 500 emergency go-bags to west valley fault-transected households. Another 92,802 bags and 25,466 hard hats have been distributed to public school students in the city. In 2017, Makati also established the country's first DRRM Academy at the University of Makati.

Our journey to disaster preparedness and true resilience has driven us farther than our original plans. It has transformed our framework of governance beyond being a mere vision, but what struck me the most about our DRRM journey is the genuine support and cooperation of our community.

Makati would not have achieved its goals without the help of our network of partner organizations both here and abroad. True to our theme in this two-day conference, "*International Bayanihan : Unity in the Face of Disasters*", I am hoping that you would make good use of this opportunity for a healthy exchange of ideas.

Let us begin our work with a common vision of establishing a resilient nation and building an international community that cares and looks out for one another. May the Crisis Management Conference 2019 pave the way to the creation of definitive, actionable and effective solutions to current DRRM challenges we are facing. May it help us prepare better for emergencies and calamities, and minimize the impact of disasters on our constituents.

Again, in the name of our honorable Mayor Mar-Len Abigail S. Binay, yours truly Vice Mayor Monique Lagdameo, and the rest of the administration, we welcome you all to the city of Makati.

Thank you and good morning.



INVOCATION AND PHILIPPINE NATIONAL ANTHEM

The event started with an invocation and the singing of the Philippine National Anthem led by the MMDA Chorale.





NATIONAL SIMULTANEOUS EARTHQUAKE DRILL



As part of the CMC's goal of highlighting the role of the private sector during times of disasters, a live-feed from the 4th Quarter National Simultaneous Earthquake Drill held at Meralco Compound was shown. Everyone was asked to do the "Duck, Cover, and Hold" for one minute in participation to the drill.

INTRODUCTION OF CMC 2019 PARTICIPANTS

The masters of ceremonies introduced the participants for the conference. The attending member and observer cities are Jakarta, Kuala Lumpur, Metropolitan Manila, New Taipei, Seoul, Singapore, Taipei, Tokyo, Ulaanbaatar and Brussels. Other local attendees were MMDA, Metro Manila local government units (LGUs), Disaster Risk Reduction and Management Offices (DRRMOs), as well as representatives from Response Clusters and the Private Sector.



PLENARY SESSION

SUB-THEME 1: THE STRENGTH OF PUBLIC-PRIVATE PARTNERSHIPS

In the first session, it was emphasized that there is a great necessity for private sector participation in crisis management, since the government cannot do it alone. All stakeholders must seek to develop working relationships based on mutual trust and recognition of differences and needs, geared towards disaster prevention and mitigation.



Mr. Tri Indrawan
 Secretary, Board of Local Disaster Management
 Jakarta Disaster Management Agency

JAKARTA STAKEHOLDERS EMPOWERMENT

Mr. Indrawan discussed the main hazards of Jakarta which are flooding, fire settlement, epidemic diseases and earthquake potency. In the past, the city focused on disaster management but now they are aiming for disaster risk reduction. To reduce the impacts of disasters, it is important to know that it is not only the government's responsibility, but of all stakeholders.

Through collaborations with other government agencies and the private sector, the city was able to develop first responder citizens, members of the community with enhanced capabilities in providing aid to others.

Finally, he closed with the statement that when disasters happen, we must *siap* (prepare), *tanggap* (respond), and *galang* (be united).



Mr. Huang De-Ching
Commissioner
New Taipei City Government
Fire Department

BUILD NEW TAIPEI SMART DISASTER RESCUE CITY: GUARD LIVES EVERYTIME, EVERYWHERE

Mr. Huang highlighted that safety is always the first priority in their city.

Since 2018, the Fire Department embarked on the use of intelligent technology for disaster prevention, fire rescue and emergency care, all for the safety of its citizens. Some of the features of their Smart Disaster Prevention Innovation are the Emergency Data Platform (EDP) and the Emergency Messenger.

Through the EDP System, the department receives early alerts of flooding and mudslides 48 hours before the disaster and visualize the possible effects and impacts of the disaster. Through the Emergency Messenger service, disaster information can automatically be broadcasted to the public.

Another feature is the application of VR-3D technology in the Huawei Disaster Prevention Guidance Museum, which is used to raise public awareness on disaster prevention, and in the Emergency Response Command Academy (ERCA), with simulations of immersive fire emergency scenarios. The ERCA has developed 11 fire command courses for capacity-building of their responders. To close his presentation, Mr. Huang emphasized that they adhere to a People First Service Priority.



Dr. Maria Rosarita Quijano-Siasoco
Executive Director
PHAPCares Foundation Inc.

