Greening the Financial Sector in Malawi

A feasibility study

December 2024

NDC PARTNERSHIP

CONTENTS

ABBREVIATIONS

DFI	Development Finance Institution
DoCCMS	Department of Climate Change and Meteorological Services
DoDMA	Department of Disaster Management Affairs
ESG	Environmental, Social, and Governance
FI	Financial Institution
FiNES	Financial Inclusion and Entrepreneurship Scaling project
GHG	Greenhouse Gas Emissions
LDC	Least Developed Country
MCMI	Malawi Carbon Markets Initiative
MK	Malawian Kwacha
MoF	Ministry of Finance
MoNRCC	Ministry of Natural Resources and Climate Change
MSE	Malawi Stock Exchange
NGFS	Network on Greening the Financial System
NTCCCDRM	National Technical Committee on Climate Change and Disaster Risk Management
RBM	Reserve Bank of Malawi
SADC	Southern African Development Community
UNDP	United Nations Development Programme
UNCDF	United Nations Capital Development Fund
UNEP CCC	United Nations Environment Programme Copenhagen Climate Centre
WWF	World Wildlife Fund

INTRODUCTION

Malawi is highly vulnerable to climate change and its financial sector is expected to face increased climate-related financial risks in the near-term.

There is a growing recognition that climate-related financial risks threaten price and financial stability, thus affecting the mandate of the Reserve Bank of Malawi (RBM), the country's monetary authority and supervisory agency for the financial industry. Climate-related financial risks refer to the risks expected to arise from climate change or efforts to mitigate climate change, their related impacts, and economic and financial consequences. Physical risks from climate change in Malawi include extreme weather events, such as floods, droughts, strong winds associated with tropical cyclones, inconsistent rainfalls, and environmental degradation affecting land and natural resources.[1][2] Transition risks, stemming from changes in policy, markets, or technology in response to climate change, are currently low given Malawi's small greenhouse gas emission profile. Still, they are expected to grow with the country's carbon footprint. Moreover, climate-related transition risks stemming from regulatory changes, consumer preference shifts, and environmental advocacy abroad (e.g. in response to deforestation) could have severe impacts on several economic sectors and the financial institutions (FIs) covering them.

A green financial sector will enable the transition to a low-carbon and climate-resilient economy in Malawi. It mobilizes public and private capital for sustainable investments while hedging against climate risks.

Malawi's financial markets must adequately signal and price climate-related risks – whether this reflects exposure to physical hazards or the possibility of assets becoming stranded – and channel financing towards climate change mitigation and adaptation. Transforming the existing financial sector into one capable of achieving these goals will require coordinated efforts from key state and non-state actors who have the ability to create a financial ecosystem conducive to investments into climate change mitigation and adaptation. Furthermore, it will also require buy-in and action from the private FIs themselves, e.g. banks, insurance companies, and nonbank FIs.

This feasibility study seeks to align these stakeholders around the following shared objectives:

- Identify gaps, barriers, and areas that demand action to improve the provision of finance towards climate action in Malawi,
- Detail an action plan with timelines, actions, and key actors in Malawian for the focus areas and
- Communicate priorities to Malawian stakeholders in the financial sector and signal commitment.

[1] Government of Malawi (2021). *The Third National Communication of the Republic of Malawi to the Conference of the Parties (COP) of the United Nations Framework Convention on Climate Change (UNFCCC)*. January, 2021. https://unfccc.int/sites/default/files/resource/TNC%20report%20submitted%20to%20UNFCCC.pdf

[2] World Bank (2022). *Malawi World Bank Group Country Climate and Development Report*. October, 2022. https://documents1.worldbank.org/curated/en/099545010272237260/pdf/P1772201ced75ce9182e7142761bde013662bca4fe42.pdf

BARRIERS TO GREENING THE FINANCIAL SECTOR

Global context

The present global financial system, the state of multilateral development finance, and the insufficiency of climate funding present barriers to Malawi's climate commitments.

The present global financial system falls short of what is required to enable a transition to a global state of net zero emissions and climate resilience by mid-century. While investments into climate change mitigation and adaptation are growing, they are not on track to result in an attainment of these global climate goals.

The Climate Policy Initiative estimates that the volume of average annual climate finance flows amounted to USD 1.3 trillion in 2021/2022.[3] While this is a sizeable increase to previous years, annual climate finance flows must grow by more than sixfold compared to current levels, reaching USD 8.5 trillion per year by 2030, and over USD 10 trillion per year from 2031 to 2050. However, global climate finance is not proportionally distributed. Less than 3% of the above-mentioned finance flowed to or within Least Developed Countries (LDCs) like Malawi.[4]

The present international development finance system is failing developing countries, especially LDCs like Malawi, when it comes to providing adequate support to enable climate investments. Global funding for mitigation is available at higher volumes than funding for adaptation to climate change, despite the latter being a greater priority for many developing countries, including Malawi.[5] International adaptation finance from bilateral and multilateral sources amounted to USD 27.5 billion globally in 2022 – far short of estimated needs of USD 387 billion annually by 2030 for developing countries alone.[6] What is more, accessing the limited amounts of international climate finance that is available is often cumbersome and lengthy for eligible organisations in developing countries.

Overall, international climate finance for countries like Malawi is insufficient to support their achievement of mitigation goals and address their adaptation needs. Reparations for losses and damages due to climate change are not forthcoming, aggravating resentments from least developed countries like Malawi, which have contributed little to the climate crisis yet are over-proportionally impacted by its consequences due to their propensity to have constrained public finances, reliance on climate-sensitive economic sectors, and highly vulnerable populations, all of which limit their capacity to adapt.

At the same time, monetary and prudential authorities worldwide are growing cognizant of the threat climate-related and environmental financial risks pose to price and financial stability. There is a rising level of international exchange on how to respond to this challenge, which has manifested itself in the form of global engagements on climate risks by the Financial Stability Board, the Networks for Greening the Financial Sector, the International Organization of Securities Commission, the Basel Committee on Banking Supervision, and others.

---

[3] Climate Policy Initiative (2023). *Global Landscape of Climate Finance 2023*. November 2023. https://www.climatepolicyinitiative.org/wp-content/uploads/2023/11/Global-Landscape-of-Climate-Finance-2023.pdf

[4] *ibid*.

[5] United Nations Environment Programme (2024). *Adaptation Gap Report 2024: Come hell and high water — As fires and floods hit the poor hardest, it is time for the world to step up adaptation actions*. Nairobi. https://doi.org/10.59117/20.500.11822/46497.

[6] *ibid*. Note that these figures on adaptation finance exclude private sector finance and focus on multilateral and bilateral development finance that support adaptation finance.

National context

Given the inadequate supply of development funding for climate action and insufficient public funding in Malawi, the role of the private sector in investing in climate change mitigation and adaptation is even more pertinent. However, private sector investment in climate change mitigation and adaptation is limited by the availability and affordability of financing.

Several factors limit the availability and affordability of financing. Financing is often unaffordable, given the very high interest rates for lending in Malawi's currency. Exchange rate risk prevails for lenders in foreign currencies. These factors disproportionately hinder investments in some climate technologies characterized by high upfront capital costs and realizing cost savings over longer time frames.[7] Similarly, financing climate technology projects is considered risky by some FIs, leading to collateral requirements for borrowing becoming an obstacle for many private sector actors. Short tenors or lack of grace periods impede financing for longer-term investments.

