



Global Shield
against Climate Risks

STOCKTAKE REPORT: CLIMATE AND DISASTER RISK FINANCE IN MALAWI

**Contribution to the In-Country
Process of the Global Shield
against Climate Risks in
Malawi**

Ministry of Finance and Economic
Affairs Government of Malawi

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Acronyms

A2ii	Access to Insurance Initiative
AAL	Average Annual Loss
ACL	Access Communications Limited
ADRFi	Africa Disaster Risk Financing Programme
AfDB	African Development Bank Group
AIP	Agriculture Input Programme
ARC Ltd	African Risk Capacity Limited
ATM	Automated Teller Machine
AYII	Area Yield Index Insurance
BEM	Building Exposure Model
CAADP	Comprehensive African Agriculture Development Programme
CAT DDO	Catastrophe Deferred Drawdown Option
CCDR	Country Climate Development Report
CDRF/ CDRFI	Climate and Disaster Risk Finance/ and Insurance
CDRI	Coalition for Disaster Resilient Infrastructure
CERP	Contingency Emergency Response Project
CISONECC	Civil Society Network on Climate Change
CoE	Centre of Excellence on Gender-smart Solutions
COMSIP	Community Savings and Investment Promotion Cooperative Union
CREWS	Climate Risk and Early Warning Systems
CRS	Climate Resilient Solutions
CSO	Civil Society Organisation
CSPWP	Climate Smart Public Works Programme
CVF-V20	Climate Vulnerable Forum – Vulnerable Twenty Group
DCCMS	Department of Climate Change and Meteorological Services
DFID	UK Department for International Development
DFS	Digital Financial Services
DoDMA	Department of Disaster Management Affairs
DRF	Disaster Risk Financing
DRM	Disaster Risk Management
DRR	Disaster Risk Reduction
DTM	Digital Terrain Model
EAD	Environmental Affairs Department
EHP	Essential Health Package
EP&D	Economic Planning and Development
ESCP	Environmental and Social Commitment Plan
EWS	Early Warning Systems
FAO	Food and Agriculture Organisation
FEWS NET	Famine Early Warning Systems Network
FSDS	Financial Sector Development Strategy
GCF	Green Climate Fund



GCRS	UK EPSRC-Global Challenges Research Fund
GDP	Gross Domestic Product
GEF	Global Environment Facility
GEM	Global Earthquake Model
GIRI	Global Infrastructure Resilience Index
GIZ	Deutsche Gesellschaft für Internationale Zusammenarbeit
GRMA	Global Risk Modelling Alliance
GSFF	Global Shield Financing Facility
ICP	In-Country Process
ICT	Information and Communication Technology
IDA	International Development Association
IDEA	World Bank Inclusive Digitalisation in Eastern and Southern Africa
IEM	Infrastructure exposure model
IFPRI	International Food Policy Research Institute
IPC	Integrated Food Security Phase Classification
IRP	Integrated Resilience Programme
ISF	InsuResilience Solutions Fund
IUCN	International Union for Conservation of Nature
JTI	Japan Tobacco International
LLCI	Lake level change index
MAPs	Multi-Actor Partnerships
M-CLIMES	Modernised Climate Information and Early Warning Systems
M&E	Monitoring & Evaluation
MASAF	Malawi Social Action Fund
MDTF	Multi-Donor Trust Fund
MFI	Microfinance Institutions
MGDS II	Malawi Growth and Development Strategy
MiN	Microinsurance Network
MMPI	Malawi Maize Production Index
MNSSP II	Malawi National Social Support Programme II
MoA	Ministry of Agriculture
MoFEA	Ministry of Finance and Economic Affairs
MoGCDSW	Ministry of Gender, Community Development and Social Welfare
MoLGUC	Ministry of Local Government, Unity, and Culture
MoU	Memorandum of Understanding
MSMEs	Micro Small and Medium Enterprises
MTL	Malawi Telecommunications Limited
MUSCCO	Malawian Union of Savings and Credit Co-operatives
Mw	Moment Magnitude
MZCPCU	Mzuzu Coffee Planters Co-operative Union
NAP	National Adaptation Plan
NAP 2024	National Agriculture Policy 2024
NASFAM	Malawi's National Association of Smallholder Farmers
NCCF	National Climate Change Fund



NCCMP	National Climate Change Management Policy
NDC	Nationally Determined Contributions
ND-GAIN	Notre Dame Global Adaptation Initiative
NDF	National Disaster Fund
NDRMF	National Disaster Risk Management Fund
NDVI	Normalised Difference Vegetation Index
NLGFC	National Local Government Finance Committee
NPC	National Planning Commission
NPoD	National Profile of Disasters
NRS	National Resilience Strategy
NSO	National Statistics Office
NSSP II	National Social Support Programme II
OCHA	United Nations Office for the Coordination of Humanitarian Affairs
OPM	Oxford Policy Management
PPPs	Public-Private Partnerships
PREPARE	Enhancing Preparedness for East African Countries through Seismic Resilience Engineering
PROSPER	Promoting Sustainable Partnerships for Empowered Resilience Programme
PRSP	Poverty Reduction and Social Protection
PWDs	Persons with Disabilities
PWP	Public Works Programme
RBM	Reserve Bank of Malawi
RCO	UN Resident Coordinators Office
REPAIR	Regional Emergency Preparedness and Access to Inclusive Recovery
ROSCA	Rotating Savings and Credit Associations
RP	Return Period
SACCO	Savings and Credit Cooperative Organisation
SCT	Social Cash Transfer
SCTP	Social Cash Transfer Programme
SDGs	Sustainable Development Goals
SGR	Strategic Grain Reserve
SSP	Shared Socioeconomic Pathway
SPEI	Standardised Precipitation Evapotranspiration Index
SPI	Standardised Precipitation Index
SSRLP	Social Support for Resilient Livelihoods Programme
TC	Tropical cyclone
TMCU	Timber Millers Cooperative Union
TNM	Telecom Networks Malawi
TWG	Technical Working Group
UBR	Unified Beneficiary Registry
UNDP	United Nations Development Programme
UNFCCC	United Nations Framework Convention on Climate Change
UNHCR	United Nations High Commissioner for Refugees
UNICEF	United Nations Children's Fund
UNIMA	University of Malawi



UNDRR	United Nation Office for Disaster Risk Reduction
V20 SIF	V20 Sustainable Insurance Facility
VSL	Village Savings and Lending
VSLA	Village Savings and Loan Association
WB	World Bank
WCI	Water Criticality Index
WFP	World Food Programme
WRSI	Water Requirement Satisfaction Index



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Specific chapter contributions from Global Shield partners are listed below:

Chapter 3 – Risk Assessment

Author – Global Risk Modelling Alliance; *Contributor* – Oxford Policy Management

Chapter 5 – Enabling Environment

Section 5.2. Overview of legal and regulatory frameworks

Author – Access to Insurance Initiative

Section 5.3. – Capabilities of domestic private sector for insurance and banking

Author – Microinsurance Network

Section 5.6. – Capabilities of MSMEs to access financial instruments

Author – V20 Sustainable Insurance Facility

Chapter 6 – Climate and Disaster Risk Finance Solutions and Linkages

Overall contributors – African Risk Capacity Ltd, World Bank

Section 6.2.1 – Adaptive Social Protection System

Author – Oxford Policy Management

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Foreword

Malawi has recently been facing intensifying climate induced shocks that are increasingly challenging the country's development aspirations and further expose deep-seated vulnerabilities within the economy and society. As one of the countries most vulnerable to climate risks in Sub-Saharan Africa, Malawi is experiencing frequent droughts, devastating floods, and unpredictable weather patterns that not only threaten lives and livelihoods but also compound its fiscal pressures.

In this context, effective DRF has become a national imperative. This Stocktake Report on Climate and Disaster Risk Finance (CDRF) represents a significant step toward building a more resilient and financially prepared Malawi. It provides a comprehensive overview of the country's existing risk financing mechanisms, the current institutional and policy landscape, and the gaps that hinder our ability to respond efficiently and effectively to disasters.

The report is the outcome of a country-led and consultative process. It draws upon a wide range of data, sectoral insights, and stakeholder inputs from technical experts, development partners, civil society, academia, and community representatives. This report is a product of extensive collaboration and reflects the collective spirit of ownership.

The findings of this report are sobering but clear: Malawi's current DRF instruments remain fragmented, donor-dependent, and insufficiently scaled. Vulnerable populations especially women, youth, the elderly, and persons with disabilities continue to bear the brunt side of climate shocks, often without access to adequate financial protection or early support. At the same time, promising innovations are emerging such as shock-responsive social protection, risk transfer tools like sovereign insurance, and growing use of mobile finance platforms. These must be harnessed, expanded, and institutionalised within a coherent DRF strategy that is currently being developed.

The Government is committed to transforming this report from analysis into action. However, this cannot be achieved solely by government. We call on all stakeholders' development partners, financial institutions, private sector actors, and communities to work with us in building an inclusive and well-coordinated financing architecture that shields the most vulnerable, strengthens early response, and ensures a faster recovery.

On behalf of the Government of Malawi, I extend my sincere gratitude to all who contributed to the preparation of this report, including the Global Shield Secretariat, University of Malawi, and the DRF TWG. Your efforts have laid the groundwork for a more secure and resilient future for our nation.

Patrick Zimpita
Principal Secretary
Department of Economic Planning and Development



Executive summary

Malawi is highly vulnerable to natural hazards and climate-related risks, particularly droughts and floods. Approximately 73% of the population live in areas susceptible to climate-related hazards. The country's economy relies heavily on agriculture, making it especially susceptible to climate risk. Despite ongoing efforts, Malawi's DRF framework faces significant challenges, including fiscal constraints, low insurance penetration, and limited financial protection mechanisms.

Key climate and disaster risks

Malawi is experiencing increasing frequency and intensity of droughts, pest attacks and floods (including tropical cyclones) due to climate change. Droughts alone cause an average annual loss (AAL) of 1% of the Gross Domestic Product (GDP), particularly in the central and southern regions. The impact is not only on agriculture, but also on the energy sector, due to the country's dependence on hydroelectricity. Flooding, particularly river flooding caused by river overflow, poses a serious risk to infrastructure and agriculture.

Although floods occur more frequently, droughts affect the most people in Malawi and have the most severe economic impact.

Estimates suggest that 1.7 million people or 8% of Malawi's population, are impacted by disasters each year.

Climate and disaster risk finance mechanisms

Malawi has a number of CDRF initiatives at different levels (macro, meso, micro), but they remain fragmented with limited impact. CDRF mechanisms at the sovereign level are both risk transfer instruments such as the ARC¹ sovereign drought insurance and ARC Replica for drought, and risk retention mechanisms such as the Catastrophe Deferred Drawdown Option (Cat DDO) and the Strategic Grain Reserve (SGR). There are others under development such as the ARC flood insurance, and the Regional Emergency Preparedness and Access to Inclusive Recovery (REPAIR) programme that adds to the countries DRF pool. National contingency funds including the National Disaster Risk Management Fund and the National Climate Change Fund are yet to be operationalised. Additionally, the shock-responsive social protection system, Social Support for Resilient Livelihoods Programme (SSRLP), covers both contingency fund and risk transfer components. SSRLP is a scalable mechanism for the Social Cash Transfer Programme (SCTP) and the Climate Smart Public Works Programme (CSPWP) which expands support for SCTP and CSPWP during climate shocks. The SCTP covers 1.2 million people and has been adapted to provide anticipatory payouts in the event of climate shocks.

Despite these efforts, CDRF mechanisms are largely dependent on donor contributions and government borrowing, hence the need to strengthen sustainable financial resilience.

The Government aims to move towards a more risk-layered approach in its disaster risk response and finance approach; not only using ex-post financing mechanisms (budget reallocation, external aid) but also ex-ante financing mechanisms (such as risk transfer solutions).

Enabling environment

Key institutional actors leading CDRF efforts include DoDMA, the main government agency that coordinates disaster preparedness, response, recovery and resilience efforts. DoDMA, which is located in the Office of the President and Cabinet is mandated to coordinate multi-hazard early

¹ An agency of the African Union, supports African governments to improve their capacity to better plan, prepare and respond to extreme weather events and natural disasters.



warning systems (EWS) and disaster risk management (DRM) programmes in the country by overseeing disaster prevention, mitigation, preparedness, response, and recovery activities to minimise the loss of lives, damage of property, infrastructure and environmental degradation for the socio-economic development of Malawi.

Several ministries, including the Ministry of Agriculture (MoA) and MoFEA, play a central role in sector-specific DRM and disaster risk reduction (DRR) or in the management of the national budget. The Ministry of Natural Resources and Climate Change plays a central role through policy development, direction and regulation on climate change mitigation and adaptation. The Department of Climate Change and Meteorological Services (DCCMS), located under The Ministry of Natural Resources and Climate Change, reports on climate change in the country. It is mandated to monitor, analyse, and provide information on weather, climate and climate change. The Department is key actor in providing early warning of climate extremes. The Ministry of Gender, Community Development and Social Welfare is central to ensuring that aid reaches the country's most vulnerable communities. Other institutions include the Reserve Bank of Malawi, The National Planning Commission, the Ministry of Local Government, Unity and Culture, and the Ministry of Water and Sanitation.

Key regulations guiding the insurance sector include the Insurance Act of 2025 and the Inclusive Insurance Directive of 2025. To improve coordination on climate risks and strengthen preparedness and resilience building, the Government developed the National Disaster Risk Management Act (2023). This Act is the legislative framework for enhancing disaster response, preparedness and recovery in Malawi.

The financial sector of Malawi is underdeveloped. The insurance sector is one of the least developed in Southern Africa. Insurance penetration stands at 2.5%. The banking sector in Malawi is highly concentrated however there is low access to banking in urban areas. Banking reaches only about 13% of the population. Affordability barriers, low levels of awareness and understanding of insurance services, limited product diversification and lack of rural penetration are some of the reasons underlining the low financial services patronage.

Mobile technology offers a way forward, while the penetration of mobile technology is still comparatively low, the country is experiencing an increase in the use of mobile money, with more than 80% of all financial transactions being made by mobile phone, indicating a preference for this form of financial transaction.

Policy landscape

Malawi's future development is based on Malawi 2063, a long-term development blueprint. Malawi 2063 does not explicitly mention CDRF. Still, it prioritises relevant issues such as DRR, environmental sustainability and financing mechanisms for resilience. It highlights natural hazards as a crucial challenge to the country's sustainable development.

Key policy frameworks, including the National Resilience Strategy (2018-2030) and the National Disaster Risk Management Act (2023), highlight the need for scaling up CDRF, but concrete CDRF mechanisms remain underdeveloped. These frameworks call for expanding the diversity of financial mechanisms, such as insurance, risk pools and shock-responsive social protection, for protection against climate shocks. They also call for the creation of a risk-layered approach using both ex-post and ex-ante mechanisms at financial tools for responding to disaster risks.

The New Social Protection Policy (yet to be launched) mentions shock-responsive social protection and social security/insurance as priority areas. A new National Social Protection Strategy and Policy is under development as well as a DRF strategy.



Challenges

Malawi faces several challenges in the use of CDRF instruments as financial tools for responding to climate and disaster risks. These challenges are summarised below:

1. **Need for further implementation of CDRF policies and strategies:** While Malawi benefits from robust CDRF policy frameworks and strategies, there is a gap in implementation. Additionally, policies are centred at the national level with limited articulation at the sub-national level.
2. **Limited domestic financial resources:** Malawi relies heavily on international donors and government borrowing in responding to the impacts of natural hazards, making funding for disaster response unreliable.
3. **Gaps in national insurance and financial market:** Both the insurance and banking sectors do not reach vast parts of the population, leading to limited insurance coverage for particularly vulnerable people. Insurance is further constrained by limited availability of tailored products that meet market needs.
4. **Need to increase data availability and EWSs:** Enhanced data collection and modelling are critical for more precise risk assessments and effective anticipatory action through EWSs.
5. **High fiscal deficits:** With a fiscal deficit of 18.7% in 2024, Malawi is one of the countries with the highest fiscal deficits in all of Sub-Saharan Africa. Natural disasters have the potential to exacerbate these deficits, leading to additional budgetary challenges for the country.
6. **Coordination gaps:** There are critical gaps in public sector coordination on DRM; and sometimes institutional mandates overlap due to the many stakeholders and institutions involved in DRM.
7. **Technical capacity gaps:** There are technical capacity in risk and vulnerability assessment and well as macro-economic risk assessment.



1. Introduction

In June 2024, the Government of Malawi submitted the information of lead Ministry and focal point to the Global Shield against Climate Risks as pathfinder country in order to access Global Shield against Climate Risks support. The MoFEA was appointed as the government ministry to lead the process. Following this, the Global Shield In-Country Process (ICP) was initiated in July 2024. The Government selected the University of Malawi (UNIMA) as the technical support structure for the ICP.

The ICP kicked off with consultations to compile relevant information, assess existing initiatives and projects, and capture the perspectives of vulnerable groups. These consultations took place from January to February 2025 with more than 40 stakeholders from the public sector, academia, private sector, and civil society organisations (CSOs). In addition, a multi-stakeholder workshop took place in April 2025 to validate the findings of the stocktake and gap analysis report and gather priorities for Malawi's Request for Support to the Global Shield.

One of the key technical outputs of the ICP is a Stocktake and Gap Analysis report. The Stocktake provides a comprehensive understanding of the CDRF landscape of Malawi; including policy, regulatory and institutional frameworks, existing risk assessments, solutions at macro, meso and micro-levels, and the most vulnerable sectors and groups. This report relies on a combination of primary and secondary sources of data and information. Desk research is complemented with insights from stakeholder consultations and workshop outcomes. This report has further also benefitted from contributions from the DRF TWG.

This report is organised in six chapters. Chapter one introduces and sets the context for the report; chapter two provides information on the social and economic context; chapter three assesses relevant climate and disaster risks and vulnerable sectors; chapter four discusses the relevant CDRF country priorities and strategies; chapter five discusses the enabling environment for CDRF including the institutional framework, private sector, sub-national and CSO capabilities and the regulatory framework; and chapter six presents the existing, ongoing and planned financial protection solutions and the linkages to social protection, anticipatory action/EWS and DRR.

2. General country profile

This chapter presents an overview of the economic and social context of Malawi.

Malawi, a predominantly rural country with around 20 million people, faces widespread poverty with over half the population living below the poverty line and nearly 59% classified as multidimensionally poor. The economy is heavily dependent on climate-sensitive, rain-fed agriculture, making it particularly vulnerable to climate shocks like droughts, which have significantly impacted food security, economic growth, and public finances.

2.1 Economic situation

Malawi is a landlocked country in sub-Saharan Africa (see Figure 1), with a population of approximately 20 million. It is predominantly rural, with about 80% of the population living outside urban areas. There is a poverty gap² of 17%; with over 50.8% of the population living below the poverty line and 20.5% of the population living in extreme poverty (National Statistics Office (NSO), 2019).

Beyond income-based poverty, the multidimensional poverty situation is also dire. Reports show that 58.8% of individuals in Malawi were multidimensionally poor³ as of 2019. This figure was higher than the 2016 levels of 61.7% (NSO and UNDP, 2022). At the district level, the United Nations Development Programme (UNDP) Multidimensional Poverty Index identifies Mangochi and Machinga as having the highest levels of poverty, while cities like Mzuzu, Blantyre, Zomba, and Lilongwe have the lowest levels of poverty. The 2022 Malawi report lists Mchinji, Kasungu, Dowa, Phalombe, and Lilongwe rural as the districts with the highest poverty levels. Female-headed households are disproportionately multidimensionally poor (NSO and UNDP, 2022).

Malawi's economy heavily relies on agriculture (NSO, 2025)⁴, which is both the largest contributor to the GDP and the primary employment source (NSO, 2023). Agriculture in Malawi is rainfall dependent, making it particularly vulnerable to climate shocks. Recent droughts caused major setbacks in food security and crop production. Key sectors of the economy, namely agriculture, manufacturing and utilities, have all been impacted by climate-related disasters, leading to slowed economic growth or economic contraction and an increase in government expenditure and debt. According to the WB, the nation's GDP per capita in 2024 stood at around USD 602.3 and has decreased in recent years due to population growth exceeding economic growth (WB Group, 2025)

Malawi's fiscal situation is challenging; current account deficit⁵ is 18.7% as of 2024, one of the highest fiscal deficits in sub-Saharan Africa (WB, 2024). This fiscal imbalance significantly restricts the government's ability to respond to crises. Recent droughts and crop failures have compounded the fiscal strain, limiting the country's capacity to respond to crises.

Current financing to address climate-related impacts remains highly dependent on government borrowing and development aid. Furthermore, local financing is described as a part of the public financing mechanism, but in reality, this funding does not sufficiently cover disaster response needs. The Government aims to move towards a more risk-layered approach, reducing ex-post financing mechanisms while simultaneously expanding ex-ante financing mechanisms. Examples of current ex-

² The poverty gap quantifies how far, on average, the poor are from escaping poverty. It considers both the **incidence** (how many people are poor) and the **depth** (how far below the poverty line they are)

³ Refers to poverty that goes beyond income levels and includes multiple deprivations that people experience in their daily lives, such as poor health, lack of education, inadequate living standards, and social exclusion.

⁴ Agriculture accounts for 21.7%, followed by manufacturing (11.5%), wholesale and retail trade (11.1%), and real estate (6.6%). [National Accounts - News - National Statistical Officer](#)

⁵ Imports are more than exports.

post mechanisms in use in Malawi are either budget reallocations, shifting much needed funding for socio-economic development towards disaster relief, or international and national post-disaster borrowing, which increases the national debt burden and can be unpredictable and late. Since 2014, the Government has used ex-ante financing instruments such as sovereign level insurance for financial protection against climate and disaster risks.



Figure 1. Map of Malawi (World Atlas Map, 2023)

2.2 Social situation

Financial inclusion in Malawi is considered low. Around 60% of Malawians lack access to formal financial services and only 14% actively use them (WB, 2024). About 53% of Malawians use a combination of formal and informal mechanisms to manage their financial needs, thus indicating that their needs are not fully met by the formal sector alone. Interestingly, in informal financial services, rural males have a higher usage rate than females. However, in urban areas, more females utilise informal services than males (FinMark et al., 2023). Increasing access to financial services is a priority of Malawi 2063 development agenda. The WB’s Inclusive Digitalisation in Eastern and Southern Africa (IDEA) initiative seeks to enhance digital access, expanding mobile banking and mobile money services to reach the unbanked population. However, the telecommunications market has only two main providers, potentially limiting affordability and access to digital financial services. Mobile money



has, however, expanded access in recent years, with approximately 39% of adults using digital financial services (DFS). Mobile money offers a viable option for reaching underserved groups in remote areas in Malawi (FinMark et al., 2023).

Approximately, 73% of Malawians live in areas susceptible to climate related disasters (Africa Climate Foundation, 2024). The main social impact of these disasters is on food security. A recent report by the Integrated Food Security Phase Classification (IPC) describes the development of food insecurity as growing, especially in the southern and central parts of the country (IPC, 2023). This has led to the displacement of parts of Malawi's population and furthermore resulted in significant health challenges, due to a decreased quality of meals, water scarcity and the reduction in crop production.

