

Zambia Carbon Market

Insights and Draft Recommendations

April 2024

Introduction

The UK Government is partnering with the GRZ, under the UK–Zambia Green Growth Compact to attract climate finance through opportunities from carbon markets and natural capital valuation. The UK Foreign, Commonwealth and Development Office (FCDO), supported by FSD Africa and Climate Action Platform for Africa (CAP-A) convened a stakeholder roundtable in Lusaka in April 2024, to share perspectives on the current state of carbon markets in Zambia, align on gaps and challenges, and co-develop pathways to improved coordination across carbon market stakeholders, to address the key gaps and challenges. To inform this discussion, CAP-A in partnership with FSD Africa undertook an in-country fact-finding mission and engaged with forty-nine stakeholders to:

- a. Understand the key climate objectives, initiatives, and priorities of different stakeholders.
- b. Identify key challenges and gaps, particularly barriers to investment in carbon project development.
- c. Evaluate options and synergies for improved collaboration, policy support and project development.

This document seeks to provide a common understanding of Zambia's carbon market and inform discussions. It lays out the current state of the carbon market in Zambia, the opportunities and gaps in current policy efforts and proposes recommendations to realise pathways towards achieving an effective and inclusive carbon market in and for Zambia.

Context

There is an urgent need and opportunity to increase Zambia's resilience to climate impact. In recent years, Zambia has faced significant challenges attributed to climate change. In 2023, four of its ten provinces encountered unprecedented flooding, described as the worst in half a century¹. Simultaneously, other regions grappled with severe drought, leading to crop failures, loss of livestock, and widespread shortages of food and water, affecting millions of people². Similarly, driven by the El Niño weather conditions³, exacerbated by climate change, Zambia is currently experiencing another severe drought expected to significantly impact food security and interrelated vulnerabilities including poverty, deforestation/environmental degradation, and low agricultural productivity in the country.

Zambia requires an estimated \$50 billion in climate finance, (of which \$15bn is required for its climate adaptation needs) by 2030⁴. The majority (95%) of this funding is expected to come from

¹ IFRC (International Federation of Red Cross and Red Crescent Societies). 2023. *Zambia Flood in Southern Province*. Geneva: IFRC

² IWMI (International Water Management Institute). 2023. "IWMI Launches High-Tech Drought Monitoring System for Zambia." Lusaka. <https://www.iwmi.cgiar.org/2023/02/iwmi-launches-high-tech-drought-monitoring-system-for-zambia/>

³ El Niño conditions (warm phase) bring drier than average conditions in the wet summer months (December-February) in the southern half of the country, whilst the north of the country simultaneously experiences significantly wetter-than average conditions.

⁴ AfDB (African Development Bank). 2023. *Zambia Economic Outlook*. Abidjan, Côte d'Ivoire: AfDB. <https://www.afdb.org/en/countries-southern-africa-zambia/zambia-economic-outlook>

international donors⁵. While these funds are essential to strengthen climate resilience and improve livelihoods, additional sources of funding are required to build a sustainable pipeline of climate finance. To ensure long-term resilience, Zambia must diversify its funding sources, including climate-related bilateral and multilateral agreements and domestic financing from the public and private sector.

Carbon markets are a viable pathway to attract investment into Zambia's economy, safeguard its diverse landscapes and biodiversity, realise co-benefits, and align with global climate objectives. By incentivising emission reductions and removals, and promoting adaptation measures, carbon markets can drive tangible climate action while fostering community development and advancing progress towards the Sustainable Development Goals (SDGs). Successful carbon projects demonstrate proof of concept, required to attract larger climate financing, and amplify mitigation and adaptation efforts. Supportive policies and regulations, aligned with global rules (e.g. Article 6, ICVCM, VCMI, ICROA, etc.)⁶, enable high integrity as demanded by buyers, and provide co-benefits, required to mitigate some of the risks currently limiting investor confidence. Sustainable carbon markets are well placed to pave the way to attract additional climate finance sources, including private sector investors, by 'proving' the potential for and viability of green investments within the country.

Zambia has made considerable progress in developing an enabling political environment for its carbon market with support from national and foreign stakeholders. The Government of Zambia (GRZ) has made consistent efforts towards providing improved governance for its carbon market. For example, to support and better regulate the first set of carbon projects, it developed the Forest Regulations of 2015 and its associated Statutory Instrument (SI) of 2021, as well as the Carbon Market Framework in 2023. In addition, the government improved the political environment for carbon market projects by restructuring relevant departments into a single ministry - the Ministry of Green Economy and Environment (MGEE) tasked with leading the country's climate action agenda resulting in reduced bureaucratic processes and providing a uniform and single ministry for stakeholders. The impact of these efforts has been multi-dimensional. On one hand, there has been an increase in the number of project developers operating in the country. On the other hand, the GRZ's efforts have also led to increased levels of interests amongst development agencies in developing Zambia's carbon market and sponsoring climate resilience building efforts in the country.

