

# FAO's experience with the quality assurance of the national GHG inventories



Martial Bernoux MICCA programme - FAO Climate and Environment Division



### Background

 In 2017 FAO and UNFCCC signed a Memorandum of Understanding to join forces to support countries in meeting the commitments of the Paris Agreement

For the AFOLU sector FAO provides:

- Technical experts to carry out the quality assurance of the national GHG inventories
- Trainers for the workshops on the 2006 IPCC Guidelines for National Greenhouse Gas Inventories
- Tools and methodologies to enhance MRV system of the sector



### Why working on AFOLU?

- AFOLU represents the 2<sup>nd</sup> source of emissions after energy
- Globally accounts for 20-25% of emissions, 50% in developing countries
- Agriculture is dramatically affected by climate change
- One of the most frequently included sector in NDCs
- AFOLU related GHG emissions expected to continue to grow given increasing global population and food demands







# Why the AFOLU in the GHG inventory?

- Lack of data is the major concern, in terms of frequency and quality, compared to the other sectors
- Emission estimates from the sector present large uncertainty
- In several NDCs, AFOLU is not included due to the limited capacity to identify baseline and target
- At country level, all above are limiting factors to address transparency
- Collectively, AFOLU could affect the results of the global stocktaking







### Quality Assurance: FAO's experience

- QA process often reveals issues linked to poor institutional arrangements
- AFOLU perceived as a challenging sector with real difficulties for implementing transparency
- Open discussion among experts eager to improve their knowledge and capacity
- FAO receives recognition as trustable technical partner for countries support on AFOLU-related GHG emissions
- Based on the result of this experience, FAO helps countries to leverage climate finance, including CBIT

Papua New Guinea



**Argentina** 





### FAO CBIT-AFOLU — Objective

To enhance developing countries technical and institutional capacity to meet the requirements under the Paris Agreement Enhanced

Transparency Framework (ETF) with strengthened

- agriculture and land use sector components; and
- information necessary to track progress against priority actions identified in their NDC for these sectors.





## The Capacity-building Initiative for Transparency

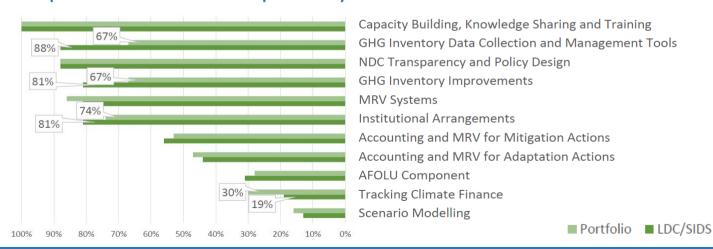
- Decision 1/CP.21 paragraph 84
  - Established the Capacity-building Initiative for Transparency (CBIT) in order to build institutional and technical capacity, both pre- and post-2020
  - Parties agreed to establish a new CBIT Trust Fund under the GEF-6 (and continued also under the GEF-7)
- Modalities, procedures and guidelines (FCCC/CP/2018/L.23)
  - o COP requested the GEF to continue to support the operation of CBIT



Further information: www.thegef.org/topics/capacity-building-initiative-transparency-cbit

#### **CBIT Aims:**

- Strengthen national institutions for transparency-related activities in line with national priorities
- Provide relevant tools, training and assistance for meeting the provisions stipulated in Article 13 of the Paris Agreement
- 3. Assist in the improvement of transparency over time





### FAO CBIT programme – Status

- FAO has developed two global projects (1 operationally active focusing on AFOLU with 10 pilot countries; 1 concept approved on forest)
- FAO has developed several CBIT projects at national level (3 operationally active Cambodia, Mongolia and Papua New Guinea; 5 concept approved Afghanistan, Bangladesh, Cuba, Nicaragua and Sri Lanka)
- FAO has been requested to support the development of other CBIT projects at national level (Benin, Equatorial Guinea, Ukraine and Uzbekistan)



### FAO CBIT-AFOLU — Components

Component 1 Institutional arrangements for enhanced transparency

Component 2a Transparency for measuring, reporting and verifying (MRV) mitigation actions

Component 2b Transparency for monitoring and evaluating (M&E) adaptation progress

Component 3 Global knowledge sharing and coordination amongst transparency practitioners (only global)



#### FAO Global CBIT-AFOLU — Modalities

- Stand-alone tools improved and/or designed to help countries to overcome the challenges posed by the ETF in the agriculture sectors;
- Pilot actions aimed at validating and refining the tools while stimulating country-level capacities to comply with ETF in the agriculture sectors;
- Coordination and dissemination of knowledge and tools across a wide range of platforms and networks to ensure a broad outreach.