THE STRENGTH OF PPP IN DISASTER PREPAREDNESS AND PUBLIC HEALTH

Dr. Siasoco introduced the PHAPCares Foundation, a private sector, as the heart of the research-based medicines and vaccines sector in the Philippines, with the mission of providing medicines in times of emergencies.

To mitigate the impacts of strong earthquakes, a whole-of-society approach is necessary, disaster preparedness must be everybody's concern. Driven by ensuring the safety and well-being of the people during disasters, the foundation forged a partnership with the MMDA.

One of the projects of the partnership with MMDA is the capacity building of members of the PHAPCares thru the Earthquake and Landslide Search and Rescue Orientation Course (ELSAROC).

The ELSAROC is a two-day course composed of four modules and hands-on training, designed to empower individuals and organizations to act as first responders when disasters strike, and to orient them on disaster preparedness.

PHAPCares Foundation vowed to continue collaborating with the government to help save more lives.



Mr. Allan Roy Ortiz
*Head, Business Continuity Solutions
Manila Water Company Inc.*

CRISIS MANAGEMENT PROGRAM

Mr. Ortiz discussed that Manila Water recognizes the effects and impacts of climate change in their approach to disasters. The company has factored in climate change policy in their sustainability program since 2013 when they shifted their climate change key strategy to adaptation.

In their Climate Change Policy 2013, they have undertaken vulnerability assessments and disaster risk reduction efforts, built and retrofitted facilities to be climate-resilient, optimized use of energy-efficient technologies, and fostered partnerships and capacity-building with stakeholders. Mr. Ortiz reiterated the importance of the partnership between their company and the government to strengthen the delivery of their services to the public.

Manila Water's crisis management framework is divided into three: preparation, response and recovery. In terms of preparation, the company enhanced their infrastructure and system resiliency, reviewed their methodologies and procedures, and improved the awareness and competency of individual. In the response side, they formulated an organized response structure and approach of their incident management team, developed inter-agency operability with local government units and non-governmental organizations, and established operational monitoring and control.

Lastly, for recovery, they have post crisis assessments, the continuous improvement of their recovery capabilities and the strengthening of stakeholder partnerships and collaborations.



Engr. Conrado Soriano
*Assistant Vice President and Head,
Corporate Safety and Health
Maynilad Water Services Inc.*

DISASTER RESILIENCY PLAN

Engr. Soriano started his presentation with defining the different facilities that must be disaster-resilient in order to cope up with the effects of disasters. These are water supply services, sewerage, and sanitation.

To ensure the continuity of these services, the people, facilities and community must be protected. First, the protection of people who manage the facilities, treatment plants, distribution networks must be ensured since they are the primary manpower needed to guarantee that water services will be provided. Second, the facilities must be retrofitted so that it can withstand the effects of the Big One. More importantly, the protection of the community being served must be safeguarded.

The Philippine Disaster Resilience Foundation Cluster include networks of private sectors that are divided into logistics, telecom, water and sanitation, emergency supplies, power, fuel and energy, early recovery (finance), and health and emergency services/search and rescue. Under water and sanitation, Maynilad is tasked to immediately restore their services, and perform humanitarian response functions.

Maynilad is one with other agencies of the National Disaster Risk Reduction and Management Council, in aiming to achieve safer, adaptive, resilient Filipino communities towards sustainable development.



THE STRENGTH OF PUBLIC-PRIVATE PARTNERSHIPS

Mr. Meily emphasized that the private sector has a significant role to play in both natural and human-induced disasters. As the country's major private sector coordinator for disaster management, the PDRF is composed of professionals from private corporations and non-government organizations, and is premised on the principle that disaster management is not a sole responsibility of the government.

The PDRF established the country's first private sector-run national emergency operations center (EOC) in Clark, Pampanga.

The EOC is a self-sufficient emergency operations hub, which is used for disaster preparedness trainings, and relief and response efforts coordination. The EOC features a command center that can monitor earthquakes, tropical cyclones, volcanic eruptions and pandemics.

Mr. Meily discussed the resilience training and education curriculum of the PDRF which includes weather training, business continuity, Rapid Earthquake Damage Assessment System (REDAS) training, EOC management training, logistics training, earthquake preparedness training, Emergency Operations (EMPOS) training, Incident Command (IC) training for private sector, first aid and safety training, and family preparedness.

Lastly, he reiterated the importance of the partnerships among the government, NGOs, and the private sector to help make a better and safer world for ourselves and our children, because all sectors are stronger when they are together.