Meanwhile, a shortage of foreign currency is also a factor for actors who require components of renewable energy and other climate technologies that need to be imported. In addition, the need for consumer education on climate technologies is significant.

The current state of green finance in Malawi can be described as nascent.

Green products and climate finance do not play a significant role in the country's development finance institutions (DFIs) or commercial banks. The absence of green bonds can be attributed to Malawi's small bond market, which lacks private issuances in general.

Likewise, knowledge of climate-related risk assessment and management is generally considered to be low by RBM representatives, and climate risk disclosure amongst Malawian FIs is limited. However, some reporting on environmental, social, and governance (ESG) topics features in a selected number of FIs annual reports. While the release of guidelines on the management and disclosure of climate-related and environmental financial risk for banks was well-received by the banking sector, it is a guideline and there is no regulation yet on sustainable finance.[8]

Capacity gaps in Malawian FIs included scarce technical capacity from the financial service and insurance providers, which is impeding the greening of the financial sector.

This includes knowledge on ESG reporting and climate-related risk disclosure but also on risk assessment and management at the project level. Furthermore, technical capacity relating to structuring climate change mitigation and adaptation needs into bankable investments is limited among Malawian entities with a mandate for climate action. Capacities required in FIs to manage and disclose climate-related and environmental financial risk as recommended by the RBM include (i) methods and tools to conduct climate scenarios analysis, (ii) risk identification and monitoring tools for the portfolio and the counter-party (borrower) level, (iii) suggestions for risk indicators to categorize counterparties, sectors and geographical locations based on the extent of climate-related and environmental financial risks; and (iv) expertise on how to make a risk mitigation plan for risks deemed material.[9]

Greening the financial sector will require policies and plans to manage climate-related and environmental financial risk to be implemented

[7] *ibid*

[8] Reserve Bank of Malawi (2023). *Guidelines on managing climate-related and financial risks in banks and banking groups*.

[9] *ibid*.

by the Ministry of Natural Resources and Climate Change (MoNRCC), the Ministry of Finance (MoF), and the RBM.

In response to climate change, central banks and prudential authorities globally are increasingly undertaking steps to manage climate-related and environmental financial risks at the systemic and organisational level. The RBM can adapt its monetary operational frameworks policy to reflect climate-related risks. In the near term, the RBM could adopt appropriate additional risk management measures to protect its balance sheets against the financial risks brought about by climate change. At a later stage, the RBM could move beyond risk management to aligning monetary policy operations to the transition to a low-carbon economy.

MoNRCC and MoF can support the goal of reducing climate-related financial risks through their work and their functions.

The MoNRCC is instrumental in enabling Malawian organisations to gain access to finance from the Adaptation Fund and the Green Climate Fund. It is the ultimate technical authority on what constitutes green activities in Malawi. Moreover, it can provide useful information on climate risk and vulnerability that can inform risk mitigation measures by the RBM and Malawian FIs.

The MoF is crucial in coordinating government action and international cooperation. It can help create a conducive environment for investments into climate change mitigation and adaptation through fiscal policy and ensure a climate-positive cooperation with international DFIs and other potential investors. Additionally, the MoF plays a role in shaping policies and regulations that enable the financial sector to address and respond to climate-related risks and ensuring that financial sector policies support national commitments, such as emissions reduction targets and climate adaptation plans.

There is a role for the RBM, MoF, and MoNRCC to facilitate mobilization of public and private resources for climate change mitigation and adaptation investments as part of greening the financial sector.

Mobilizing resources towards climate action is a cross-governmental goal in Malawi that requires action by several stakeholders. The RBM, MoNRCC, and MoF share responsibility for facilitating private investments into climate change mitigation and adaptation.

Any efforts to green the Malawian financial sector must account for its present circumstances.

Financial access is limited in Malawi, which impedes effective climate action, especially climate change adaptation. Broadening access to financial services, including insurance for households and businesses, is key for both development and to climate-prove Malawian financial markets. International finance in varied forms will be required in the near and long term. In the near future, concessional funding from Green Climate Fund and the Global Environment Facility can help pilot and financial products and programmes both broaden financial access and help households and businesses respond to climate risks. Over time, the existing portfolio of multilateral and bilateral development financiers in Malawi should be increasingly expanded to include green credit lines for Malawi's DFIs and commercial banks, project financing for climate-resilient and low-carbon infrastructure, disaster risk insurance, and other financing that promotes climate resilience and decarbonization of the Malawian economy.

PROPOSED ACTION PLAN

Table 1 Key areas of intervention for greening the financial system

Key areas	Description
1. Strategy, coordination and capacity building on green finance	This refers to a set of actions – many to be commenced in the near term – to establish a strategy and coordination mechanism among the most relevant stakeholders, such as the RBM, the MoNRCC, the MoF, and other public stakeholders. Moreover, it includes capacity-building efforts, such as seeking support from development partners and participating in international networks as a means of learning.
2. Green public financial portfolios and assets	This area includes actions such as greening and capitalizing Malawian public funds and FIs, introducing the RBM's own green financing schemes, and accessing development partner support in these endeavours.
3. Create a conducive environment for climate investments	This includes actions that foster an understanding of which economic activities foster climate change mitigation and adaptation. Moreover, it includes actions that foster functional markets for different green financial products.
4. Green private financial institutions	This includes actions that build capacity and willingness among FIs to address climate-related and environmental financial risks and to offer green financial products. It also includes the role pension funds in Malawi can play as investors in climate action.
5. Management and disclosure of climate-related and environmental financial risks	Actions that help the RBM, FIs, and others understand their exposure to climate-related financial risks and how to respond to them.
6. Central bank financial instruments and monetary policy	These include actions that may not be immediately applicable in Malawi and its current macroeconomic context but that have been applied by other central banks to green their countries' financial sector. They are for the RBM's long-term consideration.

Table 1 presents are the six key areas to focus on in greening the financial system in Malawi.

Under these six areas, there are 22 actions to commence in the near, medium-, and long-term, presented in Table 2. Near-term actions are actions that could be started within approximately 6 months, medium-term actions could commence to be implemented within 3 years while long-term actions refer to measures that are to be implemented possibly in the future. Table 3 organises these actions according to whether they can be implemented by the RBM unilaterally – i.e. without technical support or resources from other organisations – or whether they require cooperation with- or resources from external organisations to implement.

