POWERING CLIMATE ACTION

ALIGNING SDG 7 WITH NATIONALLY DETERMINED CONTRIBUTIONS

21 AUGUST 2024

GGEEA Growing Government Engagement in Energy Access

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SOUTH SOUTH NORTH TOWARDS CLIMATE RESILIENCE

African Climate Action Partnership

UKaid from the British people

Transforming Energy Access

Overview of webinar

1. Welcome
2. Overview of the agenda
3. Introducing Paris Agreement & NDCs
4. Country experiences
5. Financing and Innovation
6. Closing & final remarks

Introducing Paris Agreement & NDCs

Minky Groenewald
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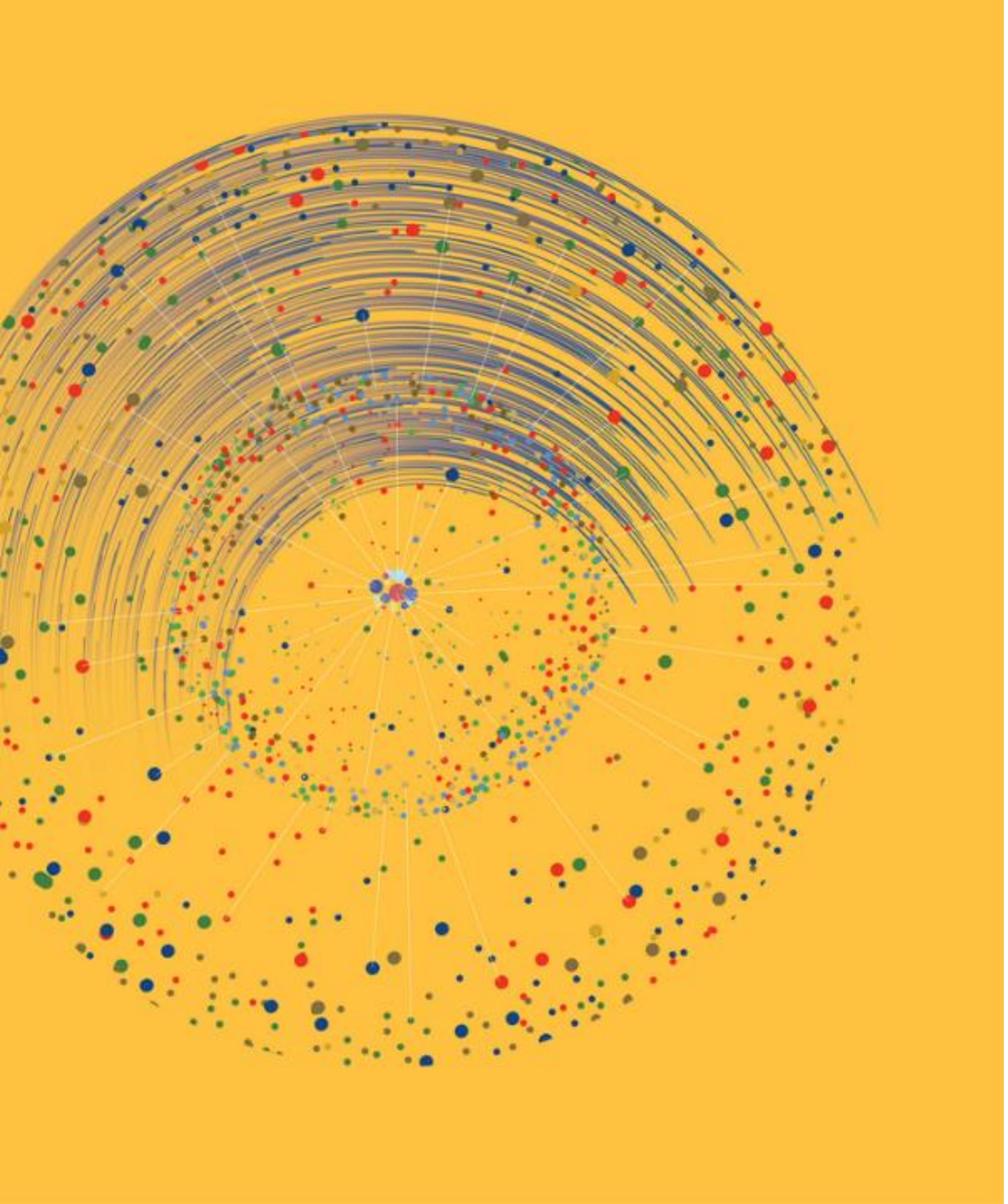

United Nations
Climate Change

RCC East and Southern Africa
Collaboration for Climate Action

Paris Agreement & NDCs: Advancing Mitigation and Energy Access Goals

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UNFCCC RCC EASA

About RCC East and Southern Africa

Partnership

RCC East and Southern Africa

Collaboration for Climate Action

Established in 2013 by UN Climate Change in partnership with the East African Development Bank (EADB), RCC EASA supports governments, NGOs, and the private sector across 19 countries in advancing climate action.

