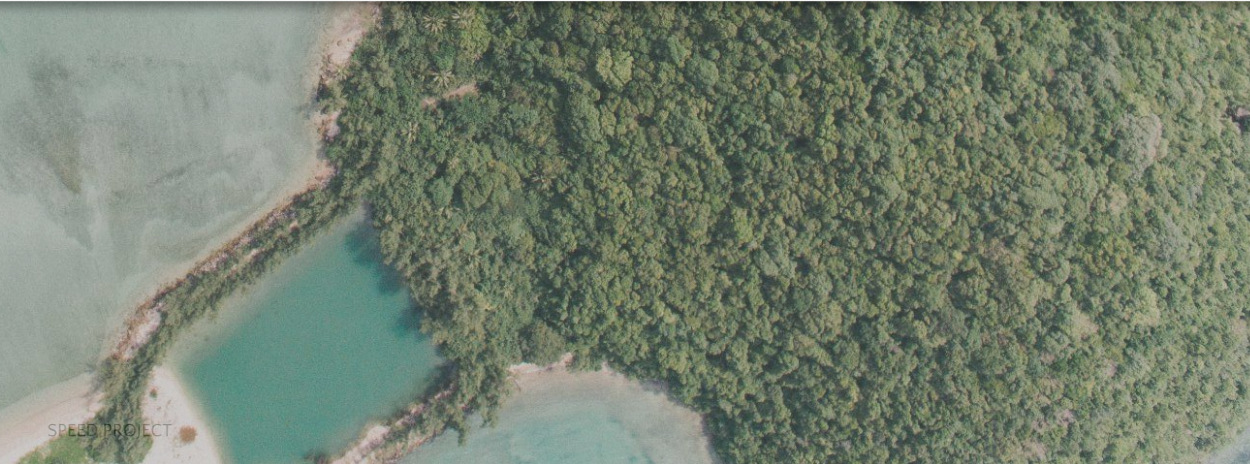


Carbon Finance - Markets & Policy Enabling Environment Assessment

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July 2023



Purpose of the Assessment

The current assessment is aligned with the [USAID Climate Strategy](#).

Purpose:

- Brings clarity on the carbon offset process in Mozambique: explains the **existing policy framework and current pathways, gaps, challenges** related to development of carbon projects in Mozambique.
- Provides recommendations to improve the enabling environment for carbon project development in Mozambique to identify opportunities for the country to contribute to the **USAID Climate Strategy targets for 2022-2030**.

This assessment provides:

- Overview of the market potential for Mozambique
- Assessment of the existing national plans, strategies, laws, regulations, regulating bodies and enforcement measures
- Pathway for carbon project transaction, approval, and verification
- Insights from private carbon project developers in Mozambique
- Identification of the gaps, challenges and opportunities for carbon offset projects
- An outline of actionable recommendations to improve the enabling environment for carbon project development in Mozambique, including opportunities for policy reform

CLIMATE STRATEGY TARGETS 2022-2030

Mitigation: CO2e reduced	6 Billion metric tons
Natural & Managed Ecosystems: Hectares conserved, restored, or managed	100 Million hectares
Adaptation: People supported to be climate resilient	500 Million people
Finance: Public and private funds mobilized	150 Billion dollars
Country Support: NDCs/NAPs supported	80 Countries supported
Critical Populations: Increase equitable engagement	40 Country partnerships strengthened

Definitions

Carbon Finance: Financial mechanisms and instruments used to support and facilitate projects and initiatives aimed at reducing greenhouse gas (GHG) emissions or promoting carbon sequestration.

NDC (Nationally Determined Contribution): Climate action plan to cut emissions and adapt to climate impacts. Each country aligned to the Paris Agreement is required to establish an NDC and update it every five years.

Carbon credits: Fundamental units of measurement in carbon finance. Credits are generated through activities that reduce emissions or enhance carbon sequestration, such as renewable energy projects, energy efficiency, afforestation, or reforestation initiatives.

Carbon markets: Platform that allows buying and selling of carbon credits. There are two types of platforms: compliance markets and voluntary carbon markets (VCM).

Compliance Markets/Cap-and-Trade: is a market for carbon offsets created by the need to comply with a regulatory act. In a Cap-and-Trade emissions reductions market, actors buy and sell carbon offsets to comply with the cap or limit imposed on their emissions.

Voluntary Carbon Markets (VCM): VCM allow carbon emitters to offset their unavoidable emissions by purchasing carbon credits emitted by projects targeted at removing or reducing GHG from the atmosphere, on a voluntary basis.



Definitions (2)

CO₂eq: Carbon dioxide equivalent or CO₂-equivalent is a unit of measurement used to compare the emissions of various greenhouse gases (GHG) on the basis of their global-warming potential (GWP), by converting amounts of other gases to the equivalent amount of carbon dioxide with the same GWP.

