





#### **GEO Carbon and GHG Initiative**

Report from WG 3

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## GEOSS ASIA-PACIFIC SYMPOSIUM

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# Working Group 3





#### **GEO-C: from Observations to Decisions**

#### **Communication**









**SBSTA** User engagement

> Framework Convention on Climate Change







Knowledge

**Decisions** 



**Services** 

¶ G€O



Data sharing

management (incl. metadata)



knowledge

From data to

Improve data harmonization Improve inter-operability Improve data accessibility **Data Citation** 





Sustainability

Identifying observational gaps

## Capacity building

# **Group on Earth Observations**

Our priorities

#### What are GEO's priorities?

GEO's global priorities include supporting the UN 2030 Agenda for Sustainable Development, the Paris Agreement on Climate Change, and the Sendai Framework for Disaster Risk Reduction.





Disaster Risk Reduction 2015 Sendai Japan





## **Paris Agreement**



#### **Article 4 and Article 13 – National Reporting**

- Reported five-yearly by parties, successive reductions in emissions
- Using existing methods and guidance; not validation



Knowledge of evolution of sinks and sources



#### **Article 7 Adaptation**

- (7.6) Strengthening cooperation,
- (7.7c) Research, systematic observation

**Article 10 Technology Transfer** & Article 11 Capacity Development

#### **Article 14 Global stocktaking**

in the light of equity and the best available science: 2023, 2028...

#### **Article 15 Compliance**









## Situation in Asia-Pacific

- AP region plays an important role in the global C-cycle and GHG emissions and sinks
- Many AP research institutions (agencies, organizations, etc.) involved in C & GHG observations and analysis
- Considerable efforts (satellites, in situ, modelling)
  - Need for an integrated approach: in situ / satellite / inventory, across scales (time, spatial), domains (atmosphere, land, ocean) systems and processes (ecophysiology, ecology, earth system)



## Situation in Vietnam

- Vietnam is a growing country and this growth has big impacts on the environment (urbanization; increasing emissions)
- Research and observations in Vietnam are significantly increasing and provide valuable information to be more exploited in the global context
- Need to improve integration and interoperability
- Identify a proactive Vietnam representative for GEO-C





## Global initiatives

Integrated Greenhouse Gas Information System (IG3IS)





Global Carbon Project (GCP)



☐ Provide opportunities for countries in the Asia-Pacific Region



## **Greenhouse Gas Inventories**

#### National perspective

- Considerable EO efforts but unsynchronized application, research and EO National Strategy
- Institutional and juridical issues of data (official statistic data is the only sources,
   EO considered as non-official sources)
- Gap between EO and GHG Inventory community



Framework Convention on Climate Change

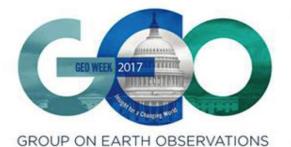
#### 2019 Refinement of the 2006 IPCC Guidelines

- Opportunities for EO
- Technology has advanced significantly (new satellite missions etc.)
- Long-term goal: confirm anthropogenic source by global observations
- Need to strengthen dialogue between EO and inventory community; initial discussion started









# INSIGHT FOR A CHANGING WORLD GEO WEEK 2017 23-27 OCTOBER 2017



## **Thank You**

Communicate and Collaborate with GEO:











