PILOTING OF ICAT AGRICULTURE POLICY GUIDANCE FOR ETHIOPIA

POLICY ASSESSMENT REPORT

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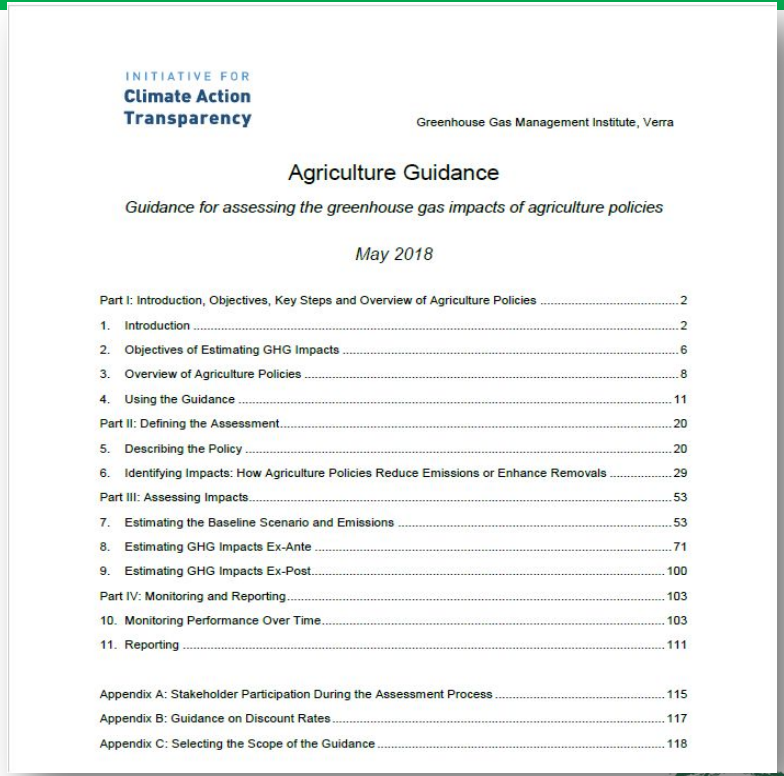

INITIATIVE FOR
Climate Action
Transparency

Greenhouse Gas Management Institute, Verra

Agriculture Guidance

Guidance for assessing the greenhouse gas impacts of agriculture policies

May 2018

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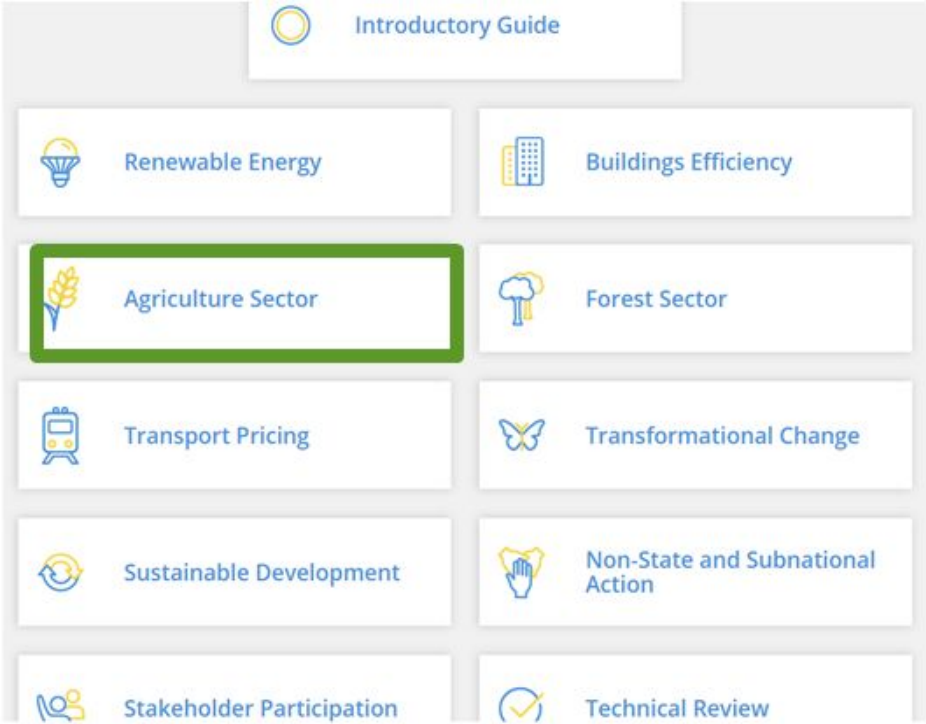
About the guidance

