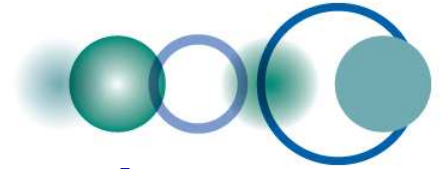


GEO, the Group on Earth Observations

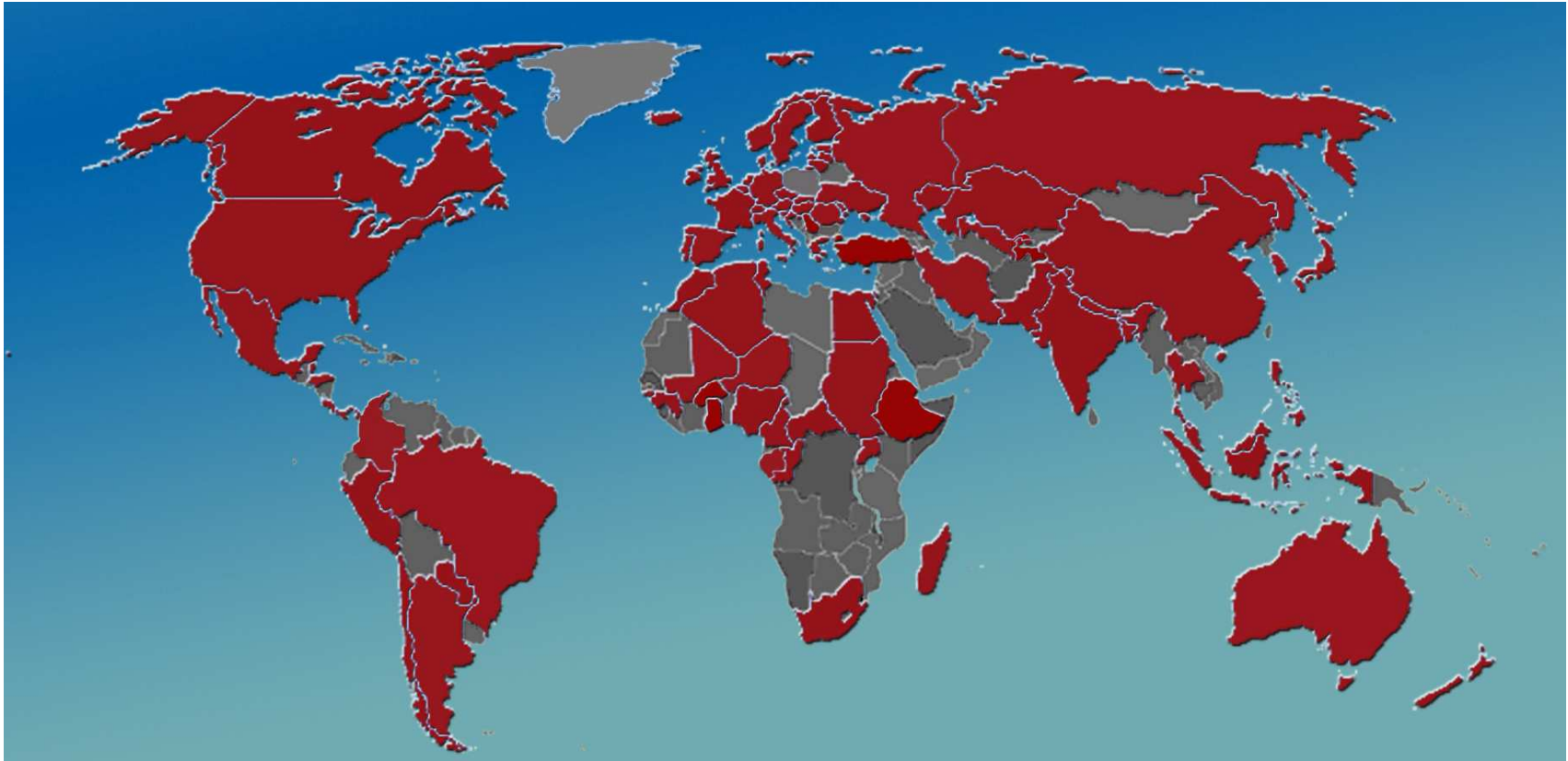
An introduction

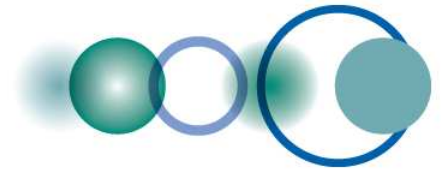




GEO, the Group on Earth Observations

An Intergovernmental Organization with 88 Members
and 64 Participating Organizations

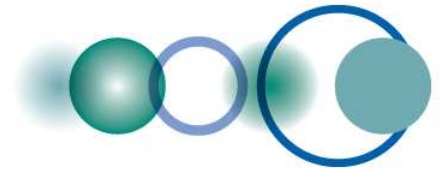




The GEO vision

**THE GLOBAL EARTH OBSERVATION
SYSTEM OF SYSTEMS**





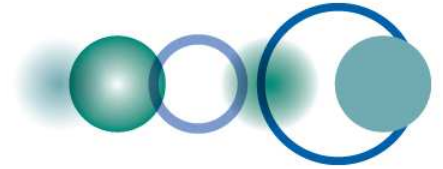
Supporting UNFCCC through carbon monitoring

There is limited understanding of the changing state and dynamics of the world's forests.