THE STRENGTH OF PUBLIC-PRIVATE PARTNERSHIPS

Ms. Loyzaga underscored that the role of the National Resilience Council (NRC) is not disaster response, but instead it deals with the root causes of vulnerabilities and exposure that will drive the response to these hazards.

The NRC is committed to building a resilient country using technology, enhancing capacities of LGUs, strengthening inter-industry collaborations, and implementing the resilience program. The challenge for the NRC is how to contribute in creating a social culture of resilience. For Metro Manila, response and resilience programs must be created for marginalized communities for them to survive and thrive in the event of a major earthquake.

The Council uses a whole-of-society approach, engaging the private sector, government agencies, local government units (LGUs), and international partners, on devising resilience interventions. Desirable impacts of the Council include resilient local governments, reduced deaths and damages, business and development continuity.

One of NRC's key initiatives is the Adopt-a-City Program, which requires LGUs to implement a multi-stakeholder, trans-disciplinary and integrated approach towards reducing their exposure and vulnerability to natural hazards, and impacts of climate change. This program engages the private sector in making local governments more resilient.

Other programs include knowledge-sharing and capacity-building programs, and resiliency assessment for cities and barangays.

SUB-THEME 2: THE ROLE OF THE LOCAL GOVERNMENT IN DISASTER MANAGEMENT

In the second session, it was discussed that in disaster management efforts and initiatives at the local level, citizen involvement and empowerment must be prioritized. Provision of trainings, reinforcement of collaboration among citizens, and development of manuals and emergency data platforms are useful tools and mechanisms to capacitate the local governments and the members of the community during emergency situations.



Mr. Takuya Higashi
*Director for Regional Liaison
Disaster Prevention Division
Bureau of General Affairs
Tokyo Metropolitan Government*

THE GOVERNMENT'S ROLE TO FOSTER SELF-HELP AND MUTUAL ASSISTANCE

Mr. Higashi discussed the variety of disasters that occur in their city: earthquakes, typhoons, torrential rains and large-scale accidents. Among these, the most pressing disaster is the occurrence of earthquakes.

In order to minimize the impacts of disasters, it is important to promote the linkage between self-help, mutual assistance, and public assistance. Self-help means protecting one's own life by himself. Mutual assistance means protecting their local communities by the members of the communities themselves. Public assistance means the lifesaving and rescuing done by the government agencies.

In order to improve disaster preparedness at the individual and neighborhood level, the city conducts human resource development through seminars, drills, and capacity-building trainings for local disaster management leaders and members of the community. The city also recognizes the vital role of women to meet diverse needs in case of disasters. They conduct seminars and training to foster female disaster management leaders.



Mr. Weiping Tsai
 Section Chief
 Taipei City Government Fire Department

ENHANCING THE DISASTER RESILIENCE OF TAIPEI CITY

Mr. Tsai first discussed the natural disasters that occur in their city. These are typhoon, earthquake, flooding and other emergencies. Some historical disasters in Taipei were the Jiji Earthquake in 1999 with 87 casualties, the Typhoon Nari in 2001 with 27 casualties, the TransAsia Air Crash in 2015 with 43 casualties, as well as torrential rains from 2017-2019.

Taipei City developed disaster resilience strategies in order to withstand, adapt and quickly recover from the effects of various disasters. They established comprehensive flood control measures to mitigate the risk of flooding in the city.

These involve upstream water conservation, midstream flood detention and downstream flood prevention. They also launched public urban renewal to enhance disaster prevention and preparedness, conducted earthquake-resistant assessment of public buildings and required them to handle structural reinforcements, and hosted full-scale disaster prevention exercises. Lastly, they promoted self or mutual assistance of community members through trainings and seminars. To conclude his presentation, he stated that they aim to build a livable, sustainable and disaster-resilient city through robust infrastructures and advanced technologies.



Mr. Kiwoon Yoo
Researcher, Fire Science Research Center
Seoul Metropolitan Fire Academy

LEADERSHIP LESSON IN SEOUL

Mr. Yoo highlighted that the main cause of deaths in Seoul is ischemic heart disease. In the chain of survival for cardiac arrests, the most important aspects are the recognition and activation of the emergency response systems, and the immediate high-quality cardiopulmonary resuscitation (CPR).

The other aspects which are rapid defibrillation, basic and advanced emergency medical services, and advanced life support and post-arrest care come after these first two.

As the primary possible responders to these scenarios, it is crucial that even bystanders are knowledgeable of the things to do in case of these emergencies. Aside from being trained to do CPR, Seoul uses technology to respond to these cases. Using video calls, physician-guided CPRs were enabled.