Carbon offset projects: Initiatives that generate carbon credits by reducing emissions or removing GHG from the atmosphere. These projects can include renewable energy projects, energy efficiency improvements, forest conservation or restoration projects, methane capture projects, and more.

REDD+ : Reducing Emissions from Deforestation and Forest Degradation. The '+' stands for additional forest-related activities that protect the climate, namely sustainable management of forests and the conservation and enhancement of forest carbon stocks.

GHG Sectors:

AFOLU: GHG emissions sector that includes Agriculture, Forests and Other Land Uses.

Energy: Emissions GHG resulting from the production, distribution and consumption of energy.

Waste: Emissions GHG associated with waste management activities.

Direct Industrial processes: Emissions of GHG from industry which includes chemical, manufacturing, cement production.



The Market Overview for Carbon Financing

Market Potential for Mozambique

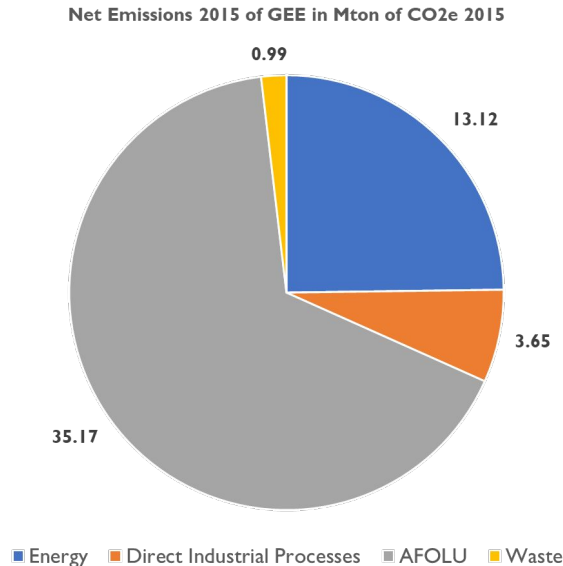
Mozambique's Nationally Determined Contribution (NDC) Commitments

- By signing the Paris Agreement, Mozambique committed to reduce GHG emissions by **40 million tons (t)CO₂eq** (between 2020 and 2025) = 1.2 tCO₂eq per capita by 2025 (GHG emissions per capita about 2.2 tCO₂eq today), through adaptation and mitigation.
- The country will require **~\$7.6 billion** in investments (2020 to 2025) to reduce 40 million tCO₂eq for adaptation (infrastructure, agriculture and coastal protection) and mitigation (waste and industrial processes) measures.

However:

- There is no national monitoring system and data that tracks information on the progress against the NDC commitments

Mozambique's GHG Emissions - 2015 Baseline



While there is more updated data on Mozambique's GHG emissions through the [World Bank](#) & [Ourworldindata](#), the GRM only officially recognizes data from the last Mozambique GHG Emissions Inventory in 2015.

Mozambique's "Long-Term Low-Emission Development Strategy (LTS-LEDS)" strategy for 2050 sets the goal of achieving net-zero emissions and climate resilience by 2050.

It established the baseline emissions in key sectors, including AFOLU, Energy, Industrial Processes, and Waste, in 2015 of **52.67 million tCO₂**.

Current Carbon Projects in Mozambique

64 projects are currently being implemented by 22 entities (21 private sector, 1 GRM)

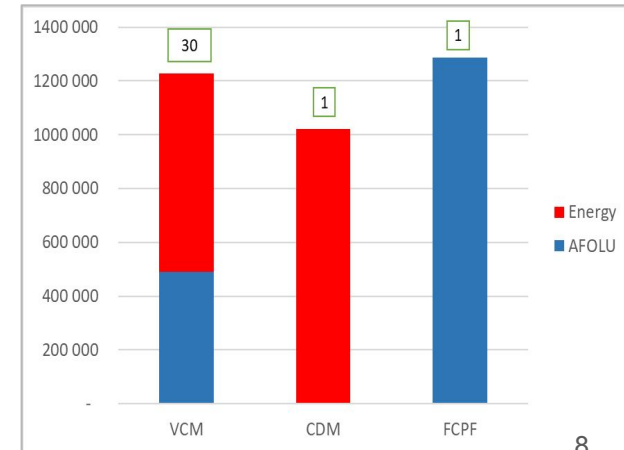
However, information on the 21 project developers is only available on VCM registry platforms. The GRM has no national-level platform with this information and has **little** or **no** understanding about their contribution to reducing emissions.

Only **32 projects** have certified carbon credits = **~3.5 million credits** (2007-2021):

- Forest Carbon Partnership Facility (FCPF) (1 project) = **\$6.4 million revenue in 2021**
- Voluntary Carbon Markets (VCM) (30 Projects) = **no data on revenues**
- Clean Development Mechanism (CDM) (1 Project) = **no data on revenues**

2023: **3.5 million credits = up to \$19.6 million***

The **64 projects** being implemented have the **potential** to generate **11.6 million carbon credits per year**.