Communities have used a number of mitigation or coping strategies in response to climate hazards. Some of these include agroforestry, small scale irrigation schemes, pest control, crop rotation, area reclamation, construction of contour bands, DRM clubs in private schools on flood risk management, Village Savings and Loan Associations (VSLA) and capacity building activities.

3. Risk assessment

This chapter⁶ illustrates the extent of existing climate modelling and natural catastrophe risk research in Malawi and indicates gaps where further risk research would be helpful to the government's aims in developing adaptation policy, resilient investment and CDRF support by the Global Shield.

3.1 General overview of available risk information for Malawi

Malawi is highly prone to various natural hazards, including droughts, intense rainfall and floods, tropical cyclones and earthquakes. Historically, the most frequent and severe of these hazards have been droughts and floods (EM-DAT, 2024), and this is unlikely to change given that climate change is expected to greatly increase the impact of these two perils in the future (WB, 2022).

The Inform Index is commonly used to understand the general drivers of risk in a country and for comparison with similar countries in the region and globally. Malawi ranks 59 out of 191 on the Index (INFORM, 2024) and overall is rated as having medium risk with high vulnerability and low coping capacity. According to the Index, the main drivers of natural catastrophe risk are drought, earthquake, tropical cyclone and river flood (the Index does not account for rainfall-related flood).

This section describes the variety of scientific studies, data and analytics available to Malawi to get an initial understanding of the risk, outlined by category of source. Further down, Section 3.2 examines the quantitative risk assessments by each specific peril affecting the country.

3.1.1 Historical risk data

Event and impact data, sourced from EM-DAT, outlines the main historical risk drivers as drought, flood (river and rainfall) and tropical cyclones (EM-DAT, 2024). Historical impact data, available for the country through EM-DAT (EM-DAT, 2024), confirm these as the main risk drivers. From 2000 to 2024 (see figure 2), Malawi was impacted by 32 floods (15 riverine, 5 flash floods, and 12 unknown), 6 droughts, 4 tropical cyclones (the impact was from tropical cyclone related flooding rather than wind), 2 earthquakes, and 1 rainfall-related landslide.

Whilst floods happen most frequently, droughts affect by far the greatest number of people (see figure 3). Nine of the top 10 events, in terms of population affected, were droughts. The only non-drought related event in the top 10 is Tropical Cyclone Freddy which struck the country in 2023 and is recorded as the costliest event in Malawi's history (EM-DAT 2024) with the reconstruction and recovery costing approximately USD 764 million (UNDP, 2023). However, this may be due to the difficulty in accurately reporting financial losses from drought events and therefore this data often not being available within the historical database.

⁶ Sections 3.1 to 3.3 of this chapter has been prepared by the GRMA, a partner initiative to the Global Shield against Climate Risks. Working in coordination with local and regional programmes such as ARC, GRMA works to enhance existing expertise in climate and disaster risk analytics.

Disclaimer: This report provides climate and disaster risk modelling context in support of the Global Shield ICP and is not in itself a new risk analysis. It was prepared by the technical staff of the GRMA in its best effort given very limited time for completion. It is based on documents and information from various reports publicly available on the internet. The Global Risk Modelling Alliance does not guarantee the accuracy, completeness or currency of the data included in this report and does not assume responsibility for any errors, omissions or misinterpretations in this information, or liability with respect to the use of or failure to use the information, methods, processes or conclusions set forth.

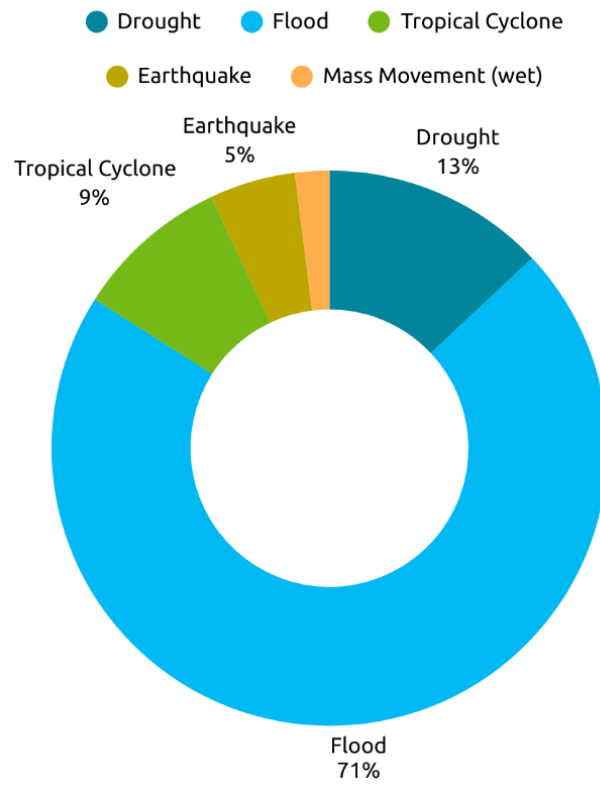


Figure 2. Number of natural hazard events from 2000 – 2024 (EM-DAT, 2024)

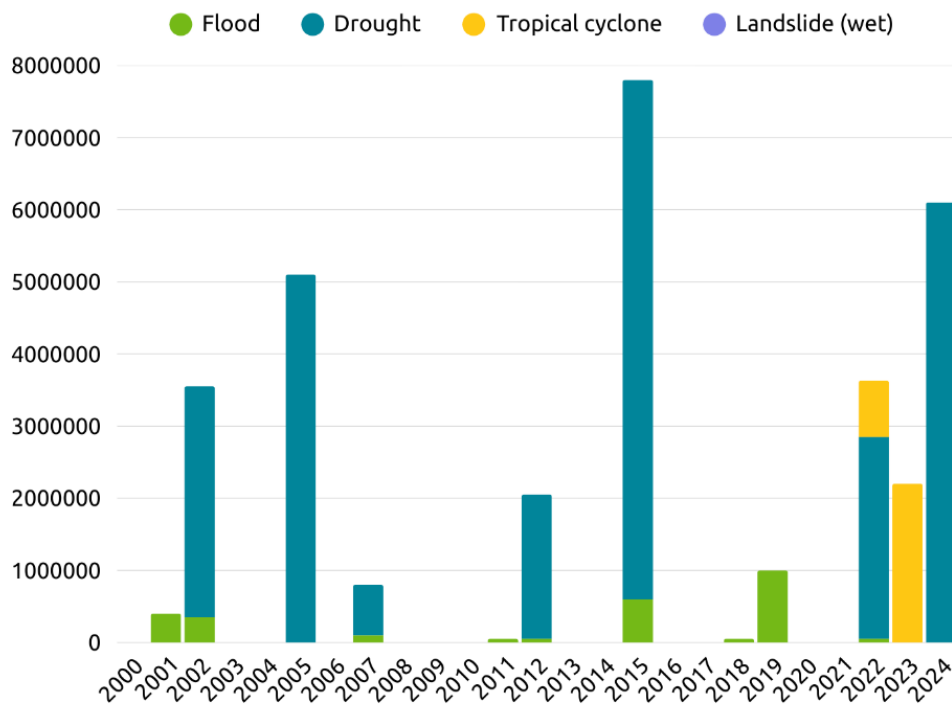


Figure 3. Number of people affected by natural hazards (EM-DAT, 2024)

DoDMA also collects disaster data for historical events in their National Profile of Disasters (NPOD). However, an up-to-date version of this data was not available to be used as part of this study and it is unknown whether this data correlates with that available in EM-DAT.

Whilst historical data can provide a good initial indication of the risk to a country, it does not provide a complete picture of the risk due to short recording periods, incomplete or inconsistent recording of event impacts, changes in recording practices over time and difficulties in obtaining accurate figures for many impact metrics during or post event.

3.1.2 Academic research relevant to risk understanding

Academic and research studies are often helpful in gaining a first indication of risk using qualitative metrics to increase understanding of specific hazards and identify hotspots of vulnerability. Usually these do not provide quantitative risk assessments that can support risk profiling, however, in Malawi a few relevant studies that include such quantitative assessments have been identified to support greater risk understanding:

- **A Probabilistic Approach to Assess Agricultural Drought Risk (Jayanthi et al., 2014)** – This study used historical satellite rainfall data to develop 500 scenario years of drought. Due to a lack of historical data available for the country losses above the 10-year Return Period (RP 10)⁷ threshold should be approached with caution. The results from this study indicate AAL of 1.2%⁸, with respect to 2008 maize production, and that the risk increases from North to South. The RP10 losses are 3.6% whilst the RP100 losses are 8.9%.
- **The Welfare Cost of Drought in Sub-Saharan Africa, (Gascoigne et al., 2024)** – This paper quantifies the impact of drought on household consumption by correlating the relationship between deficits in rainfall and poverty across eight countries, including Malawi. The paper highlights the impact that weather conditions have on national poverty rates over the available period of historical data and importantly highlights that not all indicators (e.g. Normalised Difference Vegetation Index (NDVI), Standardised Precipitation Evapotranspiration Index (SPEI), Water Requirement Satisfaction Index (WRSI), etc.) perform equally well when correlating a change in welfare with changes in weather conditions. The paper identifies soil moisture and NDVI as the most consistent indicators, with other indicators having greater variability. The paper goes on to outline the development of three 10,000-year stochastic drought catalogues by Verisk's AIR Worldwide for Malawi. The three catalogues developed were for precipitation, soil moisture and vegetation index. Further details on the methodology and validation exercises can be found in the paper and the relevant results are outlined in the drought section of this paper on page 20.
- **Meteorological and Hydrological Drought Assessment in Lake Malawi and Shire River basins (Mtilatila et al., 2020)** – This study assesses the variability and trends of both meteorological and hydrological droughts from 1970 to 2013 in Lake Malawi and Shire River basins using the Standardised Precipitation Index (SPI) and SPEI for meteorological droughts and the Lake Level Change Index (LLCI) for hydrological droughts. Results suggest that meteorological droughts are increasing due to a decrease in precipitation which is exacerbated by an increase in temperature (leading to potential evapotranspiration). This has a knock-on impact on hydrological drought and the critical lake level (the level below which a hydrological drought would be triggered) for Lake Malawi.

⁷ RP 10 – on average how often you would expect to see an event of this size, it can also be given as an exceedance probability which is the probability of this size event occurring in a particular year)

⁸ The average loss that is expected to occur in any given year as a percentage of 2008 maize production within Malawi (i.e. 1.2% of all maize produced in Malawi in 2008 would be expected to be lost due to agricultural drought in an average year)

- Scenario-based Seismic Risk Assessment for Malawi Using Improved Information on earthquake Sources and Local Building Characteristics (Goda et al., 2018)** – This risk assessment focused on the Bilila Mtakataka Fault. Two rupture scenarios were used to develop 1,000 probabilistic shake maps, a continuous rupture along the entire length of the fault and a rupture to six individual segments of the fault. The maps were used in conjunction with exposure and vulnerability data developed by supplementing 2008 census data with building surveys conducted as part of this study and from this developing new Malawi-specific vulnerability functions. The output from this analysis shows that the worst case is a continuous rupture of the fault providing a median estimate of approximately 210,000 collapsed buildings and 150,000 people affected.
- Impact of Modelling Scale on Probabilistic Flood Risk Assessment: The Malawi case (Rudari et al., 2016)** – This paper is particularly helpful to get an initial understanding of the potential flood risk to the country as well as understanding the volatility of losses that can be driven purely from using different methodologies. The study used two approaches to model flood and obtain fluvial flood maps; a partly national scale approach that estimates flood water depth at a resolution of about 1km x 1km and a full 2D hydraulic model that was developed at 12m resolution for three hotspots within the country. The national scale risk analysis focussed only on the North and Centre of the country providing output losses for buildings, population and crops. As might be expected given the distribution of exposure in the country, most building and population losses were driven by the central segment of the country whilst crop losses were higher in the North. The loss estimates are summarised in table 1 – note that these results are not included in the flood section later in this chapter given that they do not provide national level losses, however, they can still provide a useful comparator to other models. Interestingly the two methodologies gave similar results in one hotspot, however, in the other two hotspots there were significant differences. This is due to improvements in the Digital Terrain Model (DTM) and ability to account for complex flow patterns.

Table 1. Loss estimates for flooding in the North and Centre of the country (Rudari et al., 2016)

	AAL	RP20	RP100
Buildings (USD million)	1.74	4.05	7.77
Crop loss (USD million)	21.11	28.86	34.92
Population affected	68,500	106,500	131,500

- Climate Induced Vulnerability to Poverty among Smallholder Farmers: Evidence from Malawi (Maganga, A., Kambewa, P., and Chiwaula, L., 2021).** Using panel data from the Malawi Living Standards Measurement Survey (2010, 2013, and 2016), this paper analyses the impact of climate-induced vulnerability on expected poverty among farming households and its relationship with ex-post poverty and poverty transitions. Findings show that the effects of vulnerability on actual poverty lessen with time in the long run. Similarly, climate related stresses worsen the welfare of farming households. Droughts, floods and irregular rainfall exacerbates poverty with droughts showing the greatest impact on farmers' welfare loss,

followed by floods. The study underscores the importance of livestock, in buffering against poverty through serving a safety net, and off-farm income-generating activities.

3.1.3 Regional probabilistic risk analysis

In addition to analyses that focus specifically on Malawi there are several regional or global probabilistic risk models that are available to provide national and sub-national risk metrics for the country. Probabilistic risk models provide a more complete representation of risk by simulating a large range of events, including both frequent and rare, but still plausible, events. They combine this data with information on (1) people and their vulnerability, and (2) built on natural assets' location, vulnerability and replacement cost to quantify potential impacts. Impact metrics may show the number of people affected or number of assets damaged and reconstruction cost. Model results available for Malawi include (see figure 4):

- The WB's Country Disaster Risk Profile quantifies the risk for flood, earthquake, drought and landslide based on 2015 exposure that was developed for population, agriculture and building stock – including general buildings, education and health sectors, and transportation sector (GFDRR, 2015).
- The Global Earthquake Model (GEM) provides a seismic risk profile for the country using their global exposure and hazard models (GEM, 2023).
- The Coalition for Disaster Resilient Infrastructure's (CDRI) Global Infrastructure Resilience Index (GIRI) in 2024 quantified risk based on global exposure and hazard models for flood, earthquake and landslide (CDRI, 2023). This assessment was made for buildings, power, telecommunications, roads and railways, water and wastewater, oil and gas, ports and airports.

The loss estimates from these models diverge quite considerably due to the analysis being done at different points in time (i.e. do not account for aspects like inflation), focussing on different exposure categories (e.g. infrastructure or buildings), using different exposure data with different associated replacement costs, and using varying modelling methodologies. Being global models, they also tend to be at low resolution, lack any local information and have been through minimal, if any, local level validation. Caution should be taken when using their output for more than providing initial indications of the level of risk. Further evaluation would need to be done, particularly on the WB and CDRF assessments, before using for any downstream purposes, such as CDRF instruments.

Most of the modelled estimates are focussed on the number of people affected by events or losses to the building stock of the country with some also including infrastructure risk. The estimates include only the direct losses on physical assets. Indirect losses to the wider economy or intersectoral linkages are not included. Given this, the results should not be directly compared but instead used to understand the range of potential losses.

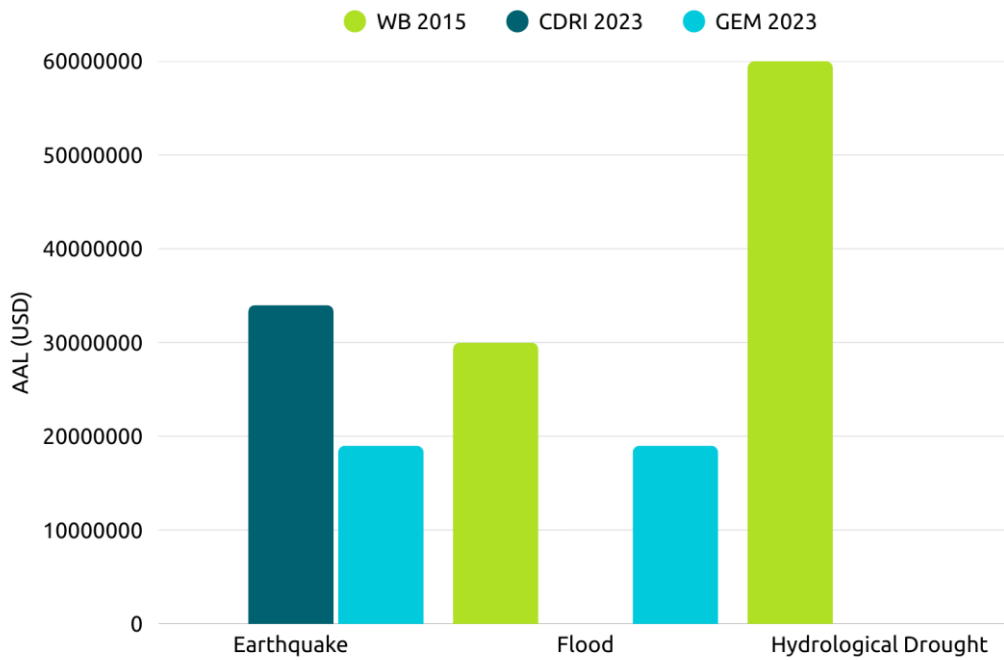


Figure 4. Average Annual Loss per peril for each of the available modelled risk profiles (GFDRR 2015, GEM 2023, CRDI 2023)

Note: WB and GEM losses for earthquake and flood are from buildings, whilst the WB drought analysis provides losses for agricultural income and CDRI losses and for building and infrastructure.

The CDRI risk assessment provides a combined AAL for Malawi of USD 37.7 million (earthquake – USD 18.7 million, flood – USD 19 million and landslide – USD 0.038 million) with the WB report indicating that 1.7 million people, approximately 8% of the 2022 population, (incl. drought) are expected to be impacted by an event each year. In a bad year that happens approximately once in a person’s lifetime, assumed to be a 50-year return period event, the cost is expected to rise to USD 200 – USD 230 million (not accounting for landslide or drought losses).

Each year on average, it is expected that hydrological drought will cause the largest losses and impact the most people, with the AAL to agricultural income alone exceeding USD 60 million, approx. 1% of GDP (GFDRR, 2019). In contrast, flood losses are expected to range from USD 19 to USD 30 million (given the exposure differences between the CDRI and WB assessments the range would be expected to be even greater if they were comparable exposure data sets) and impact approximately 100,000 people on average each year.

3.1.4 Exposure data available for Malawi

Many risk assessments have developed their own sub-national or national exposure databases, estimating either population or the total replacement value of various assets – both physical and non-physical – across the country and mapping their geographical distribution. These datasets have been developed using a range of methodologies, with large differences in the number of buildings and value of buildings in each. This is likely due to the use of international building databases without taking observations from the field to confirm expected building typologies and distributions. Ngoma et al. (2019), highlight in their study Building Classification and Seismic Vulnerability of Current Housing Construction in Malawi, that it is critical to obtain the most realistic building information possible using on the ground information and data.

3.1.5 Climate change analysis

Malawi is highly vulnerable to changes in temperature and precipitation patterns are expected to exacerbate the risk challenges of the country. Key challenges are food security (IPCC, 2014), and power generation, both of which rely on the amount and timing of precipitation events. Maize, the main staple crop of the country, is one of the most vulnerable to climate change.

The past 20 years shows an emerging trend of rainfall patterns in Malawi. There are now fewer dry days and shortened rainy seasons (Haghtalab et al., 2019). The country is also seeing more frequent and intense drought and flood events with impacts on the population going beyond direct impact to include indirect impacts such as food insecurity, reduced access to essential services (WB, 2021) and rural out-migration (Lewin et al., 2012; Suckall et al., 2015). Food insecurity and undernourishment have risen by 5% over the last 10 years (Food and Agriculture Organisation (FAO), 2023).

While the impact of climate change on hydropower generation remains somewhat uncertain due to the regulating effect of Lake Malawi, the broader macro-economic impact, assuming no adaptation, are significant. Current estimates are that drought and flood events already cost the economy 1.7% of its GDP every year (Pauw et al., 2010) with future scenarios indicating even greater losses. In the worst case, interestingly a Shared Socioeconomic Pathway (SSP)1-1.9 wet climate scenario, GDP losses hit a high of 19.5% below baseline in 2040 before beginning to decline. These losses are largely driven by the changes in precipitation patterns and direct damage from rainfall or flood events, particularly impacting the transport sector (WB, 2022).

3.2 Summarised quantitative risk estimates per major peril

At the time of writing only four national risk analyses are accessible for Malawi (see figure 5), the three identified above and a flood risk analysis that was produced by JBA Risk Management for ARC and unlike the other flood risk profiles includes both fluvial and pluvial risk. A 2024 multi-hazard risk assessment project also produced national and provincial loss profiles for current and future climate conditions across a number of perils, including flood, drought, landslides, earthquakes and strong winds. However, it has not been possible to obtain the outputs for inclusion in this summary.

Of these four risk analyses, one focusses solely on earthquake risk whilst two provide a multi-hazard risk assessment and the JBA analysis only provides output for number of people affected by flood (see figure 6)⁹. In addition to these the below sub-sections are supplemented by information and data available from academic studies and experience from historical events.

