



[www.ifms.org](http://www.ifms.org)



# **The Role of the IFMS in Strengthening the Global Weather Enterprise**

**Presented by:**

**Dr. Harinder P. S. Ahluwalia**

**President IFMS**

**12-April-2018**

**Relevant: Valuable: Unique:**  
*Helping WMO/WBG to create a 'Weather Ready Globe'.*

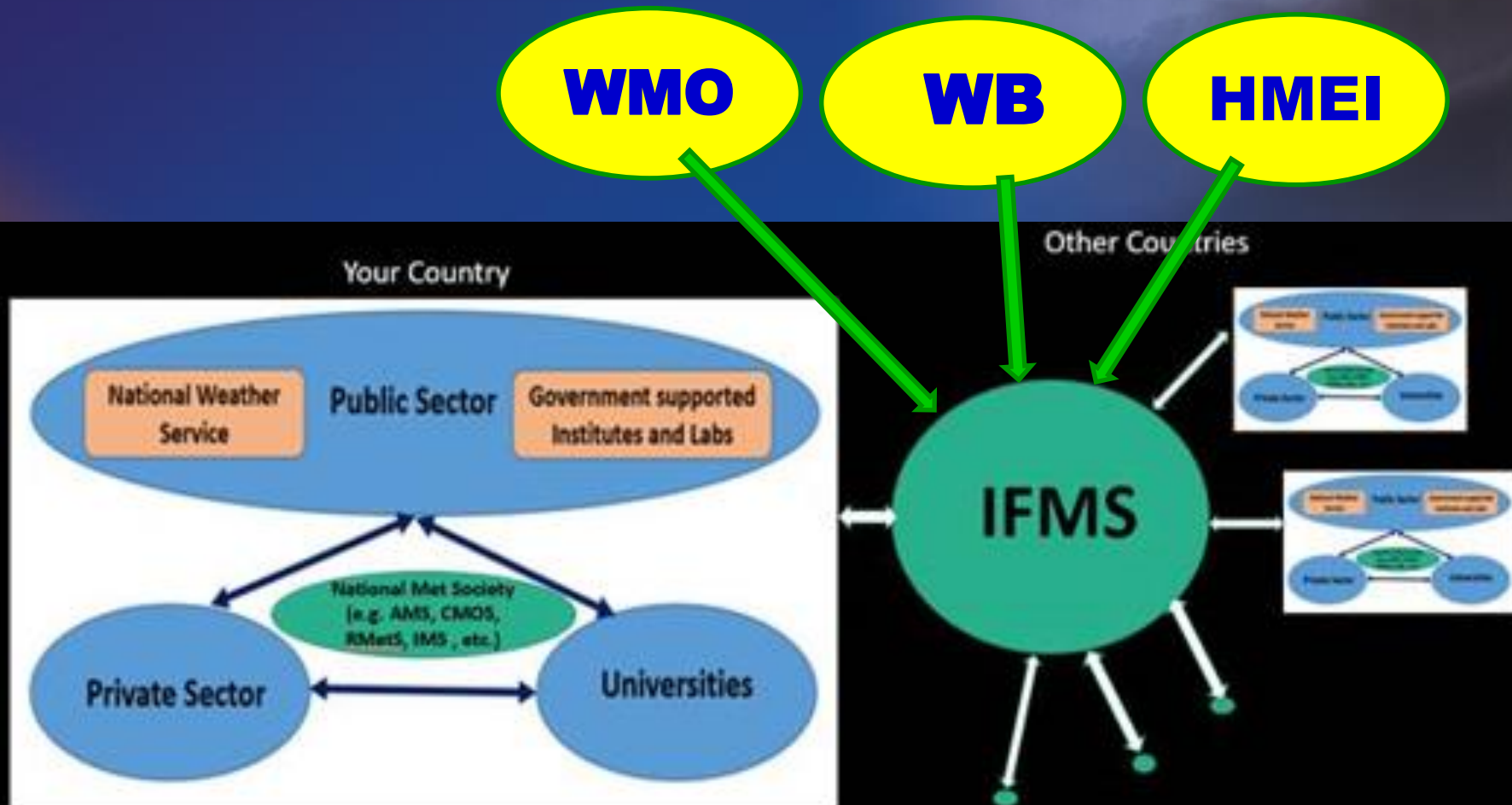
- The IFMS is an organization to **foster and encourage communication and exchange of knowledge, ideas and resources** among the world's more than sixty meteorological societies.
- The IFMS is organized for **scientific, educational and charitable purposes**
- WMO deals with National Hydro-Met **Services** (NHMS) of the world, the IFMS is meant to create cooperation between National Hydro-Met **Societies** (NHMSocs) of the World.
- Membership includes NHMSocs, Regional HMSocs, Specialized Societies such as AGU, ISB, IAUC, IABM, IAMAS, AGU, etc.