Mozambique's Economic Potential for Carbon Finance

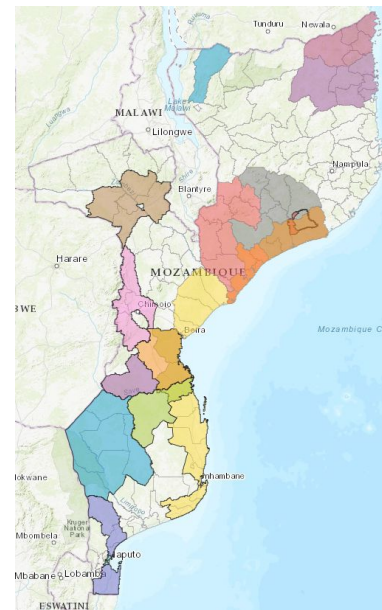
- 17 REDD+ projects are currently in the licensing process ([see map](#)).

	Potential Carbon Credits Generated	Estimated Potential Annual Revenue*
64 current projects	11.6 million	\$27.9 million
17 new REDD+ Projects	4.4 million	\$18.6 million
Total	~16 million	\$46.5 million

*Estimates based on 2021 carbon prices (most recent price):

Energy = \$2.26/credit (2021)

AFOLU = \$8.81/credit (2021)



Source: [REDD+ registry system](#)

The estimates of potential annual revenue depend on the current prices in the VCM. Uncertainties includes the calculations, project risks and buffers equals to 0.47 for AFOLU projects, 0.15 for energy projects.

Market Potential for Mozambique - Ecosystems

- Mozambique has a total of **32 million hectares (ha) of forest**, which are a host of important flora and fauna and an estimated value of \$1,050-\$1,500/ha.
 - Human pressure is responsible of an annual loss of **267,000 ha/year**, which corresponds to emissions of **38.9 tCO₂/year** ([MRV deforestation monitoring report](#))
- Mangroves cover 266,000 ha, estimated at \$2,400/ha/year
 - Deforestation, pollution, and climate change contribute to an estimated annual loss of ~350 ha/year of mangrove areas (Marzolli, 2007; Shappiro, 2018). **There is no information available on how this links to GHG emissions.**
- Marine area: threatened by overfishing, pollution and climate change: **No data available.**

Carbon finance can significantly address these human and climate threats and:

- Create jobs and improve incomes for community members
- Provide positive incentives to adopt new and sustainable practices
- Support marine ecosystems by providing incentives for sustainable fisheries management, reducing pollution, and addressing ocean acidification and coral bleaching.

Market Potential for Mozambique - Community Benefits

Mozambique has several examples of community benefit-sharing arrangements. With development of clear guidelines, detailed regulation and effective implementation of the arrangements, communities stand to benefit significantly from carbon finance.

Considering the **estimated potential annual revenue of \$46.5 million**:

1. If Mozambique allocates **20% of taxes** to communities, according to the Ministerial Diploma 93/2005 this would bring in approximately **\$9.3 million/year** for communities.
2. If the country considers **30% of carbon trading revenue** transferred to communities and individual farmers, as per the Envirotrade project's benefit sharing plan through the REDD+ project, this would bring in approximately **\$13.9 million/year** for local communities.
3. Based on recent allocation of **70% of emissions reductions revenues to communities** - from the Benefit Sharing Mechanism from the Zambezia Integrated Landscape Program (ZILMP), communities would receive approximately **\$32.5 million/year**.

Other benefits:

- According to the **African Carbon Markets Initiative** Roadmap, growing the country's VCM could create **500,000 jobs** in project development and carbon generation monitoring, by 2030.
- Investments in carbon projects **can be less resource intensive** since they do not necessarily require transportation, aggregation, and/or processing like many value chains in development (e.g. conventional agriculture projects).

Legal & Regulatory Framework for Carbon Projects in Mozambique

Legal Framework for Carbon Projects in Mozambique: 2023

REDD+ Decree

This is the only official policy decree that guides the design and implementation of REDD+ projects.

It does not include energy, waste and direct industrial processes.

The decision to prioritize REDD+ legislation was influenced by its international significance in climate change mitigation and sustainable development, and funding and technical support from the World Bank.

Lack of legislation for other sectors is a major risk for project developers, investors and citizens.

Sector	Sub-sector	Legislation
AFOLU	REDD+	Redd+ Decree 23/2018
	Agriculture	Partially covered by REDD+ Decree in components of forest plantations, agroforest, other agriculture practices
	Livestock	No Legislation
	Energy	No legislation
	Waste	No legislation
	Direct Industrial Processes	No legislation

Legal Framework for Carbon Projects in Mozambique

Select policies and strategies that create the carbon project 'enabling environment' exist.

They are not legal instruments, but provide guidance that can lead towards the confirmation of National Determined Contributions.