Table 2 Proposed actions, organised by their timeframe

Near-term (less than six months)
• Set up a climate unit within the Reserve Bank of Malawi • Release guidelines for management and disclosure of climate-related and environmental financial risks for the insurance and microfinance sectors • Build capacity for management and disclosure of climate-related and environmental risks at the Reserve Bank of Malawi • Obtain knowledge and expertise in climate scenario analysis at the Reserve Bank of Malawi • Build capacity at key ministries involved in greening the financial sector • Join the National Technical Committee on Climate Change and Disaster Risk Management
Medium-term (between six months and three years)
• Establish cross-governmental working group for greening the financial sector • Attempt internal climate scenario analysis exercise (as a learning exercise) • Provide financial institutions with data on physical risks • Green and capitalize the Export Development Fund, Malawi's development finance institutions and its climate funds • Introduce the Reserve Bank of Malawi's own green financing schemes • Explore the use cases and assess the effort required to produce a green taxonomy in Malawi • The Reserve Bank of Malawi to help foster green bonds • Support the development of carbon markets • Explore potential for innovative green financial instruments • Raise awareness and build capacity in industry on management and disclosure of climate-related and environmental risks • Establish a risk-focused industry dialogue or platform
Long-term (more than three years)
• Promote climate resilient and low-carbon investments through differentiated reserve requirements • Foster climate resilient and low-carbon investments through differentiated capital requirements • Implement differentiated collateral requirements • Introduce targeted refinancing lines for financial institutions • Green Malawi's pension funds

Table 3 Proposed actions, organised by whether they can be implemented with the RBM's own resources

Actions to implement with the RBM’s own resources
• Set up a climate unit within the Reserve Bank of Malawi • Release guidelines for management and disclosure of climate-related and environmental financial risks for the insurance and microfinance sector • Build capacity for management and disclosure of climate-related and environmental risks at the Reserve Bank of Malawi • The Reserve Bank of Malawi to help foster green bonds • Explore the potential for innovative green financial instruments • Promote climate-resilient and low-carbon investments through differentiated reserve requirements • Foster climate-resilient and low-carbon investments through differentiated capital requirements • Implement differentiated collateral requirements • Introduce targeted refinancing lines for financial institutions • Green Malawi’s pension funds
Actions requiring external collaborations and resources
• Obtain knowledge and expertise in climate scenario analysis at the Reserve Bank of Malawi • Join the National Technical Committee on Climate Change and Disaster Risk Management • Establish a cross-governmental working group for greening the financial sector • Raise awareness and build capacity in the financial industry on management and disclosure of climate-related and environmental risks • Establish a risk-focused industry dialogue or platform • Build capacity at key ministries involved in greening the financial sector • Attempt an internal climate scenario analysis exercise (as a learning exercise) • Provide financial institutions with data and tools on physical risks Green and capitalize the Export Development Fund, Malawi’s development finance institutions and its climate funds • Introduce the Reserve Bank of Malawi’s own green financing schemes • Explore the use cases and assess the effort required to produce a green taxonomy in Malawi • Support the development of carbon markets

NEAR-TERM ACTIONS

Set up a climate unit within the Reserve Bank of Malawi

There is strong and immediate need for the RBM to institutionalise climate change into its organisational structure. Establishing a climate unit within the Reserve Bank would serve to create a dedicated cross-departmental team that would become a dedicated hub for climate change expertise and enable cross-departmental coordination on climate change issues.

Drawing on the experience of other central banks – particularly those that, like the RBM, unite micro-prudential, macro-prudential, and monetary functions in the same organisation – potential models for a climate unit would include:

- a dedicated climate team composed of fulltime staff that are able to blend climate change expertise with traditional expertise relevant to key departments, or
- a cross-departmental working group in which members of relevant departments meet periodically to coordinate/collaborate on climate issues and initiatives.

A key determinant of the to-be-selected model is likely to be the availability of resources. However, in a scenario where resources are not available to establish a dedicated climate team, the climate unit could start as a cross-departmental working group but evolve overtime as more resources become available.

Regardless of the model selected, participants of the climate unit should include staff from the Departments for Financial Market, Bank Supervision, Pension and Insurance Supervision, Financial Sector Regulation, Economic Policy and Research, the Financial Stability Unit, and other teams at the RBM.

Release guidelines for management and disclosure of climate-related and environmental financial risks for the insurance and microfinance sector

The RBM has already released a set of guidelines for the management and disclosure of climate-related and environmental financial risks for banks and banking groups. While these guidelines are not part of financial regulation, they give guidance to the industry and could form part of financial regulation in the future. Such an adoption into financial regulation would be advisable Therefore, guidelines for other financial sectors, including insurance and microfinance, should follow. Climate-related risk disclosures by supervised entities are important climate exposure tools for central banks and therefore this action is an important, near-term priority for the RBM.

A first step would be to obtain the buy-in and approval of the RBM's executive management. Actors required for implementing this action include all supervision departments at the RBM (i.e. pension, insurance, microfinance, capital markets and bank supervision), the Financial Stability Unit and the Department for Financial Sector Regulation. The RBM's supervision departments would be responsible for drafting the guidelines with inputs and feedback from industry that they supervise. Potentially, relevant departments under the Ministry of Natural Resources and Climate Change (MoNRCC) – e.g. the Department of Disaster Risk Management (DoDMA) and the Department of Climate Change and Meteorological Services (DoCCMS) – could provide input on physical risks.

As the guidelines potentially represent a future regulatory instrument, prior to developing these guidelines the RBM should seek to learn from regulators in other jurisdictions that have implemented guidelines for the insurance and/or microfinance sectors (e.g. South African Reserve Bank Prudential Authority). Examples set by regulators in other jurisdictions could serve as blueprints for the RBM to follow. Moreover, there is best practice on such guidelines available by the International Association of Insurance Supervisors.

Finally, the RBM should be aware that developing guidelines will be a relatively long and resource-intensive process. In particular, drafting the guidelines will require dedicated human resources, while meaningful consultation with industry can take time. Furthermore, once the guidelines are in place, supervised entities will likely require capacity-building to be able to implement the guidelines (see Raise Awareness and build capacity in industry on Management and disclosure of climate-related and environmental risks).

Obtain knowledge and expertise in climate scenario analysis at the Reserve Bank of Malawi

Like many central banks and regulators in emerging markets, the RBM is in the early phases of assessing the financial sector's exposure/vulnerability to climate-related risks[10] and has not started the process of conducting an initial climate scenario analysis exercise.

To successfully conduct an initial climate scenario analysis exercise, the RBM will need to address significant model- and data gaps. As such, the initial exercise could take 1–2 years to complete. In light of this, prior to formally starting the process of conducting an initial climate scenario analysis, it would be prudent for the Reserve Bank to first obtain knowledge and expertise in the area. Obtaining initial expertise can initially consist of self-study (i.e. reading available literature), participating in peer-learning initiatives (e.g. webinars or seminars hosted by NGFS), or attending relevant online and in-person trainings (e.g. by Toronto Centre or the World Bank).

Allocating time and resources to those who would be responsible for conducting a climate scenario analysis should help them to get an overview of (i) the different approaches to climate scenario analyses, including which approaches are (or are not) feasible in the Malawian context given the availability of financial and climate data, financial and climate models, resources, etc. and (ii) gaps and barriers that need to be overcome. Both of these will be invaluable when the process of conducting an initial climate scenario analysis begins in earnest.

Build capacity for management and disclosure of climate-related and environmental financial risks at the Reserve Bank of Malawi

RBM staff should engage in international working groups and other fora on climate topics as a means of keeping up to date with current best practices, obtaining knowledge and learning new skills.

---

[10] The most notable progress in this regard is an evaluation of the banking and insurance sectors' exposure to climate risks contained in a recently developed Roadmap for assessing and managing climate risks for the banking and insurance sectors in Malawi (RBM and World Bank 2024), which provides initial insights about the financial systems exposure to climate-related risks.