As a key regional hub under the UNFCCC, RCC EASA provides hands-on support through technical assistance, capacity building, and strategic networking. It facilitates access to climate finance and clean development resources, helping countries implement their climate commitments under the UNFCCC, Kyoto Protocol, and Paris Agreement.

Website: [About RCC EASAfrica | UNFCCC]

Geographical Coverage

Eastern Africa (10 Countries)

- Eritrea
- Ethiopia
- Kenya
- Mauritius
- Rwanda
- Seychelles
- South Sudan
- Tanzania
- Uganda
- Zambia

Southern Africa (9 Countries)

- Angola
- Botswana
- Eswatini
- Lesotho
- Malawi
- Mozambique
- Namibia
- South Africa
- Zimbabwe

Thematic Climate Support Support

Goal 1

AMBITION

Maximize the magnitude and extent of commitment to climate action

Goal 2

IMPLEMENTATION

Facilitate implementation of climate action to achieve commitments

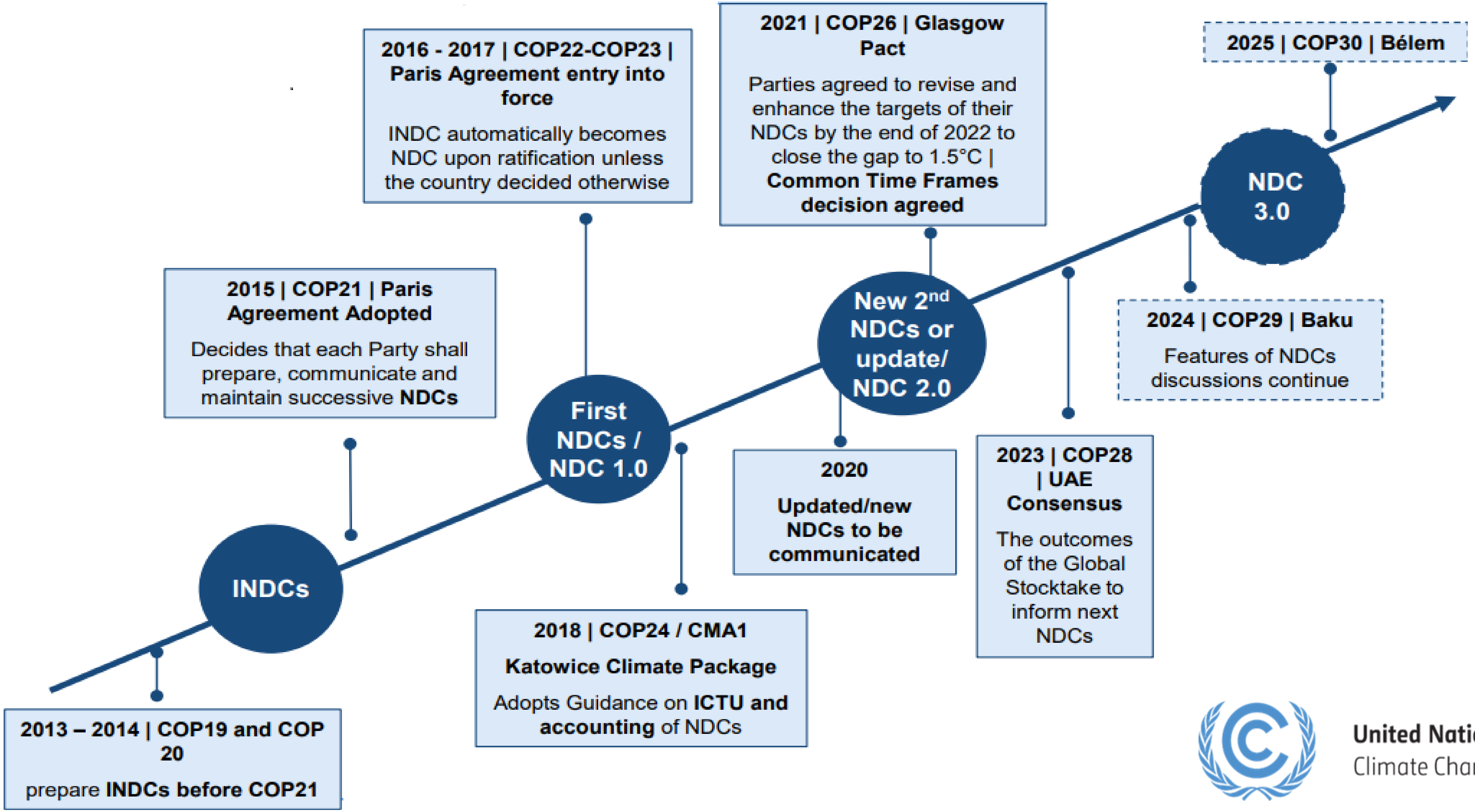
Goal 3

PARTNERSHIPS AND COORDINATION

RCC oversight and regional climate action coordination

Mitigation	NDC and LT-LEDS	Article 6 and Carbon pricing
Adaptation	NAPs	
Transparency	ETF	
Means of Implementation	Finance	
Sustainable Development and Participation	Non- Party Stakeholders	