- **Why the guidance develop:-** The Initiative for Climate Action Transparency (ICAT) aims to help countries assess the impacts of their climate actions and support greater transparency, effectiveness, trust and ambition in climate policies worldwide.
- The ICAT **series of guidance documents** is designed with countries' needs in mind with a focus on methodologies for the assessment of the GHG reduction, sustainable development and transformational change impacts of policies and actions.
- ICAT integrates methodological guidance; capacity building and knowledge sharing to strengthen the transparency and effectiveness of climate policies and actions.
- Agriculture policy guidance is primarily designed to assess specific **policy instruments** and associated mitigation practices and/or technologies in the agriculture sector.



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About the guidance

- **Purpose of the guidance:-** provides methodological guidance for assessing the GHG impacts of agriculture policies that enable or incentivize mitigation practices or technologies.
- **Scope of the guidance** :- the guidance provide principles, concepts and procedures for estimating GHG impacts of agricultural policies that mitigate GHG emissions from the **enteric fermentation and soli carbon pool sources**

Type of policy Instrument	Description	Examples of policy instruments
Regulations and standards	Rules or standards that specify abatement technologies (technology standard) or performance standards (such as minimum requirements for erosion rates, tillage setbacks or nutrient management. They typically include legal penalties for noncompliance.	• Standards for management practices for livestock health and reproduction • Standards for implementing silvopastoral systems • Conservation mandates requiring landowners to place an area equivalent to 10% of cultivated lands into conservation reserve • Laws that promote connectivity between natural ecosystems
Subsidies and incentives	Direct payments, tax reductions, price supports or the equivalent thereof from a government to an entity for implementing a practice or performing a specified action.	• Tax reductions for setting aside agricultural land • Payments for changing agricultural practices • Payments for ecosystem services
Voluntary agreements or actions	Agreements, commitments or actions undertaken voluntarily by public or private sector actors, either unilaterally or jointly in a negotiated agreement. Some voluntary agreements include rewards or penalties associated with participating in the agreement or achieving the commitments.	• Zero net-deforestation commitments • Agroforestry agreements with landowners • National programmes to reduce emissions in a sector (e.g., NAMA) • Low carbon development projects
Research, development and deployment policies	Policies aimed at supporting technological advancement, through direct government funding or investment, or facilitation of investment, in technology research, development, demonstration, and deployment activities	• Efforts to strengthen formal education of farmers, provide training and introduce new technologies or practices to farmers, provided by extension services or other programmes supported by the government to support improved practices, technology adoption, and even monitoring of activities • Training modules about sustainable production and climate change disseminated through extension agents • Regional workshops to agricultural producers
Financing and investment	Public or private sector grants or loans (for example, those supporting low-carbon development strategies or policies)	• Low-interest rate loans for farmers that implement sustainable livestock production practices

About the guidance

- **Enteric fermentation**: Reduce methane (CH4) emissions in ruminant livestock through activities such as improving feeding strategies, improving herd management and breeding
- **Soil carbon pool**: Increase carbon sequestration in soils in pasture, grazing lands or croplands through activities such as switching to no-till or conservation tillage agriculture, agricultural residue management or agroforestry.
- **Intended users :-** The primary intended users are **developing country** governments and their partners who are implementing and assessing agriculture policies.
- Intended users also includes **policymakers** and **practitioners** seeking to estimate GHG mitigation impacts in the context;
  - ✔ NDC development and implementation,
  - ✔ National low carbon strategies,
  - ✔ NAMAs and other mechanisms.
- **The guidance applicable to policies at:-**
  - ✔ At any level of government (federal, region or city)
  - ✔ That are planned ,adopted or implemented
  - ✔ The are new policies or extensions

