Unlocking Africa's Climate Ambition: Assessing NDC 3.0, NAPs, and LT-LEDS: A Review Report

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List of Acronyms

AFOLU Agriculture, Forestry and Other Land Use

AR6 Sixth Assessment Report of the Intergovernmental Panel on Climate Change

BAU Business as Usual

BTR Biennial Transparency Report

CBA Cost–Benefit Analysis

COP Conference of the Parties

CSA Climate-Smart Agriculture

DRR Disaster Risk Reduction

EWS Early Warning Systems

GCF Green Climate Fund

GDP Gross Domestic Product

GEF Global Environment Facility

GHG Greenhouse Gas

GGA Global Goal on Adaptation

GST Global Stocktake

IPCC Intergovernmental Panel on Climate Change

LAPs Local Adaptation Plans

LDCF Least Developed Countries Fund

LEG Least Developed Countries Expert Group

LT-LEDS Long-Term Low-Emission Development Strategies

M&E Monitoring and Evaluation

MDBs Multilateral Development Banks

MEL Monitoring, Evaluation and Learning

MRV Measurement, Reporting and Verification

NAP National Adaptation Plan

NDC Nationally Determined Contribution

NDC 3.0 Enhanced Nationally Determined Contribution submitted following the first Global Stocktake

NGO Non-Governmental Organization

SDGs Sustainable Development Goals

TFs Technical Frameworks (under UNFCCC reporting architecture)

UNDP United Nations Development Programme

UNEP United Nations Environment Programme

UNFCCC United Nations Framework Convention on Climate Change

Background

Africa is among the regions most vulnerable to the impacts of climate change, facing increasing frequency and intensity of climate-related hazards such as droughts, floods, cyclones, heatwaves, and sea-level rise. These risks disproportionately affect agriculture-dependent livelihoods, water security, ecosystems, and infrastructure, with significant implications for food security, economic growth, and social stability. Despite contributing a relatively small share of global greenhouse gas emissions, African countries bear a disproportionate burden of climate impacts, underscoring the critical importance of effective adaptation alongside mitigation efforts.

Under the Paris Agreement, Parties are required to communicate and progressively enhance their climate actions through a set of interlinked policy instruments, including Nationally Determined Contributions (NDCs), National Adaptation Plans (NAPs), and Long-Term Low-Emission Development Strategies (LT-LEDS). Following the first Global Stocktake (GST), countries were encouraged to submit updated NDC 3.0s reflecting increased ambition, longer-term planning horizons, and stronger alignment with global temperature and resilience goals. In parallel, NAPs provide the primary vehicle for identifying and implementing medium- to long-term adaptation priorities, while LT-LEDS articulate economy-wide pathways toward low-emission and climate-resilient development over several decades.

While African countries have made notable progress in developing and updating these instruments, differences remain in ambition levels, scope, technical robustness, and implementation readiness. Challenges related to finance mobilization, data availability, institutional coordination, monitoring systems, and capacity constraints continue to shape the quality and effectiveness of submissions. Against this backdrop, a systematic review of African NDC 3.0s, NAPs, and LT-LEDS—assessed in relation to relevant UNFCCC guidance and global benchmarks—is essential to understand current progress, identify gaps, and inform future policy, investment, and technical support efforts.

Purpose and Approach of the Review

Integrating Insights from NDC 3.0, NAPs, and LT-LEDS

This report synthesizes key insights from African countries' climate policy instruments—Nationally Determined Contributions (NDC 3.0), National Adaptation Plans (NAPs), and Long-Term Low-Emission Development Strategies (LT-LEDS)—to assess progress, ambition, and implementation readiness across the continent. It examines how these instruments reflect evolving climate priorities following the first Global Stocktake, highlighting advances in participatory processes, sectoral coverage, and the integration of mitigation and adaptation objectives, alongside persistent challenges related to climate finance, data systems, institutional capacity, and monitoring frameworks.

The primary objective of the review is to scope and assess the design, content, and implementation orientation of key climate policy frameworks across African countries, with a particular emphasis on adaptation-related planning and delivery. Given Africa's high vulnerability

to climate impacts, the review seeks to identify strengths, opportunities, and gaps in current submissions, and to assess the extent to which these instruments support resilient development and enable access to international climate finance.