The Government is actively building a regulatory framework to participate in the international carbon market. In partnership with the Global Green Growth Institute (GGGI) and the Food and Agriculture Organisation (FAO), Zambia has been developing Monitoring, Reporting and Verification (MRV) systems through the Zambia Environmental Management Agency (ZEMA). By monitoring credits through (and after) the project process and eliminating issues of double counting or poorly counted credits, MRV systems can increase the integrity of the credits issued in a country and therefore the associated quality, required to participate in internal carbon markets. Similarly, to align with global standards such as that set by the United Nations Framework Convention on Climate Change (UNFCCC), Zambia has been working with GGGI to ensure that its policies and processes align with those stated in Article 6 of the Paris agreement. One key output from these efforts so far has been the development of a Carbon Market Framework.

The Government of Zambia is currently being supported by the World Bank to implement a jurisdictional programme in the Eastern Province of Zambia. The Zambia Integrated Forest

⁵ Commonwealth Secretariat. 2021. "Climate Finance Mapping for NDC Implementation in Zambia." Country Report. https://production-new-commonwealth-files.s3.eu-west-2.amazonaws.com/migrated/inline/Climate_Finance_Mapping_for_Zambia_UPDF.pdf

⁶ ICVCM - Integrity Council for Voluntary Carbon Markets; VCMI – Voluntary Carbon Markets Integrity Initiative; ICROA - International Carbon Reduction and Offset Alliance

Landscape Project (ZIFLP), implemented by the Ministry of Green Economy and Environment with support from the World Bank and other partners was introduced in 2018, to “*improve landscape management and increase environmental and economic benefits for targeted rural communities in the Eastern Province and improve Zambia’s capacity to respond promptly and effectively to an eligible crisis or emergency*”⁷. Since its launch in 2018, the project has achieved several milestones, including the provision of policy development support to the government, completion of several technical studies and hosting of workshops to bridge some of the technical capacity gaps, engaging with private sector players and not-for-profit organisations, to establish proof of concepts and understand the type and degree of support required on the ground. More recently, via the emissions reduction purchase project, the World Bank has supported the GRZ in implementing a jurisdictional programme, using the BioCarbon Fund ISFL⁸ standard. This programme, part of a larger five-country⁹ support, came at an opportune time for Zambia - to help solve the growing integrity concerns in REDD+ projects. For example, project developers were previously able to select locations of their project, leading to high demand for select geographic areas, identified as ‘quick and easy’. This further created issues around emission leakages at project borders. In addition, given the different standards used by project developers, actual emission reductions were difficult to compare across projects. The jurisdictional programme, piloted in the Eastern Province (EP) of Zambia, aimed to improve the transparency and quality of results by adopting a single standard and reference point across all projects and establish proof of concept for jurisdictional programming. The programme, officially launched in March 2024, is currently in the implementation phase. Early results are promising specifically in terms of delivery of high-integrity credits and creating a market for these credits, through the offtake agreement for USD 30m of credits generated from the programme¹⁰.

Current state and implications

Zambia's carbon market regulatory landscape currently covers REDD+ carbon projects only, leading to perception of regulatory risks for non-REDD+ projects. To date, existing policies guiding the country’s carbon market operations are The Forestry Act of 2015 and the subsequent Forest (Carbon Stock Management) Regulations introduced in 2021, applicable only to REDD+ carbon projects. Without clear regulatory frameworks and implementation of relevant carbon policies, potential investors view Zambia as high risk, like other countries with this gap. There is an urgent need to develop policies to govern non-REDD+ projects and effectively balance the needs of government, local community, and private sector stakeholders. While the CCA is expected to solve for these challenges, its delayed release is a key driver behind the increasing perception of risk in currently investing and engaging in Zambian carbon markets.

