Climate Action Tracker

Climate Governance

An assessment of the government's ability and readiness to transform Senegal into a zero emissions society

CAT Climate Governance Series

SENEGAL

August 2022

CLIMATE ANALYTICS

NEW CLIMATE INSTITUTE

CAT Climate Governance Series

Under the Paris Agreement, governments have committed to limiting temperature increase to well below 2°C above pre-industrial levels and pursuing efforts to limit it to 1.5°C. Achieving this objective will require halving global emissions by 2030, reaching net zero CO_2 emissions by 2050 and all gases around 2070, with net negative emissions thereafter.

Governments in all countries play a critical role in enabling this transformation, which involves action from all aspects of society and the economy.

The Climate Action Tracker (CAT) tracks the progress of countries towards achieving the climate targets they have set for themselves under the Paris Agreement and what the combined effect of these commitments and policies mean for global temperature levels at the end of this century.

In this series, the CAT expands on its country analysis to evaluate the ability and readiness of national governments to enable the required economy-wide transformation towards a zero emissions society.

Our assessment focuses on national governments and analyses four aspects of governance covering key enabling factors for effective climate action:

- the political commitment of the government to decarbonisation,
- the institutional framework it has put in place to achieve its emission reduction targets,
- the processes it has established to develop, implement and review mitigation policies, and
- its ability and willingness to engage with relevant stakeholders on policy development.

The Climate Governance Series seeks to offer a standardised and replicable approach to assessing a government's ability and readiness to achieve the required transformation, highlighting positive developments and areas for improvement.

Since 2019, we have been expanding the scope of our coverage. All country profiles are available on our **website**.

http://climateactiontracker.org/publications/climate-governance

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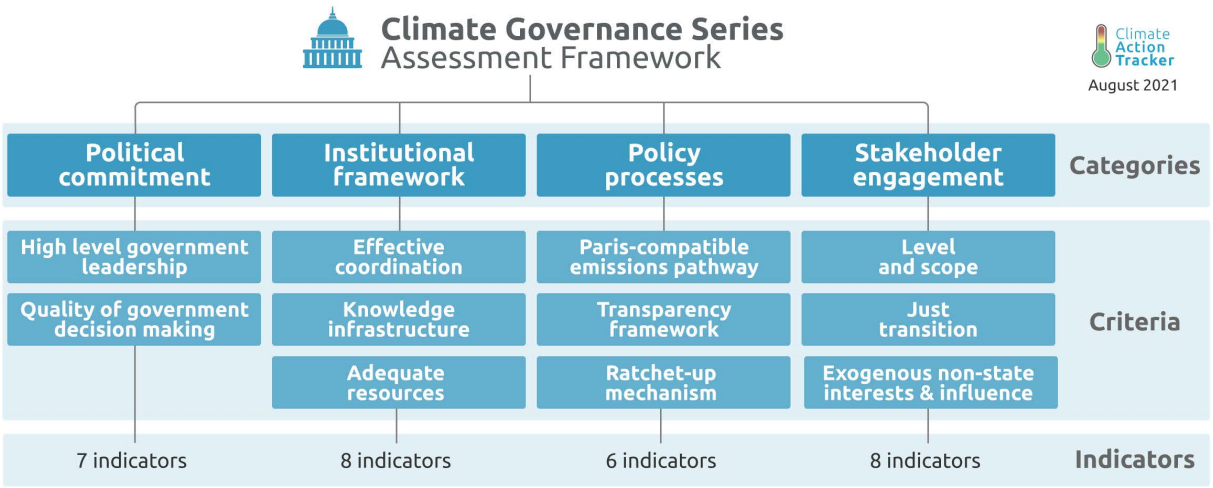
Legend

Understanding our indicators
This report series seeks to produce a standardised and replicable approach to assessing a country's readiness to transition to a zero emissions society. To achieve this, we have assessed a number of possible indicators under four broad categories and eleven criteria. **Criteria** are marked in bold text throughout this document.



Notwithstanding the desire for standardisation, our framework is a living document and we occassionally revise the number or make-up of our indicators. For complete details, see our **methodology page**. This assessment of Senegal is based on our **2021 methodology**.

Understanding our rating system
Our rating system highlights positive developments within countries, identifies areas of improvement, and establishes a basis on which to compare climate governance across countries.