Capacity and knowledge gaps at the RBM are cited as barriers to implementing many of the suggested actions to manage climate-related financial risks. These gaps could be partially addressed through capacity-building programmes and participation within international networks such as the Network for Greening the Financial System (NGFS) or the Sustainable Banking and Finance Network that are designed to promote knowledge sharing between central banks and regulators. These networks often provide free resources to members that can support them to take action to green the financial systems under their jurisdictions. To build capacity on insurance supervision, the RBM is encouraged to join the UN-convened Sustainable Insurance Forum, a network of insurance supervisors and regulators cooperating to build their understanding of and responses to sustainability issues facing the insurance sector.

Moreover, the RBM could ask for trainings by peers (other central banks and regulators or specialist organisations – e.g. Toronto Centre, World Wide Fund for Nature (WWF), UNEP Finance Initiative, or the International Monetary Fund – to provide them with training on specific topics. For example, to ensure the effective implementation of the RBM's guidelines for the management and disclosure of climate-related and environmental financial risk issued in 2023 over time, capabilities and skills in supervisors that are required, including expertise on relevant evolving market and supervisory practices.

Build capacity at key ministries involved in greening the financial sector

This can include local, international, and remote seminars and workshops to learn about new best practices and support new initiatives in Malawi. In addition to identifying and accessing the free resources available, capacity and knowledge gaps can also be addressed by increasing training budgets. Greening the financial sector requires capacity and skills from the core stakeholders, namely the Ministry of Finance (MoF), the MoNRCC, and the RBM. The more concrete the training is to its audience's knowledge and capacity needs, the better.

Given its policy portfolio and remit, the capacity needs of the MoF to fully fulfil its role in greening the financial sector in Malawi includes broadly an in-depth understanding of the potential for different financial instruments in Malawi that could help mobilize resources for climate investments and an understanding of how climate-related financial risk are expected to affect the Malawian economy and how different actors, including MoF itself, can respond to it.

Given the MoNRCC responsibilities in greening the financial sector as the authority on environmental impacts, goals, and standards, its capacity and training needs could be on better understanding its role in greening the financial sector. The Ministry would have a crucial role to play in developing and enforcing a taxonomy on sustainable finance or in providing data on physical hazards that would feature in a climate stress test of the financial system or a risk map, for example. MoNRCC oversees the accreditation of Malawian organisations that would enable them to access the Green Climate Fund or the Adaptation Fund for large investments in climate change adaptation and mitigation. Finally, as different financial mechanisms emerge and expand in Malawi – whether they will be carbon markets, green bonds, or debt-for-nature swaps, the MoNRCC can benefit from an understanding of these mechanisms and their feasibility in Malawi.

Join the National Technical Committee on Climate Change and Disaster Risk Management

The National Technical Committee on Climate Change and Disaster Risk Management (NTCCCDRM) is co-chaired by the DoCCMS and the DoDMA and provides technical guidance to the National Steering Committee on Climate Change and Disaster Risk Management, which is chaired by the Secretary to the Office of the President and Cabinet and includes Government Ministries, Departments, and Agencies.[11]

Joining the NTCCCDRM, even in an observer capacity, would enable the RBM to follow developments in the country's climate policy agenda, thereby enabling it to better understand how it can support this agenda through its own activities and also raise awareness amongst key government stakeholders regarding the role the RBM can play in supporting climate policy. Furthermore, participation in forums such as the NTCCCDRM will also enable the RBM to establish partnerships with key actors required to implement other recommended actions in the climate arena (see actions Provide financial institutions with data on physical risks and Establish cross-governmental working group for greening the financial sector, among others). Other central banks – e.g. the Reserve Bank of Zimbabwe – have regarded participating in national climate change committees as highly beneficial for their climate work and important for enabling them to contribute to the country's climate policy agenda.

MEDIUM-TERM ACTIONS

Establish a cross-governmental working group for greening the financial sector

A cross-governmental working group for greening the financial sector would bring key state actors together periodically to discuss and coordinate on action to green Malawi's financial sector. While other institutional arrangements already exist for cross-government climate action (e.g. Malawi's NTCCCDRM – which the RBM is presently not a member of [see action Join the National Technical Committee on Climate Change and Disaster Risk Management]), the purpose of establishing an additional working group would be to create a forum where state-led initiatives to facilitate the greening the financial sector would be the only matter on the agenda. Establishing a cross-governmental working group should strengthen communication and collaboration surrounding the greening of the financial sector and therefore accelerate progress. Since there are Financial Sector Technical Working Groups in Malawi already in operation, the cross-governmental working group for greening the financial sector could form a sub-working group.

The RBM should have an internal focal point – perhaps in the to-be-established climate unit – that is responsible for working with relevant parts of the government on greening the financial sector. Representatives from MoNRCC and MoF are potential participants, while financial industry associations could have an observer status. Producing and sharing relevant climate data with decision-makers in the

[11] To obtain an overview of the institutional landscape for climate change in Malawi, see World Bank (2022) *Malawi CCDR. Climate Change Institutional Assessment*. September, 2022. https://documents1.worldbank.org/curated/en/099545110272237570/pdf/P1772200ab11b80110aac1031c69114d6a9.pdf

financial sector could be one of the core objectives of such a working group.

Attempt internal climate scenario analysis exercise (as a learning exercise)

A climate scenario analysis can be used by central banks and financial regulators to (i) assess the vulnerability of the FIs they supervise to the effects of climate change, (ii) assess the vulnerability of the country's financial system to the effects of climate change, and (iii) to better understand the transmission channels through which the impacts of climate change can lead to financial risk and how the business models of supervised FIs could be affected.

The RBM could attempt an initial climate scenario analysis. While the outputs of this exercise would be useful in of themselves, its primary purpose should be to build capacity in conducting climate scenario analysis and identifying data, modelling and human capacity gaps, and begin working towards overcoming these gaps. An initial climate scenario analysis is unlikely to cover all material transition and physical climate risks, therefore the RBM should expect to prioritize assessing the potential impact of certain types of risks.

Practice around climate scenario analysis has developed phenomenally since its emergence in the late 2010's, with many central banks and financial regulators conducting their own climate scenario analyses.[12] While challenges vary between jurisdictions, the RBM can draw on the experience an increasing number of peers in developing countries who have undertaken climate scenario analysis,[13] overcoming challenges that the RBM is likely to face – e.g. severe gaps in the required climate and financial data, models and technical expertise.

Conducting a climate scenario analysis will be time- and resource-intensive. Therefore, to support this activity, it is recommended that the RBM seek financial support from development partners dedicated to green central banking (e.g. NDC Partnership, European Investment Bank, etc.) to fund the acquisition of technical expertise.

Provide financial institutions with data and tools on physical risks

A leading challenge faced by FIs seeking to assess their exposure to physical climate risks is obtaining access to ready-to-use data about the physical impacts of climate change that is tailored to their needs – i.e. data that is sufficiently granular and lends itself to financial decision-making. The RBM could provide FIs with data on physical risks that could inform their choices, ranging from decisions on credit approval at the borrower level to judgments on institution-wide risk exposure.