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About the guidance

- **When to use the guidance**:- The guidance can be used at multiple points in time throughout a policy design and implementation process, including:

•**Before policy implementation**: To assess the expected future impacts of a policy (through ex-ante assessment)

•**During policy implementation**: To assess the achieved impacts to date, ongoing performance of key performance indicators, and expected future impacts of a policy

•**After policy implementation**: To assess what impacts have occurred as a result of a policy (through ex-post assessment)

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Piloting the guidance

Overview of steps

Basic Steps Followed

- Objectives of estimating GHG impacts
- Steps and assessment principles
- Program/ policy descriptions
- Identifying impacts: The causal chain
- Estimating the baseline scenario and emissions
- Estimating GHG impacts ex-ante
- Monitoring performance over time

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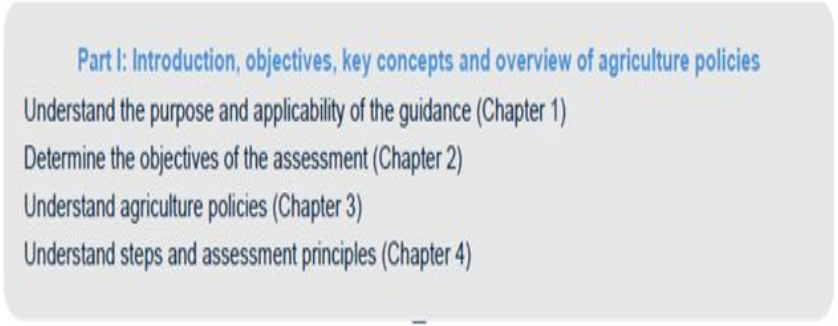
Piloting the guidance



- Objectives of estimating GHG impacts

1) Improving program and project design and implementation, assess financing and inform policy selection as well as

2) Feed into the ICAT on the current guideline to further enhance it.

- Our approach on the piloting of the Agriculture Guidance will be to look at ***before policy implementation.***

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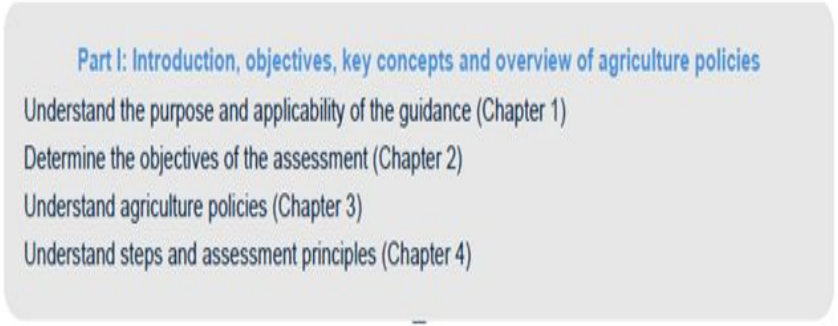

- **Steps and assessment principles**

1. Engagement with Ministry of Agriculture
2. Identification of agriculture sector mitigation actions
3. Identification of policies/programs/and projects
4. Preparation of casual chain
5. Preparation of program/project checklist
6. Preparation of report
7. Stakeholder engagement with Ministry of Agriculture

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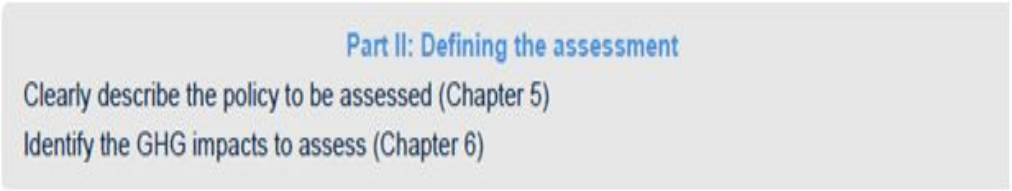

