

WG4; Ocean Observation and Society

Co-Chairs;

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Outline of the session

Opening remsrk; re-consider social driver of ocean observation
to make more contribution to Green Growth
(ECVs for climate to EOY for other drivers)

Session 1: Present status of Ocean observation (GCOS oriented projects in blue water)

**Argo/Repeat Hydrography/Buoy array and their
Data System** **3 talks**

Session 2: Present status of Ocean observation (Regional/domestic projects in green water)

Regional Observing/Data System **3 talks**

Session 3: Toward Social benefits (Linkages b/w Observation/Societal Benefit)

**Lesson from actual cases of ocean services for
the society** **5 talks**

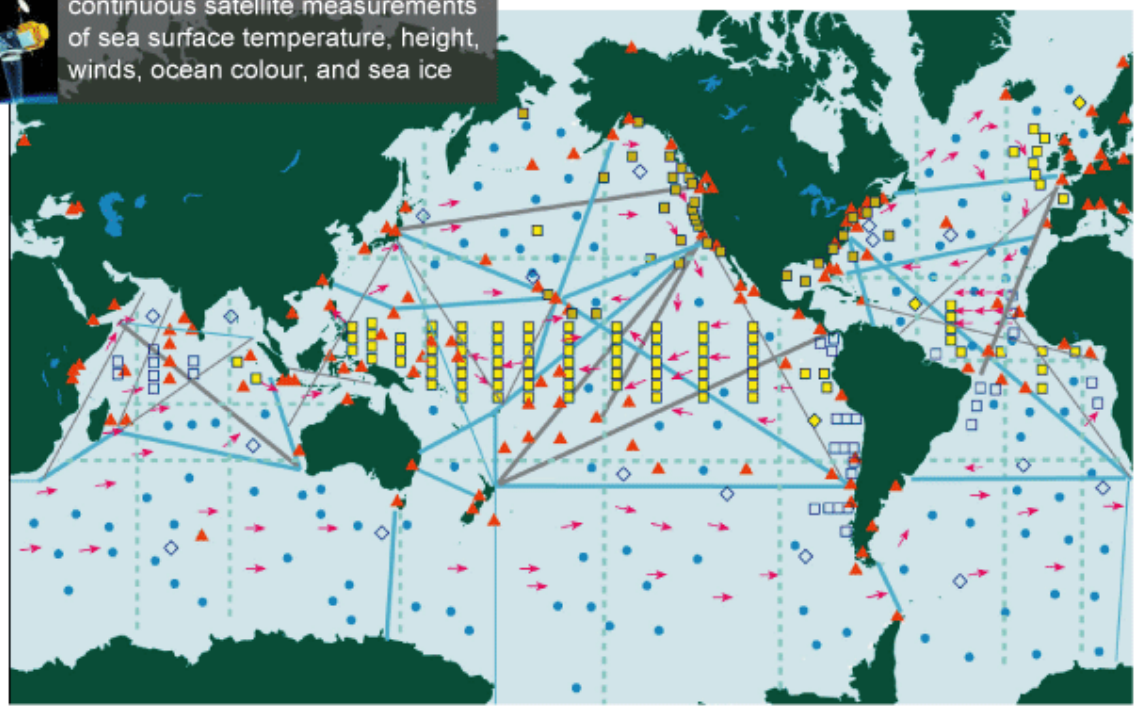
Initial Global Ocean Observing System for Climate







Status against the GCOS Implementation Plan and JCOMM targets

continuous satellite measurements of sea surface temperature, height, winds, ocean colour, and sea ice

Total *in situ* networks **65%**

March 2012



- 
87% Surface measurements from volunteer ships (VOSclim)
 200 ships in pilot project
- 
100% Global drifting surface buoy array
 5° resolution array: 1250 floats
- 
62% Tide gauge network (GCOS subset of GLOSS core network)
 170 real-time reporting gauges
- 
81% XBT sub-surface temperature section network
 51 lines occupied
- 
100% Argo profiling float network
 3° resolution array: 3000 floats
- 
43% Repeat hydrography and carbon inventory
 Full ocean survey in 10 years

