

## Journey of Federal Republic of Ethiopia from a Middle Income Country to a Climate Resilient Economy



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#### Introduction

Ethiopia is a Least Developed Country (LDC) located in the North East Africa region, the Horn of Africa. The country is characterized by tremendous diversity of climatic and biophysical settings, ranging from the equatorial rainforest in the south and south-west with high rainfall and humidity. The variation in the biophysical characteristics of Ethiopia ranging from hot, arid desert to mountain ranges accounts for the variation in climate, soil type and cultural practices across the country and reflects the challenges country is facing in addressing the dilemmas of economic growth with green growth and climate resilience pathways.

### National Commitment to Climate Resilient Green Economy

Over the last 5 years, the growth of Ethiopia's economy is among the top five fastest growing in the world, and is double the average for Sub-Saharan Africa. Ethiopia's public investmentled development strategy focuses on increased agricultural productivity, industrial output, export revenue, and public infrastructure. The strategy has generated tangible results in terms of economic growth and improved social conditions including significant reductions in rural and urban poverty. Ethiopia's goal to become a middle-income country by 2025 is thus attainable.

To reach middle-income status and sustain the development gains of recent years, Ethiopia will need to continue to implement its transformational growth strategies and address significant climate change threats. The country's ecological and agricultural systems are fragile and vulnerable to rising temperatures and

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changing weather patterns that are likely to impact critical seasonal rainfall levels. This is compounded by population pressure and stretched natural resources, especially the management and utilization of land. Furthermore, Ethiopia ranks 173 out of 187 countries on the UNDP's 2013 Human Development Index (HDI), with food insecurity persistent for roughly two million Ethiopians. In total, the negative impact of climate change on GDP could be 10% or more by 2050.

The Government of Ethiopia (GoE) clearly recognizes the negative consequences of climate in-action to the country's ongoing and future development, and has therefore prioritized climate resilience in its transition towards a green, sustainable growth model. Indeed, building a CRGE is a crosscutting pillar of the GoE's development agenda for poverty eradication through broad-based, accelerated, and sustained economic development.

In August, 2015, in Addis Ababa, two reports that present climate resilience strategies for the agriculture, forestry, water, irrigation and energy sectors in Ethiopia were launched by the Ministry of Environment and Forest (MEF), the Ministry of Agriculture (MoA) and the Ministry of Water, Irrigation and Energy (MoWIE). These strategies aim to support Ethiopia's goal to achieve middle income status by 2025 through the successful integration of the government's Climate Resilient and Green Economy (CRGE) vision into the five year national economic development framework, also known as Phase Two of the Growth and Transformational Plan (GTP II).

Agriculture and Forestry Climate Resilience Strategy, the Government of Ethiopia's (GoE) Agriculture and Forestry Strategy highlights the need to engage in more climate resilient activities in these two vital sectors, which make up 43% of national GDP and employ 80% of the population. The strategies for these sectors focus on agricultural crops, livestock, forestry, food security and disaster prevention, and are designed to move Ethiopia's economy from agricultural dependence to a greater GDP share based on services and industry. GoE projections highlight the importance of moving away from such a climate vulnerable economic model to a more sustainable and inclusive growth model that simultaneously improves livelihoods in the long term.

Water and Energy Climate Resilience Strategy, The Water and Energy Strategy is designed to effectively leverage these important sectors, which are expected to contribute approximately 7.2 billion USD to the projected GDP growth over the GTPII period. According to this strategy, 42% of MtCO2e savings will come from energy and water activities. Ethiopia's hydropower is largely dependent on rainfall, so assessing and combating the challenges related to rainfall variability, for example, will be critical to food security and livelihoods.

#### NDCs and Global Actions on Climate Change

Ethiopia was the first least-developed country to submit its Intended Nationally Determined Contributions (INDCs) to the UNFCCC, this only demonstrate the commitment of the county to climate change and resolve to safeguard community and natural resources from adversities. Signatories to the Paris Agreement set out what they intend to achieve by way of emissions reductions in their Intended Nationally Determined Contributions (INDCs), which were submitted to the United Nations Framework Convention on Climate Change (UNFCCC). Upon ratification of the Agreement, these became Nationally Determined Contributions (NDCs), in most cases without change.

Governments are now formulating plans for the delivery of NDCs. Collectively, the NDCs fall far short of what will be necessary to achieve the goals of the Paris Agreement. However, the Agreement provides an opportunity for countries to review progress and revise their NDCs every five years, beginning with a facilitative dialogue in 2018. It will be a major challenge for the parties to the UNFCCC to ensure that revised NDCs are as ambitious as possible and include all feasible energy emissions savings.

Ethiopia aims to increase power generation capacity by a considerable amount, mainly

through several large hydropower schemes. The success is in doubt after controversy about sustainability, including the challenge of mitigating the considerable downstream effects on neighbouring countries. Beyond satisfying its own growing demand, Ethiopia aims to become an exporter of electricity, which would require investment in an extensive distribution grid.