Each individual indicator has been assessed and given a score. The categories and criteria linked to those indicators are then given a rating based on those scores.

Very Poor	**≤ 20% of possible score** This rating indicates that the government is deficient and improvement is necessary.
Poor	**20 – 40% of possible score** This rating indicates that the government is showing a limited level of readiness and improvement is still necessary.
Neutral	**40 – 60% of possible score** This rating indicates that the government is showing some level of readiness, but improvement is still necessary.
Acceptable	**60 – 80% of possible score** This rating indicates that the government is showing a good level of readiness, although improvement is still possible.
Advanced	**≥ 80% of possible score** This rating indicates that the government is performing well, although improvement is still possible and beneficial.

CLIMATE ANALYTICS

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Executive summary

Senegal's government is committed to developing its oil and gas fields. President Macky Sall has openly opposed international efforts to limit financing for fossil fuel development. While the government sees adaptation and resilience, especially in the agriculture sector, as the priority, it pays little attention to the need to decarbonise.

Senegal is progressing in implementing its climate policy. The government has made progress on deploying renewable energy and expanding public transportation. It has also abandoned plans to further develop coal-fired power generation, although continues to pursue its 'gas to power' strategy to shift its electricity production from largely heavy oil fuel to fossil gas. It is unclear whether President Sall will run again in 2024; however, it is unlikely that a change in government would lead to significant changes in climate policy or fossil gas development plans.

The government has made some effort to fight corruption. However, this effort has stalled or even reversed in recent years. There are allegations of corruption regarding some of Senegal's oil and gas deals and in the forestry sector. This may undermine public trust in the government's ability to deliver on its promises around transition-related actions.

The National Committee on Climate Change (COMNACC) coordinates climate action in Senegal. While COMNACC likely ensures that there is broad coordination amongst relevant players nationally, the extent to which it ensures focused inter-ministerial coordination is questionable, given its broad stakeholder participation. Senegal does not have a dedicated inter-ministerial entity that focused on transition related action.

As a result of the limited effective coordination of climate action, the need to transition to a zero emissions society has not been mainstreamed into sectoral policies. While reference to Senegal's NDC or other mitigation measures can be found in some sectoral policies, there is a lack of strategies encompassing all transition-related issues in a given sector. Actions are fragmented between and within ministries.

Senegal does not have an authoritative body with an explicit and clear mandate to provide climate or energy transition-related advice to the government, though some agencies do advise the government on mitigation-related matters and may be capable of playing such a role.

Senegal has a good level of climate finance preparedness in some areas, like mobilising international climate finance. However, other areas, such as incorporating climate considerations into its domestic budget processes, still need work. More broadly, resource constraints are an issue and limit the ability of key institutional players to act.

Senegal does not have comprehensive climate change legislation, though it does have some climate-relevant, sector-specific legislation. The country has not adopted a net zero target and some of its current plans, like shifting to fossil gas in its power sector, are inconsistent with a 1.5°C compatible pathway. The government did start to prepare its long-term low-carbon development strategy in March 2022. Hopefully, the long-term plan will help the country bring its short-term mitigation efforts into greater alignment with a decarbonisation pathway.

The government of Senegal is in the process of developing a transparency framework. A project from the Initiative for Climate Action Transparency (ICAT) led to the proposition of a national MRV system and the preparation of a roadmap for its implementation. Senegal does not have a formal review nor ratchet-up mechanism for evaluating and enhancing climate action. However, it does have some monitoring and evaluation functions as part of its broader planning process, both within the Ministry of Environment and Sustainable Development *(Ministère de l'Environnement et du Développement Durable, MEDD)* and across the government more generally.

Seeking broad buy-in for Senegal's transition-related policies and projects is limited. Stakeholder consultation occurs regularly, but there are questions around its effectiveness. Public views are not often taken into consideration in the development of policies, and some fossil fuel projects, like the ill-fated Sendou coal fired power station, are implemented despite strong resistance from the population.

Senegal's fossil gas expansion plans are inconsistent with a Just Transition and risk creating stranded assets and high levels of unemployment. The oil and gas sector likely has significant influence on the government, while the impact of the renewable energy sector, which is still in its infancy, is likely limited. Senegal is working on developing a roadmap for a Just Transition, as part of the Climate Action for Jobs Initiative.