- **Program/ policy descriptions**

The list of program/ project looked at are:

- RPLRP (Regional Pastoral Livelihood Resilience Project)
- SLMPII (Sustainable Land Management Project)
- AGP II (Agricultural Growth Program)
- PASDIP (Participatory Small scale Irrigation Development Programme)
- PSNP IV (Production Safety Net Programme)

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Piloting the guidance

Part II: Defining the assessment

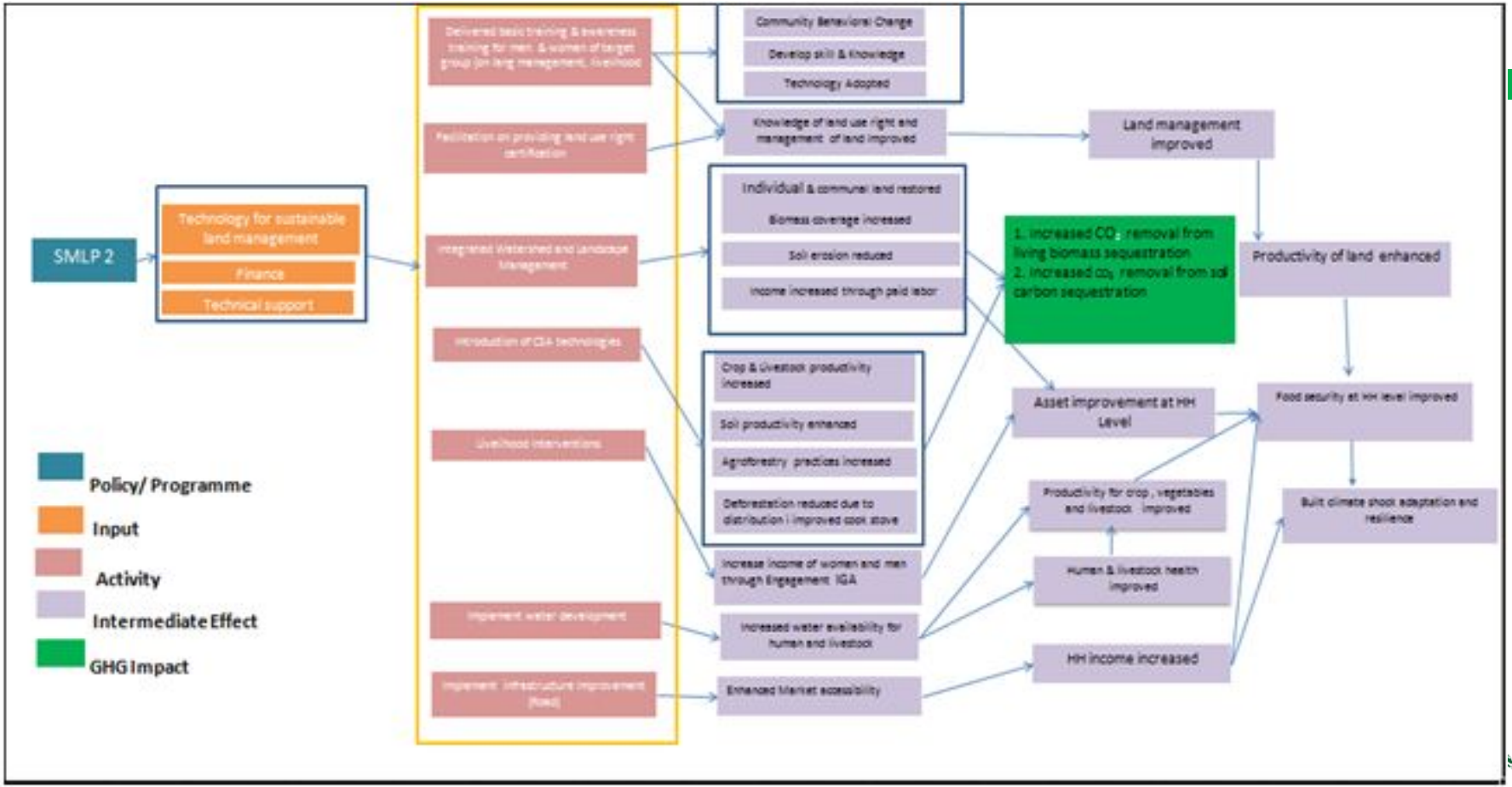
Clearly describe the policy to be assessed (Chapter 5)