⁹ It has not been possible to access African Risk Capacity's drought risk profile for Malawi

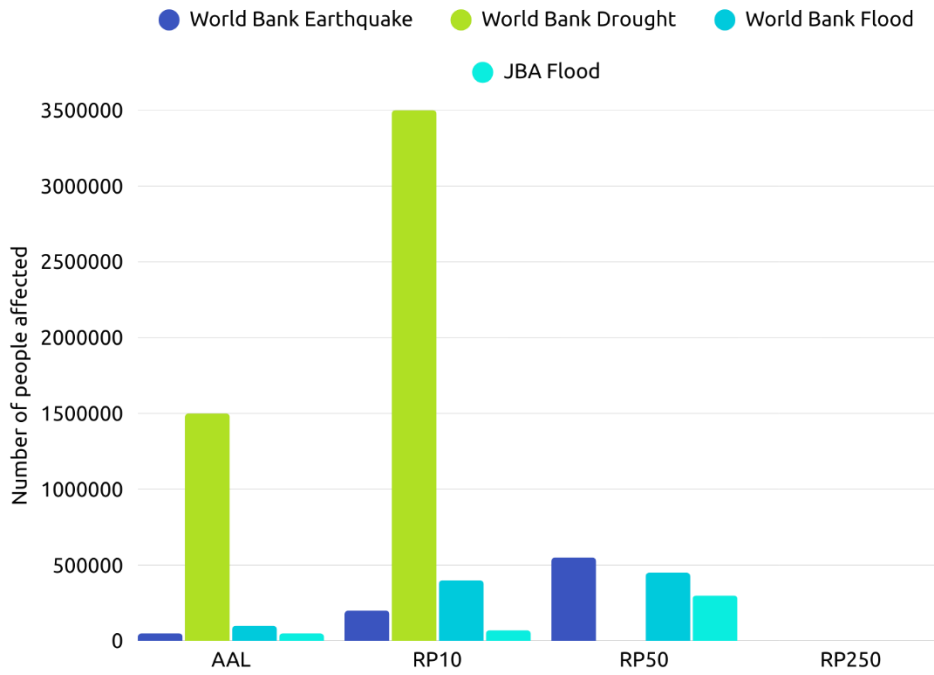


Figure 5. Estimated number of people affected by different risk profiles for different perils (GFDRR 2015, JBA 2022)

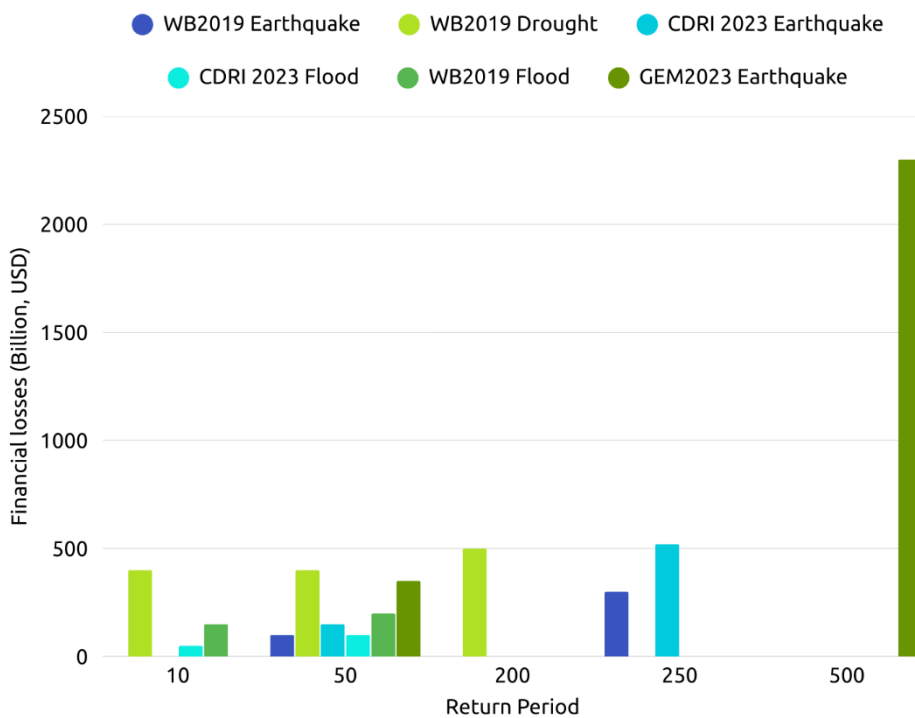


Figure 6. Estimated financial losses from different risk profiles for different perils (GFDRR 2015, GEM 2023, CDRI 2023)

3.2.1 Drought

Malawi suffers from all types of drought risk, with the central and southern regions being the most heavily affected. The population is most at risk through food insecurity, due to the impact of drought on the agricultural sector, and uncertainty over the sustainability of existing water resources. However, its effects extend further, including disruptions to hydroelectricity power production, which currently generates 1.7 TWh of electricity per year for the country.

In recent years there have been several significant drought events with the largest being the 2015-2016 drought. This caused at least 40% of the population, 6.5 million people, to become food insecure and led to losses and damages of approximately USD 370 million, 5.6% of the country's GDP (Government of Malawi, DRF Strategy 2024).

Impacts from drought are particularly hard to model as the link between lack of rainfall and food insecurity is complicated with many other interrelated factors (e.g. how lack of rainfall translates into changes in food production, stock levels, ability to trade and accessibility to supply, income, etc.) and difficulties in assigning estimates of damage and losses to the impact from drought on the population. Jayanthi et al. (2014) modelled the impact of drought on maize production (based on data from 2008) and found that every 10 years the country should expect a 3.6% loss. Maize accounts for approximately 90% of total cereal production in the country and is a critical staple crop for the population (FAO – GIEWS, 2025).

Of the risk analyses only the WB risk profile analysis attempts to model the losses from drought events on the agricultural sector and wider population. From this analysis it is estimated that 1.5 million people would on average be impacted by drought every year with a USD 60 million impact to agricultural income. For an event that happens once every 10 years this grows to 3.5 million people and USD 400 million respectively.

Additional information on drought in Malawi can be found in the WB Group's Policy Research Working Paper on The Welfare Cost of Drought in Sub-Saharan Africa (Gascoigne et al., 2024). The paper quantifies the impact of drought on household consumption by correlating the relationship between deficits in rainfall and poverty in Malawi. Using Verisk AIR's 10,000-year catalogue of weather simulations, an exceedance probability curve is produced that shows the probability of exceeding (loss exceedance in %) a particular change in poverty rate when compared to an average year (see figure 7).

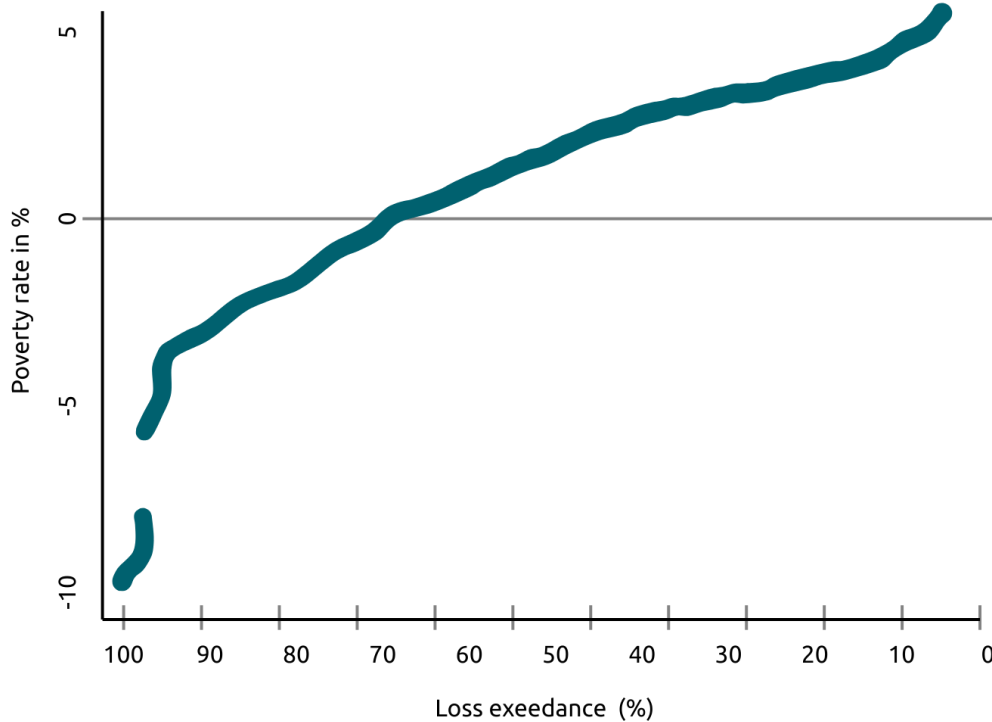


Figure 7. Impact on poverty rate using AIR hazard simulations in Malawi (Gascoigne et al., 2024)

Climate change is causing increasing temperatures in the country, whereas the total amount of yearly rainfall is on a downward trend. There is an expected increase in the number and severity of drought events in the country due to this. Impact on the agricultural sector, water availability, power production and food insecurity is growing. Increasing temperature also brings greater possibility of extreme heat events, particularly in urban environments, impacting mortality and labour productivity within the country and potentially putting health systems under stress. There are currently no models available to understand the future risk from extreme heat.

3.2.2 Flood

Malawi is dominated by the Lake Malawi drainage system which has many rivers flowing into. It is the main flow of water towards Mozambique from Malawi. Lake Chilwa is the second drainage system of the country, but this is small in comparison and has no outlet from the country. The rainy season occurs between November to April with the highest amounts of rainfall in December and January. Whilst these rains do occasionally cause flash flooding, flood risk in the country is mainly driven by river flooding. The most vulnerable areas to damaging floods are the Lower Shire Valley in the very south and districts in the North of the country (see figure 8).

Historically, Malawi's worst flood event occurred in 2015 when the country was hit by the highest amount of rainfall ever recorded in a single period. Above average rainfall was experienced in the south of the country and led to significant riverine flooding downstream in several districts. The worst affected were Nsanje, Chikwawa, Phalombe and Zomba. The event affected over one million people, displacing 230,000 and caused damage of USD 400 – 500 million (about 5% of GDP). The event impacted many sectors of the economy. Worst hit sectors were housing (USD 139.0 million), agriculture (USD 68.0 million), transportation (USD 50.0 million), water and sanitation (USD 26.0 million), education (USD 12.0 million), health (USD 12.0 million), and industry and trade (USD 11 million).

accounting for infrastructure risk. A 10-year return period event is estimated to cause USD 31 million of damages whilst an RP50 event leads to USD 89 million of damages (buildings and infrastructure), 40% less than the WB losses even though it is accounting for an additional 20% of exposed value (infrastructure). Given the reliance on global models and also the WB's acceptance that their model is overestimating losses this difference in estimates is not unexpected. Further investigation of the models would be needed to understand the drivers of these differences.

Scientific consensus does expect climate change to lead to a decrease of precipitation in the long run although the number of heavy rain days is projected to increase slightly. However, there is a wide range of possible precipitation outcomes and much uncertainty in how this will develop into the future.

3.2.3 Tropical cyclone

The Southwest Indian Ocean is one of the world's most active areas in terms of tropical cyclone (TC) formation. These events produce high wind speeds which are often the main driver of damage, but they also produce secondary hazards of storm surge, wave damage and heavy rainfall. Whilst TC's in this region mainly impact countries with a coastline (Mozambique, Madagascar, Comoros) Malawi can be impacted by the high level of precipitation driven by these events as they move inland.

Over the past 5 years three significant TCs have impacted Malawi and caused widespread destruction and large financial losses to the country. In March 2019 Tropical Cyclone Idai struck Southern Africa causing huge damage and associated losses across Mozambique, Zimbabwe and Malawi. In Malawi there were 59 deaths with nearly 1 million people affected. The event led to losses of USD 157.7 million spread across the housing sector (USD 106.9 million), energy sector (USD 3.1 million), water and sanitation (USD 6.4 million) and transport (USD 37 million) (Government of Malawi, 2019). The vast majority of damage caused by this event was from torrential rain and associated flooding.

In January 2022 Tropical Storm Ana hit the Southern part of the country destroying over 70,000 hectares of crops, displacing nearly 200,000 people and impacting over 1 million people. Including infrastructure, damages from the event were estimated to be USD 183 – 328 million (1.5 – 2.7% of GDP) (International Food Policy Research Institute (IFPRI), 2023). Of particular note was the damage to Kapichira Hydroelectric Power Station, which provides 30% of the country's power. More recently Tropical Cyclone Freddy hit the region in early 2023. This cyclone was exceptionally severe and long lived, generating the highest accumulated cyclone energy ever recorded for a single event worldwide. This event again brought torrential rains to Malawi leading to catastrophic flash floods and river flooding that impacted buildings and crippled the country's power grid. Tens of thousands of people were displaced, more than 1,000 people lost their lives and huge areas of crops were destroyed, heavily impacting the country's agricultural sector. The losses from Freddy likely led to the 3% downgrade in Fitch's real GDP growth forecast (Fitch Solutions, 2023).

There are no risk assessments available for this peril for Malawi as the impact from these events should be incorporated within flood risk assessments given the damage occurring from precipitation. Further investigation would be needed to check that the CDRI, WB and JBA models do account for this risk.

3.2.4 Earthquake

Malawi is located at the southern end of the East African Rift with seismically active zones stretching from the north down into southern Malawi. Reasonable levels of ground shaking would be expected to occur on average once in a person's lifetime but very strong earthquakes (up to Moment Magnitude (Mw)7.0+) can be expected to occur infrequently. Many of Malawi's buildings are unreinforced, have

low seismic resistance and are therefore vulnerable to seismic events, resulting in significant losses even for more moderate size events. Whilst hazard is highest in the North of the country, losses are expected to occur mostly in the Central and Southern parts due to higher prevalence of built environment in these areas.

Historically, the country suffered from Mw6.3 and Mw5.6 earthquakes in March 1989. Although many tens of thousands of people were made homeless, losses were low due to the earthquake's location which is further away from any main urban centres. There are several scientific literatures available which examines the risk from earthquake in terms of number of buildings collapsed and people affected. The most expansive study is PREPARE (Enhancing Preparedness for East African Countries through Seismic Resilience Engineering) which was a three-year United Kingdom Engineering and Physical Sciences Research Council - Global Challenges Research Fund project between 2017 and 2020 that developed earthquake impact assessment tools to improve the earthquake disaster preparedness for East African countries, including Malawi (Biggs & Macdonald, 2017 – 2022). Others also include Goda et al. (2018) and Goda et al. (2019).

Three of the existing global risk assessments provide probabilistic loss assessments for Malawi with the building AAL ranging from USD 17 to USD 35 million. From the CDRI assessment, infrastructure adds another USD 1.5 million of losses. For larger earthquakes that on average occur once every 250 years these losses increase to USD 250 – 536 million. With climate change expected to drive changes in exposure distribution and increasing urbanisation, the risk to the country and in particular urban centres is expected to increase.

3.2.5 Landslide

Landslides are localised events that tend to cause damage in the vicinity of the event but usually do not have noticeable impacts at the national level. Across Malawi, landslide risk is moderate. However, Mulanje Mountain and Malosa Complex areas have high to very high hazard.

Historically, the most severe landslide event occurred in 1992 in Phalombe killing 500 people. The event had wide-ranging impacts; it caused the failure of a dam leading to large amounts of flooding downstream. This type of compound risk is particularly important to understand in an increasingly interconnected world. A more frequent occurrence with increased quantities of TC induced precipitation that can lead to mudslides (e.g. mudslides in Blantyre following Cyclone Freddy).

At this time there are no known models of landslide risk in Malawi and there is also limited knowledge on how climate change will impact the hazard. However, there are expectations for landslides to increase over the coming years due to changes in precipitation patterns.

3.3 Sub-section conclusion

These conclusions¹⁰ acknowledge ongoing work and the gaps.

Overall conclusion: Detailed and reliable risk modelling for Malawi remains limited. Whilst some national scale catastrophe risk models do exist for the key perils as outlined earlier in the document, these are generally based on global models. These provide helpful initial indications of risk, but have the following limitations:

¹⁰ The reader is reminded that this chapter is a review of existing physical climate and disaster risk research and is not a new national risk assessment. The authors acknowledge the important work that has already been achieved and hope that much of its value has been reflected here. The authors also fully recognise the experience and memory of the people of Malawi who have lived through extreme events, and the institutions who have helped them to prepare, cope and recover.

- a. Resolution is too coarse to reliably inform local decision-making.
- b. There is very little local level input or verification.
- c. Different methodologies and source data give rise to significant variations in risk estimates.

Modelling for macro-economic planning: In discussions with MoFEA, it is understood that there is a need for analysis of the impact of future climate shocks on GDP and other economic measures. Such an analysis is expected to look at the macro-economic impact of extreme events under current and future climates and needs to reflect climate as a driver of risk, as well as the rapidly changing exposure distribution (including demographics) and vulnerability. At this point in time no such analysis has been discovered and the underlying peril specific model outputs required to support this macro planning are not available (other recommendations relate to developing these).

Addressing this gap would support economic policy and planning and would also be informative for adaptation and investment programmes. It would be highly relevant to the climate action and economic transformation objectives of 'Malawi 2063' and essential information for Malawi's Climate Prosperity Plan, as advocated by the Climate Vulnerable Forum – Vulnerable Twenty Group (CVF-V20), if (or when) that is developed.

Climate risk assessment has limited use if it is just a snapshot in time. It is recommended that any work in this area should involve transfer of knowledge and access to resources to enable Malawi's institutions to update their risk understanding continuously.

Peril specific conclusions: The quantitative analyses and therefore conclusions contained in this report would be greatly enhanced by the inclusion of ARC's national risk profiles for flood and drought, neither of which were available to inform this stocktake. However, conclusions can still be drawn based on available data:

- a. Drought: Whilst ARC's drought risk profile is not available, it is believed that this is based on WRSI and has undergone verification with local data. The profile and associated data have been used to support a sovereign risk transfer policy. The WB's risk profile is the only other risk profile known to be available for Malawi and given it was not developed specifically for the country is expected to be less robust.
- b. Flood: Off-the-shelf global or regional flood models exist that provide an indication of the risk in country from both pluvial and fluvial events (precipitation and river driven). However, these models will have undergone minimal, if any, local level evaluation and the results will therefore be highly uncertain. Further evaluation would be needed to check whether any model can provide sufficiently robust loss estimates to support downstream decision making.
- c. Heat: One area that has not been modelled to date is excess heat and its impact on heat-related mortality, labour productivity and higher welfare costs. The WB's Country Climate Development Report (CCDR) does include estimates of the impacts of this hazard on GDP with a potential impact of up to 4.6% (WB CCDR) but it is not known how this impact was obtained.
- d. Earthquake: Whilst large earthquakes are expected to happen infrequently in Malawi, the modelling available highlights how they can still have a significant impact on the country. This is not expected to be a peril of high priority, given the gaps in other areas, but it should not be forgotten when considering the multi-risk environment in the country.

Malawi can consider evaluating the index and parameters used by ARC to develop the risk profile for the country to ensure they are the most relevant and that the risk profile validates the experiences in the country. The development of a national level flood risk model using best available country and global data could be considered. Finally, as heat is a particularly new area for risk analysis and risk transfer instruments, there would be value in exploring this further by developing risk profiles based on historical experiences.

Input data conclusions: Further to the development of models, greater investment is required in the baseline and input data used to support these types of analytics:

- a. Exposure data: The existing exposure datasets show a large divergence in the estimated location and replacement value of assets and mainly use a top-down approach with limited in country validation. They also contain limited demographic information.
- b. Vulnerability data: Often global risk assessments use global vulnerability functions that bear little, if no, relation to the local building stock in developing countries and this is an area where local knowledge and research can have a large impact on reliability of results. For Malawi most research exists for seismic vulnerability with many earthquake engineering studies providing fragility or vulnerability curves for common building typologies. Very few relevant studies have been found for other perils.
- c. Historical data: Although history is not a perfect guide to future events, as in any country, a more complete historical record would be helpful. More comprehensive and consistent recording of climate and disaster events, through post-disaster surveys of asset-level hazard severity and impacts can help improve risk models for DRM and CDRF, and inform future preparedness, response and recovery.

Developing a consistent and robust exposure database involving local data is a critical first step in improving the risk analyses available. Once local exposure datasets have been developed that identify correct building typologies it would be important to also develop vulnerability curves for these buildings, utilising local or regional knowledge and research. To support further risk modelling and risk financing in Malawi it would be beneficial for the NPoD database to be reconciled with other third-party historical data sources (e.g. EM-DAT and DesInventar).

3.4 Impacts on vulnerable groups

Malawi ranks as the 26th most vulnerable country according to the Notre Dame Global Adaptation Initiative (ND-GAIN) Country index and 56th most vulnerable country according to the INFORM Risk Index. Households in Malawi rely on income from four primary sources namely agriculture, informal labour markets, household business activities, and wage labour according to University of Notre Dame.

Women and girls

In Malawi, the challenges posed by climate change disproportionately affect women and girls, exacerbating existing socio-economic vulnerabilities and gender inequalities. Erratic rainfall patterns and extreme weather events, such as droughts and floods, severely disrupt agriculture, a sector where women play a crucial role. These climatic changes lead to diminished crop yields, contributing to heightened food insecurity. As primary caregivers responsible for food preparation, women are particularly impacted by these shortages.

Water scarcity further compounds these challenges, compelling women and girls to spend considerable time collecting water. According to the United Nations Children's Fund (UNICEF) (2023), rural women and girls in Malawi often walk long distances, sometimes up to 5 kilometres to fetch water, consuming several hours each day. This burden affects school attendance and reduces time available for income-generating activities (UN Women Malawi, 2022; WB, 2021). This burdensome task not only limits their availability for educational and economic pursuits but also exposes them to increased risks of sexual and gender-based violence during their journeys. A study by Glasgow Caledonian University's Mary Robinson Centre for Climate Justice found that climate change exacerbates gender-based violence and mental health issues among vulnerable women in Malawi (Glasgow Caledonian University, 2022). The study revealed that 86% of the 213 surveyed women, had

their mental health and well-being negatively affected due to climate change, with many experiencing emotional pain, sadness, depression, and anxiety. Additionally, 24 women disclosed instances of physical abuse, and 44 reported frequent occurrences of verbal abuse from their partners. These findings underscore the urgent need for climate adaptation strategies that prioritise the safety, health, and empowerment of women and girls.

Climate change significantly impacts the health and safety of women and girls in Malawi. Increased flooding has led to a rise in vector-borne diseases, such as malaria, which pose heightened health risks, particularly for pregnant women and young children. Climate-induced displacement further threatens women and girls, exposing them to gender-based violence and disrupting essential support systems vital for recovery and resilience. Educational disruptions are also prevalent, as families facing financial strain may withdraw girls from school, perpetuating cycles of poverty and limiting future opportunities. Equality Now (2024) estimates that around 1.5 million girls in Malawi are at risk of early marriage as a direct result of climate change.

Additionally, climate-induced displacement exposes women and girls to greater risks of gender-based violence and disrupts essential support systems, hindering recovery and resilience efforts (Oxfam International, 2019; Mary Robinson Centre for Climate Justice, 2022).

In Malawi, climate change exacerbates existing gender inequalities, disproportionately affecting women and girls. The increased frequency and intensity of floods and droughts have led to food and water shortages, economic hardships, and displacement, pushing families to marry off daughters at an early age to alleviate financial burdens (Equality Now, 2024). This practice not only violates the rights of girls but also exposes them to early pregnancies, domestic violence, and limited educational and economic opportunities.

Coastal communities

Rising lake levels have led to flooding and loss of habitable land, causing displacement and infrastructure damage. Additionally, increased coastal erosion diminishes land availability for agriculture and habitation, threatening the livelihoods of communities reliant on these resources. A study by Nyoni and Banda (2020) highlights how coastal erosion is forcing communities into precarious living conditions in Malawi. Climate change significantly affects fish populations and biodiversity in Lake Malawi, potentially reducing catches for local fishermen, as reported by the International Union for Conservation of Nature (IUCN). Furthermore, more intense and frequent weather events such as storms and heavy rains result in property destruction and increased recovery challenges.

Furthermore, coastal communities often struggle to adapt to changing climates due to limited financial resources, inadequate infrastructure, and insufficient access to technology and training necessary for resilience-building (UNICEF Malawi, 2022).

Smallholder farmers

Climate change presents a substantial challenge for smallholder farmers in Malawi, disproportionately impacting women who already face significant gender inequalities. Variability in weather patterns, including increased occurrences of droughts and heavy rainfall, disrupts agricultural productivity, leading to projected reductions in crop yields of 10–20% for staple crops like maize (FAO, 2020).

Female-headed households in Malawi face significant disadvantages compared to their male-headed counterparts. These households are typically smaller, led by younger individuals with lower education levels, have less land, and lack access to adaptation and mitigation technologies. Consequently, they



experience substantially lower per-capita incomes. A study by Tsutomu Takane (2007) highlights that female-headed households often have fewer livestock and smaller landholdings, limiting their agricultural productivity and income-generating opportunities.