Polling data suggests there is some public support for reducing emissions, but overall climate literacy is low. While the government is working on a strategy to integrate climate change into the curriculum, the focus of its strategy is only on adaptation.

Category	Criteria	Recommendations
Political commitment	High level government leadership Quality of government decision making	• Strengthen the commitment of government officials from all relevant ministries to the transition, especially the need to accelerate the uptake of renewable energy; • Ensure that all relevant ministries have a mandate to lead on zero emissions transition-related action.
Institutional framework	Effective coordination Knowledge infrastructure Adequate resources	• Strengthen coordination across line ministries and between the central government and local authorities in order to ensure sufficient inter-ministerial engagement; • Strengthen the National Committee on Climate Change (COMNACC) through addressing its long-standing operational constraints; • Establish a new, or mandate an existing, entity to provide transition related advice to the government; • Strengthen efforts to mainstream the need for decarbonisation into sectoral policies; • Continue efforts to improve access by government entities and non-state actors to climate finance; • Increase the MEDD's budgetary allocation and implement a long-term programme to strengthen the Ministry's capacities; • Establish a formal climate-budget tagging mechanism for the Ministry of Finance to support systematic integration of transition-oriented climate actions into the national budget.
Policy processes	Paris-compatible emissions pathway Transparency framework Ratchet-up mechanism	• Adopt a long-term target for net zero emissions, with clear economy-wide and sectoral targets and milestones; • Continue with efforts to develop a long-term low carbon development strategy; • Establish a formal mechanism to integrate long-term zero emissions transition objectives into the design and implementation of short-term sectoral policies; • Adopt a comprehensive climate change law or revise the environmental code to include clear provisions on emissions reduction targets; • Continue with efforts to establish and strengthen the country's transparency framework, including improving access to information online; • Establish a formal ratchet up mechanism to scale up climate action in line with the Paris Agreement's five-year cycle.

Stakeholder engagement	**Level and scope**	• Strengthen public awareness and outreach efforts around climate mitigation; • Include climate change mitigation in the government's education strategy;
	Just transition	• Improve existing stakeholder consultation mechanisms to ensure adequate public participation and buy-in;
	Management of non-state actor interests	• Stengthen efforts to ensure a just transition for all by adopting a comprehensive strategy and by addressing the issues of those negatively affected by the needs of transition.

Contents

1 Introduction

1.1 Domestic context

The Republic of Senegal is located in West Africa and has a population of close to 17 million people, of which 55% live in rural and 45% in urban areas (ANSD, 2020a).

Senegal's economy grew by about 6% annually, between 2014-2019. Growth slowed during 2020 due to the pandemic, but remained positive and bounced back to 6% in 2021 (The World Bank, 2022b). The country has made a number of development gains in the past decade, including reducing the percentage of the population living in extreme poverty and expanding access to electricity (The World Bank, 2022c, 2022a). It now has one of the highest electricity access rates in West Africa (Energy Capital & Power, 2021a). In 2020, there was close to universal access in urban areas, though only about half of the population in rural areas had access (The World Bank, 2022a). The government has committed to universal access by 2025 (MPE, 2019).

In 2012, Macky Sall was sworn in as the Senegal's fourth President since the country gained independence in 1960. He was re-elected in 2019 for a five-year term. Historically, Senegal has been considered to be a stable democracy, with the peaceful transfer of power between political parties for the last two decades (Freedom House, 2022).

However, concerns have been raised over constitutional changes and the targeting of opposition leaders that has undermined the effectiveness of the opposition. Sall has not ruled out running for a third term in 2024, a move made possible by recent constitutional changes. The President's party lost key local elections, including the Mayorship of Dakar in early 2022, which were seen as a gauge of his popularity (Africanews, 2022; Ba, 2022). The President's ruling coalition claims to have won another majority in the Parliamentary elections which took place on 31 July 2022, however these results are contested by the opposition (Dione and Ba, 2022).