Mr. Ismail Bin Mahedin
Civil Defence Officer
Malaysian Civil Defence Force

OLD KUCHING SMART HERITAGE (OKSHE): THE ROLE OF LOCAL GOVERNMENT IN DISASTER MANAGEMENT

Mr. Mahedin provided an overview of disasters in the region of Southeast Asia, the country of Malaysia, the state of Sarawak and the city of Kuching. According to the ASEAN Disaster Risk Monitor and Disaster Management Review of 2019, flooding is the largest disaster as compared to wind, storm, drought, landslide, earthquake, volcanic eruption, and tsunami. In the Old Kuching Smart Heritage (OKSHe), one development strategy for the smart city was flood management, which involves smart and sustainable storm water management, integrated smart development planning, storm water management, and flood information management system.

Disaster risk reduction initiatives in Malaysia are focused on command and control. A holistic and inclusive DRR may only be achieved through a bottom-up approach, which emphasizes the empowerment of local actors and the participation of local stakeholders. As the members of the community are the first responders during disasters, building a resilient community must be a priority.

Malaysian disaster management agencies adopt the Sendai Framework for Disaster Risk Reduction (SFDRR) 2015-2030 in developing their conceptual frameworks. The SFDRR has four priority areas: understanding disaster risk; strengthening disaster risk governance to manage disaster risk; investing in disaster risk reduction for resilience; and enhancing disaster preparedness for effective response and to "Build Back Better" in recovery, rehabilitation and reconstruction.



Mr. Giovanni Antonius Reyes
Malabon City DRRMO

MALABON DISASTER RISK REDUCTION AND MANAGEMENT OFFICE

The Malabon City Disaster Risk Reduction and Management Office was established in 2011, with the mission of being an agent of transformation by providing inclusive capacity-building strategies for disaster risk reduction and climate change adaptation.

Mr. Reyes highlighted the city's disaster facilities, which are the Malabon Command and Control Center, staging area with pre-positioned response equipment and vehicles, DRRM warehouse, and Malabon Action Center. He also presented the different monitoring equipment, early warning system, rescue vehicles, mobile command vehicles, and other heavy equipment.

Mr. Reyes reported the best practices of the city in disaster risk reduction. This includes the conduct of DRR caravans, hazard preparedness seminars and basic life support and SAR trainings for capacity-building of their citizens and responders.



Mr. Roy Calingacion
Chief
Training Division
Valenzuela City DRRMO

VALENZUELA DISASTER RISK REDUCTION AND MANAGEMENT

Valenzuela City DRRMO is focused on the four thematic areas: prevention and mitigation, preparedness, response, and recovery and rehabilitation. Mr. Calingacion presented the DRRM efforts of the city.

Prevention and mitigation measures include the conduct of tree planting activities, cleaning and declogging of rivers, door to door waste collection, removal of informal settlers along waterways, and upgrading of critical facilities like hospitals, health centers, barangay halls, police precincts, fire stations, and others.

Preparedness efforts include the conduct of vulnerability and capacity assessment, creation of disaster management plan, establishment of trained response teams at the city and down to the community levels, and acquisition of disaster response equipment.

Response activities are comprised of rapid damage assessment and needs analysis, search and rescue operations, provision of immediate medical attention, clearing operations, relief distribution and management of evacuation centers.

Recovery and rehabilitation actions include repair of roads and bridges, restorations of lifelines, critical facilities, residential establishments, source of livelihood, and economy, wherein the goal is to "build back better".

Mr. Calingacion ended with the statement that "hazards become disaster only if vulnerable people remain exposed to risk."

SUB-THEME 3: THE EFFORTS OF THE NATIONAL GOVERNMENT TOWARDS DISASTER RESILIENCE

In the third session, it was highlighted by the member cities how technological adoption and innovation play a significant role in disaster prevention, mitigation, preparedness, response and recovery. One technological intervention discussed was the development and application of communication systems to improve means of coordination during disaster-related incidents. Another initiative undertaken by the national government was ensuring that the roles of concerned agencies, department, and partners are well-defined through policies that have been set in place.



Mr. Michael Salalima
*Chief of Staff, Office of the General Manager
 and Head, Metropolitan Public Safety Office*

OPLAN METRO YAKAL PLUS: METRO MANILA EARTHQUAKE CONTINGENCY PLAN

Mr. Salalima's presentation on the Metro Manila Earthquake Contingency Plan is focused on the roles of the different agencies and partners if the "Big One" (an anticipated magnitude of 7.2 earthquake) strikes.