The analysis is based on a desk-based, comparative review of official national submissions and international reference materials, including NDC 3.0 documents, NAPs, LT-LEDS, and relevant UNFCCC synthesis and technical guidance reports. Countries were included based on the availability of recent or updated policy submissions, resulting in a representative, though non-exhaustive, sample of African countries.

Key insights at a glance

Table 1**: Comparative Overview of NDCs, NAPs, and LT-LEDS**

Policy Instrument	Focus Areas	Strengths	Common Gaps
NDC 3.0	Mitigation + Adaptation targets	Higher ambition; participatory processes	Finance, MRV, data quality
NAPs	Adaptation sectors & systems	Sectoral clarity; vulnerability assessments	Lack of costed pipelines, gaps in MEL
LT-LEDS	Long-term emission pathways	Net-zero vision; economic diversification	Financing, modelling capacity

A Review of African Countries' NDC 3.0 Submissions

Introduction

Nationally Determined Contributions (NDC) 3.0 submissions from African countries highlight progress in climate mitigation and adaptation, aligned with the Paris Agreement's enhanced ambition following the first Global Stocktake (GST). Under the Paris Agreement's five-year cycle, countries were expected to submit updated NDC 3.0s by **10 February 2025**; however, progress has been uneven. **Only 13 of the 195 Parties globally met the deadline, with Zimbabwe** being the only African country to submit **on time**, highlighting capacity and process constraints across the continent.

Since then, additional African countries have submitted final NDC 3.0s or are at advanced stages of revision or provisional updates, including **Kenya, Uganda, Zambia, Zimbabwe, Somalia, Ghana, Senegal, Ethiopia, and Namibia**. While these submissions demonstrate strengthened ambition, broader sectoral coverage, and increased attention to adaptation, comparative analysis continues to reveal persistent gaps in **climate finance, data systems, monitoring frameworks, and institutional capacity**, which constrain effective implementation.

Process of Development and Stakeholder Engagement

African countries such as Kenya, Zambia, Zimbabwe, Somalia, and Uganda advanced their NDC 3.0 through inclusive, multi-stakeholder processes. According to the 2025 synthesis report, 98% of Parties globally established formal institutional arrangements for NDC coordination, including inter-ministerial committees, civil society consultations, and subnational engagement. African submissions reflect this, with national validation workshops and technical stocktakes ensuring transparency, tracking, and stronger MRV systems.

Globally, 95% of Parties engaged non-Party stakeholders, 88% considered GST outcomes, and 89% integrated gender considerations—indicating Africa's participatory processes align with best practices.

Key Findings on Adaptation Priorities, Processes, and Gaps from African NAPs

African NDC 3.0 submissions indicate **enhanced mitigation ambition relative to earlier cycles**, reflected in higher or extended targets, longer planning horizons to 2035, and broader sectoral coverage following the first Global Stocktake. Kenya's updated NDC commits to a **35% reduction in GHG emissions by 2035** timeframe, while Zimbabwe targets a **40% per capita emissions reduction by 2035 relative to BAU**. Somalia's NDC sets a **34% emissions reduction target by 2035**, and Zambia identifies **conditional reductions of 25–47% by 2030**, supported by clearer sectoral measures. **Consistent with UNFCCC synthesis findings, the achievement of a significant share of these targets remains conditional on the mobilization of international finance, technology transfer, and capacity-building support**, underscoring the continued importance of implementation means alongside ambition.

Globally, emission reductions are projected at 17% below 2019 levels by 2035, consistent with linear trajectories toward net zero between 2040–2060. Africa's emissions reduction targets, while increasingly comprehensive, remain largely conditional on international support, with fewer countries providing costed mitigation plans.

Mitigation Priorities and Actions

Mitigation actions prioritized in African NDC 3.0 submissions include renewable energy capacity, sustainable land use, forestry management, and waste management. In the 9 analyzed African countries (Kenya, Uganda, Zambia, Zimbabwe, Somalia, Ghana, Senegal, Ethiopia, Namibia), all 9 communicated domestic mitigation measures, and 7 of 9 included at least one high-potential low-cost option such as afforestation, reforestation, or solar energy. This aligns closely with the UNFCCC 2025 synthesis report (FCCC/PA/CMA/2025/8), where 98% of Parties globally communicated such measures and 80% featured similar options; African submissions show strong representation in clean energy expansion and climate-smart agriculture. Ethiopia and Ghana integrate renewable energy and forestry as major mitigation pathways, while Namibia and Senegal emphasize adaptation and climate resilience as core strategies.