People living with disability

Prevalence of disability in Malawi stands at 3% among children and 5.6% among adults. Among the adult population, the highest prevalence rates of disability are in the Central Region (6.1%), followed by the Southern Region (5.5%), and lastly the Northern Region (4.7%). The majority of persons with disabilities (PwDs) live in rural areas. The common forms of disability are visual and mobility impairments. The likelihood of disability increases with age. Indeed, while the prevalence of disability in children aged 2–4 years is 3.1%, it grows to 3.2% among people aged 5–17, and to 5% in people aged 20–24 years.

During climate-related disasters such as floods or droughts, the infrastructure necessary for mobility and access can be severely compromised. For individuals with physical disabilities, damaged roads and transportation systems may hinder their ability to evacuate or access vital resources like food and medical care. Human Rights Watch (2024) documented that people with disabilities faced greater difficulties accessing warnings and emergency information, as well as reaching humanitarian support in the aftermath of a disaster. Lack of access to information contributes to exacerbating the impacts of extreme weather events.

Youth

The youth profile in Malawi indicates that out of a population of 17.6 million (Population and Housing Census, 2018), more than 40% are persons aged 10 to 35 years, with 67% of the population under age 25 and 54% aged under 18. This demographic structure has significant implications for the dependency ratio (which is high) and for the trajectory of future population growth, given the large number of women entering childbearing years, which heightens population growth even under circumstances of decreasing fertility. The country's young population is characterised by high incidences of poverty, unemployment, violence, HIV and AIDS, malnutrition, abuse, poor health, high illiteracy rates, and psychological disorders (MDGs II, 2011–2016). The combined effects of economic instability driven by climate-related disasters have resulted in job losses and increased migration to urban areas in search of opportunities.

Youth in Malawi are particularly affected by climate-related shocks. Evidence indicates that households with children and youths are more likely to experience declines in income and overall well-being due to these events. For instance, the 2023 El Niño-induced drought and Cyclone Freddy severely impacted food security, with over 500,000 children at risk of malnutrition and approximately 4.59 million children affected by food insecurity (UN News, 2023, The Times Group, 2023). Young women and girls are particularly vulnerable during such shocks, as they are often tasked with collecting water, food, and firewood, placing them at risk of violence and exploitation.

The incidence of child labour, particularly in informal forms of casual work known as *ganyu*, increased significantly in Malawi from 2019 to 2023. This rise reflects the economic pressures on families to supplement their income following climatic shocks. *Ganyu* labour, which includes tasks like weeding and ridging on other smallholders' fields, is a crucial poverty issue in Malawi. It serves as a vital coping strategy for poor households, especially during the lean period between food stores running out and the next harvest. However, the low wages associated with *ganyu* work often prevent agricultural labourers from earning sufficient incomes to invest in sustainable livelihood development (Overseas Development Institute, n.d.). This shift towards child labour in response to economic strain is likely to perpetuate the cycle of poverty, especially for young girls (UNICEF, 2022).



Youth engagement in climate change adaptation and mitigation efforts in Malawi appears limited. In districts like Rumphu and Karonga, youths have initiated environmental projects, such as tree planting along rivers. However, they report feeling excluded from broader community development activities, including climate change adaptation initiatives and training on EWSs. This exclusion may further hinder the development of robust support networks among youths, limiting their capacity to collectively address the challenges posed by climate change (UNICEF Malawi, 2021).

Elderly population

Elderly individuals, particularly those in labour-constrained households, face critical vulnerabilities due to health issues exacerbated by climate shocks. Around 15% of elderly-headed households in Malawi reported health problems that limited their ability to work, and only about 10% of them received any form of assistance during recent crises (Oxfam, 2022). These challenges are even more pronounced for elderly women, who often outlive their spouses and face the dual burden of age and gender discrimination. Many elderly women are left as sole caregivers for grandchildren or disabled family members, often without sufficient income or support.

Cultural norms and legal limitations frequently restrict elderly women's access to land and property rights, making recovery from climate-related shocks particularly difficult. Moreover, in many rural communities, older women continue to shoulder the responsibility of securing food, water, and firewood, tasks that become significantly harder during floods or droughts (HelpAge International, 2021).

The combination of physical frailty, limited access to resources, and lack of representation in decision-making processes leaves elderly women disproportionately exposed to the impacts of climate change. Despite these risks, they are often overlooked in disaster response and climate resilience planning (UN Women, 2021).

In response to the multifaceted vulnerabilities faced by older populations, the Government of Malawi, with support from partners including the European Union and UNICEF, introduced the SCTP. This initiative aims to provide monetary support to ultra-poor and labor-constrained households, including those headed by elderly individuals, to alleviate poverty and enhance overall well-being. For instance, in Zomba District, approximately 15,556 households benefit from the programme, with 7,002 of these being elderly-headed households (UNICEF Malawi, 2022).

The SCTP is particularly critical for elderly women, who often face intersecting challenges of poverty, widowhood, limited mobility, and lack of access to land or pensions. Many elderly women are primary caregivers for grandchildren or orphaned relatives, a role intensified by HIV/AIDS and migration-related family disruptions. These women often lack formal work histories and thus do not qualify for pension benefits, making social protection their only lifeline. Regular cash transfers not only improve access to food and healthcare but also restore a degree of dignity and autonomy for elderly women, enabling them to participate more actively in household and community life (HelpAge International, 2021).

However, despite these positive impacts, a large proportion of elderly individuals, especially women in rural areas, remain outside the social protection net. Studies show that less than 5% of the elderly population in Malawi receive pension benefits, and only about a quarter benefit from social protection programmes (Borgen Project, 2024). The gender gap in social security coverage reflects broader structural inequalities and underscores the need for expanded, gender-sensitive policies that prioritise elderly women in both rural and urban settings.



Conclusion

In certain parts of Malawi, where matrilineal systems of inheritance are practiced, women possess a lot of agency. They are the primary landowners and decision makers. Although this is just a small part of the country, it is important to highlight to show the different power positions women in Malawi occupy. Programmes such as the World Food Programme's (WFP) Integrated Resilience Programme (IRP), formerly R4 Rural Resilience Initiative, employ an inclusive planning approach and include targeted gender capacity building activities and gender monitoring and evaluation indicators in the implementation. This sheds light on targeted interventions in Malawi to address the differentiated impact of climate disaster risks on marginalised groups.

4. Country priorities and strategies

This chapter describes Malawi’s policy landscape and frameworks related to CDRF. Key policies and strategic documents are listed in Table 2 and further explained in the text below.

Table 2. Overview of country strategies and policy framework

Year of Publication	Name of the document
Under development	Disaster Risk Financing Strategy
To be launched in 2025	National Social Protection Policy and Strategy (2024-2029)
2024	National Agricultural Policy
2023	National Disaster Risk Management Act
2021	Nationally Determined Contributions (NDC)
2021	Malawi 2063 First 10 Year Implementation Plan (MIP 1) (2022-2030)
2020	Malawi 2063
2020	National Adaptation Plan Framework
2018	National Resilience Strategy (2018- 2030)
2018	Disaster Risk Financing and Implementation Plan (2019-2024)
2018	Malawi National Social Support Programme II (MNSSP II) (2018–2023)
2016	Climate Change Management Policy
2015	National Gender Policy (an updated policy is under development)
2015	National Disaster Risk Management Policy (an updated policy is under review)



National Agricultural Policy, 2024

The National Agriculture Policy 2024 (NAP 2024) is the successor to the 2016 National Agriculture Programme. It provides a renewed framework to guide Malawi's agricultural development for five years i.e 2024 until 2029. The policy has two core targets; to achieve sustainable food and nutrition security and increase incomes and trade competitiveness through enhanced productivity, inclusivity, and commercialisation. To achieve this, the NAP 2024 focusses on six priority areas: 1) Agricultural Production and Productivity, 2) Food and Nutrition Security, 3) Agricultural Commercialisation, Agro-Processing and Value Addition, 4) Sustainable Management of Land, Water, and other Natural Resources, 5) Agricultural Research and Innovation, and 6) Institutional Development, Coordination, Capacity Strengthening and Risk Management. Central challenges to the development of the agricultural sector identified by the NAP 2024 are climate change, environmental degradation, and market volatility. To engage with these challenges, a number of different measures such as climate-smart agriculture, sustainable land and water management, irrigation, strengthening of EWSs, and the financial inclusion through access to affordable inputs and insurance are promoted. Furthermore, it aims to build resilience to shocks through better planning and technology adoption. Finally, an emphasis is set on institutional coordination which is seen as necessary for successful implementation.

Nationally Determined Contributions, 2021

The updated Nationally Determined Contribution (NDC) 2021 outlines the country's climate action commitments under the Paris Agreement, focusing on mitigation, adaptation, and resilience-building for the period 2020–2040. The NDC reflects Malawi's vulnerabilities to climate change, particularly in agriculture, water resources, energy, and infrastructure, and presents strategic actions to address these challenges. Economic and social risks highlighted include food insecurity, health risks, infrastructure damage, and economic losses (climate-related disasters cost over 5% of Malawi's GDP annually). The policy calls for investment in climate information services, e.g. EWS for farmers and communities, community-based adaptation programmes to increase local resilience, and ecosystem-based adaptation protecting wetlands and forests as natural barriers against disasters. It calls for strengthening institutional coordination through DoDMA, integration of disaster risk planning into national development strategies, and emergency response mechanisms for floods, droughts, and extreme weather. Key measures for DRM include 1) nationwide community-based EWS; 2) nationwide community-based flood monitoring systems; 3) designing, testing, and executing multi-hazard contingency plans; and 4) integrating risk assessment and monitoring in all sectors. The NDC calls for a National Climate Change Fund (NCCF) to mobilise financial resources for adaptation and mitigation, public-private partnerships for investments in climate resilience targeting the Green Climate Fund (GCF), Adaptation Fund, and bilateral donor funding. The policy highlights a funding gap of USD 46.3 billion for climate action and aims at expanding climate risk insurance for farmers and businesses.

Malawi 2063

Malawi 2063 is Malawi's National Development Plan. It provides a comprehensive long-term development blueprint, emphasising economic transformation, environmental sustainability, and resilience. CDRF is not explicitly detailed in the document, however, relevant themes such as DRR, environmental sustainability, and financial mechanisms for resilience are integrated within broader policy objectives. The document recognises climate and natural disasters as key challenges to sustainable development. It emphasises the need to integrate DRR and financing into national development planning to enhance resilience. The vision highlights sustainable environmental management as a national priority. Green economy initiatives, climate adaptation strategies, and capacity building for sustainable livelihoods are included. There is also a focus on promoting green

investment, action research, and innovation to support environmental sustainability. It mentions targeted agricultural insurance for commercial farms and cooperatives to mitigate losses from market failures and proposes removing constraints that hinder private sector insurers from entering the market. While this is a step towards strengthening CDRF, a more robust and comprehensive approach to DRF and insurance across sectors (agriculture, infrastructure, and livelihoods) is needed.

A financing mechanism framework is proposed to support the vision's implementation. This framework includes alternative financing sources such as pension funds and public-private partnerships (PPPs), though it lacks direct reference to risk financing for climate-related disasters. The implementation plan highlights the reliance on development aid and credit in disaster response and the impact of disasters on the national budget and demands a comprehensive risk planning system to reduce the burden on the national budget and the reliance on external donors. Specific risk financing instruments, however, are not explicitly mentioned.

The priorities of the Government as outlined in the Malawi 2063 document includes:

- **Economic transformation and industrialisation:** Transitioning from a consumption-driven economy to an export-oriented, industrialised nation with a focus on value addition in agriculture, mining, and manufacturing.
- **Environmental sustainability and climate action:** Strengthening disaster resilience and integrating climate change adaptation and mitigation into national policies as well as the promotion of clean energy and green investment.
- **Human capital development:** Investments in education, skills development, and research to foster a knowledge-based economy.
- **Governance and institutional strengthening:** Enhancing transparency, accountability, and efficient public service delivery.
- **Infrastructure development and financing:** Expanding transport, energy, and ICT infrastructure through innovative financing mechanisms.

Malawi 2063 First 10 Year Implementation Plan (MIP 1), 2022 –2030

The MIP 1 outlines a strategic roadmap for Malawi's development, focusing on economic resilience, DRM, and financial preparedness. The plan aims to strengthen CDRF, enhance disaster preparedness, and improve financial mechanisms to respond to crises effectively. It highlights key areas such as risk pooling, insurance solutions, and public-private partnerships to mitigate economic shocks from disasters. The document serves as a guiding framework for government agencies, development partners, and stakeholders to ensure sustainable development and financial resilience in Malawi over the next decade.

The MIP 1 discusses the importance of financial preparedness for disasters in Malawi. It highlights existing financial mechanisms for disaster response, including government funds, donor support, and insurance solutions. Gaps and challenges are noted, such as limited access to funds, delays in disbursement, and low penetration of financial risk instruments. Strategies to enhance DRF include strengthening risk pooling mechanisms, improving access to contingency funds, and increasing investment in pre-disaster financing.

The MIP 1 outlines the need for innovative financial solutions to help vulnerable communities recover quickly from climate-related shocks. It emphasises index-based insurance, catastrophe bonds, and sovereign risk pools as potential solutions. The role of public-private partnerships in expanding CDRF options is also highlighted. Recommendations include scaling up existing microinsurance initiatives, promoting financial literacy, and integrating CDRF into national DRM strategies.

National Adaptation Plan Framework, 2020

The National Adaptation Plan (NAP) Framework (2020) is a guiding document for strengthening Malawi's medium- and long-term adaptation efforts. It aligns with national policies such as the National Climate Change Management Policy (NCCMP) and NDC. The framework is also linked to international agreements, including the Paris Agreement, the Sendai Framework for Disaster Risk Reduction, and the Sustainable Development Goals (SDGs). The plan highlights the most climate-vulnerable sectors as agriculture, water resource, energy, infrastructure, health, forestry and land use. It emphasises the importance of coordination between government agencies, private sector, and development partners and EWSs and preparedness programmes. It highlights capacity building needs in areas such as climate risk and vulnerability assessments, economical appraisal and design of adaptation pathways. It commits to the creation of a climate change adaptation window under the NCCF.

National Resilience Strategy (2018 – 2030)

The National Resilience Strategy (NRS) provides a framework to address environmental and economic shocks, with a focus on DRF, climate adaptation, and risk management. It integrates risk reduction, flood control, EWS, and financial protection mechanisms to enhance national resilience. It provides a plan for providing food security and improvements to the resilience in the agricultural sector, designed with a pro-poor focus and aims at including international development partners in the set up. Furthermore, it aims at expanding risk data collection, provide greater access to risk data, and improve EWS. Risk financing instruments and mechanisms mentioned in the report include:

- **Insurance and risk financing:** Malawi has used sovereign insurance policies such as the ARC insurance, which was part of the 2016-17 Food Insecurity Response Plan.
- **Microinsurance for smallholder farmers:** There is a call for greater investment in microinsurance products for smallholder farmers to safeguard against losses due to droughts and floods. Supporting risk financing for smallholder farmers through weather-indexed crop insurance scheme
- **Village Savings and Lending (VSL):** A grassroots financial tool supporting household-level financial inclusion to help manage disaster-related shocks.
- **Microfinance and digital payments:** Promotion of digital payment systems and mobile money to improve financial access.
- **Shock-sensitive social protection:** Strengthening financial support for vulnerable populations by integrating DRF with existing social protection mechanisms.

Priority sectors identified in the strategy include agriculture, infrastructure, and social protection. The policy identifies droughts and flood as the primary hazards affecting Malawi, leading to agricultural losses and food insecurity. Challenges in accessing affordable insurance products for smallholder farmers; limited access to risk financing and formal financial services among rural populations and poor integration of DRF with national DRM strategies are highlighted in the strategy.

Disaster Risk Financing and Implementation Plan (2019 – 2024)

The Plan describes Malawi's current approach to DRM which relies on short-term borrowing and is therefore very cost intensive. It outlines several key strategies aimed at managing the fiscal risks associated with disasters. These strategies focus on risk identification, financing instruments, risk transfer, investment planning, and institutional coordination. The strategies include:

- **Identifying and quantifying disaster-related economic and fiscal risks:** Conducting probabilistic disaster risk assessments; developing a national database of public assets; and incorporating disaster risk information into fiscal planning.
- **Establishing a portfolio of sovereign disaster risk financing instruments:** Using a layered approach that combines risk retention and risk transfer mechanisms; developing a National Disaster Risk Management Fund to ensure timely funding; exploring contingent credit instruments, such as the WB's CAT DDO; and strengthening the SGR to mitigate food insecurity risks.
- **Developing private risk transfer mechanisms:** Encouraging private catastrophe insurance for businesses and households; enhancing agricultural insurance through feasibility studies and policy incentives; and engaging the Reserve Bank of Malawi and insurance companies to develop disaster-specific financial products.
- **Incorporating disaster risk analysis in public and private investments:** Integrating disaster risk assessments into public investment planning; and prioritising DRM mainstreaming in ministries handling agriculture, transport, urban development, health, and social protection.
- **Strengthening institutional coordination and capacity:** Establishing formal coordination roles within the MoFEA; enhancing collaboration with international development partners; and developing a DRF monitoring and evaluation framework.

Malawi National Social Support Programme II (MNSSP II) (2018–2023)

This will be replaced by the new National Social Protection Strategy which is under finalisation. The Malawi National Social Support Programme II (MNSSP II) provides a framework for strengthening social protection for vulnerable populations affected by poverty, food insecurity, and climate-related shocks. The programme builds on lessons from the first MNSSP (2013–2016) and aligns with national policies such as the National Resilience Strategy (2018–2023). It also supports international commitments like the SDGs and the African Union's Agenda 2063. MNSSP II is structured around three core pillars to enhance social protection and resilience:

- **Consumption support:** Provides timely, predictable, and adequate cash or in-kind transfers to the ultra-poor and vulnerable groups.
- **Resilient livelihoods:** Supports poverty graduation pathways through skills training, financial inclusion, and access to markets.
- **Shock-sensitive social protection:** Strengthens preparedness and response to shocks by integrating social protection with DRM mechanisms.

MNSSP II focuses on food security, agriculture, social welfare, and disaster resilience, targeting ultra-poor households, labour-constrained groups, such as the elderly, children, and persons with disabilities and communities affected by climate shocks. Vulnerabilities addressed include agricultural dependence, economic instability, health risks, and social exclusion. MNSSP II includes social cash transfers, public works programmes, school feeding, and microfinance initiatives. It promotes financial resilience through savings and loan groups, access to credit, and integration with DRF. It promotes the use of loans and insurance for managing household risks.

Climate Change Management Policy, 2016

The NCCMP of Malawi provides a framework for addressing climate change issues in the country. It recognises the vulnerability of Malawi's economy, ecosystems, and communities to climate change impacts, particularly due to reliance on rain-fed agriculture, biomass energy, and limited adaptive capacity. The policy outlines strategic interventions in adaptation, mitigation, financing, and capacity building to build resilience and promote sustainable development. The policy prioritises adaptation

to climate change as a key strategy for reducing vulnerabilities to droughts, floods, and extreme weather events, which are increasing in frequency and intensity. Community-based resilience programmes are encouraged, ensuring that local populations can better cope with disasters. The policy promotes ecosystem-based adaptation, such as reforestation and sustainable land management, to enhance natural disaster buffers. It emphasises the role of DoDMA in integrating climate change adaptation and disaster preparedness and encourages the mainstreaming of disaster risk considerations into sectoral and national development planning as well as promotes the establishment of EWS and climate information services to aid disaster preparedness.

It calls for enhanced financing mechanisms for climate adaptation and mitigation. For example, it proposes the establishment of a Climate Change Management Fund to mobilise resources for climate resilience projects and encourages PPPs and increased access to international climate financing mechanisms (e.g. the Green Climate Fund, Adaptation Fund) as well as greater national budgetary allocation to climate change initiatives. The NCCMP identifies agriculture, water, forestry, energy, and health as the most climate-vulnerable sectors.

National Gender Policy, 2015

A new Gender policy 2024 to 2030 is under development. The new policy expands on the focus areas from the 2015 policies by recognising the role of social protection in reducing gender inequalities, addressing the gendered impact of migration, and considering the impact of disasters on gender equality. The Gender Policy of 2015 is the existing and operating gender policy for Malawi. The Policy aims to promote gender equality and women's empowerment across various sectors, ensuring equal opportunities and rights for all genders. It addresses key areas such as education, health, economic empowerment, governance, and legal rights. The policy emphasises eliminating gender-based violence, enhancing women's participation in leadership and decision-making, and ensuring equal access to resources and services. Additionally, it promotes gender-responsive budgeting and calls for institutional frameworks to support gender mainstreaming in all sectors.

The policy acknowledges the impact of climate change and disasters on gender inequality, particularly how women and marginalised groups are disproportionately affected by economic shocks. It highlights the need for gender-sensitive DRM strategies, including financial mechanisms to support women and vulnerable populations in disaster recovery, inclusion of women in climate finance programmes to ensure they benefit from funds allocated for climate resilience, and the promotion of microinsurance and financial literacy for women to enhance their access to DRF solutions.

National Disaster Risk Management Policy (2015)

This policy is an update of the Disaster Preparedness and Relief Act of 1991. A new National Disaster Policy is under review to replace this policy of 2015. The 2015 policy outlines Malawi's vision and approach to managing and reducing disaster risks and improving resilience to disasters and hazards. It provides a strategic framework to integrate DRM into national development planning and policy. The National Disaster Risk Management Fund is the financial mechanism outlined in the policy for DRM. The Fund is established to support disaster preparedness, response, and recovery efforts. Ministries, departments, and local councils are expected to allocate budgets for DRM. Civil society and international donors are indicated as key contributors to emergency funds for disaster response. The policy calls for investments in risk assessment and monitoring such as hazard mapping, data collection, and EWS to inform financial planning. A detailed financial strategy for DRM and specific risk financing solutions are not included in the policy.

The six priority areas identified in the policy include the following:

- **Mainstreaming DRM into sustainable development:** Integrating DRR into all national policies and ensuring funding mechanisms for DRM at all government levels.
- **Disaster risk identification, assessment, and monitoring:** Developing a national hazard and risk assessment system and investing in geographical information systems for risk mapping.
- **People-centred EWS:** Strengthening flood and drought EWS and ensuring effective dissemination of warnings to communities.
- **Promoting a culture of safety and resilience:** Integrating DRM education into school curricula and engaging media and civil society in DRM awareness campaigns.
- **Reducing underlying risks:** Enforcing safer building and land-use policies and encouraging community-based risk reduction initiatives.
- **Strengthening preparedness for effective response and recovery:** Allocating funds for emergency preparedness and establishing emergency operations centres for disaster response.

Key hazards highlighted in the policy include flood, droughts, storms and strong winds, landslides, earthquakes, pest infestations and disease outbreaks.

Conclusion

Malawi has a good policy framework for climate and DRM. However, implementation is lagging; additionally, there is a gap between national level policies and regulations and how they are articulated at the district level. Funding is limited at the district level to implement policies, regulations, and strategies.

Policy and strategic documents highlight agriculture, water, forestry, energy, and health as the most climate vulnerable sectors. These sectors are thus prioritised in DRM and climate adaptation measures.

Several funds, namely National Disaster Risk Management Fund, and NCCF have been set up under different policy mandates to mobilise finance for disaster response and climate change initiatives in the country. Contributions from international donors is listed as one of the key sources of funding for these funds and for risk financing instruments, in addition to budget allocation and private sector contributions.