The coming of the Big One will greatly affect the whole Metro Manila region and its neighboring provinces. The foreseen damages to life and property include 35,000 deaths, multiple serious injuries, collapsed houses, fire incidents, damage to government buildings and lifeline utilities, and disruption of national socio-economic activities. The study was conducted about 15 years ago, so the projections of these impacts can potentially shoot up.

The Oplan Metro Yakal Plus is a contingency plan which covers inter-agency roles before, during and after the Big One. It was formulated through various stages of consultations with local government units (LGUs), national government agencies (NGAs), the private sector, and other stakeholders. As the agency mandated to ensure public safety in the metropolis, the head of the MMDA serves as the chairperson of the Metro Manila DRRM Council, serving as the link between the LGUs and the national government. The main role of MMDA is to establish a system/mechanism to ensure and assume command and control for Metro Manila.

With regards to DRMM, the Authority admits that the government cannot do it alone. It needs the support of all stakeholders to ensure that Metro Manila will stand tall if ever the Big One strikes. The roles of core response sectors are determined in the Plan.

These include the following: communications and warning; safety and security; search and rescue; relief and camp management; engineering, reconstruction and rehabilitation; transportation and communication; medical and nutrition; evacuations and management of casualties; and fire. These roles were assigned to different agencies and companies, both public and private, taking into account each of their strengths, capacities, and mandates. To support core agencies, other cooperating agencies were also identified.

Mr. Salalima ended his presentation with the ways forward addressing issues encountered in Metro Manila DRRM. First, the review and updating of the contingency plan is on-going to ensure that we can prepare for disasters as comprehensively as possible. Next, constant coordination and communication through regular meetings should be established. Further, inter-agency and public-private partnerships must be promoted. Lastly, the government should intensify its focus on resiliency programs that will support technology adoption, upgrade and maintenance.



THE EFFORTS OF THE NATIONAL GOVERNMENT TOWARDS DISASTER RESILIENCE

Mr. Jamsranjav discussed Mongolia's state policy on disaster protection. It is a policy that aims to ensure the country's socio-economic sustainability by strengthening the disaster management system, educating their people on safe living, reducing disaster vulnerability, and ensuring the participation of all stakeholders.

The country also adopted the Sendai Framework for Disaster Risk Reduction (SFDRR) seven global targets and four priorities areas. This framework is integrated in the country's laws and regulations, according to their capability and resources.

In 2018, the Asian Ministerial Conference on Disaster Risk Reduction was held in Ulaanbaatar, with more than 2000 representatives from Asia. This resulted into the development of the Asia Regional Plan for the Implementation of SFDRR. This Regional Plan provided policy directions to guide the countries in their implementation of the Framework, a long-term road map with defined milestones, and a two-year action plan to be implemented from 2018 to 2020.

Other government initiatives on disaster resilience include the establishment of the National Council on Disaster Risk Reduction, development of the Manual for DRR Assessment, allotment of funding for DRR activities, and conduct of tabletop exercises, drills and seminars. Through these efforts, public disaster awareness was and the disaster management leaders' capacity was intensified.



Mr. Nobushiro Nagano
Police Superintendent
Security Bureau, Natural Disaster and Accident
Rescue Division
Tokyo Metropolitan Police Department

EFFORTS TO STRENGTHEN DISASTER PREVENTION CAPABILITIES

Mr. Nagano introduced the Tokyo Metropolitan Police Department as one of the 47 independent prefectures under the National Police Agency. The police ensure the safety and security of their citizens from various threats, including daily crimes and terrorism. Under their department, the main unit involved in responding to disasters is the Disaster Countermeasures Section.

Mr. Nagano discussed the major disasters that occurred in their country, including the Great East Japan Earthquake in 2011, the West Japan heavy rain in 2018, Oshima earth and sand disaster in 2013, Volcanic eruption of Mount Ontake in 2014, and others. In these disasters, rescue teams from the Metropolitan Police Department were dispatched. Aside from rescue activities, the police also conduct other support activities such as utilization of the Air Corps, prevention of theft, regulation of traffic, transportations of relief supplies, consultations activities for the evacuees.

To further capacitate their responders, a training center was established in Tachikawa City. This facility can provide simulations for building collapse, landslides, urban flood damage, and others. Measures to increase the command function through a unified command post will ensure immediate and accurate data collection.

By utilizing artificial intelligence such as SNS utilization, they were able to understand disaster occurrence information, and prevent the spread of damages and hoaxes.

SUB-THEME 4: THE IMPORTANCE OF THE NETWORK FOR CRISIS MANAGEMENT AND OTHER INTERNATIONAL PARTNERSHIPS

In the fourth session, it was underscored that the need for well-capacitated and fit personnel is of utmost importance during terrorist-related events or human-induced disasters. Partnerships with other countries such as the Network is deemed necessary for human resource capacity-building and development, and information exchange.