Identify the GHG impacts to assess (Chapter 6)

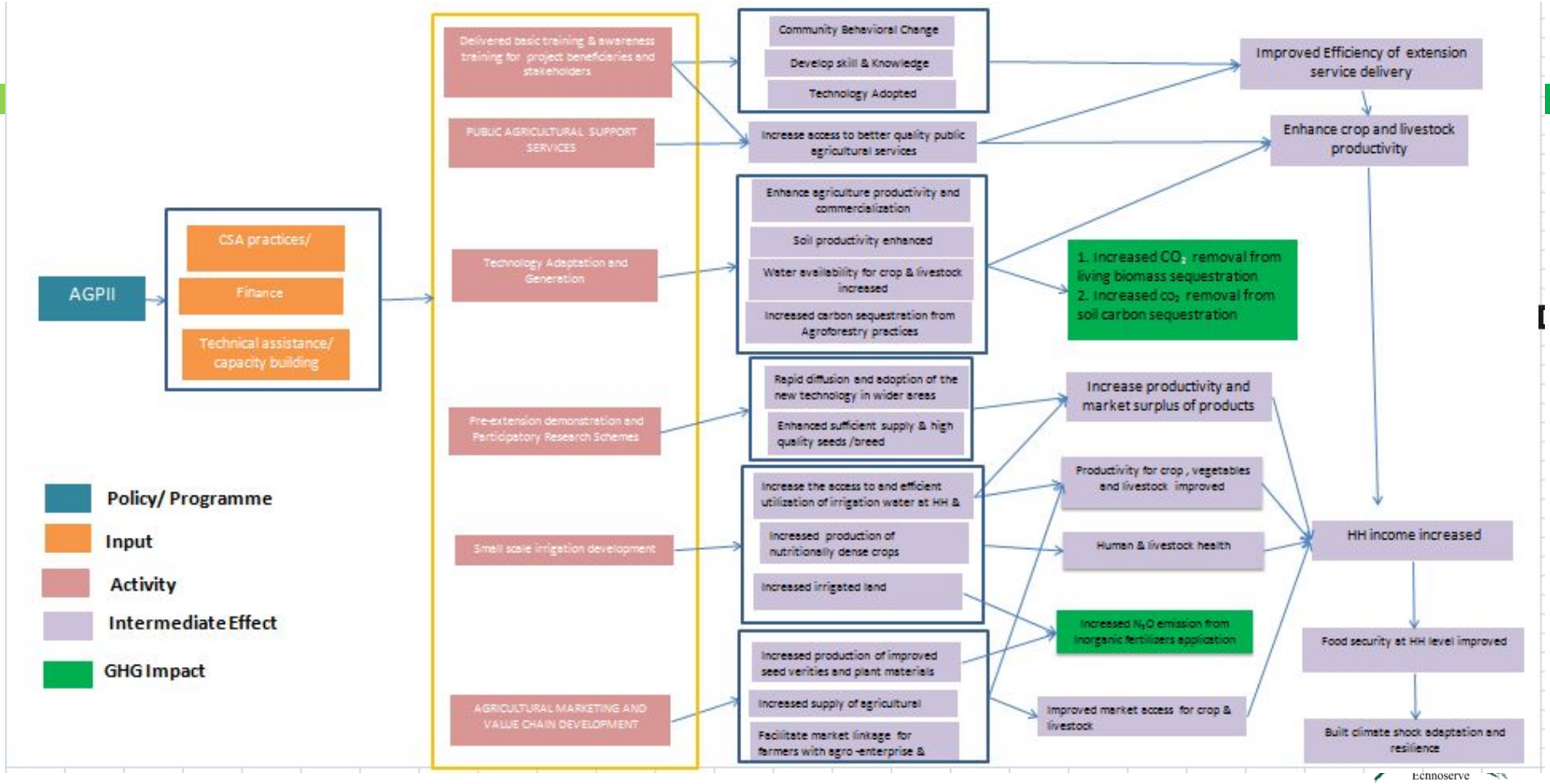
- **Program/ policy descriptions**

Information	Description	Program goal
Title of the Program	Sustainable Land Management Program II	To improve climate resilience, land productivity and carbon storage, and increase access to diversified livelihood activities in intervention watersheds.
Type of Program	Green Infrastructure and Resilient Livelihoods	1. Land area under sustainable landscape management practices (Ha) 1a. Land area restored or reforested/afforested (Ha) 1b. Land area with productivity enhancing practices applied (Ha) 2. Project area showing an increase in the NDVI14 correcting for climate effects (Percent) 3. Project area showing an increase in the Land Surface Water Index (LSWI)15 correcting for climate effects (Percent) 4. Net greenhouse gas emissions (metric tons)
	Investing in Institutions and Information for Resilience	• Impact evaluation, knowledge management and communication. • Capacity building, information modernization and policy development;
	Rural Land Administration and Use	Provide security of tenure to smallholder farmers in RLLP watersheds through Second, Level Landholding Certification
	Project Management and reporting	Effective implementation and reporting on project activities M&E , Gender sensitive information, communication , disaggregated information