## Tools – Institutional Arrangements & Data

- Ad-Hoc AFOLU Institutional Arrangements template: based on existing templates with a careful look at the peculiarity of the AFOLU sector
- Legal instruments: An overview of different options to facilitate data sharing among AFOLU-involved stakeholders
- Institutionalize data collection: A guidance to set-up a recursive survey on GHG-related data for supporting the compilation of the needed info for estimating AFOLU sector emissions



#### Tools – MRV

 AFOLU MRV Guidance: guide stakeholders in the measuring, reporting and verification process of mitigation actions in the AFOLU sector



- E-learning on "Sustainable National GHG Inventory in AFOLU" Learning curriculum offering an overview of National GHG Inventory and its implementation for the AFOLU sector
- Land Representation Matrix: built upon Collect Earth for an easier development of land representation and its matrix and therefore facilitate the estimated of GHG emissions from forestry and other land use







#### Tools – MRV

- QA/QC and Verification tool: allows the comparison of national GHG inventory data for the AFOLU sector under UNFCCC with data from the FAOSTAT Emissions Database;
- Ex-Act: designed to support project designers to estimate (ex-ante) and prioritize project activities with high benefits in economic and climate change mitigation terms;
- GLEAM: designed to estimate GHG emissions from livestock project activities with high benefits in economic and climate change mitigation terms.

ALLOCATION

POST-FARM EMISSION



#### Tools – M&E

- Technical Guidance Note on "Strengthening M&E for adaptation in the agriculture sectors" that focuses on how adaptation can be integrated into existing agriculture sectors M&E frameworks and how agriculture sectors can be integrated into national adaptation M&E frameworks
- M&E Training Package composed of several modules, presentations, exercises and case studies to be delivered during a three- to four-day workshop to help draft an adaptation M&E framework/system and work plan for the agriculture sectors to be validated through a consultative process.



#### Tools – *NDC*

- NDC navigator: A tool that will allow users to navigate the different components of countries' NDCs at national and aggregated level, with a closer look at the agriculture sectors;
- AFOLU NDC tracking: A tool that will allow users to track NDC's AFOLU sector implementation through quantitative and qualitative indicators;



#### Coordination and dissemination

- Network with two types of members
  - Internal
    - FAO CBIT-AFOLU countries (pilot countries in the global and countries with national projects)
    - FAO NDC-related support: Nap-Ag, NDC-P TWG on Agriculture, Collect Earth and the Global Strategy for Rural Statistics
  - External
    - Other CBIT implementing agencies on agriculture-related topics
    - National CBIT projects with an interest in agriculture
- Global Coordination Platform
- Other Transparency Initiatives (i.e. PATPA, ICAT)









#### FAO CBIT-AFOLU Global — Pilot Countries

#### Confirmed

Country	Continent	Region
Malawi	Africa	Eastern Africa
Mozambique	Africa	Eastern Africa
Zambia	Africa	Eastern Africa
Zimbabwe	Africa	Eastern Africa
Sudan	Africa	Northern Africa
Guinea	Africa	Western Africa
Mali	Africa	Western Africa
Senegal	Africa	Western Africa

#### Under discussion

Country	Continent	Region
Brazil	Americas	South America
China	Asia	Eastern Asia
Indonesia	Asia	South-Eastern Asia
India	Asia	Southern Asia
Nepal	Asia	Southern Asia
Dominican Republic	Americas	Caribbean



### THANKS FOR THE ATTENTION



Contact: MICCA@fao.org