Intergovernmental Processes	Capacity Building for Negotiatons	Climate Weeks

10 YEARS OF CLIMATE AMBITION: THE HISTORY OF NATIONALLY DETERMINED CONTRIBUTIONS



United Nations
Climate Change

NATIONALLY DETERMINED CONTRIBUTIONS

Definition & Purpose

- NDCs are actions that Parties to the Paris Agreement plan to undertake to address climate change.
- They emphasize a "bottom-up" approach where contributions are "nationally determined" according to each country's circumstances and priorities.

Key Requirements

•Can include mitigation, adaptation, finance, technology transfer, capacity building, and transparency (Article 3)

•Primary means for communicating GHG emission reduction plans **(Article 4)**

NDCs are foundational to achieving the Paris Agreement's goals

Limit warming to well below 2°C and pursue efforts to limit to 1.5°C

Enhance adaptation and climate resilience efforts

Align financial flows with low-emissions, climate-resilient development

Progressive and Successive NDCs

Each Party must prepare, communicate, and maintain successive NDCs (Article 4.2)

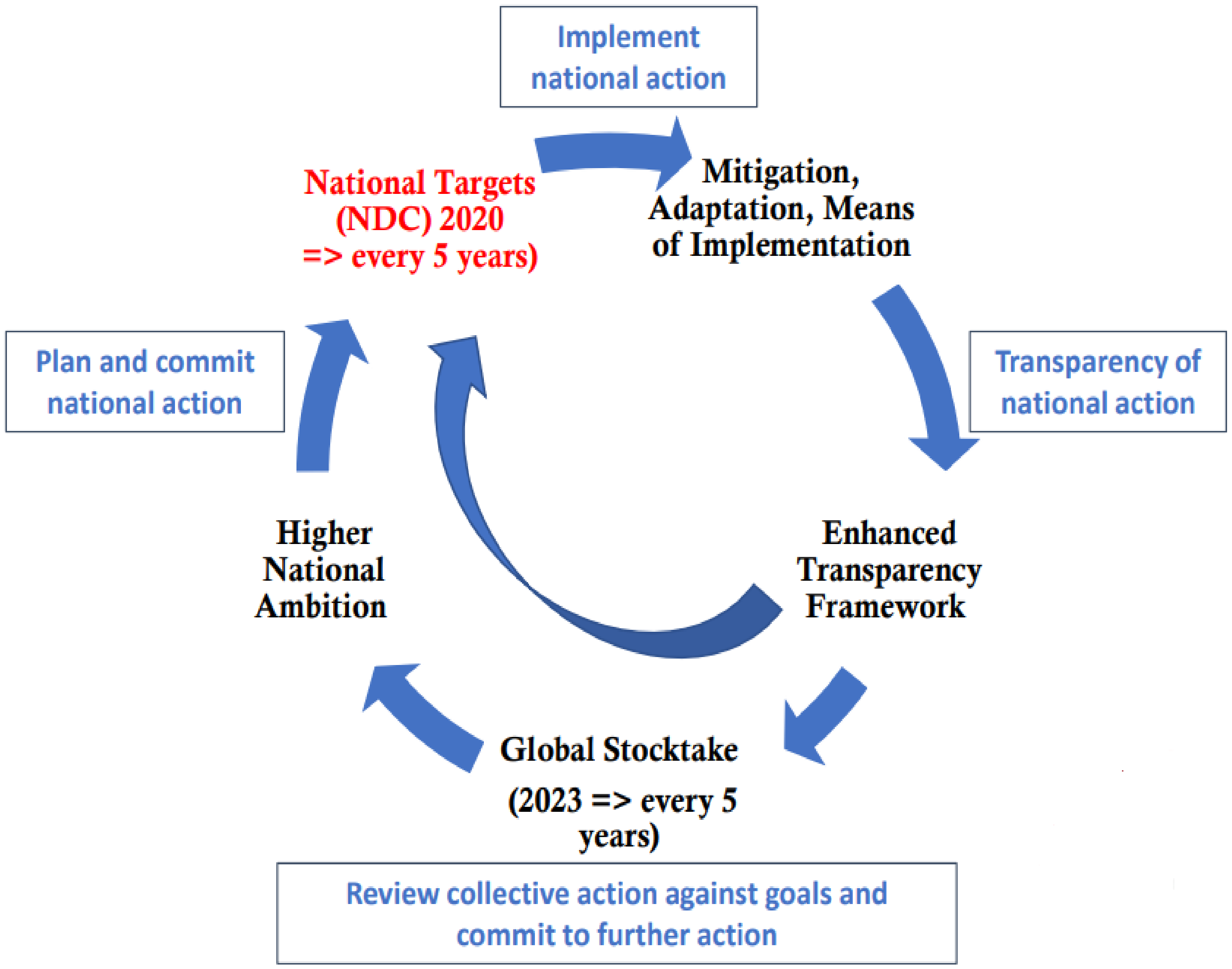
Each successive NDC must represent progression beyond the current one (Article 4.3)