Description of specific intervention		• A total of 152 major watershed with a size of 10,000ha each intervened with phased approach (45 during SLPI, 90 during SLPII and 17 during

The Casual Chain- SLMP



The Casual Chain- AGP



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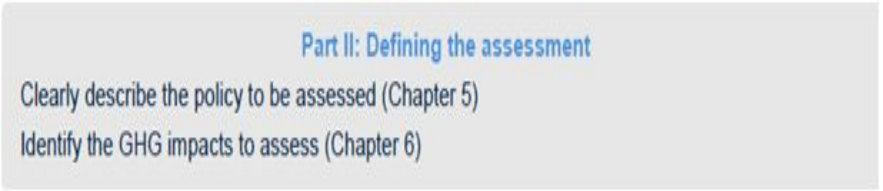

- **Estimating the baseline scenario and emissions**

SLMP II Program

Action: Integrated Watershed and Landscape Management

Assumption: No change scenario is used for the baseline scenario since the implementation is at small scale level and there is won't be a significant change during the implementation phase.

Activity Data and Unit of Measurement:

Total land area in hectares (individual and communal) brought under a catchment management system as a result of the project. This indicator refers to mainly closed areas covered with trees and managed by user groups

Baseline (2013)	Implementation period					Total
	2014	2015	2016	2017	2018	
300,000	400,000	600,000	800,000	910,000	910,000	3,620,000

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- **Estimating the baseline scenario and emissions**

Result of baseline emission

Part II: Defining the assessment

Clearly describe the policy to be assessed (Chapter 5)

Identify the GHG impacts to assess (Chapter 6)