# IFMS Objectives

- **Advancement of Science and Technology by sharing knowledge,**
- **Promote application of meteorological knowledge for Sustainable Development, Disaster Risk Reduction and Climate Change Mitigation and Adaptation**
- **Assisting each other and especially developing societies to become stronger,**
- **Creating new societies,**
- **Strengthening scientific collaboration between Public, Private and Academic Sectors of the Global Weather Enterprise**

- 
- Collaborating on joint scientific exchange activities of Member Societies
  - Strengthening access to information channels for communication: Facebook, LinkedIn, Twitter and WhatsApp
  - Assisting WMO and the World Bank Group in strengthening Global Weather Enterprise (GWE) by increasing scientific and infrastructure collaboration between PPA (Public, Private and Academic) Sectors
  - Strengthening Global Context/Collaboration with – EMS, FLISMET, EAC, etc.
  - **Providing assistance in Accreditation/Certification and Training (ACT)**
  - Aligning IFMS Plans with WMO strategic plans/priorities to increase cooperation
  - **Recognizing/Promoting the scientific contributions of individuals through awards & Scholarships**
  - Strengthening Industry contributions to GWE through local Met Societies

# Schematic Diagram of Potential Entity Relationship



# IFMS

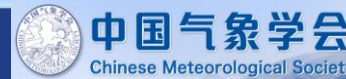
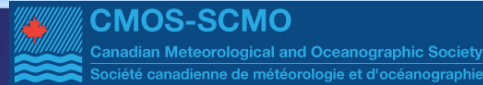
www.ifms.org

Famill  
e

# IFMS

Familia

## Family



HONG KONG METEOROLOGICAL SOCIETY



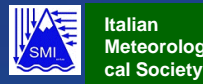
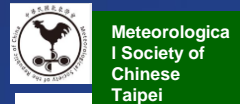
Ethiopian Meteorological Society (ETMS)



Geophysical Society of Finland



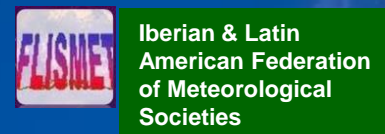
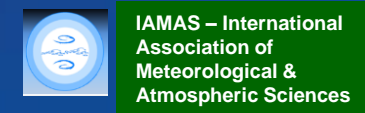
International Association for Urban Climate



Sociedad Meteorológica de Cuba



South African Society for Atmospheric Sciences



- **Need for Asian Meteorological Society**
- **Currently China is cooperating with Korea and Japan and they have regular meetings and biennial Conferences.**
- **This should be expanded to create an Asian Meteorological Society on a similar basis as we have EMS (European Meteorological Society).**
- **Similarly Europe has ECMWF which is considered to be a very strong organization involved in creation and application of the state-of-the-science Weather Forecasting**
- **With Asian GDP as highest of all continents, I have a dream that one day it will be possible to have an ACMWF (Asian Medium Range Weather Forecasting Centre) in which all Asian countries can contribute and take advantage.**

# Some Facts

- **Climate Change has intensified the frequency and severity of weather related disasters requiring more accurate and reliable weather information.**
- **Related S&T is advancing rapidly providing the opportunity to satisfy societal needs.**
- **Implementation of new technology is sometimes slow**
- **Benefits of this rapid progress not reaching LDCs**
- **Currently there are contributions from the public and private sectors but not in an organized and conscious manner – with some exceptions.**



# What is Global Weather Enterprise (GWE)

- Global Weather Enterprise consists of the following sectors:
  - *Public Sector*
  - *Private Sector*
  - *Academic*
- In addition, **Users and NGOs** are also a part of the GWE.
- However, in the current discussion GWE consists of PPA Sectors.