The sustainability of REDD+ opportunities and projects require improved integrity of REDD+ credits required to realise higher prices. REDD+ projects account for over 86% of total carbon credits issued in Zambia. This is largely due to:

- donor support focused on improving forest community livelihood resilience, due to the high likelihood and scale of potential climate change impact in the country;
- first mover advantage of an initial private sector carbon project developer focused on REDD+, due to the abundance of forest assets (and hence opportunity) in Zambia, setting the stage for other investors and developers; and

⁷ Project appraisal document - World Bank

⁸ Initiative for Sustainable Forest Landscapes

⁹ Colombia, Ethiopia, Mexico, Zambia, and Indonesia

¹⁰ BioCarbon Fund ISFL

- a higher level of investor and project developer confidence due to regulations governing REDD+ projects.

However, the lack of (enforced) policies, perceived influence of project developers and limited transparency with regards to co-benefits have resulted in low demand for Zambian REDD+ credits-49% of REDD+ credits issued in Zambia currently remain unsold¹¹. While the number of unsold credits is tied to the general issues around the integrity and additionality of REDD+ globally¹², the gaps in governance lead to additional uncertainty in Zambia. As a result, Zambian REDD+ credits are likely viewed as lower integrity, compared to credits in other Global South countries. This is a deterrent to new REDD+ project developers / investors and makes it difficult for existing investors to attract additional investment.

As the Government of Zambia seeks to scale the jurisdictional approach to other provinces, there is a need to consider learnings from ZIFLP, including:

- The importance of determining which approach is most suitable. For instance, in provinces where non-REDD+ projects like clean cooking or climate-smart agriculture are prevalent, a project-based approach may be more appropriate.
- Future programmes should consider forward purchasing agreements to provide opportunities for upfront financing for project developers, to avoid high and sometimes impossible project finance costs.
- Implementing a carbon standard that is widely used and accepted. The benefit sharing mechanisms and carbon accounting frameworks of known standards are well placed to ensure high integrity, likely supported by strong use cases and are therefore easier to adopt / implement.
- The jurisdictional approach applies a single standard to all projects in the region covered. However, there are diverse types of emission reduction projects, including REDD+, climate smart agriculture, clean cooking, which require a variety of considerations. Therefore, standards applied to a jurisdiction should appropriately cater to the unique complexities of all the types of projects it may cover. By considering this, Zambia would be better equipped to expand beyond its current focus of REDD+.
- Based on international¹³ and national¹⁴ laws, only communities have the authority to (temporarily) transfer the rights of use of the land to their selected project developers, based on an agreed benefit sharing mechanism. However, given that the jurisdictional approach gives this right to the government, in depth consultations with communities and adequate consideration of social preservation and protection systems for communities are required to ensure mutual agreement.
- Transitioning to jurisdictional REDD+ programmes require careful consideration of and defining suitable mitigation activities and enhanced MRV capacity. Zambia should reconsider centralised nesting provisions, to attract investors effectively.

A number of global agencies are currently supporting Zambia to develop its carbon market, but this

¹¹ Berkley Public Policy. Voluntary Registry Offsets Database.

¹² On average 57% of credits from REDD+ projects in Sub-Saharan Africa are unsold, and 56% globally.

¹³ Such as the Convention on the Elimination of All Forms of Discrimination Against Women (CEDAW), the Universal Declaration on Human Rights (UDHR), the International Covenant on Economic, Social, and Cultural Rights (ICESR), and the International Covenant on Civil and Political Rights (ICCPR). As a member state of the United Nations, Zambia has signed and ratified these and other international and regional instruments.

¹⁴ The Forests Act, 2015. (Act No. 4 of 2015). The Forests (Community Forest Management) Regulations, 2018. SI 11; The Lands Act 1995; The Chiefs Act 1964; National lands Policy 2021

support tends to be siloed. The World Bank, GGGI and others¹⁵ are partnering with the government to address key gaps in governance structures required for carbon markets. For example, the World Bank is supporting capacity building and the delivery of a jurisdictional programme; GGGI is supporting Zambia develop a national carbon policy aligned with Article 6; while EEAS and FAO are supporting the development of national MRV systems. However, while these individual initiatives are required, the siloed approaches reduce the collective impact of these efforts. For example, as the government seeks to develop policies and regulations aligned with Article 6¹⁶, there is a need to include the existing Forest Regulations, consider implications on current REDD+ and seek to align with or include the jurisdictional approach. On the other hand, critical aspects such as the development of a national MRV system¹⁷ require additional support and capacity; the one under development by the EEAS has a completion timeframe of 5–9 years. Other market stakeholders also operate in silos. For example, the government is focused on developing the right policies and enabling environment to attract carbon investment that can deliver sustainable value for communities; project developers are focused on realising value for all project stakeholders, including communities; and CSOs are focused on ensuring that benefits to communities are optimised and realisable. For the value added by each stakeholder category to enable an effective and inclusive carbon market within the shortest possible time, stakeholders need to collaborate, share learnings, and realise synergies, to integrate their efforts into a balanced and comprehensive set of regulations.