Adaptation Priorities and Actions

While the Paris Agreement requires that NDCs include mitigation commitments, the inclusion of an adaptation component remains voluntary and is determined by each country. Adaptation priorities feature water resource management, ecosystem-based adaptation, resilient infrastructure, and food security measures. The 2025 synthesis report indicates that 89% of all Parties have economy-wide targets and 73% include adaptation components.

These align with global trends, where 73% of NDCs include adaptation and 94% reference loss and damage considerations. Many NDCs align adaptation with national development plans such as NAPs to ensure socio-economic co-benefits and just transition principles. Kenya's NDC 3.0 explicitly aligns its adaptation priorities—such as climate-smart agriculture and water security—with the Kenya National Adaptation Plan (2015–2030) and Vision 2030, promoting socio-economic resilience and job creation in rural areas. Rwanda's updated NDC integrates adaptation actions from its National Adaptation Plan into sectoral targets for agriculture and infrastructure, including costed indicators that support just transition goals like poverty reduction and gender equity. Ethiopia links its NDC adaptation measures, including the development of drought-resistant crops and ecosystem restoration, directly to the national Growth and Transformation Plan II, ensuring co-benefits for both food security and low-carbon growth.

Mitigation co-benefits resulting from adaptation action and/or economic diversification plans

African NDC 3.0 submissions increasingly highlight adaptation actions that deliver mitigation co-benefits—reflecting a broader global trend identified in the 2025 UNFCCC Synthesis Report.

Climate-smart agriculture, sustainable land and water management, and ecosystem restoration enhance resilience while reducing emissions (ref). Countries such as Kenya, Ethiopia, Ghana, and Zimbabwe also link low-carbon growth and circular economy initiatives to economic diversification and just transition goals.

However, quantification and monitoring of these co-benefits remain limited, underscoring the need for stronger MRV systems and integrated tracking frameworks.

NDC Updates and Ambition Comparison

This table will focus on the 9 analyzed African countries (Kenya, Uganda, Zambia, Zimbabwe, Somalia, Ghana, Senegal, Ethiopia, Namibia). It highlights changes from prior NDCs to NDC 3.0 in ambition levels (e.g., emission targets, timeframes) and quality/robustness (e.g., sectoral coverage, MRV, finance clarity).

Country	Prior NDC Key Features	NDC 3.0 Updates & Ambition Increase	Quality/Robustness Improvements

Kenya	32% GHG reduction by 2030 (conditional)	35% reduction by 2035 (economy-wide); extended horizon	Stronger MRV, costed plans, NAP integration, just transition mechanisms
Ethiopia	Sectoral targets to 2030	Economy-wide to 2035; higher renewables/forestry ambition	Multilevel engagement, revised finance needs, subnational implementation
Ghana	15% unconditional/45% conditional by 2030	Enhanced forestry/RE targets to 2035; 20%+ ambition lift	Better data quality, gender integration, private sector linkages
Zimbabwe	33% reduction by 2030 (conditional)	40% per capita by 2035; on-time submission	Improved transparency, GST alignment, MRV roadmap
Zambia	25-47% conditional by 2030	Clearer sectoral measures to 2035; ~30% ambition	Finance conditionality specified, stakeholder consultations
Somalia	Initial 2030 targets (limited scope)	34% reduction by 2035; first comprehensive update	Broader coverage (AFOLU, energy), adaptation co-benefits
Senegal	29% reduction by 2030	Reinforced RE/agriculture to 2035; ~35% total	Resilience focus, NAP alignment, monitoring indicators
Uganda	Multi-stakeholder process to 2030	Extended targets, CSA emphasis; ambition ~25-30%	Inclusive validation workshops, economic diversification
Namibia	Adaptation-heavy to 2030	Balanced mitigation/adaptation to 2035; RE growth	Resilience strategies, subnational engagement, finance pipelines