Technical capacity in risk and vulnerability assessment and climate information systems such as EWS is identified as a key need, as well as the integration of disaster risk planning into national development strategies and emergency response mechanisms.

There are critical gaps in public sector coordination on DRM; the policies commit to strengthening coordination on DRM activities. DoDMA is the key government agency mandated to lead DRM coordination. The DRM plan also intends to establish formal DRM coordination roles within MoFEA.

Many of the policies do not explicitly include risk finance or risk transfer mechanisms, which points to a missing link between DRM and CDRF in national strategies and policies.

Finally, Malawi 2063 highlights the reliance on development aid and credit in disaster response and the impact of disasters on the national budget, demanding a comprehensive risk planning system to reduce the burden on the national budget and the reliance on external donors.

5. Enabling environment

This chapter provides information about the legal and regulatory frameworks as well as the institutional environment, technical capabilities, and market or distribution mechanisms related to CDRF. It is organised into six sections, namely (5.1) Overview of existing CDRF-relevant institutions; (5.2) Overview of legal and regulatory frameworks; (5.3) Capabilities of domestic private sector for insurance and banking; (5.4) Capabilities of mobile network operators and mobile money; (5.5) Capabilities of Micro, Small and Medium Enterprise (MSMEs) to access financial protection instruments; and (5.6) Capabilities of cooperatives, associations and CSOs to provide financial support to their members.

5.1 Overview of existing CDRF-relevant institutions

Key Ministries and institutions undertaking, planning, organising and coordinating CDRF and related activities in Malawi are elaborated below.

Department of Disaster Management Affairs

DoDMA is the primary government agency responsible for DRM and DRR in Malawi. It operates under the Office of the President and Cabinet and mandated to coordinate multi-hazard EWS and direct DRM programmes through overseeing disaster prevention, mitigation, preparedness, response, resilience and recovery activities to minimise the loss of lives, damage of property, infrastructure and environmental degradation for the socio-economic development of Malawi. They provide direct relief assistance to disaster affected people and are responsible for coordinating emergency preparedness plans, and climate information systems in the country. DoDMA has set up EWS and climate information systems in 21 of the 28 districts of Malawi. DoDMA performs policy functions including overseeing the implementation of the National Disaster Risk Management Policy and ensuring mainstreaming of DRM into national development plans.

Ministry of Agriculture

The MoA plays a critical role in DRM and climate resilience, particularly in agriculture, food security, water management, and irrigation. Given that Malawi's economy heavily relies on rain-fed agriculture, the Ministry is responsible for reducing vulnerability to climate shocks, ensuring food security, and promoting sustainable water management. The Ministry is responsible for coordinating, implementing and promoting agricultural policies and programmes. It serves as the focal point to the Adaptation Fund. The Ministry collaborates with other public institutions on DRF mechanisms, e.g. ARC policy and with the Ministry of Gender on social protection.

Ministry of Finance and Economic Affairs

The MoFEA is responsible for formulating economic and fiscal policies, as well as overseeing the management and implementation of the national budget. The Ministry plays a crucial role in formulating fiscal policies, managing national debt, coordinating economic policies and mobilising financial resources for development programmes. It leads national economic planning and strategy formulation and coordinates the annual implementation of Malawi 2063 and the MIP-1. The Ministry is responsible for developing risk financing mechanisms, including contingency funds and risk transfer instruments. It undertakes risk retention measures such as the allocation of resources for disaster preparedness, response, and resilience-building.



The Ministry also coordinates the Unified Beneficiary Registry (UBR) – a national database for the country's social protection programmes. The UBR is managed by a UBR Management Unit with membership from the Local Development Fund, the Ministry of Gender, Community Development and Social Welfare (MoGCDSW) and others. MoFEA is the lead Ministry for the Global Shield ICP.

Reserve Bank of Malawi

The Reserve Bank of Malawi (RBM) is the Central Bank of Malawi, responsible for monetary policy implementation, financial regulation, and maintaining financial stability. It plays a crucial role in ensuring price stability, controlling inflation, supervising financial institutions, and fostering economic growth. The Bank regulates and supervises the financial sector of Malawi. The Pension and Insurance Supervision Department of the Bank is responsible for the supervision and regulation of the insurance sector. Specific insurance supervision functions include (1) licensing and regulation of insurance companies; (2) supervision of insurance firms; (3) consumer protection and market conduct regulation; and (4) development of insurance and risk management policies.

Ministry of Natural Resources and Climate Change

The Ministry of Natural Resources and Climate Change is responsible for policy development, regulation, and management of Malawi's natural resources, environmental conservation, and climate change adaptation and mitigation efforts. The Ministry ensures sustainable utilisation of natural resources, biodiversity conservation, and climate resilience to support Malawi's socio-economic development.

The Ministry hosts the following departments/committees:

- **Department of Climate Change and Meteorological Services:** Mandated to monitor, analyse, and provide information on weather, climate, and climate change that would contribute towards the socio-economic development of the country. It produces periodic state of climate in Malawi reports, use Climate Risk Maps for risk management and emergency preparedness, it also uses DRM forecast tools to provide timely predictions on extreme weather events.
- **The Environmental Affairs Department (EAD):** The lead government agency responsible for environmental management, conservation, and climate change policy implementation in Malawi. It operates under the Ministry of Natural Resources and Climate Change and ensures the integration of environmental sustainability into national development policies. The EAD is responsible for coordination of environment and natural resources topics. It serves as the focal point to the UNFCCC to climate finance mechanisms such as the GCF. EAD also coordinates the National Steering Committee on Climate Change and the National Technical Committee on Climate Change. These committees meet on a quarterly basis and are mandated to provide policy and technical recommendations on climate change management as provided for in the national climate change policy respectively.
- **Serves as the contact point to the Global Environment Facility (GEF).**

The Ministry coordinates the implementation of Malawi's climate policies, including NCCMP and NDCs.

Ministry of Local Government, Unity, and Culture

The Ministry of Local Government, Unity, and Culture (MoLGUC) is responsible for governance, decentralisation, local development, national unity, and cultural preservation in Malawi. It plays a critical role in strengthening local governance structures and promoting social cohesion. It supports

local disaster preparedness and response through district councils and works with DoDMA to integrate DRM into local governance. MoLGUC plays a critical role in social protection by ensuring that local governments implement and coordinate social support programmes at the community level. While the Ministry leads Malawi's social protection policy, MoLGUC and MoGCDSW facilitate local implementation, coordination, and service delivery. The National Local Government Finance Committee (NLGFC) works under the Ministry and implements the WB's adaptive social protection programme i.e. the Social Support for Resilient Livelihoods project, and the Public Works Programme.

The Ministry of Gender, Community Development, and Social Welfare

The MoGCDSW is responsible for promoting gender equality, empowering communities, protecting vulnerable groups, and coordinating social protection programmes in Malawi. The Ministry plays a critical role in social welfare, poverty reduction, and disaster response, ensuring that marginalised groups receive necessary support during crises. The Ministry leads the implementation of MNSSP II. It supports cash transfers, public works programmes, and school feeding initiatives for ultra-poor and food-insecure households and oversees child protection programmes, disability services, and elderly care initiatives. MoGCDSW works with the DoDMA to deliver aid, cash transfers, and food assistance to affected communities during disasters.

The National Planning Commission

The National Planning Commission (NPC) of Malawi is responsible for the formulation, implementation, and oversight of long-term national development plans and strategies. It ensures that Malawi's development agenda aligns with the country's aspirations for sustainable growth and transformation. The NPC guides sectoral strategies to ensure alignment with national goals and promotes inclusive and sustainable economic growth policies. They collaborate with disaster management agencies such as DoDMA to strengthen national response mechanisms.

Ministry of Water and Sanitation

The Ministry of Water and Sanitation in Malawi plays a crucial role in CDRF by focusing on the resilience and sustainability of water infrastructure and services. While MoFEA leads the overall coordination of CDRF strategies, the Ministry of Water and Sanitation contributes significantly in several areas. The Ministry is responsible for ensuring that water supply and sanitation systems are resilient to climate-induced disasters such as droughts and floods. This includes developing and implementing policies and investment strategies aimed at protecting and adapting water infrastructure to withstand extreme weather events. For instance, the Government has developed a National Water Resources Investment Strategy and an Irrigation Master Plan to guide investments in water resources, ensuring sustainable provision of water and sanitation services. It also collaborates with other government departments and agencies to develop contingency plans for water supply during disasters.

5.2 Overview of legal and regulatory frameworks

The financial sector is regulated by the RBM. Malawi's insurance industry operates under two primary legislative frameworks: the Insurance Act of 2010 and the Financial Services Act of 2010 (Government of Malawi, 2010, 2014). In 2019, the country introduced the Inclusive Insurance Directive. Malawi does not have a distinct regulatory framework for microinsurance; instead, it incorporates microinsurance within the wider microfinance framework under the Financial Services Act and the Microfinance Act of 2010. The RBM classifies microinsurance as a non-deposit-taking service, stipulating a minimum capital requirement of MWK 100 million (approximately USD 60,000).

This sub-chapter describes Malawi’s legal and regulatory frameworks on CDRF.

Table 3. Overview of Malawi’s disaster risk management and insurance regulations

Year of Publication	Regulation
2025	Insurance Act
2023	National Disaster Risk Management Act
2019	Insurance (Inclusive Insurance) Directive
2018	Insurance (Submission of Information by Insurers) Directive
2017	Insurance (Classes of Insurance Business) Directive
2017	Insurance (Minimum Capital and Solvency Requirements for General Insurers) Directive
2017	Insurance (Minimum Capital and Solvency Requirements for Life Insurers) Directive
2014	Insurance (Claims Management) Directive

Insurance Act, 2025

The Malawian Parliament passed the Insurance Bill No. 26 in December 2024, bringing into place a new Insurance Act, 2025 which repeals and replaces the Insurance Act of 2010. This Insurance Act is a major reform that updates the regulatory framework for insurance business in Malawi. It covers licensing requirements, governance, prudential standards, consumer protection, and innovation. Key areas include:

- **Expanded regulatory scope:** It now more clearly covers intermediaries like bancassurance agents and loss adjustors and introduces detailed governance rules.
- **Corporate governance requirements:** Insurers and brokers must implement fit-and-proper policies for directors and senior managers.
- **Risk management and solvency:** It emphasises solvency control, risk management frameworks, and the need for technical reserving.
- **Introduction of codes of conduct:** The Registrar can now issue codes of conduct to ensure integrity and professionalism in the insurance sector.
- **Modernisation of licensing:** New licensing procedures are introduced for loss assessors, adjusters, and claims-settling agents.
- **Group supervision:** Recognition of insurance groups and allowing insurers to adopt group-wide governance policies.
- **Enhanced enforcement powers:** Stronger penalties for non-compliance and explicit power for the Registrar to revoke licenses with immediate notification requirements.

- **Consumer protection:** Focus on protecting policyholders through prudential supervision, conduct standards, and information disclosure.
- **Transition period:** all entities licensed under the previous Act are given 12 months to comply with the new law.

In this law: (1) categories of insurance business are either general insurance or life insurance, with exemptions applying for inclusive insurance business and reinsurance; (2) minimum standards for the licensing of insurers, insurance brokers, and insurance agents are set, including minimum educational and professional experience criteria; (3) an insurer's head office should be in Malawi and shall appoint a chief executive officer and officer designated as second in command who are both residents in Malawi; (4) the currency of insurance premium shall be quoted in Kwacha unless authorised differently by the Reserve Bank of Malawi; and (5) roles and responsibilities of supervision organisations. Regarding natural disasters, the Insurance Act requires owners of public buildings to insure these against, among others, natural disasters. Furthermore, section 92 outlines a disaster fund which is funded by a proportion of net premiums paid by insurers of public buildings and used for procuring equipment and facilities necessary in, amongst others, disaster rescue operations.

National Disaster Risk Management Act, 2023

The National Disaster Risk Management Act (Law No. 27 of 2023) is a legislative framework designed to enhance disaster preparedness, response, recovery, and mitigation in Malawi. It replaces and updates previous disaster management laws to align with modern risk management approaches. The Act establishes a structured and decentralised disaster management system, with clear responsibilities for different government bodies, local authorities, and relevant stakeholders. The main functions include: strengthening the governance framework for DRM; clarifying roles and responsibilities of national and local authorities in disaster prevention and response; enhancing coordination mechanisms between government agencies, NGOs, and international partners; mainstreaming DRR into national and local development planning; establishing emergency response protocols and ensuring timely action in disaster situations; and encouraging community-based disaster preparedness to build resilience at the local level.

The Act recognises the financial burden of disasters and incorporates several financial strategies to enhance resilience. DRF mechanisms mentioned in the Act include set up of a dedicated fund to finance disaster preparedness, response, and recovery efforts with funding to be sourced from government budget allocations, private sector contributions, and donor contributions. The Act encourages the use of sovereign insurance, weather derivatives, and catastrophe bonds to provide financial protection; it also promotes agricultural insurance to safeguard farmers from climate-related shocks. It empowers district-level and community structures with financial resources to implement DRM measures and encourages PPPs to mobilise additional funding.

The Act outlines key priorities for effective disaster management in Malawi, as follows:

- **Institutional strengthening and governance:** Establishing a National Disaster Risk Management Authority to oversee DRM activities and defining clear roles for government ministries, local councils, and private sector partners.
- **Risk reduction and preparedness:** Mainstreaming DRR strategies into development planning and enhancing EWSs to improve disaster forecasting and response.
- **Community engagement and capacity building:** Training local communities on disaster preparedness and response and strengthening civil protection committees at district and village levels.

- **Infrastructure resilience and climate adaptation:** Promoting climate-resilient infrastructure and sustainable land use practices and encouraging disaster-proof construction standards for public and private buildings.
- **Timely and effective response and recovery:** Ensuring rapid mobilisation of resources for immediate disaster relief and establishing clear guidelines for post-disaster reconstruction and rehabilitation.

The Disaster Risk Management Act of 2023 is a comprehensive legal framework aimed at strengthening Malawi's disaster preparedness, financing, and response. It integrates risk financing mechanisms such as disaster funds, insurance, and contingency budgeting while prioritising governance, risk reduction, community engagement, and resilient infrastructure. The Act represents a proactive shift towards reducing disaster vulnerability and enhancing national resilience.

Insurance (Inclusive Insurance) Directive of 2019

The Insurance (Inclusive Insurance) Directive of 2019 defines inclusive insurance and specified classes of insurance that would qualify including accident, illness, death, and disaster events (third schedule). The Directive also provides for several unique matters including: (1) establishment of a specialist inclusive insurer's license with reduced capital requirements; (2) specification of inclusive insurance features such as risk-only, defined benefits, no exclusion of pre-existing conditions, and no or limited waiting periods; (3) permission of bundled life and non-life products; (4) use of "distributor" entities in addition to traditional insurance brokers or agents; (5) prescription of consumer protection rules, including claims settlement periods, limiting policy wording to one page, and disclosure of key terms and conditions; and (6) requiring an insurer to be reporting on non-financial market conduct key performance indicators including the number of contracts, number of renewals and claims settlement time.

Insurance (Submission of Information by Insurers) Directive of 2018

This Directive prescribes a lot of returns related to financial data about revenues, expenses, assets, and liabilities. A few forms, G4a, R4a, and L3, require financial results of a general insurer, reinsurer and life insurer to be reported per class of insurance business. Form G16 requires a general insurer to report numbers of policies and policyholders per class of general insurance. Form L12, statistics, requires a life insurer to report on a number of non-financial data per class of business including (1) number of policies, (2) covered lives, (3) sum insured, (4) discontinuances, (5) lapses, (6) surrenders, and (7) maturities.

Insurance (Classes of Insurance Business) Directive, 2017

The two main categories are enshrined in the Act, being general or life insurance business. The Directive breaks down the general insurance category into classes to include (1) aviation, (2) engineering, (3) fire – domestic, (4) fire – industrial, (5) liability, (6) marine, (7) motor – private, (8) motor – commercial, (9) motor – traders, (10) motor – contingent, (11) miscellaneous, (12) personal accident, (13) medical/health insurance and, (14) agriculture. The Directive breaks down the life insurance category in classes to include (1) term assurance, (2) whole life assurance, (3) endowment life assurance, (4) group life, (5) annuities, (6) income protection assurance, (7) critical illness, (8) business assurance, (9) deposit administration/guaranteed funds, and (10) miscellaneous.

Insurance (Minimum Capital and Solvency Requirements for General Insurers) Directive of 2017

Insurer's regulatory capital is a buffer that is intended to absorb unexpected spikes in claims, other policy benefit payments and creditor obligations. The Insurance (Minimum Capital and Solvency Requirements for General Insurers) Directive of 2017 specifies minimum capital resources and capital adequacy (solvency) requirements. A general insurer writing all classes of general insurance business is required to (1) maintain a minimum paid-up capital of MWK 750 million (USD 427,594)¹¹, and (2) maintain a minimum capital adequacy ratio of 20%, i.e. a ratio of adjusted net assets as a percentage of one-year net premium written.

Insurance (Minimum Capital and Solvency Requirements for Life Insurers) Directive of 2017

The Insurance (Minimum Capital and Solvency Requirements for Life Insurers) Directive of 2017 specifies minimum capital resources and capital adequacy (solvency) requirements for life insurance companies. A life insurer writing all classes of life insurance business is required to (1) maintain a minimum paid-up capital of MWK 1,000 million (USD 576,701) and (2), maintain a minimum capital adequacy ratio of 120%, i.e. solvency capital divided by solvency requirement.

Insurance (Claims Management) Directive of 2014

The Insurance (Claims Management) Directive of 2014 aims to enhance the efficiency, transparency, and fairness of the insurance claims process. This directive applies to all insurers, insurance brokers, and claims settling agents operating within the country. It contains key provisions on payouts, appointment documentation requirement for legal representation and regulatory oversight and compliance. The Directive empowers the RBM to oversee the claims management practices of insurance entities, ensuring adherence to the stipulated procedures. Non-compliance with the directive may result in regulatory actions, including penalties or other enforcement measures.

5.3 Capabilities of domestic private sector for insurance and banking

Malawi is a country with significant potential for inclusive insurance development due to its large informal economy and low insurance penetration.

According to the Reserve Bank of Malawi 2023 Annual Report, 63.4% of the total banking assets belong to domestic private banks, and 36.6% to foreign owned banks. Overall, there are 121 bank branches across the country. The Standard Bank and the National Bank of Malawi are the two dominant banks in this sector. Banks deliver their services through Automated Teller Machines (ATMs), agencies, kiosks and mobile vans.

Digital payment services such as internet banking, ATMs and point of sale terminals are increasing in usage. The implementation of the 2010-2015 Financial Sector Development Strategy resulted in substantial investments in financial infrastructure, including the establishment of a national switch that interconnects banks. Compared to similar sized countries, Malawi has a much lower banking access rate due to the concentration of services in urban areas (whereas 76% of the adult population live in rural areas) and high banking service fees. Banking services reach only 13% of the population (FinMark et al., 2023).

The insurance sector comprises six life insurance companies and eight general insurance companies. The main insurance products offered are motor, personal accident, medical cover, and fire. Motor insurance accounts for the biggest insurance business. Challenges and complaints about the

¹¹ This means that microinsurers are subject to a lower capital requirement compared to general insurers, reflecting the typically smaller scale and reduced risk exposure associated with microinsurance operations.

insurance sector mostly relate to delayed settlement of claims and dispute over surrender values (RBM, 2023).

The insurance sector of Malawi is one the least developed in Southeast Africa. Only 5%¹² of Malawians have formal insurance as of 2023, a 3% rise from 2014. Low insurance patronage is due to issues of affordability and inadequate understanding of insurance services. When considering gender, men have higher levels of insurance coverage than women.

Despite the agriculture sector being one of the most vulnerable in the country, only 0.84% of agricultural workers have formal insurance coverage (RBM, 2023). At the household level, climate-related risks are commonly addressed through either fire insurance for businesses and households or crop and livestock insurance. In fire insurance, gross written premiums amounted to MWK 15.4 million (approximately USD 8,890).

The national insurance gap can be approximated by comparing annual losses as a percentage of GDP to the insurance penetration rate¹³. The Malawi Ministry of Natural Resources, Energy and Mining estimates that floods and droughts cost 1.7% of GDP annually. In 2023, based on a GDP of USD 14.08 billion, this equates to losses of USD 239.36 million. With an insurance penetration rate of 2.5% (National Strategy for Financial Inclusion III, 2024), only USD 5.98 million was insured, leaving a gap of about USD 233 million as uninsured losses (UNEP VI SIF, 2025). The low penetration rate is because of both demand and supply side issues.

Some of the challenges facing the insurance sector in Malawi include:

- **Low awareness and knowledge of microinsurance products:** Financial literacy on the benefits of insurance among Malawians remains low with majority preferring to depend on traditional approaches such as selling of assets and livestock.
- **Increased severity of climate impacts:** Resulting in a rise of claim frequency and severity, pose a potential threat to the growth of the sector. In addition, Over the past three years, the combined ratio for general insurance has exceeded 100%, indicating that premium income has been insufficient to cover expenses (Registrar of Financial Institutions, 2023)
- **Limited capacity and structural limitations:** There are a number of weather-index insurance products that have been developed to cope with increased climate risk, however, low uptake rates coupled with rising premiums as a result of frequent occurrences affect their sustainability and exacerbate the protection gap.
- **Limited distribution of products in rural areas:** While urban areas like Lilongwe and Blantyre have access to various insurance products, rural areas face barriers such as inadequate infrastructure, lack of distribution channels, and low internet penetration. Mobile technology and mobile-based solutions have the potential to address these barriers. However, these services are in the early stages and require more financial and infrastructural investments.
- **Limited product diversification:** according to a Finscope 2023 survey, there are limited tailored products designed to meet the specific needs for MSMEs and businesses. In addition to limited products, there is also a lack of skilled insurance agents especially in rural areas skilled to create awareness among potential customers in the rural communities.

¹² The number of people or businesses that actually have an insurance policy.

¹³ Insurance penetration measures how much insurance is used in a country compared to its total economy.

5.4 Capabilities of mobile network operators and mobile money

Mobile technology penetration in Malawi is lower compared to the East African average due to unaffordability and low digital literacy. At the individual level, mobile phone ownership stands nationally at 56.6% with higher access rates amongst men and in urban areas (GSM Association, 2019). People with higher-level education are more likely to own smartphones with internet function. About 42.6% of mobile phone owners have phones with internet functionality as of 2023.

The two main mobile telecommunication providers are Telecom Networks Malawi (TNM) and Airtel Malawi (Airtel). Others include Access Communications Limited (ACL) and Malawi Telecommunications Limited (MTL). The mobile network market operates 2G, 3G and 4G technologies. The number of total sim cards in the market is estimated at 10 million (Ibid).

Mobile technology has contributed to increased financial inclusion. Partnering with financial institutions, telecommunications companies introduced mobile money platforms as a payment method. Through mobile money, individuals can transfer money, make payments, buy airtime and data, receive money and remittances, and access other financial services.