Therefore high uncertainty on the amount of GHG the forests release to the atmosphere.

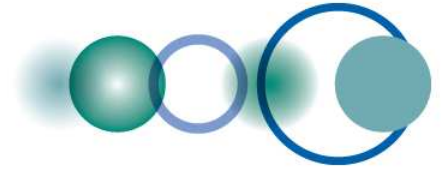
Fourth Assessment report (2007) suggests that 20% of global GHG emissions are from deforestation, forest degradation and land use change

Supporting UNFCCC through carbon monitoring



Understanding the global carbon cycle and predicting how it will affect future climate change is a major scientific challenge.

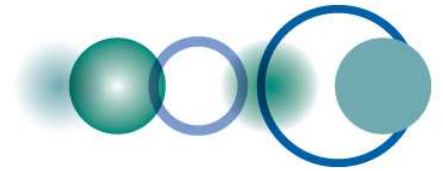
The lack of data about how much carbon is absorbed by sinks and emitted by sources is a key cause of uncertainty in climate change scenarios.



Supporting UNFCCC through carbon monitoring (cont.)

Better data are also needed for the implementation of national MRV (Measurement, Reporting and Verification) systems for forest, addressing REDD+.

As part of its commitment to addressing the challenge of climate change, GEO is coordinating two major carbon monitoring activities, the **Global Carbon Observation and Analysis System** and the **Global Forest Observations Initiative**.

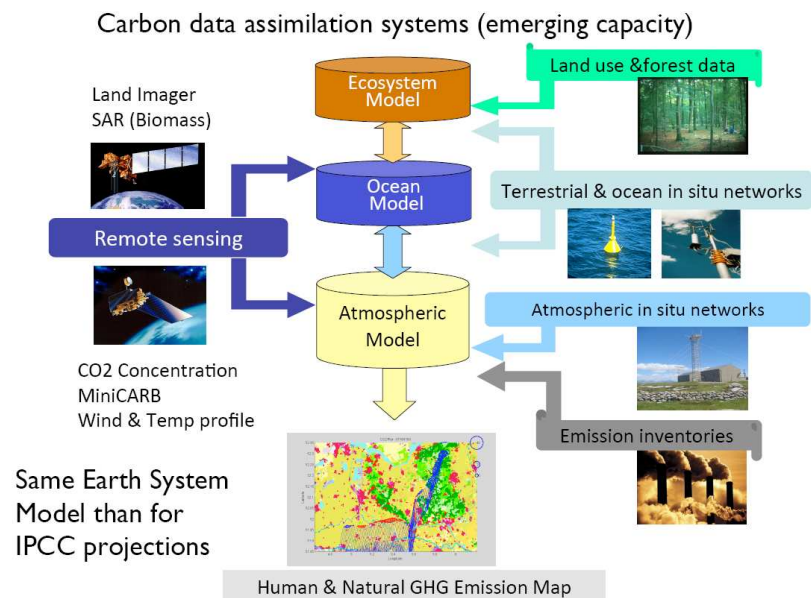


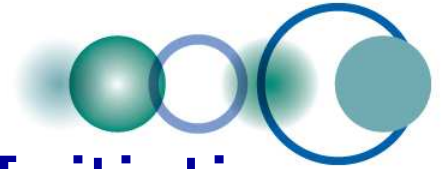
The Global Carbon Observation and Analysis System

It seeks to integrate satellite observations with in-situ observations from flux towers, tall towers, aircraft and “ships of opportunity”.

It is bringing together systems and experts that monitor carbon flows on land, in the oceans and in the atmosphere.

The key outputs will include improved estimates of the carbon budget at different scales (from global to regional to national) and reliable information for decision-makers.

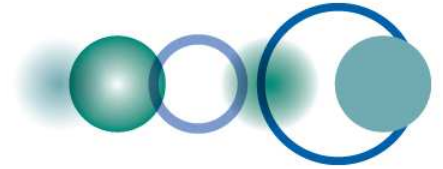




The Global Forest Observations Initiative

GFOI seeks to address national needs for sustained forest observations based on agreed data sharing principles, a portfolio of consistent and comparable methodologies, and coordinated and sustained satellite and in-situ observations.

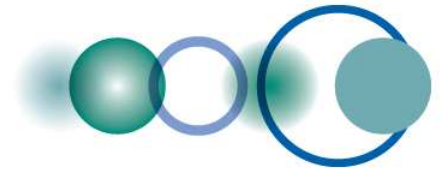
GFOI builds on and extends the results and continued demonstration activities of the GEO Forest Carbon Tracking - FCT Task, which is testing and comparing the use of various observations, models, tools and methodologies that countries could use to track forest carbon.



GFOI

The Global Forest Observations Initiative (Cont.)

GEO FCT objective is to demonstrate that coordinated earth observations from satellites, validated by in situ measurements and incorporated into models, can provide reliable, accurate, consistent and continuous information as the basis for the monitoring component of national MRV systems.



The Global Forest Observations Initiative (Cont.)

Thank you