Senegal relies on imports to meet its energy demand, which constitutes a significant burden on the country's economy (ANSD, 2020b). In 2018, Senegal adopted a Gas-to-Power Strategy following significant oil and gas discoveries. For Senegal to exploit its natural gas reserves, it would need to build significant infrastructure, including pipelines, LNG terminals and gas-fired power stations. Investing in new fossil infrastructure is a risky strategy, with the potential to create stranded assets, as the world moves to a net zero pathway (CAT, 2022). Government revenues from the projects currently under development are not expected to transform Senegal's economy or public finance, as they are estimated to average 1.5% of GDP (Davis et al., 2021).

Senegal has a small amount of coal-fired power generation, largely from the controversial Sendou coal fired power station. Sendou came online in October 2018, but was shut down less than a year later, in July 2019, due to technical issues (AfDB, 2021). It restarted production in September 2021 at about 60-70% of its original capacity (Khadre, 2021). There was significant local opposition to the plant given its social and environmental impacts (Feiger and Vasudevan, 2021; Financial Afrik, 2017).

The government has indicated that the plant will be converted into gas-fired generation and is seeking a new project sponsor (Sonko, 2021). The original developer is seeking over USD 1bn in damages from the Senegalese government for blocking access of the power plant to the grid (Xalima, 2022). At COP26, Senegal committed to stop building any new coal-fired power generation and to phase out existing generation by the 2040s (UN Climate Change Conference, 2021).

Senegal has a near-term renewable electricity goal of 29.2% of installed capacity by 2023 (Republic of Senegal, 2018b). It is on track to meet this target, having reached 26.7% installed capacity in 2020 (SENELEC, 2020). Senegal generated around 17% of its power from renewables in that year. Solar power generation has gone from essentially nothing in 2016 to close to 6% of electricity generation in 2020. In 2020, the first grid connected utility-scale wind farm began operation (Peyton, 2020). It represented 11% of the country's installed capacity in 2020 and generated 4% of its power (SENELEC, 2020). There are plans to expand the wind park further and explore battery storage (SENELEC, 2020). Senegal imports its hydropower through the Organisation for the Development of the River Senegal (OMVS).

Job creation is a key issue for the government, as close to a quarter of the population is unemployed (ANSD, 2022). The Climate Action Tracker has recently published analysis showing that if Senegal opted for accelerating its renewable energy power generation instead of fossil gas, it could create, on average, 6,700 job years per MWh annually over the next decade compared to 1,500 job years under its current plans (CAT, 2022).

Senegal's greenhouse gas (GHG) emissions were 27 $MtCO_2e$ in 2019 (excl. LULUCF) (Gütschow et al., 2021). Agriculture accounts for almost half of its emissions, followed by energy. The industry and waste sectors contribute about an equal amount; both represent less than 10% of emissions. Emissions for all sectors are projected to grow over the course of the next decade under a business as usual scenario, with the fastest growth coming from the energy sector as Senegal develops its fossil gas production (Republic of Senegal, 2020a).

Senegal is highly vulnerable to the impacts of climate change (ND-GAIN, 2022). For example, its long coastline is susceptible to sea level rise: one metre of sea level rise would flood thousands of square kilometres of low-lying areas, mainly estuaries, equivalent to the disappearance of all the current mangrove forests (Republic of Senegal, 2020).

1.2 Climate governance snapshot

Senegal's overarching policy framework is set out in its 2035 Plan for an Emerging Senegal *(Plan Sénégal Émergent, PSE)* which guides its development agenda. The plan has three strategic pillars: economic transformation, promotion of human capital, and enhancing good governance and the rule of law.

The PSE is implemented through five-year priority action plans (PAPs) (Republic of Senegal, 2014, 2018b). Sectors also develop five-year plans, although the implementation period does not always correspond to that of the PAPs (MAER, 2018a; MEDD, 2015b; MEP, 2019). The 2019-2023 PAP has a clear emphasis on climate adaptation, which is one of its key goals and developing the oil and gas sector, though it does include a GHG emissions limit for 2023 and a reference to implementing the country's NDC (Republic of Senegal, 2018b).

Senegal submitted its updated NDC in December 2020 (Republic of Senegal, 2020a). The updated NDC sets an unconditional target of reducing GHG emissions by 7% below BAU levels by 2030 (incl. LULUCF). As conditional target, the GHG emissions reduction could increase to 29.5% below BAU levels by 2030, with international support. Senegal has also committed to a 2025 unconditional target of reducing emissions by 5% below BAU by 2025; and a conditional target of reducing emissions by 23.7% below BAU.