All Parties must provide information for clarity, transparency, and understanding (Article 4.8)

NDCs must be communicated every five years (Article 4.9)

AMBITION CYCLE

Progress is tracked at both national level (**Article 13**) and global level through the Global Stocktake" every five years, which informs the next round of NDCs.



KEY ENERGY SECTOR TRENDS AND MEASURES IN NDC

- 99% of Parties outlined domestic mitigation measures as key tools for achieving their NDC targets, with energy supply being the most frequently addressed priority area (95% of Parties).
- Among the most cost-effective mitigation options (under USD 20/tCO_2eq) identified by Parties and aligned with IPCC AR6 pathways:
- Solar energy: Communicated by 51% of Parties, with a potential reduction of 3.3 Gt CO_2eq/year.
- Wind energy: Included by 36% of Parties, with a potential reduction of 3.08 Gt CO_2eq/year.
- Industrial energy efficiency: Targeted by 30% of Parties, offering a reduction potential of 1.14 Gt CO_2eq/year

KEY ENERGY SECTOR TRENDS AND MEASURES IN LT-LEDS

Renewable Energy Integration

- 99% of LT-LEDS include plans to increase renewable energy in electricity systems.
- Supporting measures include:
  - Strengthening electricity grids (81%)
  - Expanding energy storage (63%)
  - Integrating energy systems across sectors (49%)

Energy Efficiency Across Sectors

- All LT-LEDS emphasize multisector energy-efficiency improvements, with specific measures including:
  - Buildings (93%)
  - Industry (79%)
  - Appliances (72%)
  - Road transport fuel efficiency (71%)

Infrastructure and Urban Planning

- Long-term infrastructure planning is central to energy sector mitigation:
  - Public transport improvements (87%)
  - EV charging infrastructure expansion (68%)
  - Urban development with bike lanes/pedestrian zones (63%)
  - Off-grid renewable energy access and large-scale power plants (35%)

Overview GST OUTCOMES (2023) Decision 1/CMA.5

Significant collective progress towards the Paris Agreement temperature goal has been made, from an expected 4°C increase to an increase in the range of 2.1–2.8 °C

- Current NDCs would **reduce emissions on average by 2% by 2030** compared to 2019
- Limiting global warming to 1.5°C requires deep, rapid and sustained reductions in GHG emissions **of 43 per cent by 2030 and 60 per cent by 2035 relative to the 2019 level** and **reaching net zero CO2 emissions by 2050**
- Notes the **implementation gap and resolves to act to urgently address this gap**. The next round of national climate plans must deliver a dramatic step up in climate action and ambition.