Analysis of these policies help identify sectoral gaps. Ex: The Integrated Urban Solid Waste Management strategy is out of date and does not explicitly reflect the Paris Agreement commitments.

1. [National Adaptation and Mitigation Strategy for Climate Change \(ENAMMC\) – 2012](#)
2. National Development Strategy (ENDE) 2015-2035
3. Green Economy Action Plan (PAEV) – 2013
4. [National Adaptation Plan \(NAP\) of Mozambique 2013-2025](#)
5. REDD+ Program
6. [National Territorial Planning Plan \(PNDT\)](#)
7. Strategic Development Plan for the Agricultural Sector 2022-2031 (PEDSA II)
8. [National Forest Policy \(PNF\)](#) and its implementation strategy - 2020 to 2035
9. The [Mangrove Management Strategy](#) for 2020-2024
10. Integrated Urban Solid Waste Management Strategy (2005-2015)
11. [Industrial Policy and Strategy 2016-2025](#)
12. The New and Renewable Energy Development Strategy (EDENR) - 2010

Supportive Legislation for Carbon Project Development

Supportive legislation = legal and regulatory provisions that are supportive of REDD+ objectives and can help ensure that REDD+ requirements are addressed in a coherent way and in line with other legal provisions.

For example: the implementation of legislation that clarifies tenure and access rights to natural resources may help reduce pressure on forest resources and reduce dispute risks during REDD+ implementation.

1. [Law of Protection, Conservation, and Sustainable Use of Biodiversity](#) - Law 16/2014 of 20th June
2. [Law of Local Organs of the State](#) - Law 8/2003 of 19th May
3. [Regulation of the Law of Local Organs of the State](#) - Decree 11/2005 of 10th June
4. [Land Law](#) - Law 19/97 of 1st October
5. [Regulation of the Land Law](#) - Decree 66/9 of 8th December
6. [Law of Forests and Wildlife](#) - Law 10/99 of July
7. [Regulation of Forests and Wildlife](#) - Decree 12/2002 of 6th June
8. [Law of Mines](#) - Law 14/2002 of 26th June
9. [Regulation of the Law of Mines](#) - Decree 31/2015 of 31st December
10. [Marine Law](#) - Law 20/2019 of 8th November
11. [Regulation establishing the regime for the use of the national maritime space](#) - Decree 21/2017 of 24th May
12. [Environmental Law](#) - Law 20/97 of 1st October
13. [Directive on Biodiversity Offsets - Ministerial Diploma 55/2022 of 19th May](#)
14. [Water Law](#) - Law 16/91 of 3rd August

Pathway for Carbon Project Implementation

Pathway for REDD+ Projects (Transaction, Verification and Approval)

There is no clear pathway for carbon project development and implementation in Mozambique **except** for REDD+ programs.

The REDD+ pathway involves 8 steps, and its implementation started in 2022 when 17 REDD+ projects submitted their expressions of interest to GRM.

Although the REDD+ Decree guides the process for REDD+ carbon project implementation, it lacks details on:

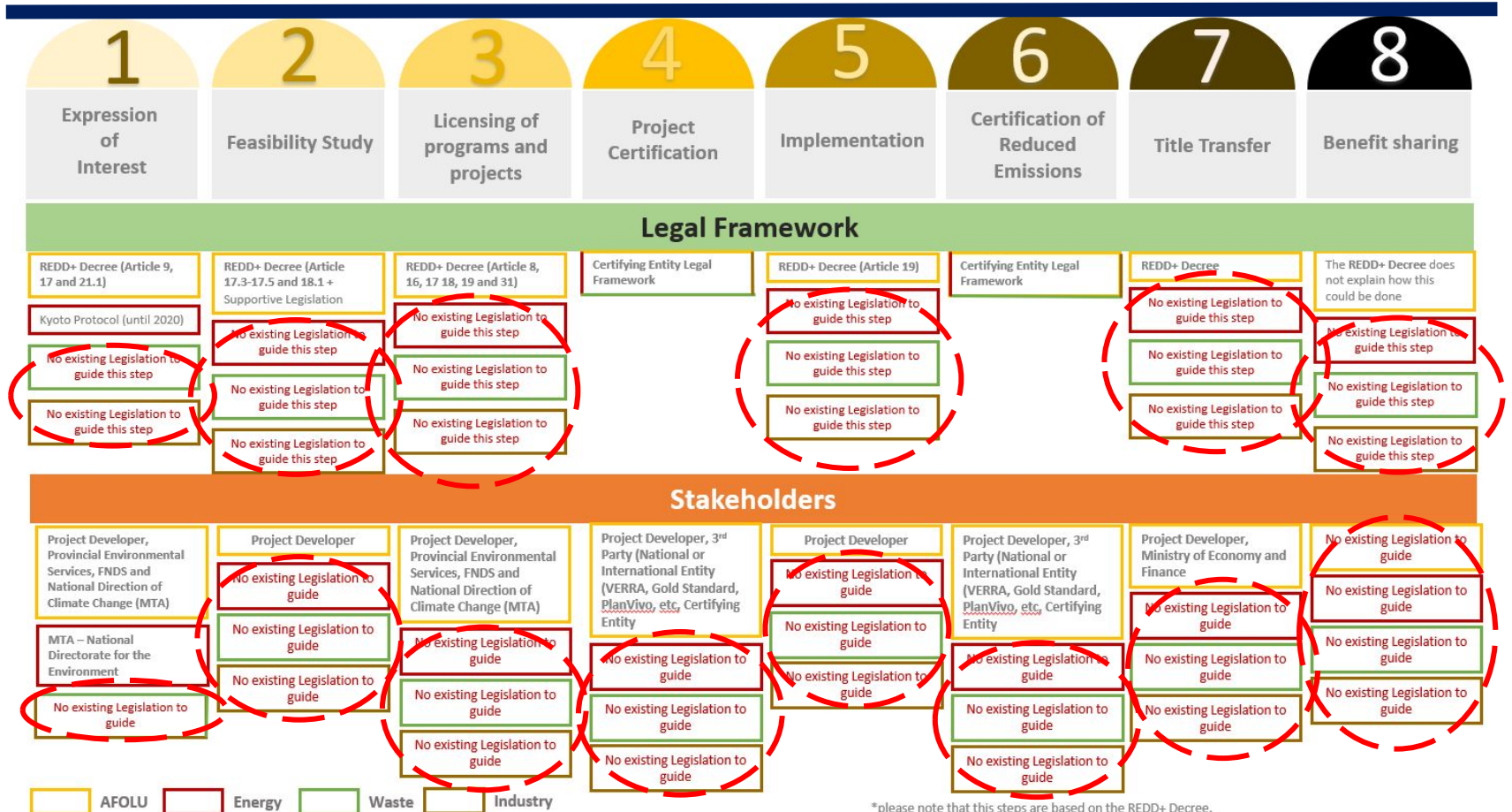
- The process of project licensing and title transference
- Instructions on how to prepare and implement a Benefit-Sharing Plan
- Instructions for transference of the benefits to all involved in the Benefit Sharing Plan

Pathway for REDD+ Projects (Transaction, Verification and Approval)

	1	2	3	4	5	6	7	8
	Expression of Interest	Feasibility Study	Licensing of programs and projects	Project Certification	Implementation	Certification of Reduced Emissions	Title Transfer	Benefit sharing
Activities	<ol style="list-style-type: none"> 1. Identification of the geographical area for the project 2. Preliminary consultation with district authorities 3. Expression of interest 4. Submission to the State 5. Evaluation of Expression of Interest 6. Approval 7. Project Registration 8. Communication 	<ol style="list-style-type: none"> 1. Program and Project presentation meetings 2. Stakeholder Engagement 3. Community consultations 4. Socio-economic study 5. Preparing the Benefit Sharing Plan 6. Greenhouse Gas Inventory 7. Preparation of Company documentation 8. Project Preparation (PD) 	<ol style="list-style-type: none"> 1. Submission of the documents prepared in previous step 2. Assessment of document compliance 3. Assessment of document content 4. Approval 5. Payment of the Program and Project License 6. Issuance of License 	<ol style="list-style-type: none"> 1. Selection of Project methodology 2. Project Submission (DE) 3. Validation and Verification of the PD 4. Certification Registration 	<ol style="list-style-type: none"> 1. Stakeholder Involvement 2. Community awareness 3. Implementation of activities that generate credits 4. Implementation of the environmental and social Complaints and Safeguards mechanism 5. M&MRV 	<ol style="list-style-type: none"> 1. Identification of the Credit Certification Entity 2. Validation and Verification 3. Certification of carbon credits 4. Registration of carbon credits on the carbon credits standard platform 	<ol style="list-style-type: none"> 1. Request for transfer of titles 2. Transfer of credit rights 3. Transactions 	<p>No guidelines in place</p>
Timeline	4 – 15 days for approval	6 months to 2 years	100 days	4 months to 1 Year	Up to 20 years	Not available	Not available	<p>No details in the legislation</p>
Costs	Costs for the proponent Not foreseen in the legislation.	Costs for the proponent Not foreseen in the legislation.	Approx. 800 USD	70K – 100K	Costs for the proponent Not foreseen in the legislation.	Costs for the proponent Not foreseen in the legislation.	Costs for the proponent Not foreseen in the legislation.	<p>No details in the legislation</p>

*please note that this steps are based on the REDD+ Regulation

Pathway for Carbon Projects (Legal Framework & Stakeholders)



*please note that this steps are based on the REDD+ Decree. The REDD+ Decree is the only Legal tool that Regulates and provides guidance on Carbon Finance Pathway

Experiences of Carbon Project Developers in Mozambique

Experiences of Carbon Project Developers

SPEED interviewed 9 project developers to understand challenges and bottlenecks and identify opportunities for improvement of the carbon finance enabling environment.