Processing data provided by the MoNRCC and DoDMA as well as global data on physical climate risks, the RBM could provide physical climate risk data to Malawian FIs. In addition to providing physical climate risk data, the Reserve Bank could also seek to develop interactive tools

[12] Financial Stability Board and NGFS (2022). *Climate Scenario Analysis by Jurisdictions: Initial findings and lessons*. November, 2022. https://www.fsb.org/2022/11/climate-scenario-analysis-by-jurisdictions-initial-findings-and-lessons/

[13] See climate scenario analyses conducted by central banks and financial regulators in: Brazil, Colombia, Morocco and Philippines.

based on this data that are tailored to the needs of FIs.

For example, a climate risk map that provides FIs with access to robust information about the likelihood of physical climate hazards (e.g. likelihood of flooding, drought, extreme heat, cyclones etc.) could be provided. The map would give FIs information about current physical risks and how the scale of physical risks is expected to develop in the future, thereby helping assess whether assets are exposed to climate risks. This could be even more valuable if the severity of a physical hazard were estimated for different sectors (agriculture, transport infrastructure, etc.). There are existing examples of this, e.g. in Uganda.

Producing this information or even the map would require the collaboration of several stakeholders and – depending on data availability could be very time and resource – intensive. Thus, it is recommended that the support of development partners be sought to produce this tool once and if its utility to FIs is established.

Green and capitalize the Export Development Fund, Malawi's development finance institutions and its climate funds

Malawi's DFIs and climate funds have a powerful role to play in a low-carbon and climate-resilient economy. They can increase the supply of long-term finance for green investments and de-risk green projects, thereby helping to overcome the barriers faced by traditional FIs using instruments such as concessional loans, guarantees, and grants.

Several funds and FIs in Malawi are actual or potential investors in climate change mitigation and adaptation. These include the Export Development Fund (EDF) at the RBM, the Malawi Climate Change Fund (MCCF), and the Malawian DFIs such as the National Bank of Malawi (NBM) Development Bank and Malawi Agricultural and Industrial Investment Corporation (MAIIC). Capitalizing the funds with environmental tax revenues (in the case of the MCCF) and with international climate and developing funding (in the case of funds and DFIs) could expand their impact. The NBM Development Bank has taken the first step and, with the help of a guarantee from the African Guarantee Fund, is expected to develop green products. Greening funds and DFIs could ensure that investments that contribute to climate change mitigation and adaptation are prioritized by these funds, while investments that lead to maladaptation and other negative environmental impacts are reduced, while effectively managing the climate risk exposure of these funds.

To capitalise these funds, several fundraising efforts should be pursued, depending on the fund or organisation. One option is investment projects with multilateral or bilateral DFIs (e.g. World Bank, African Development Bank, European Investment Bank) including green credit lines. It would be highly beneficial to introduce green finance programmes with donor, DFI and multilateral development bank support. This should include a programme that invests in equity and lends at concessional rates to climate technology providers or pilot green financial products. Green finance programmes should also be such that they de-risk the investments – either through a risk cover or a blended finance approach. There is a need for a project preparation facility in Malawi that would help structure needs into bankable projects. Financial solutions for climate change mitigation and adaptation at the district and city council levels are key. These could be developed by Malawi's publicly owned FIs with financial and technical support by development partners. Another worthwhile effort is to pursue accreditation with the Green Climate Fund as an Accredited Entity that can receive financing.

More Malawian organisations, including Malawian FIs, should pursue Accredited Entity status to access the funds of the Green Climate Fund. Finally, accessing the Global Environment Facility (GEF) could support Malawian DFIs and climate funds in financing nature-based solutions.

When it comes to "greening" these funds have several strategies at their disposal. For example, they could actively invest in green assets (e.g. green bond investing) and even set themselves targets or "green ratios". Similarly, they can apply negative screening criteria that prevents them from making investments that are environmentally harmful or integrate ESG criteria into their investment process. For example, the EDF could make its investment strategy more sustainable. It already has some experience with negative screening and applying certain criteria to investment analysis through its Environmental and Social Risk Management Policy. The EDF could extend this. Malawi's DFIs and climate funds could similarly adopt portfolio greening strategies.

To green pro-actively, DFIs and funds need to actively source green investments. As such, additional efforts including market research and building a pipeline will be necessary. Costs of preparing bankable green projects, however, will represent a barrier to doing this (as it has already to the EDF). Therefore, it is advisable to access donor funding and other development partner support to establish a project preparation facility.

Introduce the Reserve Bank of Malawi's own green financing schemes

Based on the example of World Bank-financed Financial Inclusion and Entrepreneurship Scaling (FInES) project, the RBM could introduce its own green financing scheme, i.e. a "green FInES".

With the support of development partners and a clear strategy and implementation that ensures the focus of investments into climate-resilient and low-carbon economic activities, a green FInES could build on FInES' existing working model and the experience that the RBM and FIs have accrued working with it. However, concessional finance by development partners would be required to lower the financing cost. Development partners to cooperate with include the World Bank, the African Development Bank or bilateral DFIs – e.g. the Overseas Private Investment Corporation, the European Investment Bank, the German *Deutsche Entwicklungsgesellschaft*, the French Proparco, or Swedfund. Given its focus on climate, climate funds could potentially also be utilised as a source of co-financing.

Similar green financing schemes that central banks operate have been tried and tested in other countries.

Explore the use cases and assess the effort required to produce a green taxonomy in Malawi

The RBM could form part of an effort to develop a green taxonomy along with the MoNRCC and the MoF. The technical expertise of MoNRCC and other public bodies – such as the National Commission for Science and Technologies – along with development partner support would be needed to produce a taxonomy.

Sustainable finance taxonomies are classification systems distinguishing activities, assets, or project categories that contribute to climate, social, environmental, or otherwise sustainable goals with reference to certain thresholds or targets. Establishing a shared definition of what constitutes "green" and "sustainable" is technically demanding and requires a wide range of technical expertise (i.e. beyond financial expertise). However, there are many use cases for a green taxonomy. While connecting a taxonomy to financial regulation is most effective and has been adopted (e.g. in the EU), taxonomies made for voluntary use are also helpful. Voluntary taxonomies can function as a reference point among financial actors – say between asset managers and pension funds - interested in sustainable investing. Voluntary taxonomies can be drawn on by FIs that seek to assess the alignment of their portfolio against certain environmental and social goals and that seek to disclose this alignment.

Some countries adopt green taxonomies for FIs to inform voluntary reporting, for example, Colombia, Bangladesh, Malaysia, Mexico, Indonesia, Thailand and South Africa. Kenya is developing one. China and the European Union (EU) have their own taxonomies, and the EU taxonomy is tied to binding disclosure requirements. Several developing countries, including LDCs, have received donor support to produce taxonomies because producing a sustainable finance taxonomy is a time- and resource-intensive process.

It is important to note here that a full taxonomy is not a requirement to start greening the financial sector. While a taxonomy is more thorough and more comprehensive of economic activities, it is not a pre-requisite to have a fully-fledged taxonomy to start designating some economic activities "green". In the short, run, a simple technology selection list can be used to decide which economic activities are considered green.

Given its small size, perhaps Malawi could benefit from sharing a taxonomy with surrounding countries – if there is sufficient alignment on environmental priorities.