Reference time series 24%
 58 sites

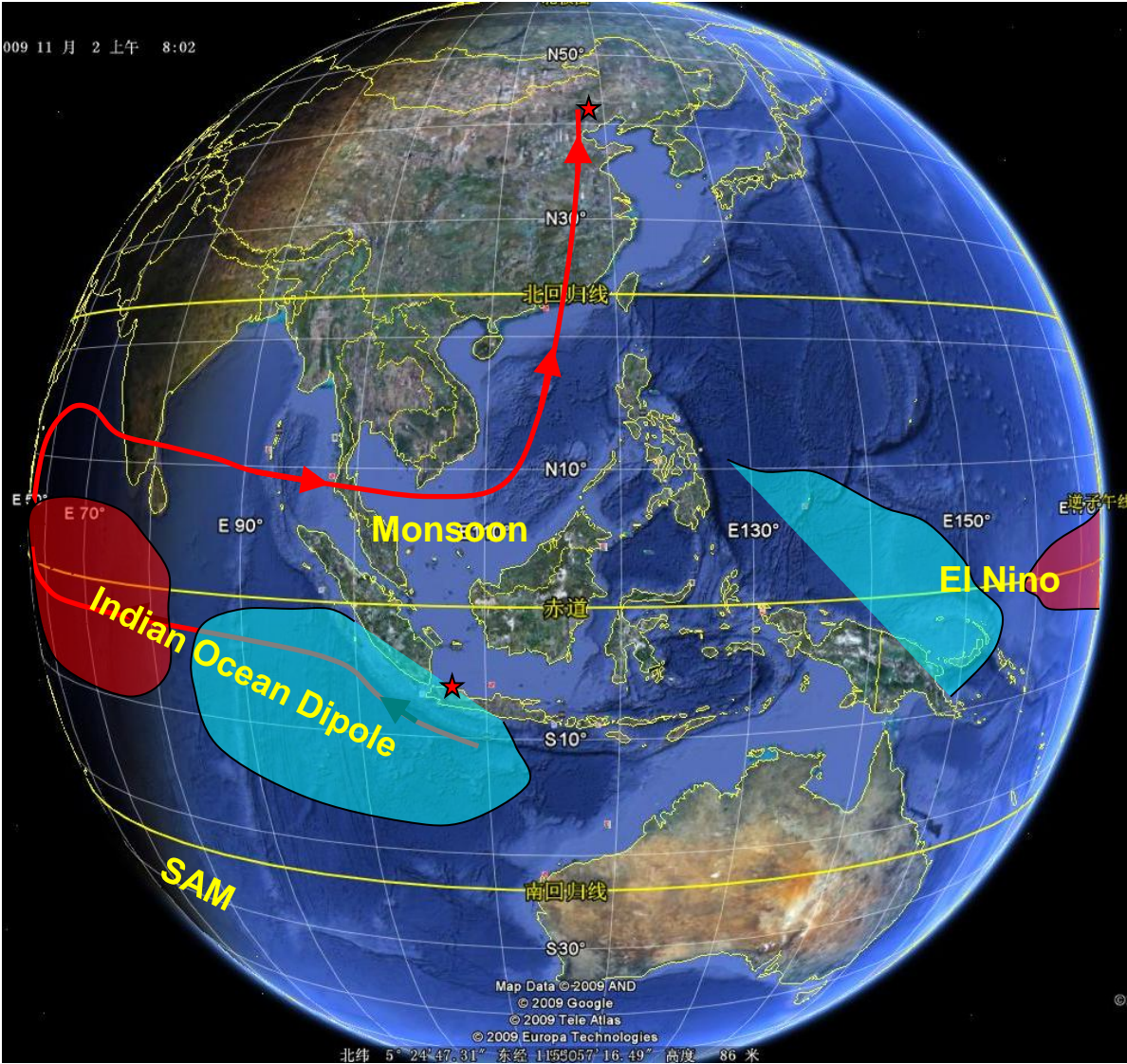
48% Global reference mooring network
 29 moorings planned

79% Global tropical moored buoy network
 119 moorings planned

- A total of 8483 in situ platforms are maintained globally.
- Of these, 4207 are supported by NOAA.