Technical capacity and workforce gaps within government remain an ongoing challenge. Several initiatives led by global agencies exist to enhance the technical capacity of the MGEE. Despite these efforts, key gaps remain, including (i) limited capacity building within other relevant ministries risking the implementation of effective governance structures, based on the needs and opportunities of the country as a whole¹⁸; (ii) delivery of thematic/sectorial support focused on resilience rather than mitigation; and (iii) limited support to fill the human resources capacity gap (through additional hires), required for the country to own and drive carbon market development.

Benefit sharing mechanisms are vital for high quality, high integrity credits, demanded by global buyers, yet Zambia lacks regulatory detail and support in this area. While developing regulations to guide the activities of carbon markets is a core focus of the government, the key issue of benefit sharing has received less attention. The Forestry¹⁹ and Wildlife²⁰ Regulations both state that a benefit sharing plan must be submitted and implemented in each (REDD+) project. However, specific guidelines on how benefits are defined or calculated are missing. As a result, to date, project developers and communities have developed and implemented their own mechanisms. The Carbon Market Framework does not elaborate on this and it's not yet clear if/how it will be considered in the CCA. This gap exacerbates the current lack of transparency and the limited tracking and monitoring of benefits and, therefore, inadequate (or non-existent) benefit sharing practices. There is an urgent need to consider and identify benefit sharing mechanisms appropriate for the Zambian context and related projects and to develop suitable governance structures to (i) incentivise communities to engage in mitigation and adaption activities; (ii) realise improved and

¹⁵ A longer list is included in the annex.

¹⁶ This focus on Article 6 alignment has been based on the goal of pricing its carbon credits above \$100 each (as shown by the President). However, such prices are only available in compliance markets like the EU ETS, which African credits lack access to. Hence, by collaborating with multiple agencies, Zambia's immediate aim should be producing high-quality authorized credits for sale in Voluntary Carbon Markets (VCM).

¹⁷ The MRV system is vital for carbon market projects, ensure verified emissions reductions needed for investor confidence. They enhance transparency, accountability, and mitigate fraud risks by monitoring and reporting project activities.

¹⁸ For example, the Ministry of finance has struggled to create a fiscal pace for the country.

¹⁹ 23.2.a-d "a benefit sharing mechanism shall— (a) contain a benefit sharing agreement executed by all interested parties; (b) be developed jointly with all interested parties; (c) contain auditable benchmarks; and (d) be derived from the gross revenue of carbon credits sold."

²⁰ 35.1 "A board shall establish a fund to enhance the economic and social wellbeing of the local community within the area described in section thirty-two."

sustainable community livelihoods; (iii) meet the bar of high integrity and high-quality credits; and (iv) support and strengthen carbon project feasibility.

Recommendations

The Zambia has made promising strides towards realising an effective carbon market, however, as summarised above, there are some challenges that have had negative impacts, such as the perception of high project risk and limited participation of new project developers and private investors. Therefore, the recommendations below are proposed to limit the impact of the current situation, explore how the jurisdictional approach can be optimally replicated in other provinces, and strengthen Zambia's pursuit towards realising an effective carbon market.

A comprehensive regulatory framework is essential to define the roles and responsibilities of various ministries. As the Carbon Credit Act (CCA) is being finalised and released, it is crucial to align existing regulations and clarify the roles of ministries involved in approving projects, both in REDD+ and non-REDD+ contexts. Presently, conflicting directives exist between the Forestry Regulations and the Carbon Market Framework. In addition, clarification is necessary to ensure consistency and efficiency in project approval processes based on comprehensive regulation with an unambiguous division of roles and responsibilities with a sole focal point to propose projects, receive project requests, and issue approvals. Currently, there is limited clarity as to who is to be approached for new project proposals, specifically for forest and non-forest projects.

Sizing and situating of non-REDD+ carbon project opportunities in Zambia. Explore non-REDD+ carbon projects to maximize Zambia's carbon market potential and increase innovative and technological investments in the country. This would involve sizing and situating of opportunities in sectors like energy, agriculture, forestry, and waste management to identify emission reduction opportunities and implement based Zambia's context.