- 6 are part of the 17 REDD+ registered at the Fundo Nacional de Desenvolvimento Sustentável (FNDS - National Sustainable Development Fund)/National Measuring Reporting and Verification (MRV) System for Zambezia, Cabo Delgado, Tete, Chimoio, Sofala, Inhambane, Gaza, Maputo.
- Zambezia Integrated Landscapes Management Program (ZILMP) (GRM initiative) - [Zambezia](#)
- One private sector company working in cooking stoves - [Maputo, Gaza, Inhambane](#)
- The first REDD+ project- Nhambita Community Project - [Sofala](#)

Main Challenges: Limited availability for interviews, no incentives to engage w/ assessment team, no trust in sharing data (how is going to be used, who gets information, etc).

Experiences of Carbon Project Developers

SPEED interviewed 9 project developers to understand challenges and bottlenecks and identify opportunities for improvement of the carbon finance enabling environment.

What we heard from project developers:

“Carbon projects are high-risk investments.”

“It is difficult to talk about something/market that is not known.”

“The carbon business benefits consultants and consulting companies more than the implementers.”

“The carbon credits business is doomed to fail because there are more incentives to destroy rather than conserve the environment.”

Case Study I: Nhambita Carbon Project

The **REDD+ Nhambita community** project was implemented by the now defunct British carbon management company [Envirotrade](#).

- Launched in 2004.
- Projects involved **3,000 producers** in agro-forestry and activities to prevent deforestation in Nhamatanda and Gorongosa near Gorongosa National Park.
- Total of **229,590 credits** sold.
- The benefit-sharing mechanism operated through a three-part division of sales proceeds: (transaction costs and company profits; financed operational expenses; payments to communities). Families paid annually to plant trees for seven years on a contractual basis. However, since it closed early, people were not paid completely.

According to Envirotrade, the business needed revenue from carbon to sustain the project, so they shut down due to the fall in the global price of carbon and the subsequent financial infeasibility.

Challenges:

- **High project management costs** for monitoring and seedling production.
- **Global economic crisis of 2008** reduced the number of buyers and affected the project's financial stability and ability to earn revenue.
- **As the first project of its kind**, the business model raised suspicions from some citizens and NGOs.

Lessons Learned:

- **Constant open communication** and transparency is essential to build trust.
- **Empowering communities** saves money: the more the project trains communities to do business the more the project gains longer-term.
- Carbon markets require **financial security** to sustain projects in times of crises (GRM, financial institutions, development partners).

Case Study II: Zambezia Integrated Landscape Management

The **Forest Carbon Partnership Facility (FCPF)** disbursed **\$6.4 million** to **Mozambique** in 2018 for reducing **1.28 million tCO₂e**.

This initial payment is the first of four installments under Mozambique's Emission Reductions Payment Agreement (ERPA) with the FCPF. The ERPA has the potential to unlock up to \$50 million for reducing 10 million tCO₂e in Mozambique's Zambézia Province by the end of 2024.

The funds from this payment **will be distributed to communities that meet the necessary conditions to develop community projects**. Distribution of funds adheres to a benefit-sharing guideline (70% - community project development, 20% - private sector, 4% - Gile National Park administration for buffer zone programs, 4% - district authorities, 2% - provincial government.)

Challenges:

- **Community area delimitation/legalization process** was poorly established, so community could not access benefits.
- **Financial Infrastructure.** Communities did not have bank accounts for the receipt of payments, leading to delays in fund transfers and implementation.
- **Rise in deforestation** at the project implementation site impacted results-based payments.

Lessons Learned:

- **Initiate project design with plan** to establish: a) legal community land delimitations, b) benefit transfer schedule, c) governance structures, and d) bank accounts to enable payments.
- **Map all stakeholders and manage effective coordination** with key actors throughout the project to ensure alignment/ shared understanding of the project's goals and implementation arrangements.
- **Report regularly on progress** to key stakeholders and external bodies to demonstrate transparency and results.

Challenges and Recommendations

Challenges and Recommendations

Legal and Regulatory Frameworks

Challenges

- Lack of robust regulatory frameworks to guide the pathway for carbon projects in Mozambique besides the REDD+ Decree. **Currently, no part of the regulatory framework guides energy, industrial processes and solid waste sectors.** This leads to:
 - Lack of clarity on roles, responsibilities, and coordination among government actors - for carbon trading, monitoring, reporting, verification, benefit sharing, community engagement
 - No clear pathway on development, approval, or implementation of non-REDD+ carbon projects
- Current REDD+ Decree is silent on: carbon rights, benefit-sharing, credit trading, corresponding adjustments (Article 6 of the Paris Agreement and the voluntary market), emissions leakage, monetary flows (transfers of funds to beneficiaries), monitoring, enforcement and community engagement, and jurisdictional issues.
- Lack of regulatory framework undermines the credibility of projects and transparency of activities. Countries are required to report emissions and mitigations efforts. If they fail to establish a regulatory framework, they are failing in demonstrating transparency towards Paris agreement goals (NDCs).