The number of transactions processed by the mobile money switch stood at 1.4 million (valued at MWK 10.6 billion or USD 574,121) in 2023 (Malawi Communications Regulatory Authority, 2024). Around 81% of financial transactions in Malawi are conducted through mobile money. 60% of adults conducting end-to-end electronic transactions use mobile money; banking platforms account for lesser number of digital financial services (FinMark et al., 2023). This shows a popularity and preference for mobile money in conducting financial transactions.

5.5 Capabilities of MSMEs to access financial protection instruments

MSMEs play a crucial role in job creation, economic empowerment, and skill development in Malawi. They are a key driver of the country's economic growth. A 2019 FinMark Study found that there are roughly 1.6 million MSMEs in Malawi contributing USD 6.8 billion annually to GDP (approximately 47% of GDP).

The majority of these businesses are micro enterprises (74%), with small enterprises accounting for 23% and medium-sized enterprises making up just 3%. 86% of MSMEs operate in either the wholesale and retail or in the agricultural sector. Small enterprises operate largely in the tourism sector (86%) and manufacturing (55%), whereas microenterprises tend to be in the agricultural and resources sector.

Similar to trends in other developing countries, a significant proportion of MSMEs in Malawi operate informally. Only 11% of MSMEs are formal enterprises while 89% remain informal. Although it should be noted that this is an improvement from 2012 when only 3% of MSMEs operated formally. The 2019 FinMark Study found that barely 7% of MSMEs were registered by the Registrar of Companies and only 10% are licensed. These informal MSMEs tend to be micro (78%), rural (82%), and in their start-up and growth phases (61%). Surveys suggest that owners of these businesses avoid formal registration due to the perceived complexity of the process and the limited registration benefits perceived. In terms of employment, MSMEs provide jobs to an estimated 1.8 million people, or roughly 24% of Malawi's workforce. Most MSMEs are located in urban areas (78%).

In terms of regional spread, the Central region covers 50% of MSMEs, followed by the Southern region at 38% and the Northern region at 12%. Approximately 11% of Malawi's population own MSMEs, with some individuals managing multiple businesses. Of these owners, 42% are people under the age of 35, who tend to be concentrated in the informal and start-up phases.

Women make up the majority of MSME owners (approximately two-thirds), though they are more likely to own microenterprises and are less likely to own small and medium businesses.

Despite the significant role MSMEs play in Malawi's economy, their growth is constrained by climate-related challenges.

MSMEs access to credit

One of the key objectives of the Financial Sector Development Strategy II 2017 to 2021 was to increase access of financial services to MSMEs. MSME Policy also prioritises the development of innovative financial mechanisms such as insurance services, venture capital, community banks and MSME Revolving Fund etc. to improve access to finance for MSMEs (Ministry of Trade and Industry, 2019)

The SME Finance Forum estimates Malawi's formal MSME finance gap at approximately USD 477 million (98.06%), while current financing covers only USD 9 million (1.94%), highlighting significant barriers to credit access. Around 35% of formal MSMEs are fully financially constrained, while 31% are partly constrained, leaving just 34% unconstrained. This gap varies across gender and firm size, with men and SMEs accounting for the majority of the gap, likely due to their greater presence in the formal MSME sector compared to women and microenterprises who dominate the informal sector.

Access to credit remains a key challenge for MSMEs with 36% citing it as their biggest growth impediment. The report shows credit access barriers to be due to fears of debt and strict credit application requirements. In 2019, only 10% of MSMEs accessed formal finance while nearly 80% of owners relied on personal savings to start businesses (FinMark, 2019). While MSMEs may have access to finance, credits are insufficient and expensive. Access to credit also varies by the characteristics of MSMEs. Start-ups and rural businesses face greater difficulties compared to their urban and more established counterparts. Additionally, access is influenced by the sector, with more developed industries like business services, tourism, and construction having higher rates of banked businesses and credit availability compared to sectors such as farming, wholesale, and retail sectors (Ibid).

While the formal MSME financing landscape in Malawi is dominated by commercial banks (providing 68% of the total MSME credit), MSMEs also access finance from microfinance institutions (18%), donors (8%), Savings and Credit Cooperative Organisations SACCOs (3%) and VSLAs (3%). Challenges to accessing financial products and services include high transaction costs, low financial literacy, high travel cost to financial services providers, limited income, and loan collateral requirements, amongst others. Overall, access to credit remains a significant challenge for MSMEs in Malawi, constraining their growth and development. Targeted interventions are needed to increase the products and services available to this underserved sector.

Insurance access and gaps

Most MSMEs are uninsured although their businesses are exposed to many risks such as theft, rain damage, fire, flood, and other natural hazards. Rain damage, flood and natural hazards account for more than half of the business risk (FinMark, 2019). MSME insurance penetration rate was 3% in 2019 (FinMark, 2019). The low penetration stems from barriers on both the demand and supply side. On the supply side, insurance firms lack the capacity to build suitable products to meet the specific needs of businesses. Underdeveloped data systems in particular slow supply. On the demand side, affordability, low awareness of insurance products, and lack of appropriate insurance products are some of the challenges identified (Ibid).

The microinsurance market is dominated by credit life and life insurance products, though there has been a growing diversification of the products and services available. However, despite this growth



in products, the distribution of microinsurance remains largely limited to Microfinance Institutions (MFIs) and member organisations like savings and credit cooperatives.

Overall, although Malawi's microinsurance market is growing, there is still room for improvement. In 2014, the percentage of the population insured under microinsurance policies stood at 1.6% (Biese et al., 2016). This saw Malawi fall just below the median on the continent and on the lower end of countries in Southern Africa. Product gaps are evident, particularly in agricultural microinsurance.

Malawi has had various experiences with parametric insurance over the past few decades. It was one of the first countries in Africa to pilot weather-index insurance with a scheme supported by the WB Group between 2005 and 2010. Under this policy, an insurance contract was bundled with loans to farmers that covered the cost of high-quality seeds. In case of severe drought, the insurance would pay off part of or the entire loan. However, there was limited participation of farmers and by 2014 most of the lending institutions had discontinued any form of direct crop insurance to smallholder farmers. More recently, PROSPER, a multi-stakeholder resilience programme supporting the government, implemented a selection of area yield insurance interventions between 2020-2021. However, similar to the 2005 scheme, these interventions were not successful due to infrastructural barriers as well as demand barriers, such as low patronage. Generally, participation in past schemes has remained very low.

Today, Malawi is part of the WFP's IRP which aims to strengthen farmers resilience against climate risks. In partnership with Malawi's eight general insurance companies and led by NICO General Insurance Company, the programme offers a yield index insurance product developed by Pula Advisors to farmers. Since its inception in 2015, the initiative has expanded to cover eight districts in Malawi. In the 2021/22 season, WFP-supported microinsurance programmes in Malawi insured 291,200 people and a total insured sum of USD 8.6 million. Of these people, 26,000 were farmers covered by the area yield index insurance (AYII). However, there is uncertainty about the continuation of the index insurance product due to a high claim ratio and the withdrawal of Africa Re as the lead insurer. In addition, the coverage has now been reduced from eight to four districts due to funding constraints.

For MSMEs, the protection gap can be estimated using their GDP contribution and insurance penetration rate. MSMEs contribute 40-47% of GDP (Chilima, 2022; Ministry of Trade, 2025), the conservative figure of 40% is adopted here. Assuming MSMEs experience a proportional share of national losses, this implies that they incurred losses of USD 95.74 million in 2023. With an insurance penetration rate of 3%, only USD 2.87 million of these losses were covered, leaving USD 92.87 million uninsured (UNEP V20 SIF, 2025). This estimate aligns with reported figures; for example, the WFP, the largest supporter of agricultural insurance in Malawi, facilitated payouts totalling USD 1.2 million in 2022/23. It should be noted, however, that the calculation of the gap is likely to be underestimated for MSMEs, particularly those in agriculture, bear a disproportionate share of climate-related losses. The actual uninsured losses are likely higher than USD 92.87 million.

5.6 Capabilities of cooperatives, associations and CSOs to provide financial support to their members

The four biggest co-operative unions in Malawi are Mzuzu Coffee Planters Co-operative Union (MZCPCU), Community Savings and Investment Promotion Cooperative Union (COMSIP), Timber Millers Cooperative Union (TMCU), and Malawian Union of Savings and Credit Co-operatives (MUSCCO). There are also a relatively large SACCOs, VSLAs, and Rotating Savings and Credit Associations (ROSCAs) commonly found in local communities. Cooperatives are membership-based with a clear mandate to provide their members with a number of services including credit, training, and capacity building.



The RBM reports some of the challenges of the cooperative sector as loan over deductions and delays in member share or credit payments. Government strategies for poverty reduction often include developing the capabilities of cooperatives, especially those in rural areas, to improve their access to financial services such as loans, savings, payment services, money transfers, and insurance.

There are active farmer cooperative groups that serve as aggregators for insurance. Malawi's National Association of Small Farmers (NASFAM) is a farmers' organisation with over 100,000 smallholder farmers across the country. NASFAM has been actively involved in farmer aggregation and the distribution of weather-index insurance.

The Civil Society Network on Climate Change (CISONECC), with support from the German Government through CARE, implemented the Multi-Actor-Partnerships (MAPs) project to enhance CDRF in Malawi. The project aimed to reduce the impact of disasters on vulnerable populations by fostering multi-actor partnerships across government, civil society, academia, private sector, and media, promoting gender-equitable and poverty-focused approaches. A national MAP was established to facilitate regular stakeholder dialogue and collaboration on CDRF.

Following a successful implementation of the project, CISONECC secured additional support from the Government of Germany through CARE International and CARE Malawi to implement MAPs project on Climate and Disaster Risk Finance and Insurance (CDRFI) in the context of the InsuResilience Vision 2025. The programme seeks to ensure that through strengthened structures, coordination, networking and technical capacities of MAP cooperation partners' campaigns, the framework and conditions for implementing and scaling up effective and evidence-based, human rights-based, gender-responsive and poverty-focused CDRF approaches improve significantly.

5.7 Conclusion

This chapter provides a comprehensive overview of Malawi's institutional, legal, regulatory, and market structures related to CDRF. It examines the roles of key government ministries, financial institutions, and regulatory frameworks, as well as the capabilities of the private sector, cooperatives, and civil society organisations in advancing financial protection against climate risks. The analyses of these key areas show several key gaps in the enabling environment.

One of the main gaps identified is the lack of coordination and overlap among institutions involved in DRF. While multiple ministries and institutions are responsible for CDRF-related initiatives, the absence of a clearly defined coordinating mechanism results in fragmented implementation. Local governments, which play a key role in disaster response and social protection, also face financial and technical limitations that are not fully explored in the text. Strengthening local government capacity and creating a streamlined coordination framework among national and local stakeholders would significantly improve DRF efforts.

The chapter also highlights limitations in the private sector and the insurance market, particularly in addressing the needs of vulnerable populations. Malawi's insurance penetration rate remains low, with only 5% of the population covered, and microinsurance, particularly in agriculture, has had limited success due to poor distribution networks and financial literacy challenges. MSMEs remain largely uninsured, despite their vulnerability to climate-related economic shocks. Strengthening public-private partnerships to enhance insurance distribution through mobile platforms and cooperatives could help close this gap. Providing incentives for microinsurance products specifically designed for MSMEs and smallholder farmers would also improve access to financial protection.

In terms of financial and digital infrastructure, the chapter highlights limited access to formal financial services by rural communities. While mobile money adoption is high, with 81% of transactions conducted through digital platforms, mobile-based insurance solutions remain underdeveloped.



Expanding the use of mobile money platforms for premium payments and integrating SACCOs, cooperatives, and VSLAs as intermediaries for climate risk financing would strengthen financial inclusion. Gender and social inclusion gaps in CDRF exist, as women, youth, and marginalised communities face higher climate vulnerabilities yet remain underserved by financial protection mechanisms.

There are gender disparities in financial access. Current insurance regulations do not explicitly address parametric/index-based insurance products. This absence can lead to uncertainties regarding product approval, operation, and oversight.

There are clear gaps in institutional coordination, regulations, financial accessibility, private sector involvement, digital finance integration, and gender inclusivity. By closing these gaps, Malawi can build a more resilient and financially protected society that is better equipped to withstand climate-related disasters.

6. Climate and disaster risk finance solutions and linkages

PPPs play a significant role in promoting the design and distribution of insurance, especially among smallholder farmers in Malawi. Insurance products are offered at the macro, meso and micro-level. **At the macro-level**, there are several programmes: (1) the SSRLP Social Protection Programme, which includes a sovereign insurance policy, (2) the Macro Derivates Programme, (3) REPAIR Programme, as well as specific policies such as (4) the sovereign drought insurance offered by ARC Ltd.

Malawi has participated in the ARC risk pool for drought for three consecutive years underscoring the significance of such partnerships in helping vulnerable countries combat climate triggered disasters. However, this came with a steep learning curve in 2015, where due to a wrong parameterisation the payout was not triggered as expected. A payout was later made to the Government after a review. Following this, and improving the programme with these learnings, the country has received payouts from subsequent schemes in 2023 and 2024.

A number of ex-ante instruments are used for DRM in Malawi, including a contingency budget line not exceeding 2% of total expenditure budget, a WB CAT DDO, and SGR for absorbing market shocks and maintaining physical grain stock.

Under the Government's Agriculture Risk Resilience Insurance Access Programme, a feasibility study is under development to inform policy enactment for the integration of a risk transfer component to the Agriculture Input Programme. This programme will address both the demand and supply side of agricultural insurance, exploring a sustainable approach to integrating insurance into the AIP to financially protect farmers against significant agricultural losses. The objective is to facilitate smallholder farmer's access to improved agricultural farm inputs to increase agricultural (i.e. cereal crop and goat) production and raise household income through sales of surplus production. AIP is the largest agricultural programme of the country.

The two **main meso-level** programmes were implemented in partnership with local intermediaries namely, Mthangati programme through the INVEST Co-op initiative and the NASFAM Index-Based Insurance (2005-2008) supported by the WB.

At the micro-level, several programmes have been implemented. For example, One Acre Fund, with support from the International Finance Corporation's Africa Inclusive Insurance Programme, distributes affordable insurance with the goal of connecting at least five million smallholder farmers and MSMEs to climate insurance by 2025, paving the way for a more secure and sustainable agricultural future in Africa.

Another initiative is the WFP IRP which bundles insurance with comprehensive risk management services. In partnership with Pula Advisors, the programme reached 26,386 farmers, registering a notable number of women. During Cyclone Freddy the initiative paid USD 1.2 million in compensation to farmers.

6.1 Overview of climate and disaster risk finance projects and solutions

There are several CDRF solutions in place at the macro, meso and micro-level. An overview is provided in Table 4 and further details are discussed in the text below.

Table 4. Overview of CDRF and other related projects and solutions

Climate and Disaster Risk Finance solutions/Programmes				
Project name and duration	Implementing partners	Description	Instrument type	Perils covered
Macro-level risk financing solutions				
REPAIR Programme (under development)	WB, Global Shield Financing Facility (GSFF), MoFEA, ARC Ltd	This programme supported by WB aims to strengthen financial and operational preparedness for climate-related shocks in Eastern and Southern Africa. It will establish a Regional Climate Risk Fund (RCRF) with pre-arranged finance instruments to enable swift responses to shocks of varying severity and frequency.	Sovereign risk transfer, contingent financing	Flood, Storms, Drought
Sovereign ARC Flood Policy (under development)	ARC Ltd, JBA, DoDMA	The ARC flood product has been developed in partnership with JBA. An insurance policy is expected to be offered to the Government at the end of 2025-2026.	Sovereign risk transfer	Flood
Mitigating Fragility through Africa Disaster Risk Financing Programme in Southern Africa, Malawi and Zimbabwe (2024 - ongoing)	Africa Development Bank (AfDB)/ Africa Disaster Risk Financing Programme (ADRFi), MoA, DoDMA.	USD 34.8 million to enhance resilience and adaptation to climate disaster risks for vulnerable communities in Malawi and Zimbabwe. Includes components for strengthening EWS in Malawi.	Sovereign risk transfer solution, and Micro-level index-based crop insurance.	Drought, flood and other production risks
SSRLP Social Protection Programme (Shock-responsive element) (2023 - ongoing)	ARC Ltd, WB, GSFF	A shock-responsive element of SSRLP which allows the SCTP to scale up automatically in response to droughts. Enabled through contingency funding and parametric insurance.	Sovereign risk transfer, contingency funds	Drought
Sovereign ARC Drought Insurance (2015 - ongoing)	DoDMA, MoA, MoFEA, MoGCDSW, ARC Ltd	A sovereign risk transfer solution that offers protection against drought.	Sovereign risk transfer	Drought
ARC Replica (2023 - ongoing)	ARC Ltd, UNHCR	A sovereign risk transfer solution covering the central region of the country. Offers coverage for refugees and displaced people.	Sovereign risk transfer	Drought
Macro Derivates Programme/ Malawi Maize Production Index (MMPI) (2008 - 2010)	WB, DFID/FCDO, Malawi Meteorological Office	A national level drought risk management programme developed as a protection mechanism for maize.	Sovereign risk transfer	Drought

Meso-Micro-level risk financing solutions

Meso Initiative on Flood Insurance (under development)	ARC Ltd, InsuResilience Solutions Fund (ISF), JBA, Danish Red Cross	A flood model as meso insurance initiative to cover flood risk in Phalombe district.	Meso-level insurance	Flood
National Local Government Finance Committee Malawi Social Protection Insurance/ Scalable Mechanism (2024 - ongoing)	NLGFC, MoGCDSW, ARC Ltd, WB	A social protection product covering communities in vulnerable settings in 8 districts. Policy started with coverage of 116,000 households in 6 districts to now 154,000 households in 8 districts.	Meso-micro-level risk transfer solution	Drought
One Acre Fund Agriculture Programme (2023 - ongoing)	One Acre Fund, Natural Disaster Fund Technical Assistance Facility, ARC Ltd	An integrated climate risk management approach in insurance product offerings through resilience building, crop diversification, and social safety nets and assets.	Meso-micro-level yield index insurance and weather-index insurance	Drought, Flood
Integrated Resilience Programme – Malawi (ongoing)	WFP, Pula Advisors, Oxfam America, CUMO Microfinance, NICO Insurance Company, MoA, DCCMS, United Purpose and World Vision Malawi	Through integrated climate risk management approach, IRP enables poorest farmers access to crop insurance.	Micro-level index-based insurance	Drought
Mtetezi Insurance (ongoing)	Japan Tobacco International (JTI) and Alliance One	Mtetezi is NICO's insurance product for tobacco farmers against loss or damage to tobacco leaf.	Micro-level insurance product	Hail, Windstorm, Floods, Rainfall
Enhancing Resilience of Smallholder Farmers in Southern Malawi through a Risk Layering Approach for Managing Climate-related Risks (2024 - ongoing)	CelsiusPro AG, ISF, Opportunity International Malawi, Microinsurance Centre at Milliman	Developing 2 risk layers for MFIs: - a meso-level portfolio cover to insure them against highly symmetric defaults - a microinsurance product to be distributed by the MFIs to protect their clients at the individual level	Meso-micro-level Insurance	Drought, Flood, Windstorm



Tearfund Multi Country Protection (2023 - 2025)	Tearfund, NDF Technical Assistance Facility	Developing a 4-country drought insurance policy for the humanitarian organisation Tearfund to add another layer to their financing strategy for drought response in the country.	Meso-level insurance	Drought
USAID Flood (2023 - 2024)	Floodbase, CelsiusPro	An innovative flood microinsurance product to protect farmers mainly against tropical cyclone induced floods.	Micro-level insurance for households and businesses	Flood
Area Yield Index Insurance Malawi (2022 - 2024)	Pula Advisors, Adaptation Fund, MoA	The project supports the design and implementation of climate risk insurance to alleviate farmers' vulnerability to climate-related shocks.	Micro-level insurance for households	Drought, Dust Storm, Extreme Cold, Extreme Heat, Flood, Landslide, Windstorm
Mthangati Weather-Index Insurance (2018 - 2022)	INVEST Co-op initiative, Global Affairs Canada	The programme structured coverage through agricultural cooperatives rather than directly to individual farmers. Cooperatives acted as the insured entity, and farmers registered for coverage through their cooperative.	Meso-level weather-index insurance	Drought
NASFAM Index-Based Insurance (2005 - 2008)	WB, NASFAM	Enhance smallholder farmers' access to credit while managing drought risks. By mitigating weather-related risks, the insurance encouraged banks to lend to insured farmers, who then invested in higher-quality seeds.	Meso-level index-based insurance	Drought
Promoting Sustainable Partnerships for Empowered Resilience (PROSPER) programme (2020 - 2023)	Concern Worldwide, FAO, GOAL, Kadale Consulting, UN Resident Coordinators Office (RCO), UNDP, UNICEF, United Purpose, WFP, UK Department for International Development (DFID)[1]/Foreign, Commonwealth and Development Office (FCDO) [1] Former UK Department for International Development which was dissolved in 2020 and merged with FCDO.	A multi-stakeholder resilience programme supporting the Government to implement a selection of area yield insurance interventions.	Weather-Index insurance	Climate shocks

6.1.1 Macro-level risk financing solutions

Regional Emergency Preparedness and Access to Inclusive Recovery (REPAIR) Programme

Regional focus: National

Target beneficiaries: to be determined by Government

Implementing organisation: ARC Ltd (implementing the regional programme), MoFEA



Key partners: WB, GSFF

Timeline: under development, planned for 2025 - 2031

Further details: A Southern Africa regional climate risk response programme to support countries' access to finance within seven days when a disaster strikes. The programme offers a suite of DRF instruments including contingency funds, sovereign risk transfer solutions and reserves. Malawi is among the new countries that will receive support from 2025 onwards. ARC will support as implementation partner.

Malawi ARC Sovereign Flood Policy

Regional focus: National

Target beneficiary: Government

Implementing organisation: ARC Ltd, DoDMA

Timeline: under development, to be launched at the end of 2025/2026

Key partners: JBA

Further details: The ARC flood product has been developed in partnership with JBA. An insurance policy is expected to be offered to the Government at the end of 2025/2026.

Mitigating Fragility through Africa Disaster Risk Financing Programme in Southern Africa, Zimbabwe and Malawi

Regional focus: Nkhotakota, Machinga, Blantyre, and Mzuzu city

Target beneficiaries: households and businesses

Implementing organisation: MoA, DoDMA

Key partners: AfDB, ADRiFi

Timeline: 2024 - ongoing

Further details: A grant of USD 34.8 million approved by AfDB under the ADRiFi initiative to enhance resilience and adaptation to climate disaster risks for vulnerable communities in Malawi and Zimbabwe. Under the project, insurance payouts will provide timely and adequate financial protection to mitigate losses incurred from climate-related disasters, safeguarding households, and businesses from falling into poverty or bankruptcy. The specific objectives of the project are (1) increase institutional capacity for climate risk preparedness and management; (2) increase financial protection against climate disaster risks through sovereign climate disaster risk transfer; and (3) promote the adoption of index-based crop insurance to mitigate against drought and other production risks at the micro-level. This project contributes to a contingency fund and builds on the successes of the first phase of the ADRiFi programme in Malawi.