PROMOTING INTERNATIONAL COOPERATION FOR TOMORROW

Mr. Suzuki defined the area of responsibility of Tokyo Fire Department (TFD), covering 13 million citizens. As mandated to ensure the safety of the people against fires, the Fire Department has 1 main headquarters, 10 fire district headquarters, 81 fire stations, 3 divisions, 208 branches, with a total of around 18,500 employees. Their fire-fighting equipment and vehicles include 489 fire engines, 86 ladder trucks, 253 ambulances, 29 rescue trucks, 10 fireboats, and 8 helicopters.

Studies show that the number of foreign tourists visiting Tokyo increase rapidly. As the Olympic and Paralympic Games 2020 is approaching, more tourists are expected to come. The TFD carries out various safety measures for these tourists. One of the initiatives of the department is breaking the language barrier between the tourists and the responders by employing members with English communications skills to handle 119 emergency calls. They also involved interpreters for five languages, English, Chinese, Korean, Portuguese, and Spanish. Ambulance units are equipped with the translating application, EMS Voice Tra, to ensure smooth communications.

To capacitate fire responders of local international cities, the TFD hosts a Fire Rescue Techniques Training Course, while the TMG holds a Comprehensive Joint Disaster Management Drill annually. These trainings develop the international teamwork system in preparing for disasters. The TFD continues to develop their human resources through international conferences and trainings hosted by various agencies and countries.

Because of various major disasters in other countries, the establishment of an international rescue team (IRT) was triggered. Upon the request of a disaster-stricken country's government, the IRT will be sent to commence rescue operations.

Tokyo City was ranked as the safest city in the world by the Economist, but the TFD still makes efforts to create a safer tomorrow.



Mr. Hironaga Suzuki
Division Chief, Administration Division
Tokyo Fire Department



Ms. Valerie Barbier
Head Expertise, Human Factors
Brussels Fire Department

TERRORIST ATTACKS: CASUALTY EXTRACTION TEAM

Ms. Barbier discussed that the location of Belgium is strategic, allowing an increased freedom of movement, consequently an increased potential of terrorist attacks.

In March 22, 2016, two terrorist attacks occurred in Brussels, one at the national airport, and another at the Maalbeek Metro Station. Due to the attacks, 32 persons were killed and over 300 civilians were injured. Because of this large-scale mass violence, Belgium has learned the focus on human factors and ergonomics was necessary.

Human factors involve psychological, cultural, behavioral and other human attributes. Human factors influence situation awareness, decision-making, and the flow and interpretation of information. As a result, they formed a Casualty Extraction Team (CET). The members of the CET are first responders chosen based on their physical, mental, and emotional capacities.



OPEN FORUM

After the end of every sub-theme, Col. Ilagan of the MMDA, presented a summary of all presentations and facilitated open forums.





COMMITMENT SIGNING AND PRESENTATION OF PLAQUES

For the first time in CMC history, the Authority initiated the Commitment Signing. The heads of delegation signed the Commitment Board as a promise of unity especially in times of disasters among the member cities. The heads of delegation were then given Plaques of Appreciation for their participation in the conference.





ANNUAL REPORT OF THE TMG SECRETARIAT

Ms. Chieko Kanno presented the 2019 Annual Report of the TMG Secretariat. She explained that the Network aims for the enhancement of crisis management through capacity-building and human networking. This objective is carried out in three areas: human resources development, knowledge sharing at the CMC and information exchange. Finally, she announced the host city for CMC 2020, Taipei City.