The Ministry of the Environment and Sustainable Development *(Ministère de l'Environnement et du Développement Durable, MEDD)* is in charge of coordinating and monitoring climate policy development and implementation. The National Committee on Climate Change *(Comité National sur les Changements Climatiques, COMNACC)*, established in 1994, seeks to ensure the coordination, integration, monitoring and evaluation of climate change interventions at both national and local levels (Republic of Senegal, 2011a). The Directorate of Environment and Protected Areas *(Direction de l'Environnement et des Établissements Classés, DEEC)*, a department within the MEDD, serves as the secretariat for COMNACC.

Key Institutions

Ministry of Environment and Sustainable Development (Ministère de l'Environnement et du Développement Durable, MEDD)

The MEDD is the national institution in charge of developing and implementing Senegal's environmental policy. The Ministry has the broad mandate to address pollution-related issues, monitor climate change and its impact, and represent Senegal at international climate meetings. However, the Ministry is not explicitly tasked with cutting GHG emissions nor helping the country transition to a zero emissions society. Its current mandate is set out in Decree n°2020-2214 (11 November 2020).

National Committee on Climate Change (Comité National sur les Changements Climatiques, COMNACC)

The COMNACC was first created in 1994. The Committee has broad government and stakeholder participation. Its mandate is to ensure the coordination of the various activities related to consultation, training, awareness raising, management and monitoring as part of climate policies' implementation. Its current mandate is set out in Presidential Decree n°2011-1689 (3 October 2011).

Key Plans & Strategies

Senegal Emerging Plan (Plan Sénégal Émergent, PSE) 2014-2035

The PSE is the overall policy framework, which guides the country's development agenda. The Plan has three strategic pillars: economic transformation, promotion of human capital, and enhancing good governance and the rule of law. It is implemented through five-year priority action plans (PAPs). The 2019-2023 PAP has a clear emphasis on climate adaptation and developing the oil and gas sector. It also includes a GHG emissions limit for 2023 and reference to implementing the country's NDC.

Targets

Nationally Determined Contribution (NDC) – 2020 update

The NDC is comprised of a number of sectoral targets for both 2025 and 2030. These targets represent an overall reduction in GHG emissions of 7% to 29.5% below business-as-usual emissions in 2030, with the lower end representing Senegal's unconditional target and the upper end its target conditional on international support and climate finance. The sectors covered are energy, agriculture, forestry, and other land use, waste and industry.

Key Laws & Regulations

Environmental Code (Law n°2001-01 of January 15, 2001)

The Law on Environmental Code established the fundamental principles governing the management and protection of the environment, however it does not explicitly address GHG emissions or mitigation measures.

Renewable energy (Law n°2010-21)

This law established the legal framework for the promotion and development of renewable energy. It established the conditions for the production, transport, storage and distribution of renewable energy sources.

Biofuels (Law n°2010-22)

This law aims to promote the use of biofuels. It sets out the conditions and standards for production and use in order to ensure the diversification of energy sources in Senegal by making use of forest and agricultural land and thus contributing to the preservation of the environment.

Forestry (Law n°2018-25)

The forestry code aims to develop, regulate and protect the forests as well as increase of the country's carbon sequestration potential.

2 National assessment

2.1 Political commitment

Political commitment	
High-level government leadership	Quality of government decision making

Senegal's government is committed to developing its oil and gas fields. The President has openly opposed international efforts to limit financing for fossil fuel development. Adaptation and resilience, especially in the agriculture sector, are the priority for the government which pays little attention to the need to decarbonise.

Senegal is progressing in implementing its climate policy. The government has made progress on deploying renewable energy and expanding public transportation. It has also abandoned plans to further develop coal-fired power generation, though it continues to pursue its 'gas to power' strategy to shift its electricity production from largely heavy oil fuel to fossil gas. It is unclear whether the President will run again in 2024; however, it is unlikely that a change in government would lead to significant changes in climate policy or fossil gas development plans.

The government has made some efforts to fight corruption. However, those efforts have stalled or even reversed in recent years. There are allegations of corruption regarding some of Senegal's oil and gas deals and in the forestry sector. Therefore, the corruption concerns seem to undermine the public trust in the government's ability to deliver on its promises as regards transition-related actions.