The Reserve Bank of Malawi to help foster green bonds

There are no green bonds listed yet on the Malawi Stock Exchange. However, there is vast potential in raising finance for climate change mitigation and adaptation from sovereign and possibly municipal and corporate green bonds. Issuing green bonds – whether it be sovereign, corporate, or municipal green bonds – can form part of the much-needed broadening of capital markets that can benefit the Malawian economy and mobilize financing for green investments.

This requires cooperation with the relevant stakeholders, including the MoF, the district councils, possible environmental authorities, development partners, and the Malawi Stock Exchange (MSE). MSE is engaged in the Southern African Development Community (SADC) Green Bond Programme to promote the issuance of Green and Sustainable Bonds to leverage capital markets to finance green and social projects. The programme includes Guidelines for Issuance of Sustainable Bonds that were developed by MSE based on the International Capital Market Association's Green Bond Principles. Local governments in Malawi receive support, amongst others, from the United Nations Capital Development Fund (UNCDF) for districts, including Phalombe, Nkhotakota and Mulanje, to develop innovative green financial products such as municipal green bonds.

The RBM has an established role in sovereign issuances and therefore, it would already be involved in the issuance of sovereign green bonds. Beyond that, however, it could explore its role in the development of a green bond framework and in fostering the green bond market. The Financial Markets Department has worked with district councils to sensitize them on the options they have in funding their budget, including issuing municipal bonds and raising capital from capital markets. The department also does this for utilities, water boards, and public universities. Through these collaborations, the RBM could further sensitize relevant actors on climate-related financial exposures and risks. The RBM could also guide them to make climate-conscious decisions and identify options for leveraging national and international climate finance, e.g. through the issuance of green bonds for climate-related investments.

Support the development of a carbon markets

Carbon markets are a way to finance climate action in areas where other financing falls short. The Government of Malawi established the Malawi Carbon Markets Initiative (MCMI) in 2023, and various regulations are being established to improve the enabling environment for carbon markets. Presently however, most commercial banks have not yet invested time and resources in trying to understand the carbon market and explore the associated business opportunities.

With the establishment of the MCMI and the development of the Malawi Carbon Trading Regulatory Framework, it is expected that there will be improved oversight in the design, implementation, monitoring, and management of carbon projects. The new framework can attract investors and carbon project developers to the country but there will still be a need to engage with local FIs so that they can provide support and financing for locally-led carbon projects. United Nations Development Programme (UNDP) has criticized that funds raised thus far in Malawi have mostly benefitted international developers and has pointed to the upfront costs of developing carbon projects as a significant obstacle that prevents local green businesses from participating.[14]

MoNRCC and MoF should engage FIs to facilitate the growth of carbon markets in Malawi. This could form part of a wider effort to grow carbon markets, including voluntary carbon markets. UNDP proposes the creation of a Malawi Carbon Hub to support the growth of businesses that could develop voluntary carbon projects locally.[15]

Explore potential for innovative green financial instruments

Green financial products are needed to finance climate action in Malawi (including at the municipal level) and enhance climate resilience. Therefore, innovative financial mechanisms that can be applied in the Malawian market must be explored. Examples of innovative financing instruments include: debt-for-nature swaps, nature-based capital, ecosystem-based services, blended finance approaches that draw on climate funds, Public Private Partnership (PPPs), results-based finance, and crowdfunding.

Innovative insurance products are even more needed in Malawi. Innovative insurance products include for instance weather index-based insurance. There are no tailored insurance products for green sectors and businesses in Malawi and existing insurance for smallholders and small-scale producers is unaffordable. UNDP recommends undertaking a market assessment to assess holistically relevant insurance products_based on market feedback from FIs. Such a market assessment should cover product pricing and premiums and the function and possibilities of third parties funding structures, such as blended finance and debt-

[14] UNDP (2024). *Malawi Country Action Roadmap: Africa Green Business and Financing Initiative (AGBFI).* https://www.undp.org/malawi/publications/malawi-country-action-roadmap-africa-green-business-and-financing-initiative-agbfi

[15] *ibid*.

for-impact swaps.[16] The RBM can provide technical inputs in such an assessment.

Moreover, the RBM can support the development of innovative financial instruments within its existing mandate. Together with the MoF, the RBM could apply its role both in informing relevant stakeholders on the possibilities and – within its mandate – provide advice on the options. For example, the Financial Market Department's role in helping state-owned enterprises and district councils realize funding options could be expanded to include options on green finance.

Exploring the potential of innovative financial mechanisms and to what extent they could address financing gaps when it comes to Malawi's climate commitments could build on the Malawi Resource Mobilization Strategy of 2022.[17] It could include actions such as developing nature as an asset class and building a green venture capital ecosystem, as recommended by UNDP.[18] It could be led by the MoNRCC and the MoF with support from development partners and consultancies specialised on this topic. Already promising efforts by UNCFD on municipal green bonds and by UNDP on green economic transition and green business models are underway.

Raise awareness and build capacity in industry on management and disclosure of climate-related and environmental risks

The authors reviewed the Guidelines on Climate-Related and Environmental Financial Risk Management for Banks and identified what capacities banks would require to implement them. Capacities needed to implement the guidelines include methods and tools to conduct stress-testing and scenarios analysis, risk identification and monitoring tools for the portfolio and the counter-party (borrower) level, suggestions for risk indicators to categorize counter-parties, sectors, and geographical locations based on the extent of climate-related and environmental financial risks; and expertise on how to make a risk mitigation plan for risks deemed material.

Capacities at FIs could also include more detailed guidance (likely developed internally by banks themselves) to the different functions in banks, i.e. specific guidance for the board of Directors, for management, for frontline staff specifically on how to conduct climate-related and environmental financial risks assessment in client due diligence or during new product approval processes. For risk management, the capacity for undertake independent climate-regulations while the internal audit require capacity to perform regular reviews of the adequacy, appropriateness, and effectiveness of the risk management and internal control framework for climate-related and environmental financial risks.

Efforts to build capacity in Malawi's financial industry on the management and disclosure of climate-related and environmental financial risk could be combined with efforts to build awareness among financial service providers on the potential of green finance. UNDP proposes a capacity-building programme to raise awareness, strengthen financial knowledge and structuring abilities, and build a pipeline of bankable green projects. Malawian DFIs, insurance companies, and banks with business in the most climate-relevant sectors in Malawi – including agriculture, forestry, infrastructure and manufacturing – should be beneficiaries of such a capacity-building programme. Raising awareness as part of such a capacity-building programme should emphasise, for example, that given the bank-centric nature of the Malawian financial sector, the greening of the loan market

[16] *ibid*.

[17] MoNRCC (2022). *Resource mobilization strategy for the Nationally Determined Contribution (NDC) of Malawi. Product 2: Draft resource mobilization strategy (including detailed analyses on costing, funding gaps, financing options, and implementation arrangements*. May, 2022.

[18] UNDP (2024). Malawi Country Action Roadmap: Africa Green Business and Financing Initiative (AGBFI)

related and environmental financial risks assessment and monitoring is required. Meanwhile, FIs' compliance function must ensure adherence to applicable rules and should be prioritized (even as green bonds, for instance, attract attention).

Establish a risk-focused industry dialogue or platform

It will be easier for FIs to build capacity on managing and disclosing climate-related and financial risk, if an industry dialogue or national platform supports it. Following a recommendation by the World Bank, this could be a helpful forum to exchange on practices around climate-related risk management and disclosure.[19] There could be a role for the Bankers Association of Malawi or some of the larger FIs in the country. Ideally, such an industry dialogue would cover banks, insurance and microfinance companies, capital markets, and pension funds.