# Some of the issues to be Resolved to Strengthen GWE

1. Lack of proper infrastructure & Training in Least Developed Countries (LDC's)
2. Lack of data exchange between NHMS, private & academic sectors
3. Fragmented Data Collection – need Network of Networks
4. Lack of or insufficient collaboration between Public/Private (PP) Sectors in most countries, hence need to convince NHMSs about the value of PP collaboration.
5. Overcoming difficulty of coordination of work of three (PPA) sectors – **Building Confidence as partners**

## Some of the issues to be Resolved to Strengthen GWE Common Sense is not that common

6. GWE needs to convince Governments the need for infrastructure and Training for safety of their citizens and their properties so that they allocate sufficient budgets
7. Case study required for the cost of destruction caused by Natural Disasters versus cost of proper infrastructure & Training
8. Public Education so that public is aware of the value of investment in Disaster Forecasting and Management.

# What is Required to be done? Collaboration Between PPA

- **Public/University Collaboration is already active, though it can be further strengthened with innovative steps**
- **Strong reluctance/resistance in many countries for PP Collaboration**
- **Some countries have even felt threatened by the presence of the foreign private sector in their country and complained to WMO**
- **This shows that a lot of convincing of NHMSs will be required to show the value of this collaboration.**

# Actions Taken Up to Now to Strengthen GWE

- WMO with the assistance of GFDRR is leading this effort.
- First significant action was taken by WMO WWOSC-2014 Conference in **Montreal**.
- GFDRR-WBG organized a workshop in **Washington DC** on 27<sup>th</sup> of November, 2018 to discuss this issue
- Another workshop was held in as a part of the AMS Conference in January 2018 in **Austin, Texas**
- GFDRR-WBG is conducting another event in InterMet Asia 2018 in **Singapore – most intensified**
- Next Opportunity will be at the IFMS General Body Meeting in **Budapest** in Sept, 2018 concurrently with EMS Conference followed by one in **Met-Tech Amsterdam**

# What is Required to be done? Collaboration Between PPA

- In early 2000s, when US Weather Enterprise went through the Conflict period between PPA Sectors, they organized a Committee to discuss the issues.
- **“Fair Weather Report”** was created which recommended a framework for PPA Collaboration and also recommended that AMS provide the infrastructure for discussions and Arbitration when required. 
- This was implemented and is working very well and has brought PPA collaboration to a new height which should act as a model for others.

# How can IFMS Help in Strengthening GWE

- 
- **IFMS plans to assist WMO and WBG in their effort to strengthen this collaboration.**
  - **Since all three sectors (PPA) are members of the NHMSocs, these societies can play an important role in creating collaboration between PPA Sectors.**
  - **With AMS already playing such a role, with its assistance, IFMS can act as mentor and advisor of these societies.**
  - **IFMS is ready to play an important role in strengthening GWE.**

# Conclusions

- In order to strengthen GWE it is important to create a meaningful collaboration between PPA Sectors
- **No nation, by itself, can resolve all the problems, nations must collaborate – ECMWF is a great example of such a collaboration on European Level**
- Nations need to be convinced about the value of PPA collaboration
- **Infrastructure to meet the basic requirements of Forecast Model is required.**
- IFMS having membership from PPA Sectors, is ideally suited to play an important role to support WMO/WBG
- **WMO/WBG should see the great value in strengthening IFMS because it provides substantial expertise and volunteer manpower – bigger bang for every \$ spent!**