



Case study

Ghana

Establishing a multi-purpose national forest monitoring system to improve land use monitoring capacities in Ghana

Strengthening the accessibility and accuracy of forest-related data for meeting national and international climate targets

Context

In the Republic of Ghana, forest degradation and deforestation are driven primarily by unsustainable logging and fuelwood harvesting, agricultural expansion, and shifting cultivation. Since 2008, Ghana has implemented activities for reducing emissions from deforestation and forest degradation (REDD+). In 2016, a REDD+ strategy was developed which serves as a roadmap to undertake REDD+ programmes across the landscapes of Ghana. One such programme, is the Ghana Cocoa Forest REDD+ Programme, the world's first commodity-based emission reduction programme. It is jointly coordinated by the National REDD+ Secretariat (NRS) of the Forestry Commission (FC), and Ghana's Cocoa Board in partnership with the private and public sectors, civil society, traditional authority, and local communities. The goal of the programme is to reduce deforestation and forest degradation by promoting climate-smart cocoa production, landscape level land-use planning, strategic policy reforms, integrated coordination and monitoring, law enforcement, and risk reduction efforts within priority Hotspot Intervention Area landscapes. Currently, the country is transitioning to performance-based REDD+. In 2019, Ghana signed a five-year Emission Reduction Payment Agreement with the World Bank's Forest Carbon Partnership Facility Carbon Fund (FCPF). Under this agreement, Ghana has received an advance payment of USD 1.3 million from a USD 50 million agreement for results-based payments for REDD+.

Challenges

The main challenges are linked to the lack of sustainable and predictable funding for the National REDD+ Secretariat and REDD+ investments. The current financial support is largely donor-dependent. The establishment of the national forest monitoring system (NFMS) will require institutional support and capacity for data processing and analysis.

Replicability and upscaling

As part of the NFMS, the Forestry Commission developed 12 standard operations procedures and user manuals to guide the development of activity data and emission factors, and to ensure that methodologies are transparent and up-to-date.



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Actors and stakeholders

The FC under the Ministry of Lands and Natural Resources (MLNR) is responsible for the development, operationalization, and management of the NFMS. The administration of the NFMS are granted to the head of the NRS, which is hosted by the Climate Change Directorate of the FC with Technical Support from both the Research Management Support Centre (RMSC) and the FC's Information Technology Department. In addition, the accessibility and accuracy of forest monitoring is technically and financially supported by FAO and FCPF under common projects. Other stakeholders include multilateral development partners, non-governmental organizations (NGOs), other government agencies, and private sector entities.

Objectives

- » Serve as the main source of data for the land use sector that will have a central data storage system and a web portal to house all the data collected from multiple sources.
- » Provide information on REDD+ and related activities to the public online, while key stakeholders will have access to more detailed information and data as per their access rights. Support transparent communication of REDD+ transactions as well as financial flows.
- » Generate reports and regular publications depending on specific needs. The publications will be synced with the reporting periods of the FC as well as that of the Biennial Update Reports and National Communications.
- » Support all related sectors by providing them with the most current, transparent, and accurate information about resources under their jurisdiction and third-party verification of reported activities.
- » Provide relevant information for key stakeholders such as private cocoa sector companies, NGOs, etc.

Impact

- » Based on its NFMS, Ghana has submitted its first monitoring report (2019) for REDD+ results-based payments to the FCPF Carbon Fund.
- » The NFMS web portal is not yet operational but will broadly have three main components, namely
 1. greenhouse gas inventory for the land use sector and measurement, reporting and verification (MRV) for REDD+,
 2. environment and social safeguards and
 3. the registry sub-system.
- » A national forest monitoring framework document has been developed, which provides a road map for the establishment of the integrated NFMS.
- » In 2017 and 2021, Ghana submitted two national forest reference levels to the United Nations Framework Convention on Climate Change.
- » Good progress has been made in transitioning from ground-based forest inventories to remote sensing-based approaches that are combined with ground-based sampling for estimating changes in forest carbon stocks.

Testimony

Mr Jacob Amoako, GIS and MRV Officer for REDD+ at the Forestry Commission of Ghana, says:

“Sustainable forest management depends on the accessibility of good quality data and the ability to share this data transparently with all the stakeholders involved in managing forests. Ghana would like to move away from depending on international experts and get to the stage where we have sustainability in everything that we do. In this regard, FAO's support in training country experts to use and apply various forest monitoring tools and techniques to country's circumstances will help us monitor our forests sustainably.”

Related resources

Forestry Commission. 2017. *Framework for National Forest Monitoring System*, Accra.

EPA. 2019. *Ghana's Fourth National Greenhouse Gas Inventory Report*, Environmental Protection Agency (EPA), Accra. Available at https://www4.unfccc.int/sites/SubmissionsStaging/NationalReports/Documents/59648301_Ghana-BUR2-2-gh_nir4.pdf



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Success factors

- » **Integration of and consistency with existing information sources:** A technical and operational review of existing NFMS was conducted to improve the design and utility of Ghana's NFMS. The objective is to harmonize and bring together the various components housed in different institutions for a functional NFMS.
- » **Forest inventory institutional arrangements:** The Lead Agency of forest inventories is the RMSC of the FC, mandated by Act 571 of 1999. The RMSC, in collaboration with Forest Services Division (FSD) of the FC, undertakes forest inventories. RMSC and FSD receive government support for routine office activities and salaries but depend on donor-support for inventory activities. In order to ensure that the institutional architecture is formalised, the NRS intends to sign agreements with all the key agencies to ensure that all relevant institutions fully acknowledge their assigned roles and have adequate capacity to implement.
- » **South-South cooperation:** Ghana is engaged in South-South learning activities and workshops associated with REDD+ capacity building and the achievement of Sustainable Development Goals.
- » **Gender participation:** Ghana created a gender-responsive emission reduction program by implementing a gender analysis and action plan and collaborated with the International Union for Conservation of Nature to provide technical assistance and mainstream gender into the country's Cocoa Forest Program.