LONG-TERM ACTIONS

Long-term actions to pursue greening the financial sector include actions by the Reserve Bank that affect its monetary policy framework.

In this regard, the RBM's mandate and its focus on price and financial stability limit the central bank's ability to mainstream climate change in monetary policy formulation and implementation. Some of the financial instruments discussed in this chapter would also require approval by the MoF. Thus, the likelihood that they will be implemented in the near- or medium-term is limited. The perceived viability and effectiveness of some financial instruments (e.g. differentiated reserve, capital and collateral requirements) is also constrained by the shallowness of the Malawian financial sector. They constitute relatively new tools, and evidence of their suitability, as well as potential negative impacts, is still being collected. The World Bank found that there has yet to be any guidance from international standard settlers on using these tools. Thus, before considering them, the RBM is advised to draw on the growing body of research and experience from other central banks for information. In 2024, the World Bank found that the "jury's still out" on the effectiveness and suitability of differentiated reserve requirements, targeted refinancing lines, and collateral management.[20]

Nevertheless, these actions have been undertaken successfully in other countries, including in developing countries, and therefore merit a long-term consideration.

---

[19] World Bank (2024). *Roadmap for assessing and managing climate risks for the banking and insurance sectors in Malawi.*

[20] World Bank (2024). Chapter 3. Acting on Climate Risks and Climate Finance through the Banking Sector. In: *Finance and Prosperity 2024. Special Focus: Sovereign-Bank Nexus Climate and the Banking Sector.* World Bank Group. https://openknowledge.worldbank.org/server/api/core/bitstreams/9f1f6970-5619-4f5d-a8e5-e32a2fa58db0/content

Promote climate resilient and low-carbon investments through differentiated reserve requirements

The RBM could promote climate-resilient and low-carbon investments through differentiated reserve requirements. Doing this requires classifying what assets should deserve differentiated treatment (e.g. a green taxonomy). The differentiation should not only be based on the wish to promote green investments, as this can jeopardize the central bank's objective of financial stability if lax requirements put the financial system at risk Instead, a consideration and assessment if climate-resilient and low-carbon investments indeed have a lower risk profile should inform reserve requirement policies.

Reserve requirements refer to the cash or deposits at central banks that banks must hold against their deposit liabilities, ensuring that banks have enough liquidity to meet customer withdrawals and other short-term obligations. Non-interest-bearing reserves limit a bank's profitability, but also provides a safety net and ensures stability in the banking system. By adjusting reserve requirements, central banks can normally influence the amount of money available for lending, which in turn affects the overall money supply and interest rates. By differentiating the reserve requirements, the central bank can actively influence the allocation of credit.

Differentiated reserve requirements are a powerful exposure tool that has been tried in Indonesia, Lebanon, and the Philippines. Variable 'asset-based reserve requirements' have historically been widely used to promote lending to desired sector in many countries as reserve requirements have a substantial impact on banks' ability to create credit.

Foster climate resilient and low-carbon investments through differentiated capital requirements

The RBM could promote climate resilient and low-carbon investments through differentiated capital requirements. Capital requirements are set by central banks as regulatory standards determining the minimum amount of capital a bank must hold relative to its assets, ensuring that banks can absorb a reasonable amount of stress and losses and remain solvent, thus protecting depositors, ensuring financial stability and mitigating systemic risk in the banking sector. But the existing capital requirement frameworks have been criticised from an environmental perspective because (a) they do not address FI exposure to climate- and environment-related financial risks, which are sizeable and suggest that FIs could be under-capitalised, and (b) there is no incentive for FIs to finance climate-friendly activities nor penalty for harmful activities.

Capital requirements could be differentiated based on an assessment of FIs' exposure to climate-related risk and emissions profiles of investment portfolios. By requiring FIs to set aside more capital for assets associated with high climate risk exposure of high-carbon assets, banks would be incentivised to reduce their exposure. The reverse could also be applicable, with the requirement of less capital for portfolios which promote low- carbon or climate resilience enhancing practices like the use of drought-resilient seeds, relocation of assets to less exposed locations, or the business models reducing the reliance on physical climate-vulnerable assets (e.g.

digitalization). It is important that such requirements are based on actual assessments of climate-related risks' potential contribution to loans solvency pressures.

While this approach has been tried in Hungary and Indonesia, evidence has yet to accrue on its suitability. Note that the World Bank does not recommend adjusting assets' capital risk weights to enable climate finance because it deems the risks of compromising financial stability or market neutrality objective higher than the potential benefit. The World Bank cites that there lack of evidence as of yet that this measure directly affecting pricing or leads to more credit going to targeted sectors. Moreover, they point to the risk of market distortions.[21]

Differentiated collateral requirements

The RBM could introduce differentiated collateral requirements. Differentiated collateral requirements, reducing the haircut (percentage shaved off) associated with greener assets, can provide the opportunity to increase the market value of an asset used as collateral for a loan. The same can be applied in reverse to disincentivise investments with associated emissions or climate risks, potentially combined with thresholds. If climate mitigation or resilient related collateral is highly rated it could be taken at full(er) value and, as assets become more carbon intensive or riskier, central banks can apply increasing haircuts. With increasing haircuts, FIs would need to post more of the riskier assets to get equivalent liquidity.

The European Central Bank and the Bank of the People's Republic of China have included climate considerations into their collateral management. Introducing differentiated collateral requirements comes with pre-requisites and requirements to reduce the downside risks. More research is needed to provide a framework for the calculation and application of these haircuts, building on the application of an appropriate risk assessment methodology. High quality climate-related data and disclosure on assets that form collateral is needed too. There is the risk of this measure achieving the opposite of the intended effect, that is, reducing lending to climate-exposed sectors and clients preventing them from investing in adaptation. If collateral frameworks were to exclude assets that are not aligned with climate or environmental goals, even if this is based on a sound calculation of risks, it would impact the liquidity of FIs with high-risk assets in their portfolio, as the exclusion of these cut the pledgeable collateral.

Introduce targeted refinancing lines for financial institutions

The RBM could offer refinancing to FIs as a measure to improve their liquidity. Refinancing could be structured to offer preferential terms for climate friendly assets. FIs with a high proportion of green loans or a low proportion of "brown" loans, would be able to benefit from lower interest rates from the RBM. This would incentivize FIs to decarbonize their assets. FIs could also pass on the change in the RBM's interest rate to the interest rates that they charge their borrowers. Compensating FIs for lending at lower than market interest rates to low-carbon or climate resilient projects would further affect the demand for investments in climate projects. For an example of other central banks having introduced targeted refinancing

[21] World Bank (2024). Chapter 3. Acting on Climate Risks and Climate Finance through the Banking Sector. In: *Finance and Prosperity 2024. Special Focus: Sovereign-Bank Nexus Climate and the Banking Sector.* World Bank Group.

operations with regards to climate risk, the RBM can look central banks in Bangladesh, China, Egypt, Japan, and Malaysia.

