

http://gcos.wmo.int





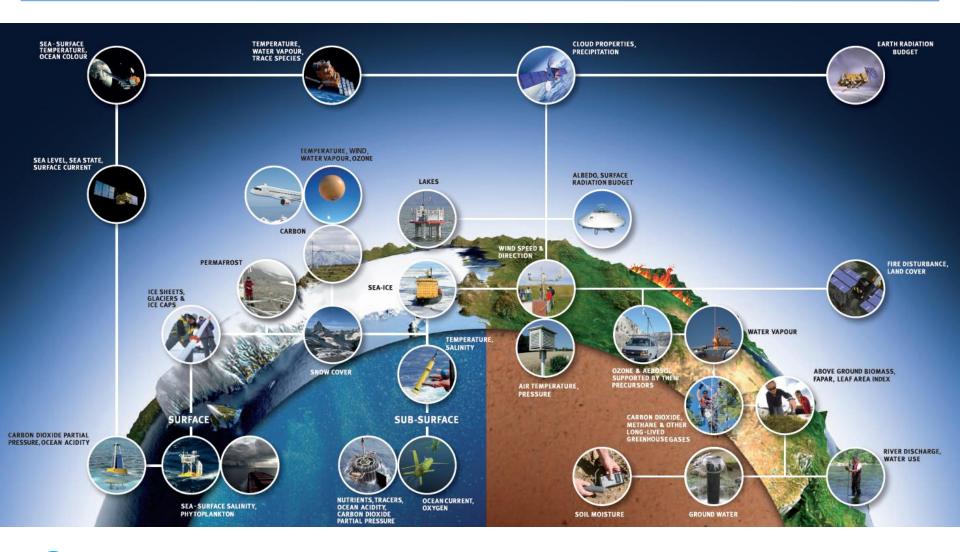




# Report from the joint GCOS/GOFC-GOLD Workshop on 'Observations for Climate Change Mitigation'

Carolin Richter, Director, GCOS Secretariat SBSTA40 – Research Dialogue 7 June 2014, Bonn, Germany

# **Global Observing Systems for Climate**







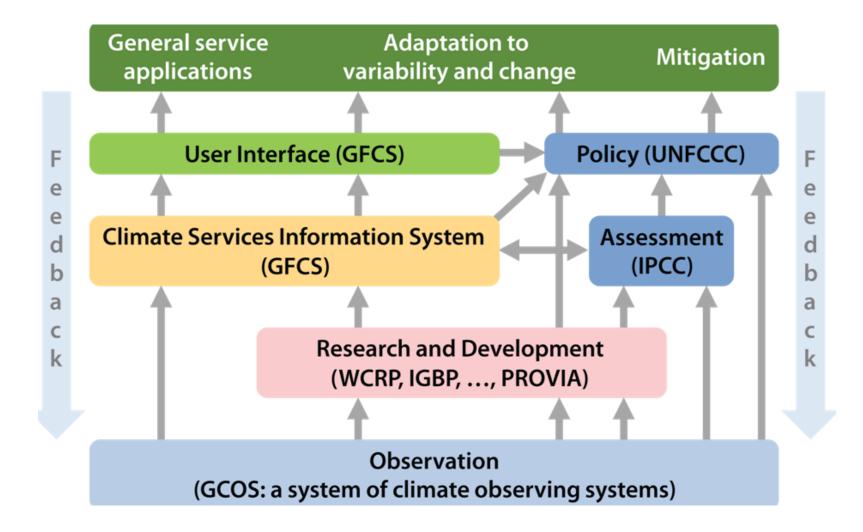








# **Global Framework for Climate Services**

















# **Observation requirements**

Common themes regarding observation requirements for both adaptation and mitigation to climate change identified by the GCOS community:

- → Need for higher spatial and temporal resolution;
- → Need to focus on regions where climate change will have significant sector effects and where there are vulnerable populations;
- → Need to develop infrastructure and governance to support sustained data rescue;
- → Need to support research initiatives such as PROVIA and Future Earth.













# **Observation requirements for mitigation**



GCOS, in collaboration with the Land Cover Project Office from the Global Observation for Forest Cover and Land Dynamics (GOFC-GOLD), has organized an international workshop to consider the climate observation requirements to support mitigation to climate change mitigation.

GCOS Workshop on Observations for Climate Change Mitigation

> Geneva, Switzerland 5–7 May 2014

Co-sponsored by the Land Cover Project Office of the Global Observation for Forest Cover and Land Dynamics (GOFC-GOLD) Programme



- + Focus on Land Use (Agriculture)
  and Forest
  - + Representatives from UNFCCC, FAO, ICRAF, ESA, IPCC, etc.

#### Workshop website:

http://www.wmo.int/pages/prog/gcos/index.php?name=ObservationsforMitigation











# Observations for climate change mitigation

- → What kinds of data are required to improve mitigation design, implementation and impact assessment?
- → How do existing networks need to be improved in order to derive information to design and implement mitigation measures?
- Which are the regions in particular need?
- → On which scale should mitigation measures be assessed, and which sort of observational scale should be requested?
- → With regard to the list of ECVs and available products in the CEOS-CGMS ECV inventory, what gaps do currently exist in data provision?



Even when it's raining data, there is an information drought.













# Next Steps – Strategy on evolving data needs for mitigation

- → Identification of evolving data needs for different sectors: forest related (REDD+), NAMA related, cross-cutting, etc.
- → Current ECV activities are not targeted for land-based mitigation → Need for revision of ECV actions, and potential amendment.
- → Generating a full global land use map that tracks the change over time, using the six IPCC land use categories (forest land, cropland, grazing land, wetlands, settlements, other land).
- → Development of a consistency among mitigation-relevant (terrestrial) ECVs for IPCC-GPG-based estimation and UNFCCC reporting.













#### **Actions**

We need to foster the dialogue between stakeholders:

- UNFCCC and Parties, GCOS, IPCC

We need to map stakeholder's requirements.













# **GCOS-IPCC-UNFCCC Workshop**

"The 5th Assessment Report of IPCC – Response from GCOS and UNFCCC on Uncertainties in Observations and Needs for Research – Focus on impacts, adaptation and vulnerability"













- Coordinated, comprehensive observations are the nervous system of any Earth information system.
- Observations are needed by global and regional models to support and verify climate models to reliably assess present extremes and projections needed to make the right adaptation decisions.
- Data driven analysis and synthesis using an agreed framework such as the IPCC GPG, is an evolving requirement for ECV monitoring in the context of mitigation.











