Promoting Mitigation Actions through Measuring, Reporting and Verification (MRV) System, ISAP, 29 July 2015, Yokohama, Japan

Role of MRV and necessary condition to address Climate Change

Akio Takemoto (Ph.D.)

Director

Research and Information Office, Global Environment Bureau

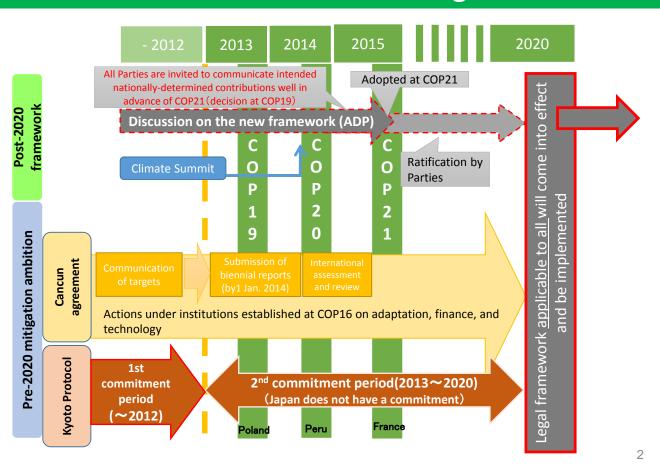
Ministry of the Environment, Japan

E-mail: akio_takemoto@env.go.jp



APN

Timeline of International Negotiations

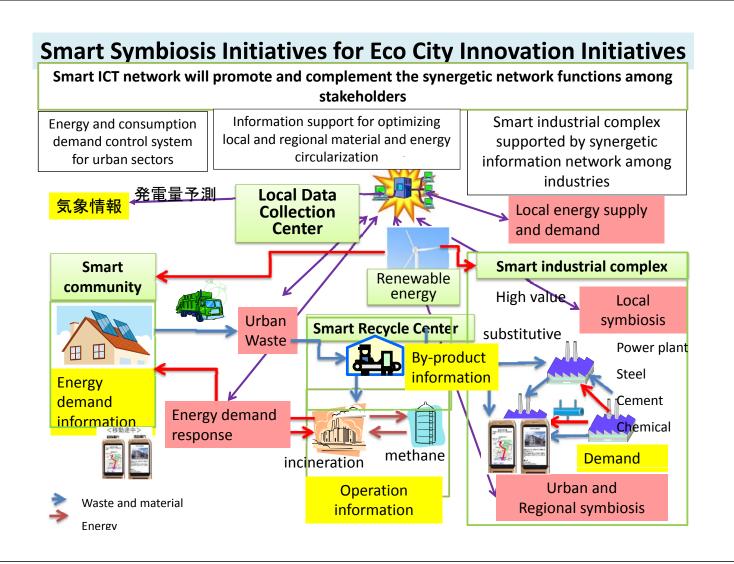


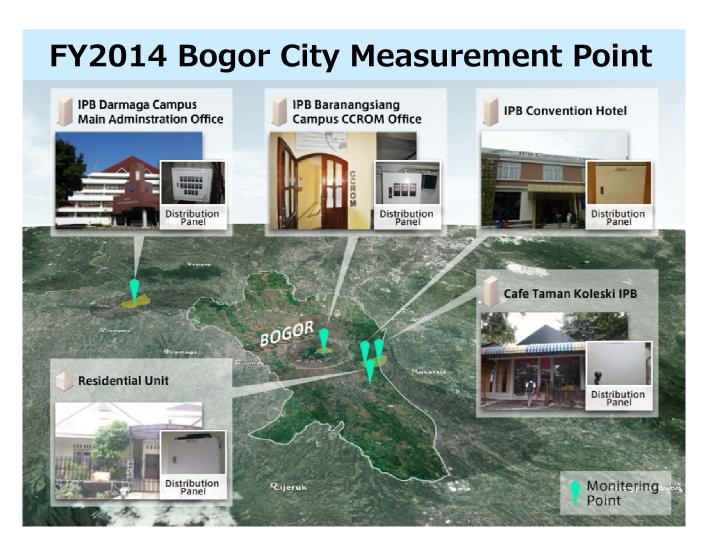
Key points

- Data and information are fundamental to take mitigation actions
 - GHG inventories; emission by sources, removal by sinks, (can't manage what you don't measure)
 - Energy supply and consumption
 - technology
 - Economic and social condition
 - Good practices, lessons learnt
 - Lack of capacity to collect and analyze data

