ITU Global Forum on Emergency Telecommunications Wednesday 6th March – 09h00 Intercontinental Resort (Balaclava) Hon. Mr Yogida Sawmynaden Minister Ministry of Technology, Communication and Innovation Mauritius

Hon. Miss Kay Mc Conney, Minister of Innovation, Science & Smart Technology of Barbados...

His Excellency Mr Monise Laafai, Minister of Communications & Transport of Tuvalu...

Hon. Etienne Sinatambou, Minister of Social Security, Reform Institutions and Environment, & Sustainable Development Mauritius...

His Excellency Lealailepule Aiafi, Vice-Minister of Communications & Information Technology of Samoa...

Mrs Doreen Bogdan-Martin, Director, Telecommunication Development Bureau at ITU...

Mrs Bernadette Lewis, Secretary General of the Caribbean Telecommunication Union...

Mrs Rooba Moorgen, Permanent Secretary, Ministry of Technology, Communication and Innovation

Mauritius...

Participants and staff of different institutions and ministries attending the forum...

Members of the media, Distinguished guests...

Ladies and gentlemen...

Welcome to the Paradise island of Mauritius... I am proud to be addressing you this morning on an issue, which has been taking us by storm lately.

There is, without any doubt, an utmost urgency to discuss and plan about our response to natural calamities. Two days back, maybe you saw all the havoc left behind by a tornado in Alabama (USA). 23 persons lost their lives...

Climate change is no more to be questioned... it is reality and we are living it every single day.

Mauritius is classified according to the World Risk Report 2018 as the 16th country with the highest disaster risk with a World Risk Index of 14.27.

Mauritius, being a small island in the Indian Ocean, is already witnessing extreme weather conditions such as flash floods, strong tropical cyclones among others that are severely impacting on the livelihood of our nation.

Ladies and gentlemen...

In line with Government's vision to enhance the safety and security of our citizens against natural disasters, we are constantly working on new frameworks and innovation projects to review and update the national multi-hazard early warning system and embark on innovative disaster management education, training and public awareness initiatives.

It is worth highlighting that since 2016, my government has introduced the National Disaster Risk Reduction and Management Act to improve response and preparedness to disasters. An Early Warning System for storm surges with 3 days probabilistic and 6 hours' deterministic capability has also been developed.

Moreover, the National Disaster Risk Reduction and Management Centre (NDRRMC) is already operational for the planning, organizing, coordinating and monitoring of disaster risk reduction and management activities at all levels.

Dear participants...

Information technology plays a fundamental role in modern disaster management mechanisms, helping organizations identify and prevent disaster risks in operating activities.

With a mobile penetration rate of 146% and a total of 1.85M subscribers, Mauritius is working towards the implementation of the National Multi-Hazard Early Warning and Emergency Alert System (EWEAS).

Discussions have been initiated with mobile phone operators to gauge the capabilities of their existing infrastructure and requirements for upgrading to accommodate disaster management functionalities in their different networks.

Ladies and gentlemen...

With the growing intensity and frequency of natural disasters, there is a constant need to enhance the use of technology in all forms for disaster management before, during and post disasters. Mauritius is investing considerable amount of its own resources on climate related measures as highlighted in the Budget Speech 2018-2019.

Several Automatic Weather Stations have been setup with sensors to capture real time data on weather conditions around the island.

Moreover, Mauritius being an island exposed to tsunamis, sensors have been installed at strategic positions in the sea to monitor the water level. Mauritius is now equipped with a Tsunami Warning System which gives us a lead time of 5-7 hours before the tsunami waves are likely to reach our coasts.

Government is working towards the implementation of a project for enhancing Meteorological Observation, Weather Forecasting and Warning Capabilities and it is expected to start in April 2019.

In light of the above, a state-of-the-art new S-Band Doppler Solid-State Radar has already been acquired and installed in Mauritius to enhance the dissemination of weather information and actionable warnings so as to reach disaster-related organisations and the population in a timely manner.

It is a fact that land-based communication systems are prone to damage during disasters. Given that communications provide the critical path for relief in emergency and disaster, the use of satellite phones is now considered as an integral tool for disaster management. Moreover, satellites may also be used in disasters for communications, remote sensing and mapping.

Mauritius is maintaining its AM broadcasting service and is in the process of upgrading the 1575-kilohertz transmitter as an emergency radio transmission for island wide coverage during disasters.

In times of crisis and natural disasters, amateur radio is often used as a means of emergency communication. The ICT Authority has set up a conducive licensing framework for Radio Amateur in Mauritius by adopting the different frequency bands as recommended by the International Telecommunication Union.

Ladies and gentlemen...

Besides the military and commercial applications of drones, there is no doubt that drones play an important role to support emergency incidents. The use of drones to map disaster areas provides greater advantages in costs and in rapid response times when compared to traditional methods.

Several local bodies including first responders have expressed their interest to deploy drones for disaster management. There is therefore an urgent need to introduce the necessary frameworks to allow deployment of drone for community resilience and disaster response.

Internet of Things (IoT) refers to a network of physical objects embedded with sensors and software that collect data and communicate with another.

As it relates to emergency management, IoT can be used to enhance data collection from the physical environment and quickly communicate this data to different bodies involved in disaster management.

With the implementation of several smart cities in Mauritius, real time data about weather, traffic, police and medical services will be readily available.

Gathering information from various sources is vital for decision making in crisis situations. However, same poses certain challenges in analysing and presenting the information in a relevant and actionable manner.

New innovative solutions including Augmented Reality integrated with live drone footage may be used to provide an immersive experience and enhance decision making capabilities.

Broadband and software solutions, including mapping and visualisation features, can aggregate live video feeds to provide a view of what is happening at various affected sites. Events and responses can be built into a timeline and be reviewed after the incident to determine the best course of action in the future.

Dear participants...

It is without doubt that ICT plays a pivotal role in enabling timely disaster response, management and reconstruction after disasters and in promoting disaster risk reduction and preparedness.

To conclude, I wish to stress that my ministry will endeavour to provide all the necessary facilities, legislations and frameworks for the establishment of any emergency communication network in Mauritius.

I wish you all a fruitful forum, with possibilities of exchanging each country's experience and I am sure we shall all come up with solutions.

Thank you.