SSRLP Social Protection Programme (shock-responsive element)

Regional focus: National

Target beneficiaries: 120,000 households currently enrolled in the Social Protection Cash Transfer and Climate Smart Public Works Programme

Implementing organisation: MoGCDSW, NLGFC,

Key partners: ARC Ltd, WB, GSFF

Timeline: 2023 - ongoing

Further details: A USD 21 million grant from GSFF to enable Malawi's SCTP to scale up during drought emergencies. The scale-up mechanism is backed by the WB's USD312.5 million SSRLP, which strengthens Malawi's overall social protection system. The grant funds both a USD 21 million contingency fund, protecting up to 1.2 million people from moderate droughts and an USD 11 million insurance instrument that shields another 600,000 people from severe drought. Since the grant's launch, there have been four SCTP scale-ups, reaching over 248,000 households with emergency cash support. In August 2024, payouts of USD 11.9 million were made in 10 districts, reaching about

142,000 households (nearly 700,000 people). For the 2024/25 season, another scale-up was triggered in Ntcheu district, resulting in a USD2.36 million payout that supported over 26,000 households.

Malawi Sovereign Drought Policy by African Risk Capacity

Regional focus: National

Target beneficiaries: smallholder farmers

Implementing organisation: DoDMA, MoA, MoFEA, MoGCDSW

Key partners: ARC Ltd, AfDB

Timeline: 2015 - present

Further details: The Government of Malawi signed a Memorandum of Understanding (MoU) with the ARC Agency in 2012. Since 2015, the Government has been subscribing to the ARC risk pool, anticipatory sovereign parametric insurance. The first drought insurance policy from ARC came with a premium of USD 4.7 million in 2015. In 2021, the Government purchased another drought policy with support from the AfDB through its ADRIFi Multi-Donor Trust Fund for the 2020/2021 crop season. In 2016, the Government received a payout of USD 8.1 million, in 2022 a payout of USD 14.2 million, and in 2024 a payout of USD 11.2 million. The insurance policy is structured to provide drought coverage across the nation by dividing it into four distinct regions, each with its own insurance policy and specific drought trigger levels. This regional segmentation allows for tailored responses to varying drought conditions within different parts of the country. The Government of Malawi has been selected as part of the two pilot countries for the ARC anticipatory action insurance policy which started in 2023. The drought anticipatory action product was co-designed with the United Nations Office for the Coordination of Humanitarian Affairs (OCHA) but the Government is the one that takes the risk. The policy did not trigger a payout the first year, but it did the second year (2024-25).

Malawi ARC Replica

Regional focus: Central Malawi (in 2023) and Southern Malawi (in 2024)

Target beneficiaries: Refugees and displaced communities

Implementing organisation: ARC Ltd

Key partners: UN Refugee Agency (UNHCR)

Timeline: 2023 - present

Further details: UNHCR took up ARC Replica in Malawi in 2023. Before then, there was no ARC Replica policy in place. Malawi is the pilot country for UNHCR for this approach. USD 250,000 premium was paid for the policy covering only the Central cluster. Following the El-Nino drought in 2023, a total payout of USD 11.6 million was received by the country; USD 11.2 million to the Government and USD 400,000 to the Replica programme. The programme is extended to other countries following a successful implementation in Malawi.

Macro Derivates Programme/Malawi Maize Production Index

Regional focus: National

Target beneficiaries: maize farmers

Implementing organisation: Malawi Meteorological Office

Key partners: DFID/FCDO, WB

Timeline: 2008 - 2010

Further details: The programme used rainfall data from weather stations across the country to estimate maize yields. The system was designed to trigger payouts when the index dropped 10% below historical averages, allowing for quick financial responses before harvest assessments. The financial structure of the programme was based on a weather derivative contract, where the WB acted as an intermediary, and DFID/FCDO covered the insurance premiums. This mechanism transferred the financial risks of severe droughts to the weather reinsurance market, ensuring early payouts for relief efforts. Despite its innovative design, the programme had limitations. Payouts were only triggered by nation-wide severe droughts, leaving localised droughts unaddressed. Additionally,

the long-term sustainability of the programme was uncertain, as it depended on donor-funded premiums rather than self-sustaining financing.

6.1.2 Meso- micro-level risk financing solutions

Meso Initiative on Flood Insurance

Regional focus: Southern region

Target beneficiaries: Phalombe district

Implementing organisation: Danish Red Cross, Malawian Red Cross Society

Key partners: ISF, ARC Ltd, JBA Risk Management Ltd

Timeline: Under development

Further details: Currently, together with the Danish Red Cross, the Government and ARC are working to scale up anticipatory action. ARC Ltd and JBA are working together on a flood model as meso-level insurance initiative to cover flood risk in Phalombe district. The initiative aims to enhance the capacity of vulnerable communities to anticipate, manage, and recover from large-scale flooding events. The project will create and introduce a nationwide, index-based insurance product. This innovative insurance solution will enable rapid payouts and swift response measures integrated into a comprehensive DRF framework that links triggers, funding, and digital contingency plans from the national to the community level.

National Local Government Finance Committee Malawi Social Protection Insurance/Scalable Mechanism

Regional focus: Karonga, Nkhotakota, Ntcheu, Blantyre, Chiradzulu, Thyolo, Mwanza, Nsanje districts

Target beneficiaries: 154,000 households from 8 districts

Implementing organisation: NLGFC, MoGCDSW

Key partners: ARC Ltd, WB

Timeline: 2021 - ongoing

Further details: A social protection product covering communities in vulnerable settings in eight districts. The social cash transfer (SCT) scheme started with coverage of 116,000 households in six districts to now 154,000 households in 8 districts. This policy is a response to social protection needs caused by drought. Maximum payout is curbed at USD 9.7 million. The Government plans to scale coverage to 12 districts, however, unable to currently do so due to resource constraints. Current policy season ends in April 2025, with plans to reapply for a new season to start September/October. The WB is providing technical assistance and finance.

One Acre Fund Agriculture Programme

Regional focus: nation-wide

Target beneficiaries: Low-income vulnerable communities, NGOs, and smallholder farmers

Implementing organisation: One Acre Fund

Key partners: Natural Disaster Fund Technical Assistance Facility, ARC Ltd (as reinsurer)

Timeline: 2023 - ongoing

Further details: An integrated climate risk management approach based on three pillars namely resilience building, crop diversification, and social safety nets and assets. One Acre Fund supplies farm inputs (e.g. fertilisers, seeds) on credit up to MWK 9,000 for which farmers are to pay over the course of the farming season. Insurance payout goes towards loan repayments. Once loans are repaid, the insurance payout is in cash. Furthermore, these loans are taken out in groups, where failure to meet repayment terms disqualifies farmers from the programme in the next season.

Integrated Resilience Programme (formerly R4 Rural Resilience Initiative)

Regional focus: four districts



Target beneficiaries: smallholder farmers

Implementing organisation: WFP

Key partners: Oxfam America, CUMO Microfinance, NICO Insurance Company, Pula Advisors, MoA, DCCMS, United Purpose, World Vision Malawi

Timeline: 2015 - present

Further details: Launched in 2015 by WFP and Oxfam America to enable vulnerable rural families to increase their food and income security by managing climate-related risks. It combines four risk management strategies namely (1) improved resource management through nature-based solutions or improved agricultural practices; (2) access to insurance; (3) increased investment, livelihoods diversification and microcredit; and (4) savings. The initiative enables the poorest farmers to access crop insurance by participating in risk reduction activities. The initiative has benefitted more than 10,000 farmers from Zomba, Blantyre and Balaka districts since its launch in 2015. Initially covering eight districts, coverage has scaled down to four due to funding constraints.

Mtetezi insurance

Regional focus: National

Target beneficiaries: Tobacco farmers

Implementing organisation: NICO's insurance

Key partners: JTI and Alliance One

Timeline: ongoing¹⁴

Further details: Designed for tobacco farmers against losses or damages to tobacco leaves in the field due to hail, windstorm, floods, and excessive rainfall. The insurance also covers losses and damages experienced in the process of picking, stringing, curing, bulking, grading, re-ordering and transiting leaves to auction floors due to fires, malicious damage, lightning, strikes, riots, theft, and many more risks. The insurance facility is implemented in collaboration with private tobacco companies who provide technical guidance, facilitate advocacy and client engagement, package products, and discharge payouts.

Enhancing Resilience of Smallholder Farmers in Southern Malawi through a Risk Layering Approach for Managing Climate-related Risks

Regional focus: Southern Malawi

Target beneficiaries: Low-income and vulnerable communities, NGOs, and smallholder farmers

Implementing organisation: CelsiusPro AG, Opportunity International Malawi, Microinsurance Centre at Milliman

Key partners: ISF

Timeline: 2024 – ongoing

Further details: The primary goal of this initiative is to enhance the economic and climate resilience of smallholder farmers in Malawi by improving their access to financial services, including insurance and credit. This will be achieved by bolstering the financial stability of Opportunity International Malawi's network of financial institution partners in the aftermath of climate-related disasters, ensuring they can continue lending to farmers. Additionally, the project will protect smallholder farmers from the economic impacts of flooding, excessive rainfall, and drought while providing financial management training and supporting the implementation of regenerative agricultural practices on heavily depleted soils.

Tearfund Multi Country Protection

Regional focus: Balaka district

Target beneficiaries: Low-income and vulnerable communities, NGOs, smallholder farmers

Implementing organisation: Tearfund

¹⁴ Start date unknown



Key partners: NDF Technical Assistance Facility

Timeline: 2023 - 2025

Further details: Tearfund and Global Parametrics partnered in 2023 to develop an innovative risk transfer instrument for drought response, which leverages satellite data to determine the availability of water for crops. The project was funded by the NDF Technical Assistance Facility. As a result, Tearfund was able to sign their first ever parametric risk transfer as a humanitarian organisation at the end of December 2023. In February 2024, a payout of over GBP 80,000 was paid to Tearfund for smallholder farmers.

USAID Flood

Regional focus: five regions

Target beneficiaries: Low-income and vulnerable communities, NGOs, and smallholder farmers

Implementing organisation: Floodbase

Key partners: USAID

Timeline: 2023 – 2024

Further details: An innovative flood microinsurance product that was set up to protect farmers mainly against tropical cyclone induced floods.

Area Yield Index Insurance Malawi

Regional focus: Machinga, Zomba, and Balaka districts

Target beneficiaries: farmers

Implementing organisation: MoA, WFP

Key partners: Adaptation Fund, Pula Advisors

Timeline: 2022 - 2024

Further details: As part of its integrated risk management approach, the project supported the design and implementation of climate risk insurance to alleviate farmers' vulnerability to climate-related shocks. Small-scale farmers could subscribe to AYII to insure the value of their purchased inputs (such as farm equipment, seeds and other resources) against low yields. During the 2023/2024 agricultural season, up to 20,224 farmers were insured for a total value of USD 4.06 million. Since the beginning of the project, up to USD 1.9 million in insurance claims have been paid to farmers targeted by the project.

Mthangati Weather-Index Insurance

Regional focus: Lilongwe, Dowa, and Mchinji

Target beneficiaries: Smallholder farmers

Implementing organisation: INVEST Co-opt Initiative

Key partners: Global Affairs Canada

Timeline: 2018 - 2022

Further details: A weather-index-based meso-level insurance programme with coverage offered through agricultural cooperatives. Cooperatives were served as the insured entity and the intermediary between farmers and the insurance provider. Through this programme 5,614 women and 12,464 men were trained on the benefits of the Mthangati insurance product but only one percent of these subscribed to the programme. Subscription was higher among women (120) than men (54). Unsustainable donor funding coupled with low participation led to the closure of the programme.

NASFAM Index-Based Insurance

Regional focus: Kasungu, Nkhotakota, Lilongwe North, Chitedze

Target beneficiaries: smallholder farmers

Implementing organisation: NASFAM

Key partners: WB



Timeline: 2005 - 2008

Further details: A weather-index-based insurance designed to enhance small scale farmers access to credit and response to drought risk. By 2008, 2,600 farmers had purchased policies worth USD 2.5 million. The insurance was bundled with credit access that enabled farmers to buy certified high-quality seeds.

Promoting Sustainable Partnerships for Empowered Resilience (PROSPER) programme

Regional focus: Balaka, Chikwawa, Phalombe, Mangochi districts

Target beneficiaries: smallholder farmers

Implementing organisation: Concern Worldwide, FAO, GOAL, Kadale Consulting, RCO, UNDP, UNICEF, United Purpose, WFP

Key partners: DFID/FCDO

Timeline: 2020 - 2023

Further details: Supported the Government of Malawi to build resilience of 1.1 million vulnerable people across four districts. The project also focused on reducing poverty and ending the recurrent cycle of crisis. This was a GBP 60 million project which is funded by the DFID/FCDO. PROSPER used an integrated and multi-layered approach to meet the immediate needs of vulnerable households, and to support longer term sustainable community development. It was designed to strengthen the capacity of communities to anticipate, absorb, and adapt to shocks so they can better cope and “bounce back” from crisis. Key programme elements included climate services, watershed management, microfinance and microinsurance, market systems development, and inclusive business models.

6.1.3 Local private insurance providers

The private sector offers a number of insurance solutions on the market. The insurance companies on the market that offer products with coverage for fire, lightning, explosion, thunderbolt, earthquake (fire and shock), subterranean fire, bush fire, storm, tempest, flood, burst pipes, landslide, riots, and strikes are Libertas General Insurance, General Alliance Insurance Ltd, NICO General Insurance Company Ltd, Prime Insurance Company Ltd, and Britam Insurance Company Malawi Ltd. Products are offered to both businesses and individuals. The sector has significant experience and expertise in developing climate-related products, such as weather-index-based insurance but face several challenges such as low insurance patronage and limited climate risk management capacity. Affordability is a key issue and a contributing factor to low insurance penetration. Recent disasters have caused a rise in insurance premiums as insurance companies have to adjust to increasing reinsurance cost. Some of the key challenges of the insurance sector of Malawi in the context of climate risk management include overreliance on international reinsurance markets, low affordability and accessibility of climate insurance products, and significant fire related losses caused by climate-related events that lead to financial strain (Africa Climate Foundation, 2024).

6.2 Themes linking to CDRF

Beyond CDRF focused projects, several initiatives address related areas such as climate change adaptation, DRR, social protection, and community resilience. The following table and subsections provide an overview of key initiatives addressing themes connected to financial protection.

Table 5. CDRF-related projects

CDRF-related projects		
Project name and duration	Implementing organisation	Description
Strengthening Risk informed planning, Hydro-Meteorological and Early Warning Services in Malawi (2022 - 2026)	Climate Risk and Early Warning Systems (CREWS), World Meteorological Organisation, and United Nation Office for Disaster Risk Reduction (UNDRR)	To strengthen the national capacity related to weather forecasting, hydrological services, early warning early action services and financial preparedness of the Government of Malawi.
Accelerating Employment Creation and Social Protection through Integrated Agriculture Value Chain Development (2024 - 2026)	International Labour Organisation, Food and Agriculture Organisation, and UN Women	Review public policies and guidelines on social protection, decent jobs, skill development, and agriculture commercialisation to ensure that they are gender-responsive and implemented to enhance job creation and opportunities for the youth, women, and other marginalised populations.
Cyclone Freddy Recovery Project (2023 - 2024)	Eagles Relief and Development Programme	The project achieved the following impact: <ul style="list-style-type: none"> • 1100 people affected by crisis received food. • 1200 livelihoods were protected and restored.
Environmental and Economic Sustainability Project (2024 - 2025)	Eagles Relief and Development Programme	Help households adapt to climate impacts.
Zurich Climate Resilience (2024 - 2027)	Zurich Foundation	Enhance community resilience to climate hazards. Activities include conducting risk assessments using the Climate Resilience Measurement for Communities (CRMC) tool, building early warning systems, and implementing community action plans. Additionally, the project involves advocacy efforts to influence policy changes and secure funding for disaster risk management at local and national levels, ensuring sustainable and scalable resilience interventions.
Affordable Input Program (AIP)	Government of Malawi	A successor to the Farm Input Subsidy Program (FISP) developed by the Malawian Government in response to long-term recurring food shortages and poor maize harvest due to low access to farm inputs by smallholder farmers. The programme has undergone transformation from the initial design which offered a 75% subsidy on fertiliser and seeds to more than two million farmers and boosted their maize productivity. Currently the program targets about 1 million farmers with a subsidy on fertilisers and seed. The programme has also extended to livestock where about 500 farmers access goats at the same subsidy rate as the maize farmers.
SCTP or Mtukula pa Khomo (2006 - ongoing)	Ministry of Gender, Community Development and Social Welfare	Malawi's flagship social protection programme that and targets 10% of ultra-poor and labour-constrained households (303,000 households), providing direct unconditional cash transfers.
Climate Smart Public Works Programme (2020 - ongoing)	NLGFC	The CSPWP offers temporary work opportunities in public infrastructure projects to vulnerable individuals in exchange for cash or in-kind support like food vouchers.
Social Support for Resilient Livelihoods Project (2019 - present)	Malawi National Local Government Finance Committee	Project is implemented by government (led by NLGFC). This project for shock responsive social protection, has a risk transfer policy as part of the financing plan, which is currently underwritten by ARC Limited, with premium financing from government's IDA allocation and a grant from the GSFF.

Scaling up Climate Resilient Solutions (CRS) (2017 - 2019)	NASFAM and Technical Centre for Agricultural and Rural Cooperation	The project aimed at enhancing the productivity and adaptation of agriculture for smallholder farmers in Malawi under a changing climate by improving access to weather information by farmers through Information Communication Technology, promoting farmers access to stress tolerant seeds as an adaptation strategy to climate change, and improving awareness and levels of climate insurance for farmers in Malawi. The CRS project targeted 50,000 beneficiaries in Zomba, Mchinji, Ntchisi, Nkhotakota, and Mzimba districts.
Modernised Climate Information and Early Warning System (M-CLIMES) project (2017 - 2024)	Government of Malawi, UNDP	The project aims at improving and creating new EWS in Malawi. It operates in 14 districts with food insecurity challenges. It focusses on flood-prone areas by strengthening the local capacity to respond to early warnings which should improve disaster planning, monitoring and resource mobilisation for disaster management.
The Famine Early Warning Systems Network (FEWS NET)	USAID, MoA, Chemonics International	Provides information and early warning of potential food security crises.

6.2.1. Adaptive social protection system

Malawi has made significant progress in strengthening its social protection system, particularly in terms of institutional frameworks, programme integration, and shock-responsive mechanisms. However, gaps remain in implementation, coordination, and effectiveness. This analysis provides a structured stocktaking of key components and identifies first gaps that need to be addressed for enhanced efficiency and impact. The gaps will be further elaborated in the separate Gap Analysis document.

Key social protection frameworks

Malawi has several cross-sectoral frameworks in place that aim at protecting its citizens from shocks.

NRS 2018 - 2030 aims to enhance Malawi's ability to manage and recover from economic and environmental shocks. The strategy establishes a plan for coordinated emergency preparedness and EWSs, ensuring that social protection interventions are adaptable to cyclical and large-scale shocks through planned interventions and temporary service expansions. It has four pillars:

- Pillar I: Resilient agricultural growth
- Pillar II: Risk reduction, flood control, and early warning and response systems
- Pillar III: Human capacity, livelihoods, and social protection
- Pillar IV: Catchment protection and management

Pillar III directly supports and aligns with MNSSP II (2018 - 2023) and informs the ongoing development of MNSSP 3. It provides a roadmap for asset creation and diversified livelihoods to mitigate risks and reduce vulnerability. Key strategic actions under Pillar III include fostering multisectoral partnerships between humanitarian and social protection actors, establishing a robust coordination structure with clear roles and responsibilities at both central and district levels, and ensuring that social protection interventions effectively fulfil their core mandates. Furthermore, the strategy emphasises the need to enhance preparedness and responsiveness through pre-defined objectives for shock-responsive social protection. Measures include pre-planned seasonal scaling-up,

leveraging existing programmes for horizontal and vertical expansion¹⁵ based on vulnerability assessments, setting objective triggers for response, and creating a pooled contingency fund. Flexible financing mechanisms within the Social Support Fund are also highlighted as essential for short-term social protection expansions during emergencies.

The third version of the MNSSP is currently under review by the Poverty Reduction and Social Protection (PRSP) team within the Economic Planning and Development (EP&D) division of MoFEA and seeks to address poverty and vulnerability by linking economic growth, human development, food security, and social services with shock-responsive mechanisms. Recognising shocks as key drivers of poverty, the policy integrates DRM and climate risk considerations into social protection strategies. Among the seven priority areas, shock-sensitive social protection is supposed to ensure that individuals, households, and communities affected by cyclical livelihood shocks, seasonal vulnerability, and larger unpredictable shocks receive adequate protection.

The draft of Malawi's new Social Protection Strategy (November 2023) emphasises strengthening social protection systems to provide timely and effective responses to shocks. Key focus areas include improving payment mechanisms through harmonised electronic transfers and addressing existing weaknesses such as fiscal constraints, donor dependency, and climate-related vulnerabilities. One significant change from the second version of the MNSSP is that it includes disaster risk insurance through the ARC Group as a shock-responsive social protection mechanism. Notable strengths include Malawi's experience with shock-responsive social protection and the established social registry. The strategy underscores the need for contingency funding, with donors already integrating crisis modifiers into their programmes. Strategic outcomes aim to build robust, scalable systems for emergency response, establish clear contingency funding mechanisms, and define agreed trigger mechanisms for rapid response. By leveraging existing vulnerability assessments and securing commitments from development partners, Malawi aims to create a more adaptive and resilient social protection framework.

The Environmental and Social Commitment Plan (ESCP) for Malawi's Contingency Emergency Response Project (CERP), finalised in October 2024, outlines the Government's commitments to managing environmental and social risks in emergency response initiatives. It mandates the establishment of an organisational structure with qualified staff, regular monitoring and reporting, stakeholder engagement, and grievance mechanisms (Government of Malawi, 2024). The plan also ensures compliance with environmental and social standards while requiring prompt reporting of significant incidents. By integrating these safeguards, the ESCP aims to enhance the resilience and sustainability of Malawi's social protection and disaster response efforts and specifies that the project will be implemented with the involvement of various ministries, including Health; Disaster Management Affairs; Local Government Finance; Water and Sanitation; Finance; Gender, Community Development and Social Welfare; Agriculture; and Local Government, Unity and Culture.

Lastly, the UN OCHA Anticipatory Action framework has been endorsed by UN agencies, the Malawi Resident Coordinator, and the Emergency Relief Coordinator and constitutes a predictive trigger monitoring. These projects aim to strengthen the country's capacity to respond proactively to climate-related shocks, such as droughts and floods, by providing timely financial assistance and support to vulnerable households before a crisis fully unfolds. By leveraging EWSs, predictive analytics, and pre-arranged financing, these initiatives seek to reduce the negative socio-economic impacts of disasters, enhance resilience, and improve the overall efficiency of Malawi's social protection system.

¹⁵ Horizontal scale-up refers to expanding programmes across location, communities or sectors, broadening their reach and impact. Vertical scale-up refers to increasing the level of intervention (i.e. benefit amount) or expanding the scope of services provided.

Key social protection programmes

A comparatively small share of the population (21.3%; one third of children) is covered by at least one social protection programme (ILO, 2024). Legally, all citizens are eligible to receive non-contributory social protection (see figure 9).