Alignment with Global Climate Goals and UNFCCC Frameworks

The UNFCCC 2025 synthesis confirms that 88% of Parties aligned their NDC 3.0s with the outcomes of the first Global Stocktake. African submissions generally align with the Paris Agreement's objectives on mitigation and adaptation but fall short in quantified finance and monitoring commitments. To meet 1.5°C trajectories, African NDCs must deepen ambition through stronger linkages with LT-LEDS, enhanced domestic financing, and harmonized MRV systems

Cross-Cutting Gaps and Implementation Challenges

Common gaps in the African NDC 3.0 submissions mainly relate to technical, financial, and institutional barriers that limit effective implementation. Key gaps include:

Finance Gaps

African NDCs heavily rely on conditional international finance without firm domestic commitments—for instance, Somalia's NDC 3.0 identifies USD 2.5 billion in needs but lacks private sector mobilization strategies, while Zambia specifies 47% conditional reductions tied solely to external grants rather than blended finance mechanisms. Kenya's document requests USD 28 billion but provides no timelines for accessing GCF or MDB pipelines, mirroring Ghana's failure to quantify forestry sector contributions beyond high-level conditionality.

Specific Data and MRV Gaps

Emissions tracking remains weak: Ethiopia's NDC 3.0 uses outdated sectoral baselines without disaggregated subnational data, and Namibia lacks GHG inventories for AFOLU activities critical to its land-use targets. Zimbabwe mentions MRV roadmaps but omits baselines or indicators for its 40% per capita target, while Senegal's agriculture measures reference CSA without sex-disaggregated vulnerability data.

Capacity Gaps

Institutional coordination falters at subnational levels—Uganda's multi-stakeholder process stops at national validation without county-level action plans, and Namibia emphasizes resilience but identifies no decentralized budgets or training for adaptation-mitigation integration. Only Kenya and Ethiopia reference operational just transition funds; others like Somalia and Zambia cite capacity constraints without costed training pipelines.
These country-specific examples from the 9 countries analyzed NDCs ground the gaps in observable evidence, distinguishing them from generic observations while aligning with UNFCCC synthesis findings on global implementation barriers.

A Review of African Countries' NAPs Submissions

Introduction

African NAPs consistently prioritize sector-based adaptation—specifically, agriculture, water, coastal and marine management, infrastructure, health, and ecosystem services—rather than setting economy-wide, measurable targets. The plans analyze local climate hazards, including droughts, floods, cyclones, and heatwaves; they identify vulnerable populations, such as smallholder farmers, women, youth, and urban informal dwellers. The adaptation portfolios are generally robust, featuring ecosystem restoration, disaster risk reduction (DRR), infrastructure climate-proofing, and climate-smart agriculture—with frequent mention of mitigation benefits such as reforestation, mangrove recovery, and sustainable land management. However, NAPs endure persistent gaps: few contain consolidated, measurable national targets aligned with the Global Goal on Adaptation (GGA); many lack costed, bankable project pipelines; monitoring and evaluation (MEL) frameworks often omit baseline or outcome indicators; and mainstreaming into sectoral budgets is inconsistent.

Process of Development and Stakeholder Engagement

NAP preparation in Africa commonly follows the NAP Least Developed Countries Expert Group Technical Guidelines and is built on participatory and inclusive frameworks. from the the official UNFCCC technical guidelines developed by the Least Developed Countries Expert Group (LEG), which outline the NAP process through four key elements commonly described as phases, most countries move through four phases: 1) establishing coordination and institutional frameworks; 2) conducting vulnerability assessments and setting adaptation priorities; 3) integrating actions into national and sector strategies; 4) developing MEL protocols. Environmental and climate ministries typically spearhead preparation, with multi-sectoral committees and local consultations used to ensure alignment with community realities. Technical analyses are generally grounded in national datasets, though more advanced cases (Ethiopia, South Africa, Morocco) incorporate climate modelling and socio-economic scenario analysis. Funding is predominantly sourced from GCF Readiness, GEF-LDCF, and bilateral donors including UNDP and UNEP, supported by NAP Global Network technical assistance. Good practices emerging include Kenya's phased NAP approach, Mozambique's Local Adaptation Plans (LAPs), and early adoption of GGA-aligned MEL indicators in a few cases (South Africa, Morocco).