Support market access for Zambian carbon credits. To ensure Zambian carbon credits can access global markets, aligning governance with international standards like Article 6 of the Paris Agreement will be crucial. This requires accurate baselines, strong monitoring systems, and transparency. Understanding global buyers' preferences is also vital to address any perceived risks or barriers. Transitioning to jurisdictional REDD+ programmes requires careful consideration such as defining suitable mitigation activities and enhancing MRV capacity. Zambia should answer these questions and reconsider centralised nesting provisions, to attract investors effectively.

Implement a concerted effort towards capacity-building at an interministerial level. This coordinated approach will bring in a sense of ownership, identify gaps across ministries, understand individual learning priority areas, ensure consistent information and awareness levels and pinpoint specific areas needing support for wider government engagement in carbon markets. It will also help develop incentive structures for effective benefit sharing, incentivise investment, promote sustainable community development and ensure global alignment while considering Zambia's context.

Support the development of effective benefit sharing mechanisms. While some African governments have introduced benefit sharing models, feedback suggests they may not attract the needed investment. Zambia aims to enable local investment and climate financing and realisation of co benefits (including poverty reduction and climate adaptation), which require clear benefit sharing models. Therefore, agreements between government, investors and communities are vital for integrity and market access. The Government is best placed to orchestrate benefit sharing mechanisms and ensure that projects developers do follow necessary requirements and guidelines, and properly implement them. Zambia should build on existing learnings and collaborate to establish equitable benefit sharing. In addition, the Government should also consider

developing benefit sharing mechanisms, with the input of other stakeholders, and ensure that project developers abide by these guidelines.

Enhance collaboration among stakeholders by expanding existing platforms or creating new ones.

These platforms should facilitate shared learning and best practices, and involve diverse stakeholders such as global agencies, local communities, government bodies, CSOs, and private sector actors. This collaborative and inclusive approach will help foster trust, transparency, and accountability, while sharing insights helps mitigate investment risks. Also, distributing decision-making power among stakeholders is vital for REDD+ jurisdictional approaches, implementing benefit-sharing mechanisms, promoting sustainable resource management, and aligning carbon projects with national climate goals.

Create market incentives and support financing tailored to address high capex and other upfront project costs which hinder carbon project development, especially for local investors and the private sector in Zambia. Involving local stakeholders is crucial for seizing carbon opportunities, retaining value within Zambia, and building community partnerships. This approach not only ensures equitable value distribution but also drives economic growth, sustainable development, and project sustainability. To unlock Zambia's carbon market potential and ensure long-term prosperity there is a need to create an enabling environment through a supportive tax regime, transparent and predictable regulation, accountability, and including the private sector into the capacity building. In addition, there is a need to implement financing solutions tailored to domestic investors and project developers' needs and constraints, such as the green bonds and green loans introduced in the country, but at a larger scale.

Conclusion

The development of an effective carbon market in Zambia has great promise, not only for mitigating climate change but also for driving economic growth and human development. There is an urgent need to address the gaps through improved collaboration and coordination. This will enable the Government and stakeholders to take account of the learnings to date and collaborate to inform appropriate governance and market building efforts required to realise an effective carbon market in and for the country. It is important to acknowledge that all countries leading the momentum in Africa are facing challenges, some intrinsic to carbon markets, others specific to each nation. It is, therefore, critical, and timely for Zambia to chart its own path, ensuring sensible and meaningful progress. While Zambia has the prerequisites required to develop a sustainable carbon market and climate action, there is a need to collectivise efforts to generate high-quality carbon credits, realise higher prices, and develop sustainable proof of concept. This can attract large pools of investment capital required to contribute meaningfully to global climate efforts while advancing the country's socio-economic development goals.

Annex: List of Global Agencies Operating in Zambia

Agency	Focus Area
African Development Bank (AfDB)	Climate Resilient Livestock Management Project
Climate Investment Funds (CIF)	-Pilot Program for Climate Resilience (PPCR) -Forest Investment Program (FIP) -Scaling up Renewable Energy Program (SREP)
European External Action Service (EEAS)	-Development of a Monitoring, Reporting and Verification System -Climate Resilience Agriculture
Food and Agriculture Organisation (FAO)	-Forest and farm program -Community farm management support
GFA Consulting	Article 6 alignment
Global Green Growth Institute (GGGI)	Article 6 alignment
Green Climate Fund (GCF)	- Macro-economic and fiscal circumstances and poverty reduction strategies - Low emission and clean energy policies/strategies - Infrastructure investment policies (e.g. related to urban development and transport) - Adaptation and risk management policies/strategies
Green Economy Fund (GEF)	Jurisdictional approach
World Bank	ZIFLP Jurisdictional programme

*Note that this list is not exhaustive.