By 2030

- Tripling renewable energy capacity and doubling energy efficiency improvements by 2030
- Substantial reduction of non-CO_2 emissions, especially methane, by 2030

By Mid-Century

- Transition away from fossil fuels in a just, orderly, and equitable manner
- Net zero emission energy systems using zero/low-carbon fuels by mid-century

Energy

- Phase-down of unabated coal power
- Accelerate zero- and low-emission technologies including renewables, nuclear, CCS, and hydrogen
- Reduce emissions from road transport via infrastructure and zero/low-emission vehicles
- Phase out inefficient fossil fuel subsidies

Biodiversity and Ecosystems

- Preserve and restore nature and ecosystems including marine and land ecosystems
- Support efforts to halt and reverse deforestation and forest degradation

NDC Process 2025

NDC Ambition Requirements: Para 39: Encourages Parties to come forward in their next NDCs with ambitious, economy-wide emission reduction targets, covering all GHGs, sectors and categories and aligned with limiting global warming to 1.5 °C, as informed by the latest science, in the light of different national circumstances

Para 164-171: Recalls the NDC process for new 2025 NDCs

Submission Timeline

- Submission of new NDCs by 2025 – mandatory for all;
- 2025 NDCs to be submitted 9 to 12 months in advance of the CMA 7
- 2025 NDCs with an end date of 2035
- Notes the capacity challenges of the LDCs and SIDS related to preparing and communicating NDCs

Content Requirements

- 2025 NDCs to be a progression beyond the Party's current NDC and reflect its highest possible ambition
- 2025 NDCs to provide ICTU information – mandatory for all
- 2025 NDCs to use adopted accounting approaches – mandatory for all
- 2025 NDCs to provide information on how the preparation of the NDC has been informed by the outcomes of the GST – mandatory for all

- **Notes the importance of aligning NDCs with LT-LEDS, and encourages Parties to align their next NDC with their LT-LEDS**
- **Invites all other Parties to communicate or revise, by CMA 6 (November 2024), their LT-LEDS towards just transitions to net zero emissions by or around mid-century, considering different national circumstances**

INTEGRATING ENERGY ACCESS WITH CLIMATE ACTION

Policy Alignment

- Integrate SDG 7 targets into NDCs and LT-LEDS to ensure energy access is treated as a climate priority.
- Harmonize national energy and climate policies to avoid conflicting goals and promote coherence.

Inclusive Planning

- Engage local communities and vulnerable groups in energy planning to ensure equity.
- Use disaggregated data to reflect rural vs. urban energy needs and tailor interventions accordingly.

Technology Deployment

- Promote decentralized renewable energy systems (e.g., solar mini-grids, clean cooking solutions).
- Support energy efficiency improvements across sectors - buildings, transport, and industry.

Financing Mechanisms

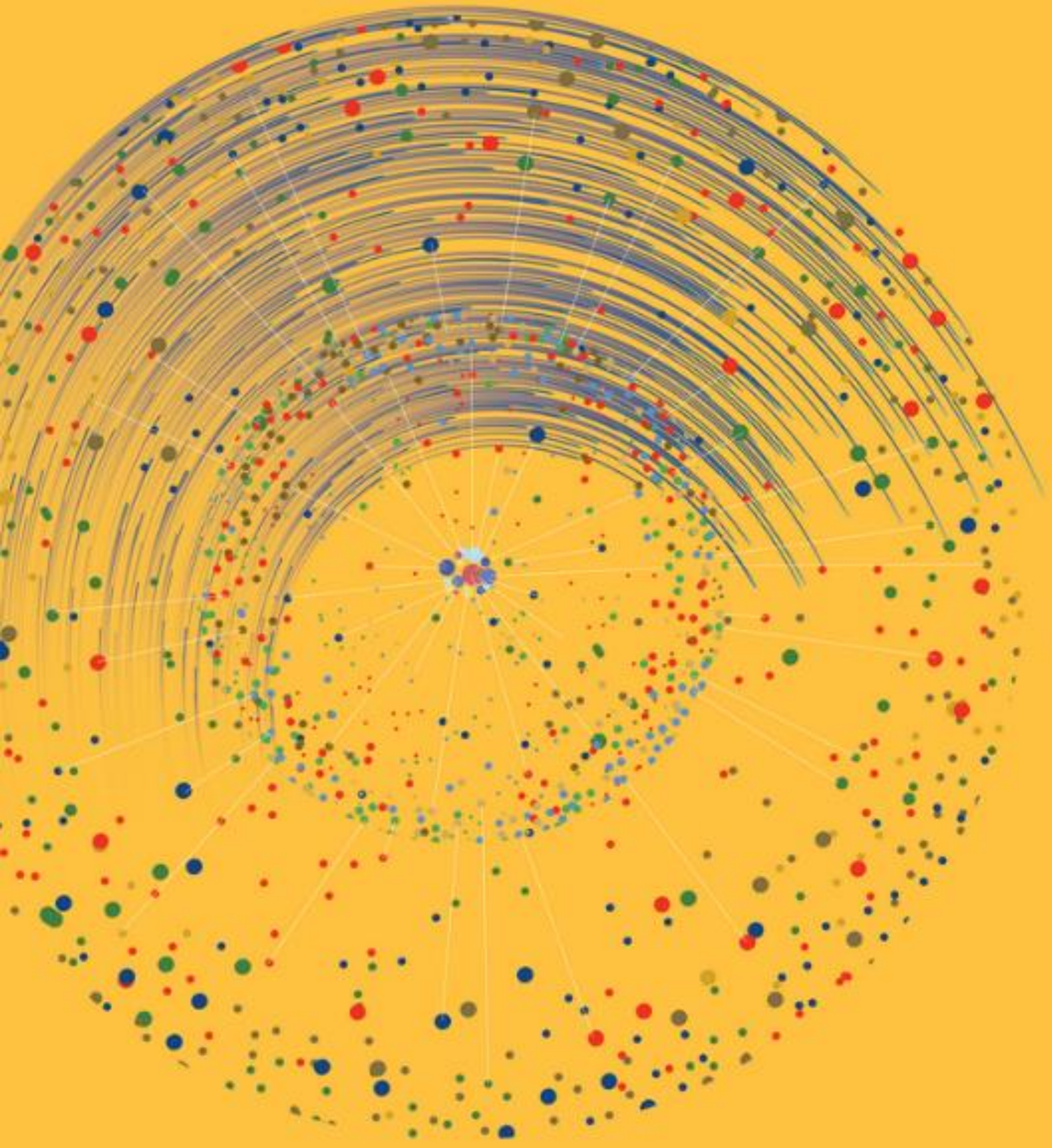
- Leverage climate finance to support clean energy infrastructure.
- Encourage public-private partnerships and innovative financing models