Recommendations

- **Establish clear and robust regulatory frameworks.** **REDD+:** The current REDD+ regulation should provide clarity on the missing issues above. **Non-REDD+:** Establish a clear and robust regulatory framework with clear guidelines for other GHG sectors (AFOLU, Energy, Waste, and Industry).

Challenges and Recommendations (2)

Institutional Capacity

Challenges

- **Limited institutional capacity within key GRM bodies** on carbon processes at all operational and decision-making levels - leading to reliance on foreign consultants and auditors rather than GRM ownership of processes.

Recommendations

- GRM should engage stakeholders to **provide capacity building programs** to enhance the knowledge on climate change, carbon processes, emissions reduction and data collection, systematic data collection, database management, data analysis and consistent integration of climate change issues into policies.

Challenges and Recommendations (3)

Awareness and Perception of Carbon Projects & Global Perception of “Carbon Fraud”

Challenges

- Some civil society groups and local media **perceive these projects as land-grabbing** and global protest movements have helped shine a light on this issue in Mozambique and around the world.
- **Due to scandals on reliability of data and overestimation of baselines**, project developers and investors are hesitant to engage in unregulated environments.

Recommendations

- **Raise awareness and address negative perception of carbon projects.** GRM develop a strategy with key stakeholders to raise awareness and improve civil society’s understanding of carbon projects. Strategy may include:
 - **Public awareness programs and learning events** targeting citizens, businesses, policymakers, and community organizations. Events could include presentations by experts, engagement with educational institutions, interactive discussions, and opportunities for questions and answers to enhance understanding and clarify misconceptions.
 - **Development of interactive resources and tools** that provide information, guidelines, and calculators to help individuals and businesses understand their carbon footprint and explore ways to reduce it.
 - **Engagement with local communities.** Sessions designed by and with community members can help demystify the pros and cons of carbon projects.

Challenges and Recommendations (4)

Lack of National Database of Carbon Projects; Measurement & Verification Challenges

Challenges

- **No available data on current carbon projects** in Mozambique. Only 1 program registered in the official GRM platform. Data on other current projects were found in the global VCM registry systems.
- **Lack of reliable and public data** on carbon stocks. Data are needed to measure the potential of and reduce costs in project design and feasibility studies.
- **Lack of trained personnel** to measure and update GHG emissions inventory (last inventory was 2015).
- **Absence of information management system** with current and comprehensive statistics on GHG emissions and project monitoring data for all sectors (AFOLU, energy, waste, direct industrial processes).

Recommendations

- GRM should **improve the MRV system** to ensure integrity and transparency of projects, e.g.:
 - Enhance data collection systems and reporting mechanisms to accurately quantify emission reduction, assess project impacts, and facilitate carbon credit trading;
 - Create structures and procedures to govern an open GHG web page with data for all sectors.
- **All certifications and transactions should be registered** in an open national registry system.

Challenges and Recommendations (5)

Social and Environmental Co-benefits

Challenges

- Current carbon finance initiatives do not adequately address **distributional equity** or deliver sufficient social and environmental benefits, particularly for marginalized communities. Each initiative has his own **benefit sharing mechanism** which is defined on an ad-hoc basis.

Recommendations

- Develop **clear and robust guidelines** on benefit-sharing arrangements:
 - Stakeholder participation (especially local communities) is key to design, implementation, and evaluation of benefit sharing arrangements to ensure they respond to the needs and interests of the full range of stakeholders.
 - Support should be provided to empower communities to participate in carbon projects. Specifically: to delimit communal lands, establish natural resource governance structures, open bank accounts, establish community zoning, map farmers' properties, and train community members on the adoption of sustainable practices.
 - Establish community governance mechanisms for carbon projects, ensuring meaningful participation through regular consultations and dialogue.
- **Prioritize community governance** arrangements for carbon projects in collaboration with donors.

Challenges and Recommendations (6)

Uncertainty and Price Volatility

Challenges

- **Carbon credit prices are subject to significant fluctuations** influenced by policy changes, market conditions, and political stability. This uncertainty and volatility can create risks for investors and project developers, making it challenging to secure stable and predictable financing for carbon projects.
 - **Example: Envirotrade.** Prior to 2008, Envirotrade credits sold at \$12/tCO₂e. After the 2008 economic crisis, sales significantly decreased and credit prices dropped to \$7/tCO₂e, significantly impacting the project's cost structure. Carbon projects require financial security, such as insurance or a dedicated fund, to address and mitigate the impact of such situations.