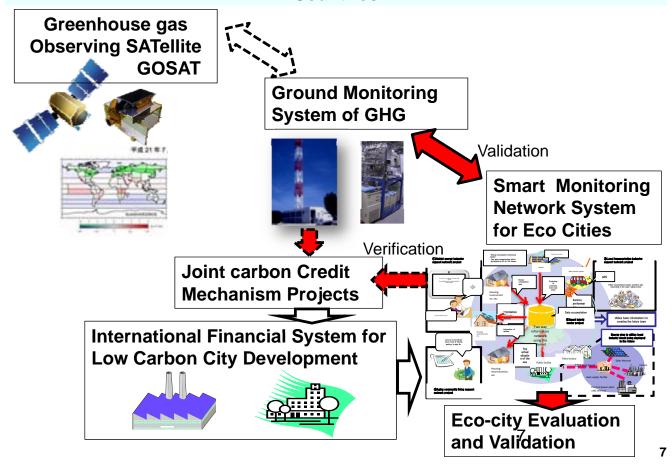
Key points

- Lack of data and information is a major barriers to enhance mitigation actions in developing countries
- Capacity to collect, analyze, access to data and information should be enhanced
- Scientific capacity, to conduct research, survey, monitoring should be also enhanced
- MRV system requires innovation
- Newly launched projects to develop monitoring, modelling and verification (MMV) system in Indonesia has a big potential to innovate climate mitigation measures in Indonesia and other developing countries





Innovative Monitoring and Reporting, Verification System in Asian Countries



Global environmental monitoring for climate change policies



Science is basis of and indispensable to climate change policy. Therefore, we should understand science on climate change.

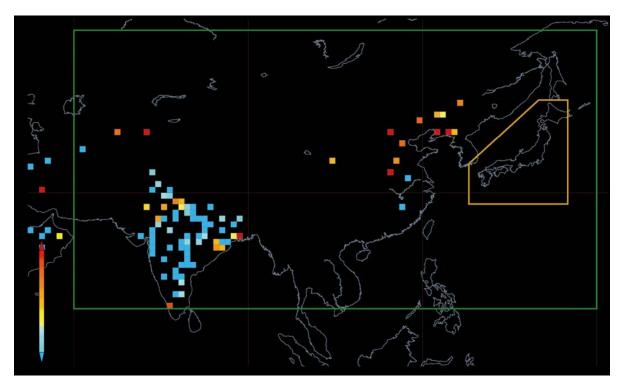


Figure 1. Distribution of anthropogenic CO₂ concentrations based on the observational data acquired from GOSAT. The concentrations are shown by colors.

Comments at Low Carbon Asia Research Network (LoCARNet) 3rd
Annual Meeting, 25 November 2014

- CO2 and Methane observation with GOSAT is
 - Sparse monitoring to scanning monitoring.
 - Verifying ground observation
- New 10 year space development plan will be formulated soon, GOSAT-2 will enable us to monitor the GHG emissions in more detail that could be used for mitigation measures (validate emission reduction fro industrial complex and commercial areas, validate national, local GHG inventories)
- Big potential to utilize satellite observation data for REDD+ under the UNFCCC
- MOEJ wiling to establish G-G cooperation to develop the MMV system for promoting mitigation policies and measures in partnering countries, in particular, JCM and REDD+

Key points

- Monitoring, modeling, verification, survey, research,
 Need Fund
- Strategic approach for enhancing scientific capacity includes the following;
 - i. developing country governments will establish national environmental research funds
 - ii. regional /international funding agencies will facilitate developing countries to establish /enhance national environmental research finds
 - iii. regional / international funding agencies and national governments will link the research funds with each other.

Case of Japan (Ministry of the Environment)

Domestic research programme

- Global Environment Research Fund (since 1990), integrated to Environment Research and Technology Development Fund (ERTDF)
- Budget: JPY 5,3 billion (FY2014)
- Annual call for proposals submitted by research in Japan, peer review process
- Thematic areas;
 - · climate change
 - 3R (waste management & recycle)
 - biodiversity and ecosystem
 - Safe and secure society
 - Strategic Research and development
 - cross cutting



Asia-Pacific Network for Global Change Research

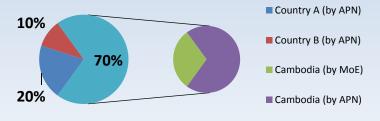
- Inter-governmental Network of 22 member countries
- Funding Agency for Global Change Research
- Established in 1996, Hyogo Prefecture hosted the Permanent Secretariat since 1999
- financial contribution support by Japan, USA, Republic of Korea and New Zealand



Co-financing Partnership between MOE Cambodia and APN

- Partnership established on 10 July 2014;
- Term of partnership: July 2014 to June 2019;
- Scope of partnership (year 1): CAPaBLE, CAF, other partnership activities;.

CAPaBLE/CAF Contribution breakdown (example)



Other Collaborative Activities (example)



Provided by APN Secretariat (Sep. 2014)

Thank you so much for your attention!