Monitoring & Reporting

- Use SDG 7 indicators within NDC tracking frameworks to monitor progress on energy access.
- Strengthen transparency systems to report on both climate and development outcomes.

Capacity Building

- Invest in technical training and institutional capacity to support integrated planning and implementation.



RCC East and Southern Africa

Collaboration for Climate Action

Country experiences

Esther Wang'ombe

Linking Climate action to energy access and SDG7

Kenya country experience

By Esther Wang’ombe, OGW (Director, Renewable Energy)
State Department for Energy
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Kenya

21st August 2025

Introduction

- Kenyan economy relies heavily on natural resources that are susceptible to the impacts of climate change (drought, floods, and sea-level rise).

- Kenya has a devolved, two-tier government consisting of a national government and 47 county governments, with defined spheres of power and functions.

- National Government:

✓ responsible for formulating policies to ensure the country transforms into a low-carbon, climate-resilient development pathway;

✓ designing programs to deliver its obligations under the United Nations Framework Convention on Climate Change

- County Governments implement national policies

Climate change governance

i. **Climate change Act 2016-** continues to guide the nation's response to Climate Change both at the national and sub-national level.

- Through this framework, several Climate Change Action Plans, including the NCCAP, the NAP and the updated NDC were developed.
- Act amended in September 2023 to provide a legal framework for the regulation of carbon markets

ii. NDC

In 2020, Kenya submitted its updated NDC to the United Nations Framework Convention on Climate Change (UNFCCC), in line with the Paris Agreement and pledged to increase its ambitions by reducing 32% of the GHG emissions relative to the business-as-usual scenario by 2030

Kenya’s New NDC (2031-2035)

- builds on existing national policies and legal frameworks

✓ the Constitution of Kenya (2010),

✓the Climate Change Act (2016),

✓ Kenya’s Long-Term Low-Emission Development Strategy (LT-LEDS).