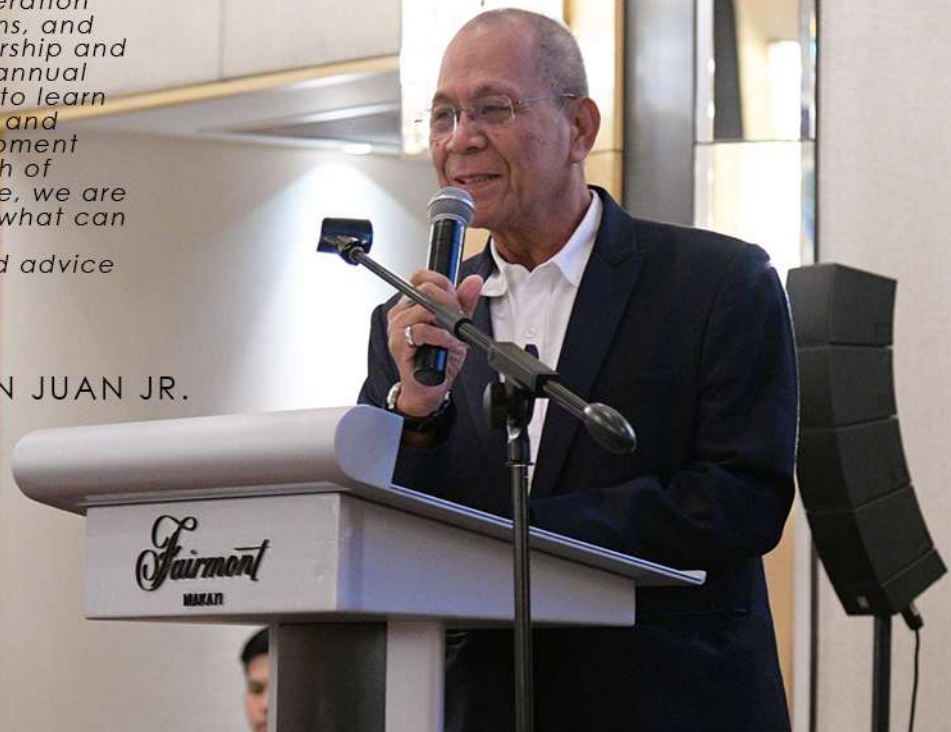
CMC 2020 HOST CITY

Usec. San Juan facilitated the ceremonial key turnover to Taipei City. Mr. Chih Min Hsu, of Taipei City Government Fire Department, delivered their manifesto of acceptance as the next host city.



"... I cannot overemphasize the importance of partnerships with the private sector, and cooperation among other cities, regions, and countries. Through partnership and cooperation such as this annual conference, we are able to learn the common experiences and challenges of our development partners. Given this wealth of awareness and knowledge, we are able to mutually analyze what can be done to address such challenges, provide sound advice and extend assistance."

USEC. FRISCO S. SAN JUAN JR.
Deputy Chairman, MMDA



CHAIRMAN'S SUMMARY STATEMENT

Member cities of the Network for Crisis Management, distinguished guests, ladies and gentlemen:

Good afternoon.

It has been a pleasure to host the Crisis Management Conference this year in support of our ongoing efforts to enhance the crisis management capabilities of our member cities.

Allow me therefore to thank the delegates from the member cities of Brussels, Kuala Lumpur, Jakarta, New Taipei, Seoul, Singapore, Taipei, Tokyo, and Ulaanbaatar, as well as our guests from the seventeen (17) local government units of Metro Manila, national government agencies, and the private sector for your participation in this year's Conference.

With the theme "International Bayanihan: Unity in the Face of Disasters", we recognize the importance of stronger cooperation and partnership of both the public and private sectors among cities, regions, and countries that is geared towards strengthening the efforts and capabilities on disaster prevention and mitigation.

This annual event has become more important to solidify further the cooperation among the member cities of the Network for Crisis Management as we seek more innovative disaster management approaches.

To summarize the presentations of the participating member cities, let me provide you with these takeaways:

First – the significance of disaster management efforts and initiatives at the local level particularly community involvement and empowerment.

It was good to note that citizen involvement and empowerment is prioritized by governments of the member cities.

We learned that the provision of training, reinforcement of collaboration among citizens, and the development of manuals, online applications as well as emergency data platforms are deemed useful tools and mechanisms to capacitate citizens to help themselves as well as other members of the community during emergency situations.

These efforts materialize when local governments are able to manage their own capabilities and limitations before, during, and immediately after hazardous incidents.

Second – the adaptive disaster management efforts and initiatives of the national government.

It was underscored by all member cities how technological adoption and innovation play a significant role in disaster prevention, mitigation, preparedness, response, and recovery.

Interventions and measures on disaster management should be progressing in parallel with the technological advancements of today.

The application of smart technology, for one, has become beneficial with information generation, monitoring, and data storage relative to disaster prevention and response strategies.

A common technological intervention I noted among member cities is the development and application of communication systems to improve means of coordination between decision-makers as well as the stakeholders during emergency or disaster-related incidents.

Another equally important initiative undertaken by national governments of member cities is to ensure that the roles of the concerned agencies, departments, and partners are well-defined through policies that have been set in place.

Moreover, I also noted that concerned personnel and groups should be well-equipped with the appropriate skills and knowledge about the magnitude and relevance of their duties.

In fact, the need for well-capacitated and fit personnel is of utmost importance during terrorist-related events or human-induced disasters as emphasized in one of the presentations earlier.