Recommendations

- **Promote market liquidity and price stability**
 - Develop financial instruments that facilitate risk management and hedging strategies.
 - Stimulate price stability by implementing mechanisms like minimum/maximum prices, reserves or intervention measures to avoid excessive price fluctuations.

Challenges and Recommendations (7)

Access to Finance

Challenges

- **High costs associated with carbon project studies and implementation** (esp. feasibility studies and certifications) limit incentives for private sector investment.
- Carbon projects are **perceived as high-risk investments** due to uncertainties in carbon markets, lack of collateral, limited transparency, or limited track records.

Recommendations

- **Improve access to finance**
 - Develop tax and financial incentive packages for programs and projects to reduce emissions.
 - Engage financial institutions to encourage the establishment of financing lines with attractive interest rates and longer terms.
 - Establish specific investment funds for carbon projects.
 - Establish public-private partnerships to finance carbon projects.

Reasons for Optimism - Looking Ahead

Mozambique: First Mover Status, Political Will and Organizational Capacity

- Mozambique is one of the first countries worldwide to develop a REDD+ decree. Recent movements to develop legal frameworks in the region only started in 2022. Many countries are implementing carbon projects without a regulatory framework.
- National institutions (FNDS and Fundo de Energia [FUNAE]) are interesting in mobilizing international climate finance to invest in green/low carbon solutions. FNDS has invested almost \$1 billion in climate mitigation projects (land, biodiversity conservation, sustainable agriculture, forest and rural development) since 2016.
- MEF established a Climate Finance Unit in March 2023.
- Increased political awareness of climate change issues and the benefits of carbon finance since Mozambique received payment for emission reduction in 2021.
- Numerous financial institutions are exploring financing products for green/low carbon projects (BCI, NEDBank, ABSA, etc)

Global: Market Boom

- Positive signals from growth of VCM (global increase in transaction volumes from \$500 million in 2020 to \$2 billion in 2021).

Recommendations for Further Action

- **Coordinate with relevant donors and stakeholders on current actions** to avoid duplication of carbon financing efforts and resources.
- **Assessment/ mapping of current carbon projects**, to include all projects in Mozambique, current status, and activities proposed. This will help the GRM and all relevant stakeholders to create a project registry system (MTA, MEF, MIMAIP, MADER, MIREME)
- **Assessment of current GHG emissions.** The last inventory was compiled in 2015 and is still being used to date.
- **Coastal assessments.** Due to lack of data and to promote investment in coastal and marine ecosystems (blue carbon) there is a need to:
 - Develop (a) baseline assessment of GHG emissions and removals, and (b) socio-economic assessment in coastal and marine ecosystems.

Obrigado/a!
Thank you!



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ANNEX

Private Sector Experiences - Challenges

1. **High costs** associated with the feasibility studies and implementation of carbon projects and no GRM incentive to support those costs. Lack of technical capacity in country drives project developers to hire foreign consultants and external auditors.
2. There is **no legal and regulatory framework** to guide the pathway for non-REDD+ carbon project implementation (especially those focused on renewable energy or energy efficiency projects, the marine component of blue carbon, waste and industrial processes).
3. New REDD+ project implementers highlighted the **lack of clarity in the procedures** for a) project approval, b) legal benefit-sharing mechanism and c) credit transaction pathway.
4. **Political instability** in some parts of the country threatens implementation (Ex: Cabo Delgado Province).
5. Communities are not well structured to embrace carbon project initiatives. Clear **community delimitation processes are needed**, with governance structure and bank accounts to ensure transparency in the benefit sharing process. Project developers want to work with communities with established systems (governance, bank account, etc).

Private Sector Experiences - Bottlenecks

1. Carbon project **approval processes** under the new REDD+ decree are slow and inefficient. This leads to delays in the authorization processes of projects.
2. **Certification process** is managed by VERRA, Gold Standard, Plan Vivo, CDM, etc. The certification of projects and emissions reductions takes an average of 3 to 12 months. The longest certification process took 36 months.
3. To date, Mozambique has **focused on forest carbon projects** (REDD+), while other areas such as blue carbon, the energy sector, industrial processes, and waste are being neglected.
4. **Lack of incentives** (i.e. upfront financing for feasibility studies) for the private sector to attract more carbon project developers and investors.

Private Sector Experiences - Opportunities

1. **Benefit-sharing.** Involve the private sector, communities, NGOs in the process of development of an implementable and transparent benefit sharing mechanism.
2. **Public policies for all GHG sectors.** Refine the regulatory framework to support the development and implementation of carbon projects in other non-REDD+ GHG sectors.
3. **Financing transparent community delimitation processes.** Efforts should prioritize areas where carbon projects are being developed.
4. **Carbon financial products.** Engage financial institutions to develop carbon products for Mozambique (i.e Banco Comercial do Investimentos [BCI]).
5. **Advisory.** Provide technical support to project developers to facilitate project development and approval and minimize the hassles of delays in certification (USAID Planeta/CrossBoundary).