- Focus on green energy transition, ensuring that Kenya’s economy thrives in harmony with environmental sustainability

- to be implemented from 1st January 2031 to 31st December 2035,

iii. The National Climate Change Action Plan (NCCAP)

- serves as the key planning document to mainstream and implement climate change actions outlined in the NDC.

iv. **The National Long-Term Low Emission Development Strategy (LTS)**

- assesses the country's emission reduction potential and estimates the level of investment needed
- the strategy outlines key targets and actions to be implemented, delivering on the strategy's objectives
- aligns with existing national climate change action plans and the country's development plan

Role of the State Department for Energy in SDG7, NDC, LTS

Achievements

- Sustainable Development Goal 7, focuses on ensuring access to affordable, reliable, sustainable, and modern energy for all. The goal emphasizes increasing the share of renewable energy, improving energy efficiency, and enhancing international cooperation for clean energy research and technology.
- A focus on Renewable Energy development: Approximately 90% of electricity supplied to Kenya's national grid is from renewable energy sources.
- Geothermal energy is the leading renewable source of electricity in Kenya followed by Hydropower. Kenya is also home to the Lake Turkana Wind Project, the largest wind farm on the African continent

- Kenya electricity access: national access levels rose from approximately 30% in 2014 to over 75% by 2024. Target to increase access to electricity from 75% to 100% by 2030
- urban areas already achieving full access
- extensive transmission network, including three regional interconnectors that support cross-border electricity trade.
- The Last Mile Connectivity Project (LMCP), launched in 2015; has reduced the number of people without access by nearly half in just under a decade.
- off-grid solar adoption accounting for most solar home systems
- off-grid solutions in remote and underserved communities have become a key part of Kenya’s electrification strategy.
- Double energy efficiency improvement by 2030

Challenges

- Critical challenges still exist, necessitating the need for urgent, strategic and coordinated interventions.

✓ Approximately 25% of Kenyans still do not have access to electricity, with rural areas having low access

✓ Kenya has significantly improved access to clean cooking solutions over the past decade, with an access rate of about 10% in 2013 to over 30% in 2023. Despite this progress, millions of households across Kenya still rely on polluting fuels such as firewood, charcoal and kerosene.

✓ Kenya's power networks face high losses – estimated at 23% in 2023 – due to technical issues, theft, and billing problems

✓ Climate finance flows in Kenya still fall short of what is needed to achieve the NDC

Future energy plans

- Rehabilitate and expand power generation, transmission and distribution capacity at competitive costs.
- Increase the share of renewable energy in the energy mix, leveraging on the abundant renewable energy resource potential of the country to enhance energy security and achieve the national climate goals
- Mobilize funding for energy projects from public and private sources
- Increased regional integration

Conclusion

- The energy sector supports SDG7 by promoting affordable, reliable, sustainable and modern energy for all
- Kenya is well-positioned to meet its long-term energy and development goals. Has strong policy frameworks, a skilled workforce and a high renewable energy potential
- The country is paving the way toward a more inclusive, sustainable and secure energy future.

Asanteni

Thank you

Finance and Innovation

Aimee Tredoux

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Climate Finance as a Catalyst for Climate Action

Bridging the Gap Between NDCs and SDG7

Aimee Tredoux, Project Manager and Research Assistant

21 August 2025

Context

- **Climate finance:** a critical enabler of NDCs & SDG7
- Ambition remains out of reach without strategic finance
- How can climate finance — both traditional and innovative — can support countries in implementing climate action, with a focus on **bridging the climate finance gap?**

SSN TOWARDS CLIMATE RESILIENCE

The Climate Finance Gap

- Article 2.1(c) of the Paris Agreement → *align financial flows with low emissions and climate resilient development*
- Developing countries need $5.9–6.8T by 2030
- Africa: $240B/year for energy; $180B clean energy
- Africa receives only a tiny fraction (≈3.3%) of global climate finance flows[1].
- Only about 23% of the investment needed for African NDCs is currently met[2].
- To meet NDC targets, climate finance flows to Africa must roughly quadruple each year through 2030[1].
- The finance shortfall is most severe for adaptation and the poorest, most vulnerable countries
- **Annual gap:** ~$4T; projected $7.5T by 2030

SDG7 (Energy Access) & NDC Synergies

- ~600 million Africans lack electricity (≈40% of population)[3]; ~70% lack clean cooking facilities.
- Universal access (SDG7) must be achieved with low-carbon energy to meet NDCs.
- Clean energy access drives development and lowers emissions simultaneously.
- *Case:* AU's SDG7 Initiative mobilizes private capital for 10 GW of renewables by 2025, linking energy access and NDCs

Finance Flows for Climate Action

There is a need to move from **input-based → outcome-based finance**

Finance must match scale of ambition for low-carbon, climate-resilient development

Structural solutions required, not just political pledges

Financing Mechanisms

- **Blended finance:** combine concessional + commercial capital
- **Guarantees & risk mitigation:** mobilize private investors
- **Taxes/levies:** fossil fuel, air travel, financial transactions
- **Innovative instruments:** catastrophe bonds, performance-linked financing
- **Public finance:** grants, concessional loans, guarantees
- **Private finance:** equity, debt, green bonds, sustainability-linked loans
- **Innovative mechanisms:** catastrophe bonds, climate-resilient debt clauses, levies