This brings me to my last point – “Bayanihan”. To reiterate the Chairman’s message this morning, the term “*bayanihan*”, which means “help” or “aid”, is a system of mutual help, cooperation and concern which has become the backbone of family and community in the Filipino culture.

With this year’s conference theme, I cannot overemphasize the importance of partnerships with the private sector, and cooperation among other cities, regions, and countries. Through partnership and cooperation such as this annual conference, we are able to learn the common experiences and challenges of our

development partners. Given this wealth of awareness and knowledge, we are able to mutually analyze what can be done to address such challenges, provide sound advice and extend assistance.

The communities, local governments, national governments, the private sector as well as other development partners play significant roles in disaster management. The realization of these efforts becomes more consequential when there is proper coordination and strengthened collaboration across all levels and sectors.

We hope to continue this endeavor as we shape the road ahead for this Network. Together, we shall work for the protection of our people's welfare into the future.

To Taipei City Government, our next host city, congratulations. We look forward to the active participation of all member cities next year.

Bayanihan comes from the root word *bayani*. What does it mean? It means a hero. *Bayanihan* involves a group of heroes, when several persons, agencies, entities come together for a single heroic act, with one common goal or objective. That's *Bayanihan*. They do it without expecting anything in return.

Ikaw ay bayani. You are a hero. I'm not praying that disasters happen in any of our cities. Just in case, we all know that you all become heroes. You do not do it for the glory, but for the act of heroism, doing something without expecting anything in return.

You are my hero.

In closing, I invite all of you to attend our Fellowship Night at around 6:30 tonight and I want everyone to enjoy with singing, dancing and booze.

Again, you are all our heroes. Thank you for coming.

MMDA METROBASE

The Metrobase Operations Center (Metrobase 2.0) is the main Intelligent Traffic System control hub of the Metropolitan Manila Development Authority (MMDA). The facility features more than a hundred LCD screens showing live footage from more than 200 operational CCTV cameras spread out across the major roads of the metropolis. The Metrobase serves as the eyes and ears of MMDA with regards to traffic monitoring and management as well as road emergency response and the enforcement of the No-Contact Apprehension Policy of the Authority. This facility also oversees the systematic control of traffic signal lights along the Metro Manila's major thoroughfares. Lastly the Metrobase also functions as the Metro Manila Crisis Monitoring and Management Center (MMCMMC) during times calamities and disasters. The tour was facilitated by Mr. Vic Felizardo.

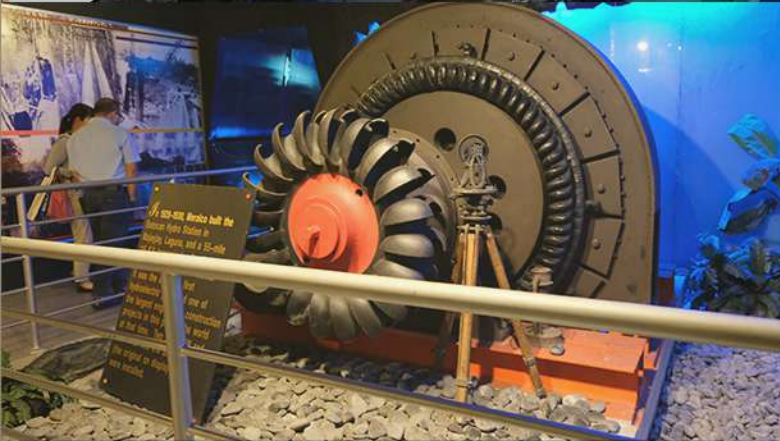






MERALCO COMMAND CENTER

The Manila Electric Company or Meralco, the sole electric distributor for Metro Manila, employs various measures in ensuring the continuity of its service at times of disaster. Aside from that, Meralco is an active private sector partner of various government agencies including the Authority in multiple disaster preparedness and resiliency measures. One of their notable efforts in doing such is through the capacity building of their service powerline personnel in terms of emergency response for them to act as man-power multiplier during disasters.





PASIG COMMAND CENTER AND RED TRAINING CENTER

The City of Pasig, as one of Metro Manila's prime cities, has their own world class emergency operation center equipped various monitoring and communication systems as well as modern disaster risk reduction and management equipment and environmental quality monitoring equipment. The city also established their own Rescue Emergency Disaster (RED) Training Center which aims to improve the disaster resiliency education and information of citizens of Pasig City otherwise known as the Pasigueños.

The participants first visited the Pasig City Hall for a courtesy call to the mayor. Then, Mr. Bryant Wong facilitated the tour of the two facilities.



