Drought finance

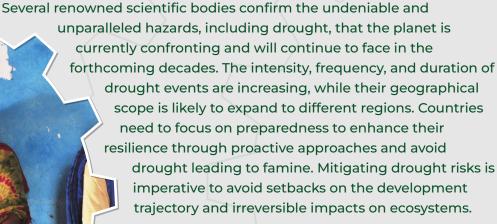
Background

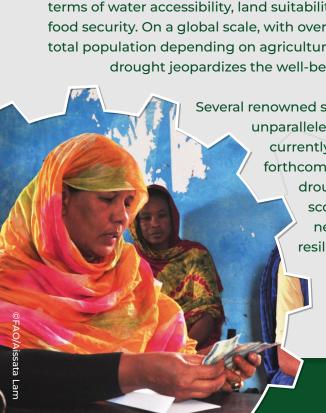
Drought is the most harmful natural hazard. Across all regions, its impacts affect the highest number of people and span across all sectors, with devastating consequences on human beings, the environment, and economies. Drought is a "silent" phenomenon, a slowly-onsetting disaster spreading over time and beyond national boundaries, whose development and long-term outcomes are highly unpredictable and difficult to anticipate.

Agriculture shoulders a significant portion of the burden, particularly in developing nations where it emerges as the most vulnerable sector. In these contexts, rural livelihoods absorb as much as 80 percent of the direct consequences of drought, with negative effects, among others, in

terms of water accessibility, land suitability, crop production, and food security. On a global scale, with over 40 percent of the total population depending on agriculture for a living, it is estimated that

drought jeopardizes the well-being of over 1.3 billion individuals.





Approach

As part of the Drought Initiative established by the United Nations Convention to Combat Desertification (UNCCD), FAO embarked on a comprehensive programme to tackle the multiple dimensions of drought and support countries' preparedness. The programme responds to the Organization's Strategic Framework and reflects on the Programme Priority Area for "Better Life" and "Resilient agri-food systems" calling for implementing measures to reduce vulnerability to socioeconomic and environmental stresses. The "Enabling Activities for Implementing UNCCD COP Drought Decisions" project, funded by the Global Environmental Facility and implemented in collaboration with UNCCD, the World Meteorological Organization, and other partners, recognizes the importance of holistic approaches for integrated drought management and drought risk reduction and aims at enhancing communities' resilience through global



- Intergovernmental Working Group on Drought in support of the effective policy and implementation measures for addressing drought under the UNCCD
- Drought Toolbox in support of utilizing and upgrading the toolbox for planning and mitigation efforts
- Capacity-building for the implementation of the national drought plans in support of the development of national institutional frameworks
- Drought vulnerability assessment and preparedness for mitigation measures in support of the national capacities for drought vulnerability assessment, monitoring and reporting

Complementary to knowledge generation and in-country actions, the programme developed different digital tools and capacity-building activities to promote drought preparedness, including:

Droughts really are changing the planet, around us. They are one of the worst impacts that we will see in terms of the human impacts of climate change

multidimensional interventions.

Louise Baker, UNCCD Global Mechanism Managing Director, UN Climate Change Conference, 7 December 2019 **FAO Drought portal**, a global knowledge-sharing platform to support countries and stakeholders in enhancing drought resilience in agriculture and improving food security;

tive and user-friendly platform for the analysis of international drought finance flow and decision-making.



Drought finance

FAO's work on drought economics and finance

Drought poses a significant threat to economies, ecosystems, and livelihoods worldwide. It is a climate-associated hazard, but it is not solely a consequence of climate change. This implies that, even if endeavors to mitigate climate change yield positive outcomes and some adaptation requirements can be reversed, the risk of drought cannot be completely eradicated. As a result, it is imperative to recognize that financing for drought should not hinge solely on commitments associated with climate change; rather, it should be regarded as a persistent issue that remains unresolved.

Addressing drought risk requires a multifaceted approach that includes innovative financing mechanisms to change risk behaviour, leverage resources, and foster resilience. Mitigating risks and drought adverse impacts can result highly more effective thanks to the elaboration and application of innovative financing mechanisms that can influence risk behaviour while mobilizing resources from both the public and private sectors.