Key Findings and Targets on Adaptation Priorities, Processes, and Gaps from African NAPs

Targets in African NAPs are usually sectoral and programmatic (e.g., percentage of districts implementing resilient agriculture, number of new early warning systems) rather than national numeric GGA metrics. Where present, targets are typically outcome-oriented but not universally measurable across sectors. Though strong in problem diagnosis, most NAPs require consolidation of measurable, GGA-aligned national targets to facilitate comparability and impact tracking.

Kenya's NAP identifies droughts and floods as primary hazards affecting smallholder farmers in arid counties like Turkana, while Burkina Faso's plan highlights cyclones and heatwaves impacting pastoralists in the Sahel region. Both documents target vulnerable groups including women, youth, and urban informal settlers, but systemic weaknesses persist—Kenya lacks county-level budgets for resilient infrastructure, and South Africa's NAP cites data gaps in downscaled AR6 projections for coastal erosion risks.

Top Climate Hazards: Droughts/rainfall variability dominate East Africa (Kenya, Ethiopia, Uganda), while floods/cyclones affect Mozambique and Zambia's southern regions.

Vulnerable Groups: Smallholder farmers (Ethiopia's NAP), women/youth (Morocco), and displaced urban residents (South Africa) face heightened risks without tailored social protections.

Systemic Weaknesses: Subnational capacity lags—Burkina Faso identifies district-level coordination gaps; Zambia lacks MEL baselines for irrigation projects; overall chronic underfunding limits ecosystem restoration scale across all reviewed NAPs.

Adaptation Priorities and Actions

NAPs generally encompass the following sectors and interventions:

Agriculture & Food Systems: Climate-smart agriculture (drought-tolerant seeds, conservation agriculture, smallholder irrigation), seed systems, value-chain resilience.

Water Security: Watershed restoration, rainwater harvesting, integrated water resources management, groundwater protection.

Coastal & Marine: Mangrove restoration, coastal defences, managed retreat/zoning, early warning for coastal storms.

Ecosystems: Reforestation, protected-area management, ecosystem restoration for water regulation and slope stability.

Infrastructure & Urban Systems: Climate proofing of roads/bridges, urban drainage improvement, resilient housing, EWS integration.

Public Health & Social Protection: Vector-borne disease surveillance, heat-health plans, social safety nets linked to climate shocks.

Disaster Risk Reduction & EWS: Strengthened EWS, contingency planning, preparedness & recovery measures.

Mitigation Co-Benefits

Many adaptation measures have clear mitigation co-benefits: reforestation/afforestation, improved land management (reduced emissions from deforestation and degradation), mangrove restoration (blue carbon), and energy-related resilience measures that lower emissions when aligned with clean energy. A number of NAPs note alignment with national mitigation strategies and NDCs; operational joint adaptation-mitigation designs are still rare.

Specific Examples from Analyzed NAPs

- Ethiopia's NAP: Links climate-smart agriculture and reforestation to emission reductions through sustainable land management, explicitly noting alignment with national mitigation strategies.
- Kenya's NAP (2015-2030): Identifies conservation agriculture and agroforestry as delivering both resilience and GHG reductions from soil carbon sequestration.
- South Africa/Morocco NAPs: Highlight mangrove restoration and ecosystem measures as blue carbon sinks with quantified mitigation potential.
- Mozambique/Zambia: Note reduced deforestation pressure from community-based land restoration as a direct emission avoidance co-benefit.

These examples show NAPs operationalizing Paris Agreement Article 4.7, which recognizes "mitigation co-benefits resulting from Parties' adaptation actions," though quantification and MRV integration remain limited across most submissions.