Project Name	SLMP 2		Climate	Tropical Mountain (Dry)		Duration of the Project (Years)	20	
Continent	Africa		Dominant Regional Soil Type	HAC Soils		Total area (ha)	3620000	
Components of the project	Gross fluxes Without	With	Balance	Share per GHG of the Balance All GHG in tCO2eq CO_2 Biomass	Soil	Other	N_2O	CH_4	Result per year Without	With	Balance
	All GHG in tCO2eq										
	Positive = source / negative = sink										
Land use changes											
Deforestation	0	0	0	0	0		0	0	0	0	0
Afforestation	-67,636,388	-816,145,743	########	######	-271,191,433		0	0	-3,381,819	-40,807,287	#######
Other LUC	0	0	0	0	0		0	0	0	0	0
Agriculture											
Annual	0	0	0	0	0		0	0	0	0	0
Perennial	0	0	0	0	0		0	0	0	0	0
Rice	0	0	0	0	0		0	0	0	0	0
Grassland & Livestocks											
Grassland	0	0	0	0	0		0	0	0	0	0
Livestocks	0	0	0				0	0	0	0	0
Degradation & Manageme											
Forest degradation	0	0	0	0	0		0	0	0	0	0
Peat extraction	0	0	0		0		0	0	0	0	0
Drainage organic soil	0	0	0		0		0	0	0	0	0
Rewetting organic soil	0	0	0		0		0	0	0	0	0
Fire organic soil	0	0	0	0				0	0	0	0
Coastal wetlands	0	0	0	0	0		0	0	0	0	0
Inputs & Investments	0	0	0			0	0	0	0	0	0
Fishery & Aquaculture	0	0	0			0	0	0	0	0	0
Total	-67,636,388	-816,145,743	########	######	-271,191,433	0	0	0	-3,381,819	-40,807,287	#######
Per hectare	-18.7	-225.5	-206.8	-131.9	-74.9	0.0	0.0	0.0			
Per hectare per year	-0.9	-11.3	-10.3	-6.6	-3.7	0.0	0.0	0.0	-0.9	-11.3	-10.3

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Part III: Assessing impacts

Estimate the baseline scenario and emissions (Chapter 7)

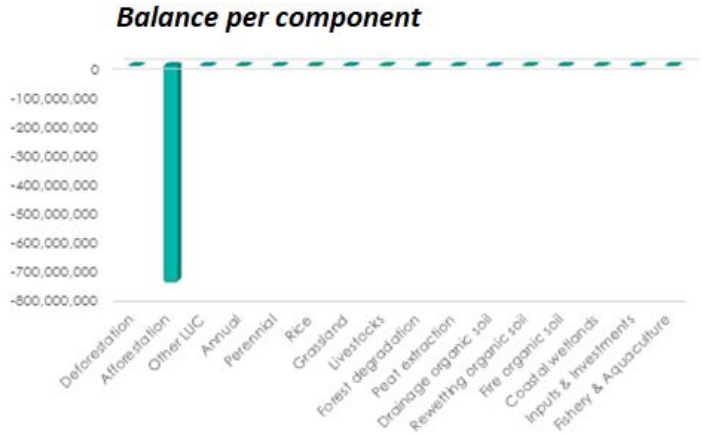
Estimate the implementation potential of the policy and quantify the emissions ex-ante (Chapter 8)

Estimate the impact of the policy ex-post (Chapter 9)

- **Estimating GHG impacts ex-ante**

SLMP II Program

Action: Integrated Watershed and Landscape Management



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SLMP II Program

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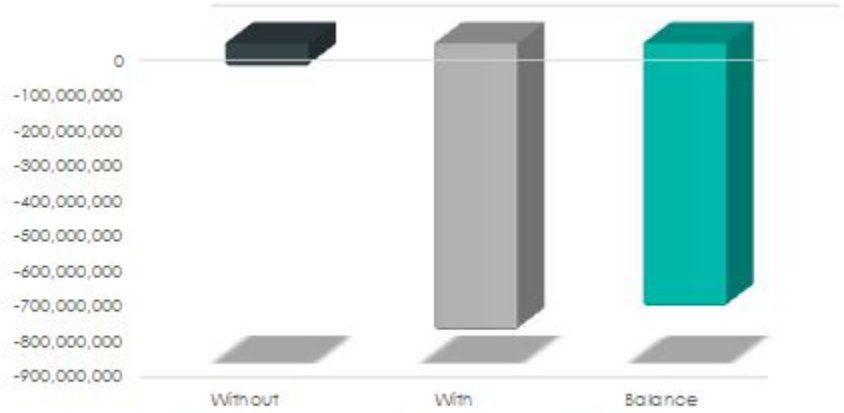

Total without and with project and balance

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Part III: Assessing impacts

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- **Estimating GHG impacts ex-ante**