Drought-prone countries and communities can leverage available sources and actors of financing to improve their resilience and enhance preparedness, but these are not easily accessible, as previously reported by FAO.

The FAO Drought programme brings those findings forward in two complementary directions:

- For the finance dimension, it delves into the distinctive characteristics of drought finance to assess its current status and explore innovative pathways to invigorate the current landscape for drought management in agriculture.
- For the economic profile, it takes a broader view to understand the macroeconomic perspective of drought management and investigate the typologies of costs and benefits of proactive drought actions as crucial elements of decision-making processes for drought preparedness.

Drought finance: key messages

Integrated drought management necessitates a fundamental shift in financial approaches. Several challenges have historically limited drought financing, hence innovative financial tools and suitable funding sources need to be explored to address drought impacts and identify pathways to bolster the flow of financial resources.

Innovations in finance are indispensable throughout the entire resilience-building cycle, from financing risk management to post-disaster relief. These innovations must be geared towards improving preparedness and delivering measurable impacts, effectively harnessing finance for integrated drought management.

The implementation of integrated drought management hinges on the availability of reliable and accessible financial resources. Nevertheless, the uncertainty surrounding drought has constrained the availability of resources. Currently, financial sources predominantly reside within the public sector, and both acute and systematic barriers **hinder newcomers from the broad financial domain**. To bridge the financing gap, addressing these barriers becomes imperative, thereby diversifying funding sources.

Drought finance

Drought finance requires coordination among stakeholders at both horizontal and vertical levels, and it is essential to facilitate the **inclusion of the private sector**. Establishing direct connections between beneficiaries and other stakeholders, including academia and financial institutions, represents a valuable approach to enhancing the flow of financial resources.

Innovative financial instruments prove effective in mitigating all drought impacts when employed as a **mix of instruments**. However, a context-specific approach is essential for assembling the most suitable combination of these instruments.

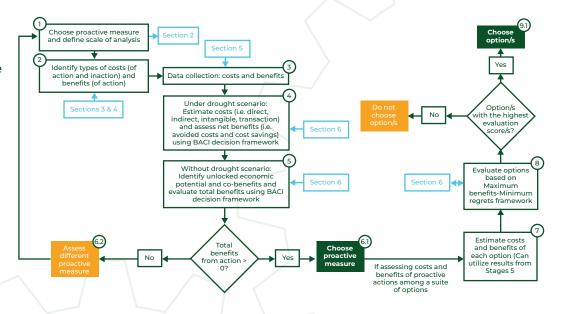
The success of innovation in drought finance depends on how **technology and scientific achievements** can be translated into the development of financial products.



Economics of drought management: key messages

The debate has shifted from whether to invest in proactive drought actions to how to invest due to the increasing threat of more frequent and intense drought events in the future.

There is a need to shift the mindset that perceives proactive actions only as a means to minimize drought impacts, and instead recognize their benefits during non-drought periods as



well. This is required to **break the vicious cycle of the so-called 'hydro-illogical cycle'** that characterizes the myopic behavior of drought-affected stakeholders.

All impacts must be addressed through appropriate actions through overcoming the dilemma of the affordability. To this end, investing in proactive drought measures should undergo **an iterative decision-making process** to determine economically viable options possibly through comprehensive frameworks for all-encompassing assessments. Like this, the most appropriate investment option can be selected without compromising the financial needs. Costs can be distinguished as **pre- and post-drought costs**, where pre-drought cost refers to the cost of the implementation of proactive actions and the post-drought cost is categorized as either the cost of inaction or the cost of reactive actions. Each category can include direct, indirect, intangible and transaction costs. All these costs must be mapped out and estimated to prepare a realistic cost-benefit analysis that, in turn, can support decision-making.

Benefits can be distinguished between **with and without drought scenarios**, and these benefits are accrued simultaneously the moment proactive drought measures are adopted. With-drought scenarios can bring benefits as avoided costs or cost savings, and without-drought scenarios account for benefits such as unlocked economic potential and co-benefits.