Ethiopia's NDC would lead to a reduction of at least 64% below the Ethiopian business-asusual (BAU) scenario by 2030, when emissions including Land Use, land use change & forestry (LULUCF) are projected to reach 400 Metric Ton CO2e (MtCO2e). The corresponding Greenhouse Gas Emission (GHG) reduction target for 2030, excluding LULUCF, is 40% below BAU, or 185 MtCO2e, which is the emissions level used to rate the emissions reduction target. Full implementation of the NDC is conditional on finance, technology transfer and capacity building support under the framework of Ethiopia's Climate Resilient Green Economy Strategy (CRGE) strategy, which is integrated in its national development plan GTP II (Second Growth and Transformation Plan).

The mitigation efforts will focus primarily on the forestry sector, which is expected to contribute with a reduction of 130MtCO2e. Ethiopia also intends to use international carbon credits to meet its target.

Ethiopia's NDC is based on the Climate Resilient Green Economy Strategy (CRGE) strategy, which is integrated in its national development plan GTP II (Second Growth and Transformation Plan). If policies are successfully implemented, the NDC target could be achieved in 2030. Uncertainty remains on the effectiveness of current policies in place, which is reflected in a range of current policy projections.

Reducing vulnerability and building resilience to safeguard human security and to achieve the SDGs is another key pillar of the NDC. An important component of Ethiopia's contribution includes actions to build resilience and enhance adaptation to the impact of climate change. Given that 80 percent of the population depends on agriculture for their livelihoods increasing the resilience of agriculture is a priority for Ethiopia. This includes addressing the high vulnerability of the sector to droughts and floods. The NDC explicitly refers to co-benefts of mitigation and adaptation actions in regards to forestry and agriculture by maximizing the synergies between adaptation and mitigation. Many of the measures involving forestry and agriculture can provide substantial economic and livelihood benefits to Ethiopians. Respective adaptation needs are further specified in the CRGE and the National Adaptation Programs of Action (NAPA), including the institutional establishment of improved coordination of disaster risk management and adaptation; education and awareness raising on effective adaptation and disaster risk management from the local to the national level; enhanced emergency preparedness and response; enhanced local livelihood and community resilience for all Ethiopians; and an integrated approach to climate-sensitive development planning.

While Ethiopia considers their NDC a full national commitment to be undertaken without pre-conditions, international support for the implementation of both mitigation and adaptation action is critical for success. Altogether, Ethiopia's NDC can be considered an ambitious response to the significant challenges to stay at 1.5°C and to deal with the enormously challenging risks for Ethiopia as a LDC. This is true with respect to the enabling institutional framework described, the inter-ministerial approach and the ambitious targets and priority actions.

#### The Implementation Modalities for Sustainable Future

Implementation has institutional, procedural and thematic dimensions. At the institutional level, Ethiopia has set up a management framework for the CRGE. The inter-ministerial approach ensures national commitment and alignment across the government. The inter-ministerial management framework is led by the Environmental Council and the Technical Committee, which oversees the implementation of the strategy through six technical committees (Agriculture, Electric power supply, Building and green cities, Transport, Industry, and Health) to meet its ambitious growth targets while keeping GHG emissions low. This set-up reflects very well Ethiopia's strong commitment and demonstration of climate leadership at the highest levels of the government, including the Office of the Prime Minister and the concerned line ministries.

At the procedural and legal/policy level, legal frameworks and policies need an upgrade to ensure proper NDC implementation, well aligned with the SDG implementation roadmap and the NAPA. This should include the revised NAP and revised guidelines and a checklist to ensure the mainstreaming of the CRGE as well as the full integration of gender and human rights measures into the country's climate strategy. Ethiopia may also benefit from continuous intense cooperation with international partners and services provided by the NDC Partnership. The general objective of the CRGE is to improve and enhance the health and quality of life of all Ethiopians and to promote sustainable social and economic development through the sound management and use of natural, human-made and cultural resources and the environment as a whole so as to meet the needs of the present generation without compromising the ability of future generations to meet their own needs.

At the level of thematic priorities, the CRGE includes the following, which are broadly consistent with the NDC. However, is to further develop these thematic priorities into more specific flagship programmes for action, including related investment plans. It is further recommended to identify lighthouse projects under each of the programmes for action, which demonstrate step-by-step how programmes turn into reality. Each should include clearly visible sustainable development co-benefits and linkages to Ethiopia's GTP II/CRGE. To scale up Enhanced Climate Action in Response to 1.5°C of Global Warming: Scaling Up Nationally Determined Contributions there is need to create more ambitious inclusive green growth development plan with measurable indicators and timeline which are in sync with NDC.

# Conclusion: Climate Safe Future for Ethiopia

Due to both its high vulnerability to climate change

and its envisioned leadership for ambitious climate action, Ethiopia has a huge potential to provide an enabling policy and legal framework to guide climate action consistent with 1.5°C pathways in alignment with sustainable development planning and disaster risk reduction. Building on existing frameworks, policies and the NDC, it is recommended to develop a number of national flagship programmes and related lighthouse projects, comprehensively addressing the most burning climate risks and impacts in a targeted and inclusive way. More programme to cover food security, water management, climateresilient livelihoods, renewable energies, and non-economic and economic loss and damage shall be integrated, designed and implemented in a participatory way, creating triple wins of adaptation, GHG mitigation, and sustainable development, and mobilizing international cooperation and support.

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