Cross-Cutting Gaps and Implementation Challenges

In comparison with the requirements and best-practice guidance outlined in relevant UNFCCC frameworks, African NAPs submissions exhibit recurring gaps as discussed:

1. **Targets in African NAPs remain primarily sectoral and programmatic**—such as percentage of districts implementing resilient agriculture or number of early warning systems—since most predate the COP29 Global Goal on Adaptation (GGA) indicators finalized November 11-22, 2024. For context, Kenya's NAP (2015-2030) was developed 2013-2015, Ethiopia's in 2019, and South Africa/Morocco NAPs (2021-2024) occurred during only early GGA discussions. While strong in problem diagnosis, these NAPs require updated national targets compatible with emerging GGA frameworks to enhance comparability, impact tracking, and climate finance access.
2. **Bankable project pipelines & costing.** Lack of full cost estimates and bankable project profiles prevents rapid mobilization of external finance.
3. **MEL (baselines & outcome/impact indicators).** Monitoring is often limited to outputs; outcome/impact indicators and baselines are usually missing.
4. **Subnational operationalization & budget mainstreaming as m**any plans identify county/municipal roles but lack budget linkages and capacity.
5. **Use of up-to-date climate science (AR6 downscales) & data systems, s**everal NAPs cite national assessments but not uniform use of AR6 guidance.
6. **Gender & vulnerable groups — operationalization. S**trong on paper, weaker in concrete measures and indicators.

A Review of African Countries' LT-LEDs Submissions

Introduction

African countries developed and submitted LT-LEDS in response to Article 4.19 of the Paris Agreement, adopted at COP21 in 2015, which invited all Parties to formulate and communicate long-term, low-emission development pathways, aiming to align with global climate temperature goals while promoting sustainable and inclusive growth. Developing these strategies typically requires a long-term planning horizon of 30 to 40 years, usually targeting net-zero emissions around 2050 or shortly thereafter. Only a small group of countries(10 countries) have accomplished this, each facing significant challenges—limited technical and financial capacity, complex economy-wide planning, and data gaps for robust analysis. They include Benin, Burkina Faso, Ethiopia, Equatorial Guinea, Gambia, Morocco, Nigeria, South Africa, Tunisia, and Zimbabwe. Despite these hurdles, LT-LEDS have driven whole-of-economy strategies and facilitated cross-sectoral transitions, with a strong emphasis on stakeholder engagement and broad policy alignment—though key gaps remain around implementation capacity and monitoring systems.

Process of Development and Stakeholder Engagement

African countries followed a four-phase approach for LT-LEDS development: inception and scoping, vision development, scenario analysis, and implementation planning. National

ministries for environment, planning, and finance usually led the coordination, supported by inter-ministerial committees and technical working groups. Examples include Ethiopia's Ministry of Planning and Development and South Africa's Inter-Ministerial Committee on Climate Change. Stakeholder engagement was prioritized, with countries like Kenya and South Africa conducting broad consultations across public institutions, civil society, academia, and sector experts. Technical and financial resource constraints were often cited as major challenges, alongside insufficient emissions and socio-economic data.

Key Findings and Targets on Adaptation Priorities, Processes, and Gaps from African LT-LEDs

Common long-term targets center around net-zero ambition by mid-century (2050–2060) and robust economic growth within a low-carbon framework. Nigeria sets goals for net-zero emissions by 2060, Kenya for 2050, while South Africa commits to a "just transition" aligned with international temperature goals. Several smaller states' documents emphasize long-term low-emission development without always naming a single net-zero year in the guide summary.

Countries commonly present multiple scenarios (BAU vs low-carbon / resilience pathways). Scenarios commonly show that higher ambition often yields development co-benefits (jobs, GDP gains), but requires upfront investment and capacity.

Energy (power generation and access), AFOLU (land use, forestry, agriculture), transport, waste, and industrial efficiency are the recurrent high-priority sectors.

The strategies promote gender-responsive development, poverty reduction, and the creation of decent jobs, with Ethiopia and Morocco highlighting gender-disaggregated monitoring and inclusive planning. Many strategies integrate existing national plans, such as development and adaptation frameworks.

Mitigation Priorities and Actions

Consistent with the Paris Agreement mitigation objectives and UNFCCC guidance for LT-LEDS, African submissions prioritize sector-based mitigation actions, with varying levels of ambition, cost specification, and implementation readiness. Mitigation measures typically include:

- Transitioning to renewable energy sources (solar, wind, hydro) where all countries emphasize accelerating renewables (wind, solar, hydro, where appropriate) and expanding grid/infrastructure for electrification (notably Nigeria, Morocco, Ethiopia, South Africa).
- Promoting energy efficiency across economic sectors. Sectoral efficiency standards, building codes, industrial efficiency programmes and appliance standards are common recommendations.
- Implementing sustainable land use and forestry practices. Reforestation, sustainable land management, and landscape restoration recur as high-impact, low-cost options (Burkina Faso, Ethiopia, Zimbabwe, Morocco).