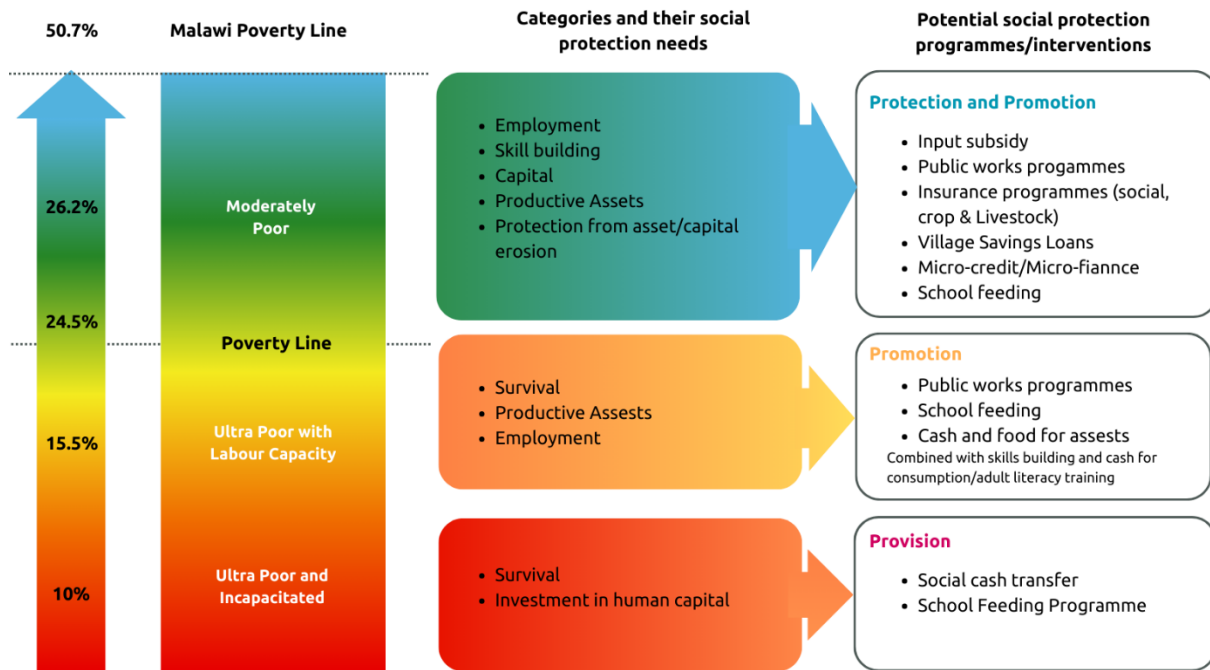


Figure 9. Overview of Malawi National Support Programme (MNSSP) II, by Poverty Category and Programme/Intervention. Source. Republic of Malawi, 2018

Social Cash Transfer Programme or Mtukula pa Khomo: Malawi's flagship social protection programme was launched by the Ministry of Gender, Community Development and Social Welfare in 2006 and targets 10% of ultra-poor and labour-constrained¹⁶ households (303,000 households), providing direct unconditional¹⁷ cash transfers. It is regularly scaled up during the lean season to account for the increased vulnerability of beneficiaries. Positive impacts include improved health and greater demand for healthcare, higher levels of school enrolment and asset accumulation, increased agricultural production, and improved food security, leading to a greater resilience to shocks. The average benefit amount has already been expanded and is to be adjusted for inflation in the next 4 years. At the same time, eligibility of the programme is intended to be raised from 10% to 15% while strengthening harmonisation with other social protection initiatives.

A notable caveat is that different donors support implementation in different districts, with resulting differences in implementation (e.g. different payment mechanisms) possible within the scope of national guidelines. In 2020/21, the SCTP was funded mainly by WB (39%), Germany (27%), the European Union (20%) and to the same extent by Irish Aid and the Government of Malawi (7% each) (UNICEF, 2023). This is being harmonised under the social protection Multi-Donor Trust Fund.

The Government funds the SCTP in one district; 27¹⁸ remain funded through official development assistance. Another major challenge of the programme is that 10% of eligible households per district

¹⁶ Labour-constrained refer to households or individuals who are unable to engage in sufficient paid work or productive activities due to factors like disability, age, or lack of local employment opportunities, making them dependent on cash transfer programmes for income support.

¹⁷ Not tied to any conditions like school attendance, health check-ups or similar.

¹⁸ World Bank (11 districts), Germany (7 districts), European Union (7 districts), Irish Aid (2 districts)

are selected, regardless of the district's poverty rate. This leaves many deserving households in the south of the country, which are disproportionately affected by climate shocks and poverty, without support. The donors participate in regular coordination meetings and are supported by UNICEF in the provision of technical support for regular operations and temporary expansions.

Climate Smart Public Works Programme: The CSPWP offers temporary work opportunities in public infrastructure projects to vulnerable individuals in exchange for cash or in-kind support like food vouchers. The programme aims to smooth income and consumption, addressing pillar 1 of the MNSSP II, build resilience and allow communities to accumulate productive assets, and thereby enhance the participants' and community's livelihoods. Recently, the CSPWP was renamed Climate-Smart Enhanced Public Work Programme (CS-EPWP) and adapted to include knowledge-building aspects and work projects around climate-responsible activities.

The WB has been instrumental in supporting Malawi's CSPWP, primarily through initiatives like the Malawi Social Action Fund (MASAF). However, a study on MASAF's CSPWP indicated that while participants could earn up to USD 44, there was no significant improvement in food security or increased use of agricultural inputs like fertiliser (Beegle et al., 2017). From 2015 to 2018, approximately 985,635 individuals benefited from a CSPWP initiated after the 2015 floods, underscoring the scale and reach of these programmes in Malawi (WB, 2021).

Social Support for Resilient Livelihood Project: The flagship ex-ante mechanism in Malawi's DRF structure is the Scalable Mechanism of the SCTP, an adaptive social protection mechanism that scales up when disasters are expected. The SSRLP, in place since 2021, expands the SCTP's and the CSPWP support during climate shocks by increasing both the cash benefit amounts (vertical expansion) and the number of pre-identified beneficiary households by around 7% (horizontal expansion). While primarily funded through contingency mechanisms, parametric insurance has covered part of the costs since the start of the programme. The system has performed well, meeting reinsurance standards and enabling the use of insurance-based solutions.

Since June 2020, the SCTP has been reinforced with a sovereign risk transfer instrument providing additional liquidity for drought response. When an ARC payout is triggered, MoFEA and the MoA pool resources to support affected communities. Beneficiaries, identified through the UBR, receive direct payouts in cash. Additionally, there is an explicitly linked insurance policy with ARC Ltd for the SSRLP. Currently supported by the WB, the SCTP operates with an average annual cost of USD 5 million and a maximum of USD 11.1 million, which is expected to rise due to increasing drought frequency. While drought remains the primary concern, there are considerations for future expansion to include flood risks.

The SSRLP is intended to be rolled out in all SCTP districts. As of November 2023, it is implemented in Blantyre, Ntcheu, Thyolo, Chiradzulu, Nkhotakota and Karonga. Those districts have been selected based on drought risks, food security and delivery systems capacity.

The mechanism follows a dual trigger approach: a primary trigger monitors two rainfall remote sensing indices and a secondary trigger based on an evidence review of the Famine Early Warning System Network, Global IPC reports, rainfall data from weather stations run by DCCMS and IFPRI Malawi Monthly Maize Market Report (WB, 2024). In case a trigger is reached, a pre-agreed amount of money is released, saving time compared to a previous severity assessment. The process from the trigger to a payout takes approximately six weeks. As the triggers are set during the growing season, payouts can be facilitated in advance to the lean season, allowing recipients to benefit from cheaper food prices and preventing these from reducing their savings, child education, and selling their property to cope with the consequences of the disaster.

Village Savings and Loan Associations & Microfinance: These community-based savings and credit schemes promote financial inclusion and support asset building, which is vital in times of shocks. In the future, this strategic pillar is planned to constitute a cash plus component in combination with cash transfers and complementary programmes providing additional benefits, information and educational offers, and (linkages to) other services like psychological support. However, the lack of a legal framework, oversight, and collaboration at the district level, leads to dual membership, competition between VSLAs, and a lack of transparency for potential members.

The VSLAs and microfinance institutions are currently neither funded by the Government nor by donors. While VSLAs are still active and technically supported and referred to by the District Social Welfare Offices, microfinance is left to the private market. An initial injection of capital to facilitate the establishment of the initiative and additional support such as developing group regulations and electing leadership helps leverage the potential of VSLAs and microfinance in building resilience of households for shock response. However, if long-term external funding is required, it may indicate underlying structural or operational challenges.

School Meal Programme: The programmes provide food to students in schools to encourage enrolment and attendance while boosting the local economy.

Affordable Inputs Programme provides subsidised agricultural inputs to smallholder farmers while the Adaptation Fund supports climate change adaptation projects through promoting sustainable farming practices, constructing climate-resilient infrastructure, and enhancing EWS.

Essential Health Package (EHP) seeks to ensure access to essential health services for all citizens, and especially free access to vulnerable groups in line with the Health Sector Strategic Plan. EHP is inaccessible to a large number of people in need because of the lack of health care facilities in rural areas. Out-of-pocket health expenditures remain high due to low levels of health insurance membership and low perceived benefit and reliability of free healthcare services. Currently, the government is exploring the option of forming a strategic partnership with the Christian Health Association under a service agreement in order to be able to provide free primary healthcare to those most in need, regardless of their geographic location.

There are several other social protection projects under implementation by development partners that contributes to the functioning of the social protection ecosystem. Some of these include the Accelerating Employment Creation and Social Protection through Integrated Agriculture Value Chain Development project that reviews public policies and guidelines on social protection, decent jobs, skill development, and agriculture commercialisation to ensure that they are gender-responsive.

To further harmonise and optimise the effectiveness of social protection programmes, the government, in collaboration with development partners, has established the Multi-Donor Trust Fund (MDTF), currently managed by the WB. The MDTF is a USD 3.35 million programme running from 2023 - 2025 which plays a crucial role in strengthening the country's social protection system by pooling resources from the Government of Iceland, the EU, Ireland, Norway, the UK and the US to enhance coordination, sustainability, and impact of shock-responsive social protection (WB, 2024).

Support systems

The **National ID** System includes 97% of Malawians, facilitating access to services like voting, banking, and social protection. The system is interoperable, aiding in taxation, civil registry linkages, and disaster response. There is potential to connect the ID system with the UBR for improved targeting and coordination.

The **UBR** was established in 2016 and is operated by the PRSP team within the MoFEA. It consolidates socio-economic data for flagship programmes like SCTP and CSPWP. As of March 2025, it covers 4.2

million households and 17 million persons which constitutes 77% of all and 96% of rural households across 17 out of the 28 districts. The remaining district is to be included in 2025 and the roll-out to cover urban households is underway. The aim is to update the data every four years identify additional beneficiaries quickly when the SCTP is scaled up in times of crises.

E-Payment systems are active in 15 WB-, Irish Aid- and the Government-funded districts with the remaining 13 German and EU-funded districts planning the switch in 2025. They enhance timeliness, security, and financial inclusion while reducing fraud and operational costs. A fully digitised system would allow for more flexibility in benefit collection and reduce administrative inefficiencies.

There is no fully integrated Monitoring & Evaluation system. Each stakeholder conducts its own evaluation, leading to fragmented reporting. Government initiatives, like the “Learning Agenda”, aim to streamline data collection and reporting. District-level monitoring is hindered by resource constraints, inconsistent data quality, and lack of standardised reporting formats.

A harmonised Grievance and Redress Mechanism was introduced in 2020 and provides a structured mechanism for handling complaints across major social programmes. It includes a call center and a toll-free number, but uptake and effectiveness need improvement. WB-funded programmes still use a separate complaint-handling system, limiting harmonisation.

6.2.2 Anticipatory action/Early warning systems

The flagship of ex-ante mechanism in Malawi’s DRF structure is the SSRLP, which is explained under 6.2.1. The Government, together with the Danish Red Cross and ARC Ltd are working to scale up anticipatory action in Malawi. A meso-level initiative for flood is under development to enhance the capacity of vulnerable communities to anticipate, manage, and recover from large-scale flooding events. The Mitigating Fragility through ADRIFi Programme also aims to strengthen EWS in Malawi. The creation of EWS has become a more central element in recent DRM strategies in Malawi. The 2023 Disaster Risk Management Act outlines the role of EWS and establishes the goal of creating an integrated system for early warnings. The National Resilience Strategy (2018-2030) also establishes early warning as one of four key pillars to break the cycle of food insecurity in Malawi. Lastly, the Disaster Risk Management Policy (2015) aims at strengthening a people-centred EWS. A number of different EWS projects have been implemented throughout the past years which are outlined in the following.

- **The M-CLIMES project (2017 to 2024)** aims at improving and creating new EWS in Malawi. It operates in 14 districts with food security challenges. The project is implemented by the Government, supported by UNDP and funded by the Green Climate Fund and focusses on flood-prone areas by strengthening local capacities to respond to early warnings which should improve disaster planning, monitoring, and resource mobilisation for DRM. Key strategies are the installation of automatic weather stations, hydrological monitoring station, and lake-based weather buoys, as well as creating a strategy for the dissemination of risk information with the ultimate goal of increasing the time between warning and impact of disasters.
- **The CREWS initiative** has a four-year project in Malawi aimed at improving the dissemination and preparedness capacity as well as the capacity to respond to these risks. Furthermore, it aims at building the capacity of the national Meteorological and Hydrological Services and supporting the design and establishment of a Disaster Risk Management Fund. Additionally, it aims to create national- and local-level contingency plans based on feedback gathered through community engagement. The project started in 2022 and is expected to end in 2026. The project is implemented by the World Meteorological Organisation and supported by the WB and UNDRR.

- **The FEWS NET** provides information and early warning of potential food security crises. This data system models how food insecurity will develop in different regions in Malawi in the upcoming months and is, combined with satellite data. This is one of the data sources used by the SCTP to release funds in anticipation of droughts.

6.2.3 Disaster risk reduction (adaptation), incl. ecosystem-based adaptation

Malawi has been proactive in addressing DRR and climate change adaptation, integrating ecosystem-based approaches to enhance resilience but fiscal constraints limit government's efforts on DRR. Government allocation for DRR is at MWK 3.9 billion (USD 2.3 million) annually, which is significantly short of the estimated annual DRR costs of MWK 1,983 billion (USD 1.2 billion) (UNDRR, 2022 cf Africa Climate Foundation, 2024). The country requires adaptation funding of around MWK 38,289 billion (USD 23 billion) up to 2040, which is MWK 1,914 billion (USD 1.5 billion) per year. While the majority of climate finance solutions flow into adaptation (particularly in the agricultural sector) there is a large financing gap for adaptation (69%), which is approximately MWK 826 billion (USD 495 million) per year (Africa Climate Foundation, 2024).

Malawi's National Adaptation Programmes of Action prioritise activities such as improving community resilience through sustainable livelihoods, restoring forests in the Upper and Lower Shire Valleys to reduce siltation and water flow issues, and enhancing agricultural production under erratic climatic conditions. These initiatives underscore the country's commitment to leveraging natural ecosystems for climate adaptation. There are several ongoing adaptation projects in Malawi aimed at reducing disaster risks and supporting households and communities adapt to climate impacts.

The Eagles Relief and Development Programme's Environmental and Economic Sustainability Project targeted enhancement of community resilience, with a focus on areas such as food security, climate change adaptation, DRM, health, and income generation. **The Zurich Climate Resilience project by Zurich Foundation** also shares similarly goals, to enhance community resilience to climate hazards. Activities include conducting risk assessments using the Climate Resilience Measurement for Communities tool, building EWSs, and implementing community action plans. Additionally, the project involves advocacy efforts to influence policy changes and secure funding for DRM at local and national levels, ensuring sustainable and scalable resilience interventions. Thirdly, the **WB's Social Support for Resilient Livelihoods Project** is working to improve resilience among the poor and vulnerable population and strengthen the national platform for safety nets in Malawi. And finally, **the Scaling up Climate Resilient Solutions project** aimed at enhancing the productivity and adaptation of agriculture for smallholder farmers in Malawi under a changing climate by improving access to weather information by farmers through Information Communication Technology, promoting farmers access to stress tolerant seeds as an adaptation strategy to climate change, and improving awareness and levels of climate insurance for farmers in Malawi. The CRS project targeted 50,000 beneficiaries from Zomba, Mchinji, Ntchisi, Nkhotakota and Mzimba Districts.

Despite these efforts, Malawi continues to face significant challenges due to climate-induced disasters. Extreme weather events, such as Cyclone Freddy and severe droughts, have led to widespread devastation, affecting millions and straining health systems. These events have resulted in immediate destruction, loss of life, and long-term health issues, including outbreaks of cholera and malaria. The increased frequency and intensity of such disasters highlight the urgent need for effective DRR strategies and robust adaptation measures.



6.3 Conclusion

The current DRF infrastructure remains highly dependent on government borrowing and development aid. Public finance management put a cap of 2% of national budget for unbudgeted expenditures. Government allocation for DRR is at MWK 3.9 billion (USD 2.3 million) annually, which is significantly short of the estimated annual DRR costs of MWK 1,983 billion (USD 1.2 billion).

To mitigate the financial burdens following climate disasters, Malawi has explored pre-arranged financing mechanisms, including insurance schemes and contingent loans. These tools aim to provide timely and predictable funds for disaster response, reducing economic strain and enabling swift recovery. While these instruments provide a financial cushion for climate-related shocks, past experiences, such as the 2015 ARC payout failure due to flawed trigger mechanisms, have highlighted the need for continuous refinement. Despite improvements, reliance on donor-funded premiums raises concerns about long-term sustainability.

Malawi has seen many short-term CDRF pilot projects that have not been sustained in the long-term. This raises stakeholder scepticism about CDRF projects. Challenges such as affordability and a lack of financial literacy have also limited widespread adoption of insurance solutions at the meso-micro-level. Additionally, there is more funds flowing into humanitarian efforts instead of resilience building.

Despite ongoing efforts to layer financial protection solutions, Malawi's DRF framework still faces structural and operational challenges. Strengthening PPPs, improving insurance affordability, and enhancing community engagement are critical next steps. Without a robust, self-sustaining funding mechanism, Malawi's disaster financing system remains vulnerable, limiting its ability to mitigate the economic impact of climate-related shocks.



7. Summary and key findings

This Stocktake Report clearly illustrates the need for sustained CDRF in Malawi. Although Malawi has a number of CDRF solutions especially at the micro-level, the continuity of these projects has been a challenge, with donor funding lasting only a few years. Stakeholders highlighted the need for long-term solutions, moving away from the pilot approach. Short-term implementation of solutions has contributed to stakeholder scepticism on the effectiveness of CDRF solutions.

Increasing frequency and severity of climate shocks will heighten the vulnerabilities of and marginalised populations across all regions in Malawi. The report demonstrates the high levels of vulnerability of the Malawian population with 73% of Malawians living in areas susceptible to climate related disasters. Climate disasters however have a disproportionately negative effect on women, girls, coastal communities, smallholder farmers, people living with disabilities, youth, and elderly.

The country grapples with different disaster types, particularly droughts, intense floods, tropical cyclones (induced by floods), pest attacks and earthquakes, with droughts and floods being the most frequent and severe disaster types affecting a larger number of the population and causing the largest economic losses.

Malawi has developed a comprehensive policy framework for DRM, with Malawi 2063 and other strategic documents identifying DRR as a national priority. However, implementation is hindered by limited funding, particularly at the district level, coordination challenges, and technical capacity gaps, especially in risk assessment.

Key sectors such as agriculture, water, infrastructure, and health are prioritised, yet risk transfer mechanisms are often concentrated on agriculture leaving other sectors with large financial protection gaps. Addressing these gaps through improved public-private coordination, and the expansion of inclusive and diversified financial protection products, whilst leveraging digital tools and existing community-based structures such as VSLAs, cooperatives, associations etc. are essential to build resilience and reduce fiscal vulnerabilities.

There are significant gaps in Malawi's insurance market, particularly for vulnerable groups, and MSMEs. Insurance penetration of 2.5% is above the African regional average but still considered low. Weak or limited distribution channels, digital and physical infrastructure challenges, challenges with affordability, limited financial literacy and awareness, and the lack of diversity of insurance products that fail to meet market needs account for the low uptake of insurance. Limited capacity of the private sector for innovative product design has also been highlighted as a key limitation for developing the insurance market in Malawi.

Despite the high mobile money usage, mobile-based insurance solutions are underdeveloped and regulatory gaps around index-based insurance hinder innovation. Strengthening PPPs, (example with financial service providers and telecommunication companies), expanding digital financial services, and addressing gender and social inclusion barriers are critical to improving uptake of insurance in Malawi.

Although Malawi has a shock-responsive social protection system in place, there is still a need of expanding coverage to other vulnerable districts and increasing the amount of support offered. The UBR is an important tool that needs support for regular updates as well the inclusion of environmental and gender data; this will improve the effectiveness and robustness of disaster relief activities.

Various ministries in Malawi work on CDRF, which demonstrates government's keen interest in addressing climate and disaster risks, yet led to issues of overlapping responsibilities and limited



coordination. A lack of coordination leads to a fragmented implementation of CDRF solutions, which is one of the key challenges the country is facing.

The Gap Analysis report, which is a follow-up report to this stocktake report provides a detailed assessment of the gaps highlighted in this stocktake report and puts forward key recommendations for addressing these gaps.

Annex

A diverse group of stakeholders from the public sector, private sector, development partners and civil society organisations were engaged to ensure a participatory and inclusive process.

Name of organisation	Type of entity	Type of engagement	
		Participation in workshops	Consultations
Ministry of Finance and Economic Affairs	Government	X	X
University of Malawi	Academia	X	X
World Food Programme	Development Partner	X	X
National Statistics Office	Government	–	X
Insurance Association	Private sector	X	X
Reserve Bank of Malawi	Regulator	X	X
Ministry of Agriculture	Government	X	X
Ministry of Gender, Community Development and Social Welfare	Government	X	X
Trocaire	Development Partner	X	X
Care International	Development Partner	X	
Department of Disaster Management Affairs	Government	X	X
African Development Bank	Development Partner	–	X
African Risk Capacity Ltd	Regional Risk Pool	X	X
Civil Society Network on Climate Change	CSO	X	X
GIZ	Development Partner	X	X
OXFAM	Development Partner	X	
Habitat for Humanity	Development Partner	X	X
Luana University	Academia		X
Malawi University of Science and Technology	Academia	X	X

ReInsurance Company	Private Sector	X	X
Development Aid from People to People	NGO		X
Movement for Environmental Action	NGO	X	
UNICEF	Development Partner	X	
Point of Progress	NGO	X	
Timveni Child and Youth Media Organisation	Media	X	
ActionAid Malawi	NGO	X	
Save the Children	NGO	X	
International Labour Organization	IGO	X	
Embassy of Ireland	Donor	X	
Embassy of the Federal Republic of Germany	Donor	X	
World Bank	Development partner	X	
Reunion Insurance Ltd.	Private Sector	X	
Global Risk Modelling Alliance	Development partner	X	
Association of Environmental Journalists	Media	X	
Movement for Environmental Action	NGO	X	
National Local Government Finance Committee	Government	X	

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