SLMP II Program

Action: Integrated Watershed and Landscape Management

Share of the balance per GHG (plus origin for CO2)

Piloting the guidance

Part III: Assessing impacts

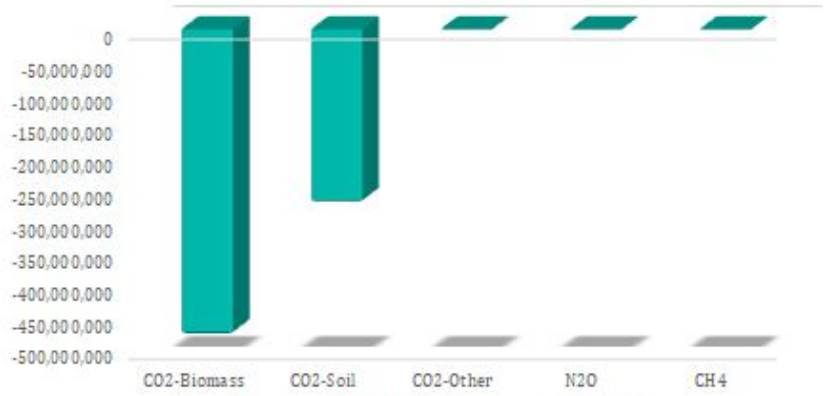
Estimate the baseline scenario and emissions (Chapter 7)

Estimate the implementation potential of the policy and quantify the emissions ex-ante (Chapter 8)

Estimate the impact of the policy ex-post (Chapter 9)

- **Monitoring performance over time**

Action: Integrated Watershed and Landscape Management



Share of the balance per GHG (plus origin for CO2)

Piloting the guidance

Part IV: Monitoring and reporting

Monitor the performance of the policy over time (Chapter 10)

Report the results and methodology used (Chapter 11)

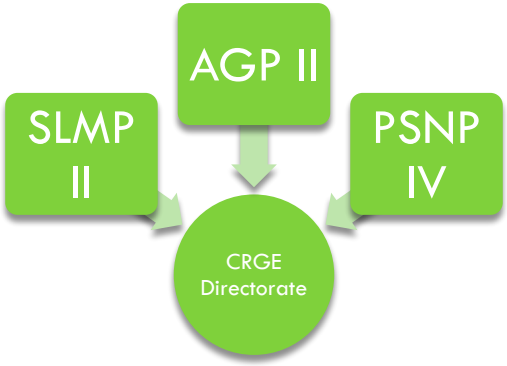
- **Monitoring performance over time**

Monitoring Plan (GHG Reporting)

Project/ Program	Action	Indicator and unit	Potential sources of data	Parameter type	Monitoring frequency	Responsible	Remark
AGP II	Small scale irrigation	Area provided with irrigation and drainage services (ha) (Hectare (Ha))	Annual report; Program Design Document;	Activity Data	Annual	AGP Program Office MoA, CRGE Directorate; EFCCC	
SLMP IV	Integrated Watershed and Landscape Management	Total land area in hectares	Annual report; Program Design Document;	Activity Data	Annual	SLMP Program Office MoA, CRGE Directorate; EFCCC	

Lesson learned

- Should MoA take program/projects approach?



- Advantage: Better and reliable data, no additional data collection
- Challenge: Woreda overlap/ double counting

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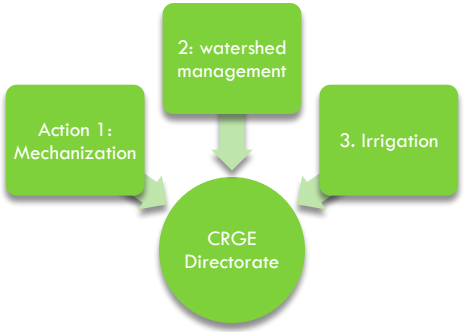
Lesson learned

- Should MoA take action based approach?
  - Mechanization, irrigation etc.



- Advantage: easier to show progress by CRGE/NDC Action
- Challenge: Difficult to collect data, verification