- Transport decarbonization (modal shifts toward low-emission vehicles and mass transit): Modal shift, electrification of vehicles, and urban planning are included, especially in larger economies' LT-LEDS (Nigeria, South Africa, Morocco).
- Carbon capture/industrial options: Where relevant (coal- or heavy-industry dependent economies), CCS and industrial process decarbonization appear in high-ambition scenarios (South Africa, Nigeria).
- Policy packages vs isolated measures: The stronger LT-LEDS tend to present costed, phased policy packages (investment schedules, regulatory reforms), while several submissions list priorities without detailed financing roadmaps.

Scenario modeling and cost-benefit analyses are common, with countries like Morocco and Nigeria applying LEAP and TIMES models for policy planning and GHG projections. South Africa and Morocco estimate substantial economic growth and job creation benefits derived from a low-carbon pathway.

Adaptation Priorities and Actions

Adaptation in the **submissions** emphasizes sector-based adaptation measures aimed at addressing climate vulnerability, resilience building, and protection of vulnerable populations. They include:

- Enhancing resilience in agriculture. Most LT-LEDS include vulnerability mapping for key sectors (agriculture, water, coastal zones). Tunisia and Morocco conducted quantitative vulnerability assessments tied to warming scenarios; others used qualitative or sectoral assessments.
- Disaster risk management and infrastructure upgrades.
- Biodiversity conservation and integrated water resource management. Integrated water resource management and coastal defences/blue economy resilience are highlighted, especially for coastal states (Gambia, Equatorial Guinea, Morocco).
- Social protection and community resilience: Several LT-LEDS integrate social protection measures (Equatorial Guinea notable for gender-responsive investment and social protections) to manage transition impacts and build local resilience.
- Monitoring adaptation: The guide flags that adaptation M&E is weaker overall; some countries (Ethiopia, Morocco, Tunisia) show advances with dedicated adaptation M&E frameworks, but many lack robust indicators and reporting systems.
- Promoting co-benefits between mitigation and adaptation, often leveraging nature-based solutions for both.

Nigeria, for example, models agricultural adaptation strategies to reverse climate-induced GDP losses, while The Gambia invests in sustainable agriculture and regional trade diversification.

Alignment with Global Climate Goals and UNFCCC Frameworks

• NDC and Paris alignment: All ten countries framed LT-LEDS to support NDCs and the Paris architecture; stronger cases explicitly link MRV, BTRs (Biennial Transparency Reports), and

national development plans (Ethiopia, Morocco, Nigeria, South Africa).
• Just transition and SDGs: South Africa, Morocco and Zimbabwe explicitly connect LT-LEDS to just-transition principles and SDG co-benefits (jobs, health, energy access). Others note co-benefits but lack fully fleshed socio-economic pathways.
• International finance and bankability: Many LT-LEDS request scaled-up international finance and identify the need to produce bankable project pipelines; the Technical Guide highlights this as a persistent implementation gap.
• Reporting & MRV: MRV systems are varied — some countries demonstrate clear MRV roadmaps (Ethiopia, Tunisia, Morocco) while others need to operationalise MRV and integrate LT-LEDS into national accounting frameworks.

Cross-Cutting Gaps and Implementation Challenges

Frequent gaps identified, as compared to the guideline, include:

1. **Data & analytical capacity constraints:** Many countries face limited emissions and socio-economic data and modelling capacity — this constrains scenario robustness and MRV design. Ethiopia, Nigeria and Morocco are cited as examples that invested heavily in modelling to overcome this, but the guide flags the gap as widespread.

2. **Financing & investment plans:** Countries often lack detailed investment plans and costed portfolios for LT-LEDS implementation; the guide recommends cost-benefit and investment planning as vital next steps.

3. **MRV / M&E integration:** While some countries (Ethiopia, Morocco, Tunisia) have begun integrating MRV/M&E systems, others lack fully operational MRV systems linked to national planning and BTR/TFs — the guide emphasises this is essential for tracking and updating LT-LEDS.