Green Malawi’s pension funds

Malawi’s pension funds could green their own investments following the example of pension funds (including pension funds from central banks) globally. This could involve ensuring that investments are aligned with both a low-carbon and a climate resilient development in Malawi. Criteria could be based on a taxonomy of sustainable finance specific to Malawi or on other criteria. There are different approaches available that range from monitoring and disclosing sustainability performance of the fund to actively investing in sustainable activities, or excluding investments based on sustainability considerations. Note that the pension funds of several other central banks have already made first strides in greening their investments.

Table 4 Implementation arrangements with timelines, roles and responsibilities

Focus areas	Activity	Indicator (Examples)	Lead	Support entities	Time line
1. Strategy, coordination and capacity building on green finance	Set up a climate unit within the Reserve Bank of Malawi	Climate unit or working group established Quarterly meeting of the unit/working group	RBM	-	Near
	Build capacity at key ministries involved in greening the financial sector	Number of training workshops Number of staff capacitated on greening the financial sector	MoF, MoNRCC	-	Near
	Establish a cross-governmental working group for greening the financial sector	Cross-governmental working group established Bi-annual meeting of the cross-governmental working group	MoNRCC	RBM, MoF, National Planning Commission	Medium
	Join the National Technical Committee on Climate Change and Disaster Risk Management	RBM becomes member of NTCCCDRM (either as participant or observer).	RBM	MoNRCC, DODMA, Executive Management by RBM	Near

2. Green public financial portfolios and assets	Green and capitalize the Export Development Fund, Malawi's development finance institutions and its climate funds	Number of suppliers providing green financial products Number of FIs with direct access to Green Climate Fund	EDF, MCCF, MAIIC	Development partners (Green Climate Fund, Adaptation Fund)	Medium
	Introduce the Reserve Bank of Malawi's own green financing schemes	Number of partner financial banks benefitting from green financing scheme and providing green financial products Volume (Malawian Kwacha [MK]) invested under green financing scheme	RBM	Development partners	Medium
3. Create a conducive environment for climate investments	Explore the use cases and assess the effort required to produce a green taxonomy in Malawi	Study on the use cases and scope of works required to produce a taxonomy for Malawi	MoF	RBM, development partners, MoNRCC	Medium
	The Reserve Bank of Malawi to help foster green bonds	Training provided by the Financial Markets Department (RBM) to District Councils and state-owned companies sensitizing them on options to raise green financing	RBM	District councils, state-owned companies	Medium
	Support the development of carbon markets	Volume (MK) of Malawi carbon markets GHG emissions reduced through carbon markets	MoNRCC	MoF	Medium
	Explore the potential for innovative green financial instruments	Study on potential of innovative green financial instruments developed	Development partners	MoNRCC, MoF, RBM	Medium

4. Greening private financial institutions	Raise awareness and build capacity in the financial industry on the management and disclosure of climate-related and environmental risk	Number of FIs that have implemented the guidelines on managing climate-related and environmental financial risk	FIs	-	Medium
	Establish a risk-focused industry dialogue or platform	Risk-focused industry dialogue established Bi-annual meeting of the dialogue	Bankers Association of Malawi	Malawi FIs	Medium
	Greening Malawi's pension funds	Asset under management (MK) of pension funds that apply ESG criteria or negative screening	Pension funds	RBM	Long
5. Management and disclosure of climate-related and environmental risk	Release guidelines for the management and disclosure of climate-related and environmental financial risks for the insurance and microfinance sector	Guidelines for insurance sector drafted and disseminated for feedback Guidelines for insurance sector officially released Guidelines for microfinance sector drafted and disseminated for feedback Guidelines for microfinance sector officially released	RBM	Insurance companies and microfinance providers	Near
	Attempt internal climate scenario analysis (as a learning exercise)	Climate stress testing exercise conducted	RBM	Development partners, expert consultancies	Medium
	Provide financial institutions with data and tools on physical risks	Relevant data packaged in ready-to-use resource for FIs	MNRCC or RBM	Development partners	Medium

		Concept and budget for a climate vulnerability map developed Climate vulnerability map developed			
	Obtain knowledge and expertise in climate analysis at the Reserve Bank of Malawi	Number of training workshops Concept for climate stress test exercise developed	RBM	Development partners	Near
	Build capacity for the management and disclosure of climate-related and environmental risk at the Reserve Bank of Malawi	RBM joining the NGFS RBM joining the Sustainable Banking Network	RBM	-	Near
6. Central bank financial instruments and monetary policy	Promote climate resilient and low-carbon investments through differentiated reserve requirements	-	RBM	MoNRCC	Long
	Foster climate resilient and low-carbon investments through differentiated capital requirements	-	RBM	MoNRCC	Long
	Implement differentiated collateral requirements	-	RBM	MoNRCC	Long
	Introduce targeted refinancing lines for financial institutions	-	RBM	MoNRCC	Long

ANNEX 1: PROJECT BACKGROUND

In light of the risks posed by climate change to the financial sector and the potential that financial sector possesses to finance climate change mitigation and adaptation, the Reserve Bank of Malawi and United Nations Environment Programme Copenhagen Climate Centre (UNEP CCC) have embarked on the NDC Partnership-funded project "Greening the Financial Sector in Malawi". The project explored how the Reserve Bank of Malawi can support the greening of Malawi's financial sector and identified capacity gaps that must be addressed for the Reserve Bank to achieve this goal. The project's final deliverable is the feasibility study contained in this document that outlines potential avenues the Reserve Bank can pursue to help Malawi's financial sector seize opportunities in green finance and manage climate-related financial risks. UNEP CCC has held a workshop with various departments of the RBM in order to determine the roles that different departments could have in greening Malawi's financial sector and the priority actions that the RBM can take to greening the financial sector.

This feasibility study has benefitted from the review of staff at the World Bank, Bankers without Borders, and the Malawi Ministry of Finance. We also thank representatives from the following organisations for their valuable inputs and insights.

Reserve Bank of Malawi, including Financial Markets Department, Supervision Banks and Banking Groups, Supervision Capital Markets and Microfinance Supervision, Pension and Insurance Supervision, Financial Sector Regulation, Strategy and Risk Management, Financial Stability Unit, Reserve Bank of Malawi Pension Fund, Economic Policy and Research, Legal Affairs, and the Export Development Fund.

Public sector: Environmental Affairs Department at the Ministry of Natural Resources and Climate Change | National Planning Commission | Ministry of Economic Planning and Development | Malawi Stock Exchange | Ministry of Energy | Ministry of Finance | Nkhotakota District Council | Kasungu District Council

Private sector: EcoBank | Standard Bank | Malawi Agricultural and Industrial Investment Corporation plc (MAIIC) | Bankers Association of Malawi | Malawi Microfinance Network | NBS Bank | First Capital Bank | CDH Investment Bank

National Bank | Dream Finance | Old Mutual | NICO General | Insurance Renewable Energy Industry Association of Malawi (REIMA) | Sustainable Farming Solutions | Green Growth Development | Malawi Carbon Markets Initiative (MCMI)

Development partners and civil society: UNCDF | NDC Partnership | Bankers without Boarders | UNDP Malawi

Other monetary authorities and prudential agencies: Central Bank of Nigeria | Bank of Mauritius | Reserve Bank of Zimbabwe | Nigeria Central Bank | South Africa Prudential Authority | Central Bank of South Africa