Scientific Driving for FIO's Indian Ocean Concern

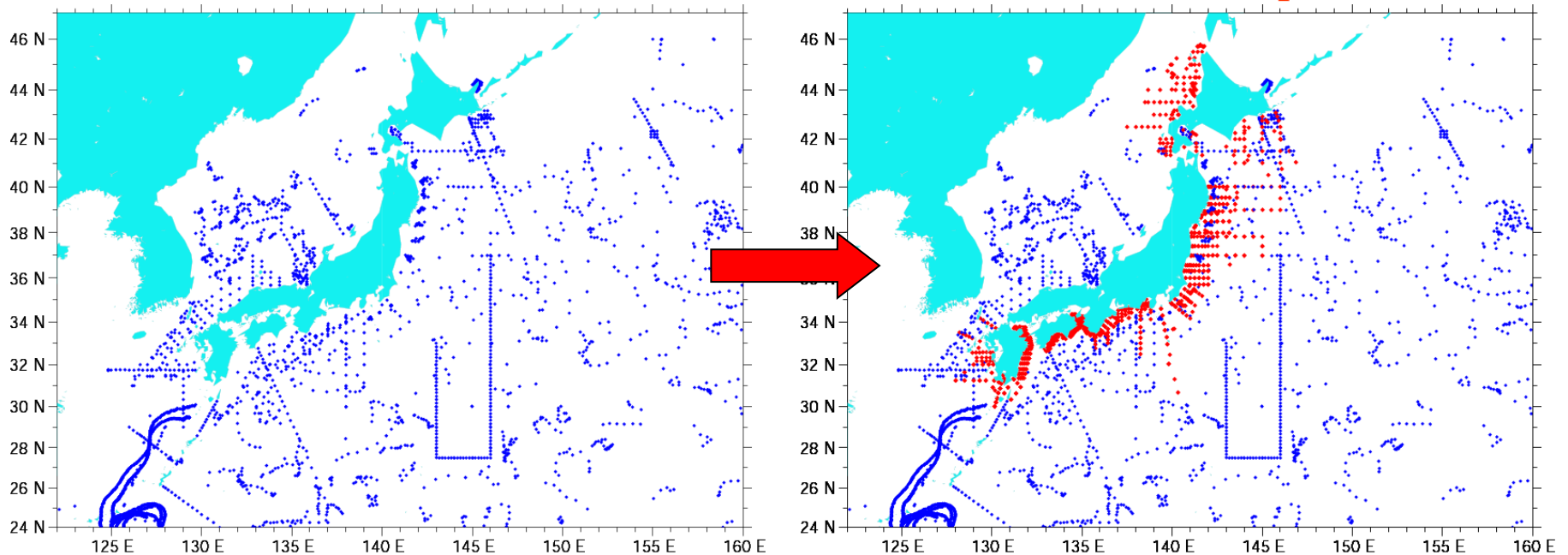


Effect on introduction of FRA-uploader

Real Time GTSP data 2008.Aug-Sep

● GTSPP without Japanese
Prefectural Fisheries Institute

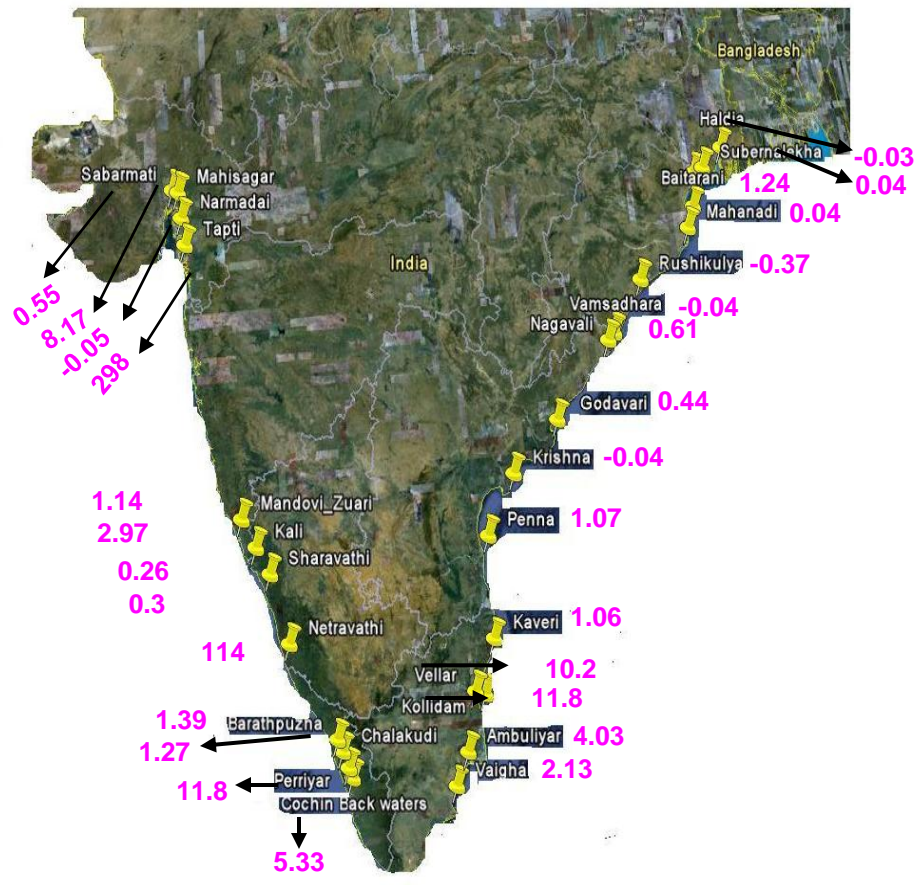
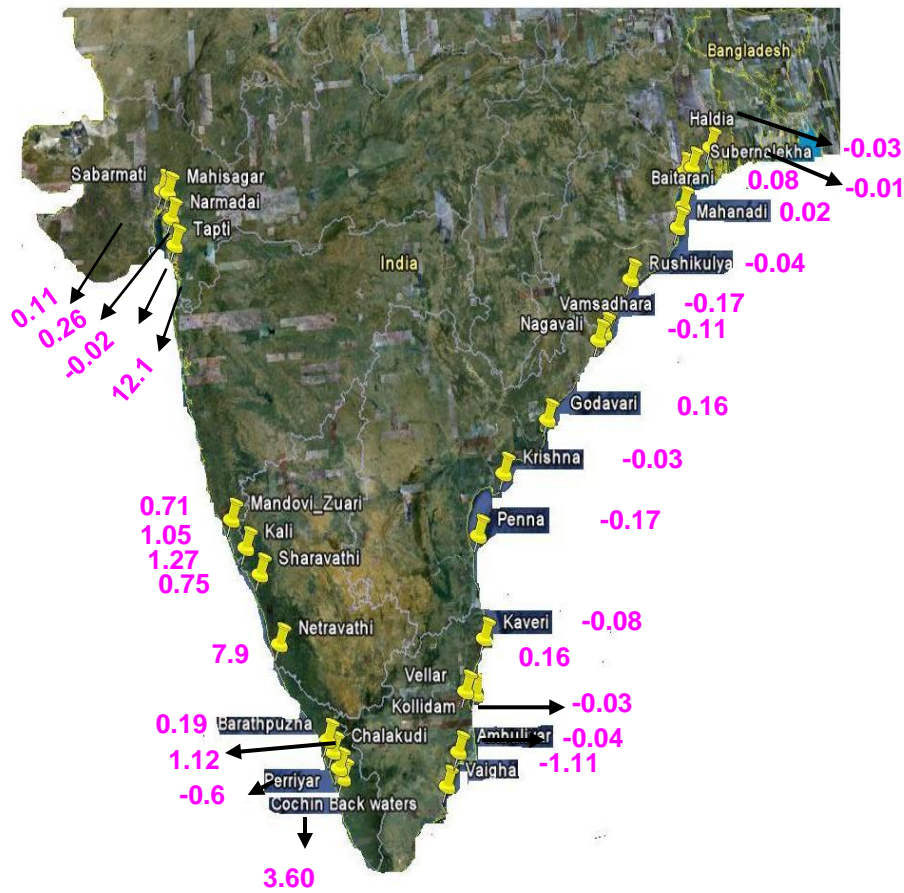
● + ◆ Prefectural Research
Institute via FRA-uploader



Fluxes of CH₄ and N₂O from the Indian Estuaries

N₂O-Flux(μmole m⁻² Day⁻¹)

CH₄-Flux(μmole m⁻² Day⁻¹)



Points for Discussion

- **What contribution can we do to Green Economy?**
- **What kind of data sharing is needed to attain the real contribution?**
- **What action is needed?**

Session 4: Discussion to wrap-up WG4 (1)

- **Definition of “Data Sharing” is recognized as every data which we can use and are shared with many countries not only for science community but also regional society.**
- **At least, every data which observed by each GOOS observation projects in each areas is needed. Common part is not only climate data but also biogeological or biochemical or biodiversity data etc if we think to contribute to the Green Glowth.**

Points for Discussion

Session 4: Discussion to wrap-up WG4 (2)

- **If we could show how the product by using regional data could be beneficial for country and what data would be needed for improvement of our capability, they could be good materials in order to convince the government for sharing the data.**
- **It means that *Societal Driver* should be widely adapted by regional countries and Asia Pacific country should recognize that coastal management cannot be carried out by one country because other country's coastal data is needed for the prediction.**

Points for Discussion

Session 4: Discussion to wrap-up WG4 (3)

- **Our final goal is making open and free data policy but still there are lots of lacks of data.**

Even though a sustainability of open ocean observation is still challenge, we need to raise the recognition of needs of ocean observation more high. Because open ocean relates to regional ocean and it is good channel.

Points for Discussion

Session 4: Discussion to wrap-up WG4 (2)

Actions to be take

▪ **Regional alliance is important for exchanging information in Asian Pacific region. In order to vitalize such framework, as for one of conclusive action plan of the WG, statement which is endorsed by GEOSS AP symposium WG4 should be made and submitted to next WESTPAC/IOC meeting in May to ask if WESTPAC could consider the importance of establishment of APCOIC as the first step of coastal data dissemination in Asia-Pacific region .**