1 Key Mechanism – Blended Finance

- *Concept:* Combine concessional public funds (grants/loans) with private capital to reduce risk and leverage scale.
- Example: The Nordic-backed EEP Africa program used donor funds (~€50M) to catalyse 200+ private-led solar and clean energy access projects[5].
- OECD notes an annual $2 trillion gap to meet SDGs/climate; leveraging limited public funds through blending is essential[6].
- Such instruments (soft loans, guarantees, green bonds) make marginal projects bankable and attract commercial investors.

2 Key Mechanism – Carbon Markets

- Carbon trading (Article 6 credits) can unlock new revenue for African mitigation projects (renewables, forestry, etc.)[7].
- Properly designed, carbon markets become a *co-benefit* rather than a diversion – they fund emission reductions and technology transfer while financing NDC projects[7].
- Integrity is critical: UNDP emphasises that credits must reflect real emission cuts, and host countries should get a fair share[8].
- *Example:* Nigeria’s 2025 Carbon Market Activation Policy aims to generate ~$2.5 billion in credits by 2030 and has launched a national registry under ACMI

3 Key Mechanism – Off-Grid & Smart-Grid Investments

- Off-grid solar (home systems, mini-grids) delivers clean power to rural areas and displaces diesel/fuel use.
- *Example:* Rwanda’s Renewable Energy Fund provided local-currency credit lines to banks for off-grid solar (SHS & mini-grids), spurring private loans to entrepreneurs[10].
- Donor grants and blended vehicles have financed mini-grid pilots and last-mile solar in Nigeria, Rwanda, Uganda, etc. (e.g. Nigeria’s rural mini-grid program, and EU’s GET.invest support for women-led off-grid firms)[11].
- Smart grids and distribution upgrades (e.g. digital meters, loss reduction) are also priority investments, often funded via concessional loans and guarantees as renewables scale up.

Country Examples – South Africa & Nigeria

- **South Africa:** Its 2011–2020 REIPPPP auctions drew **US\$16+ billion** in private investment for ~5.2 GW of wind/solar[12]. This public-private program sharply lowered renewable tariffs and advanced NDC targets. SA has also pioneered green bonds: Cape Town's municipal green bonds funded climate adaptation projects (sea defenses, housing relocations) benefiting thousands[13].
- **Nigeria:** Recently finalised a **Carbon Market Policy** to raise ~$2.5 billion by 2030[9]. This fits into its \$410 billion Energy Transition Plan (power, transport, gas, etc.). A new blended Climate Investment Fund will steer public+private capital to mini-grids, e-mobility, green industries[14]. Nigeria also leads "Mission 300" (electricity for 300 million Africans by 2030, AfDB/World Bank-backed)[15], aligning energy access goals with climate finance.

Practical Challenges & Next Steps

- **Align Policy and Planning:** Integrate NDC goals with energy and development plans, budgets and NDC revision cycles. (For example, set up climate finance units, green taxonomies, and align NDC updates with finance pipelines)[16].
- **Mobilise Private Capital:** Lower perceived risks. Use de-risking tools (guarantees, currency hedges, partial-risk insurance) and concessional finance to attract investors[17]. Enhance domestic capital markets (e.g. local currency green bonds) to reduce reliance on expensive foreign debt.
- **Strengthen Institutions:** Build capacity in finance ministries and line agencies (project preparation, MRV, transaction support). Develop national carbon market frameworks and robust regulations as recommended by UNDP[18]. Enhance transparency/tracking so investors trust the process.
- **Regional Collaboration:** Pool resources on cross-border projects (regional grids, pipelines) and share lessons. Coordinate NDC ambitions regionally to build scale (as suggested at recent African NDC forums)

Key Takeaways & Call to Action

- The climate finance deficit in Africa is vast – but targeted solutions exist. **Scale up blended finance and market mechanisms** to bridge the gap.
- Leverage clean energy for universal access: push SDG7-aligned projects that advance NDCs. Emphasise investable pipelines and bankable projects.
- Policymakers must create enabling environments: stable policies, incentives (e.g. tax breaks, tariffs), and clear frameworks. Engage private sector as partners.
- **Act now:** Align NDC ambitions with finance roadmaps. Strengthen institutions and regional cooperation. Mobilise all financing instruments to turn commitments into reality.

Thank you!

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Questions & Answers

Final remarks and closing