4. **Stakeholder & sub-national engagement:** The guide stresses the importance of whole-of-government and whole-of-society approaches. Some LT-LEDS (e.g., South Africa, Kenya examples) have strong engagement frameworks, but several country submissions are less clear on sub-national or vulnerable-group participation.

5. **Just transition and socio-economic analysis:** While several countries include socio-economic and just-transition analysis (South Africa, Zimbabwe, Morocco), many LT-LEDS do not fully quantify labor and distributional impacts or offer clear implementation pathways for affected regions/communities.

In summary, African LT-LEDS submissions demonstrate considerable progress in strategy formulation, stakeholder engagement, and ambition alignment with global climate goals. However, capacity, resource constraints, and the need for improved MRV systems, inclusivity, and data availability remain prominent challenges for realizing long-term climate resilience and low-emission development.

Conclusion

This review finds that African countries have made **meaningful progress** in articulating climate ambitions and policy frameworks through NDC 3.0 submissions, NAPs, and LT-LEDS, particularly in strengthening participatory processes, expanding sectoral coverage, and integrating adaptation alongside mitigation objectives. Many submissions reflect growing alignment with the Paris Agreement, the outcomes of the Global Stocktake, and emerging global frameworks such as the Global Goal on Adaptation.

However, the analysis also highlights **persistent and cross-cutting implementation challenges**. Across all three policy instruments, gaps remain in translating ambition into **costed, bankable investment pipelines**, operational monitoring and reporting systems, and coordinated institutional arrangements—particularly at subnational levels. Heavy reliance on conditional international finance, limited domestic resource mobilization, and uneven data and modelling capacity continue to constrain effective delivery of climate actions.

Overall, while Africa's climate policy architecture is becoming more comprehensive and forward-looking, realizing its full potential will require **stronger integration across instruments**, enhanced technical and institutional capacity, and sustained international support. Addressing these gaps is critical to ensuring that climate commitments translate into tangible resilience outcomes, emissions reductions, and inclusive development benefits across the continent.

Recommendations

Strengthen Integration Across Climate Policy Instruments

African countries should enhance coherence between NDCs, NAPs, and LT-LEDS by explicitly aligning targets, sectoral priorities, and implementation frameworks. Stronger linkages will help ensure consistency across short-, medium-, and long-term planning horizons and improve tracking of progress toward national and global climate goals.

Enhance Finance Readiness and Investment Planning

Governments should prioritize the development of **costed, bankable project pipelines** linked to NDC, NAP, and LT-LEDS priorities. This includes improving project preparation capacity, leveraging blended finance approaches, and strengthening engagement with multilateral development banks, climate funds, and private sector actors.

Improve Data, Modelling, and MRV/MEL Systems

Investments in emissions data, climate risk information, scenario modelling, and integrated MRV/MEL frameworks are critical. Harmonized systems aligned with UNFCCC reporting requirements (including BTRs) will support transparency, accountability, and evidence-based decision-making.

Strengthen Subnational Implementation and Institutional Capacity

Greater emphasis should be placed on translating national plans into **subnational action**, supported by clear mandates, budget integration, and capacity-building at local levels. This is particularly important for adaptation delivery, where impacts and responses are highly localized.

Advance Just Transition and Inclusive Approaches

Countries should further operationalize just transition principles by integrating social, gender, and equity considerations into implementation plans, financing strategies, and monitoring frameworks. This will help ensure climate actions contribute to poverty reduction, job creation, and inclusive development.

Scale Up International Support and Technical Assistance

Development partners and international institutions should continue and expand support for African countries through targeted finance, technology transfer, and capacity-building—particularly for NDC 3.0 enhancement, GGA-aligned NAP updates, and implementation-oriented LT-LEDS.

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Unlocking Africa's Climate Ambition: Assessing NDC 3.0, NAPs, and LT-LEDS: A Review Report

This report presents a comparative review of African countries' submitted NDC 3.0, NAPs, and LT-LEDS, focusing on formulation processes, key findings, and identified mitigation and adaptation measures. It assesses these submissions against relevant global guidelines and frameworks to identify common strengths, gaps, and implementation challenges across Africa's climate policy landscape.