High level government leadership can be a driving force for stimulating economy-wide transformational changes and increasing climate mitigation ambition through top-down strategy setting and sending effective policy signals.

President Sall does support some climate measures. However, this support is undermined by his commitment to developing Senegal's fossil gas production. For example, in his 2021 year-end address to the nation Sall highlighted achievements in low-carbon transport, solar power and the fight against deforestation but also touted the country's plans to begin fossil gas production in 2023 (Head of State, 2021). He has opposed international efforts to limit financing for fossil fuel development (La Croix, 2021). President Sall appointed a close ally to the Ministry of Petroleum and Energy in a 2020 cabinet reshuffle, further highlighting the importance of the portfolio (Morgan, 2022).

Adaptation and resilience, especially in agriculture, are the priority for the government (BIG, 2021a). The Council of Ministers discusses some mitigation relevant projects, such as solar and public transport initiatives, but consideration of the need to transition to a zero emissions society is largely absent from its deliberations (Senegal Presidency, 2022c, 2022b).[1] While the government supports the deployment of renewable energy, both the Minister of Petroleum and Energy have stressed the need to develop the country's fossil gas and not just focus on expanding renewable energy (Energy Capital & Power, 2021b). Taken together these actions suggest that the transition to a zero emissions economy is a low priority for the government with little ministerial buy-in.

Senegal's key institutions are limited in their ability to drive the transition across government. The Ministry of Environment and Sustainable Development (MEDD) is the lead institution for climate change, through the Directorate of Environment and Protected Areas (DECC). The Ministry has a broad mandate to address pollution-related issues, monitor climate change and its impacts, and represent Senegal at international climate meetings (Republic of Senegal, 2020b). However, the

1 We reviewed Council communiques from the first half of 2022, available here: https://www.presidence.sn/actualites/conseil-des-ministres.

Ministry is not explicitly tasked with cutting GHG emissions nor helping the country transition to a zero emissions society.

It is the National Committee on Climate Change (COMNACC), an inter-ministerial body with broad stakeholder participation, that has been tasked with coordinating, monitoring and raising awareness about climate change, including mitigation efforts (Republic of Senegal, 2011a). The DECC serves as the Secretariat of the COMNACC. The COMNACC is composed of representatives from all sectoral ministries, the Presidency of the Republic, the Senate, the National Assembly, the Prime Minister Office, key public agencies, key groups of private actors, trade unions and academia. While COMNACC has a dedicated mitigation group, its core task is focused on coordinating efforts, which are largely project based, and is not focused on the transition specifically.

The **quality of government decision making** at the highest levels is a key factor in implementing ambitious climate policies as national governments provide resources and direction for lower levels of government and can stimulate horizontal dynamics through mainstreaming, lesson-drawing, and cooperation (Jänicke, Schreurs, & Töpfer, 2015).

Stability is one aspect that enhances the quality of decision-making as it allows for the continuous development and implementation of policy. President Sall has been in power for the past decade. While a complete assessment of the state of the government's climate decision-making is outside the scope of this report, there is evidence of the continuous implementation of climate plans.

In its Nationally Determined Contribution (NDC), Senegal outlined a number of sectoral measures it planned to take (Republic of Senegal, 2015a). It has progressed, *inter alia*, on its renewable energy deployment, which has seen a rapid increase since 2017, and the expansion of public transportation (Dakar BRT, 2020; SENELEC, 2020). Its first NDC of 2020 contains greater detail on the baseline used to underpin each of the sectoral targets (Republic of Senegal, 2020a).

The government has also abandoned plans to develop further coal-fired power generation and has committed to phase out existing generation by the 2040s (UN Climate Change Conference, 2021). However, after the discovery of its gas fields, the government did adopt a Gas-to-Power Strategy to reduce reliance on imported oil, which could result in stranded assets and creation of fewer jobs compared to those that could be created under a scenario of pursing renewable power (CAT, 2022).

It is unlikely that a change in government would lead to significant changes in climate policy. In his 2019 Presidential manifesto, Sall's main rival, Ousmane Sonko, supported enhancing climate resiliency and cutting GHG emissions through promoting renewable energy and other measures, but would also continue to develop fossil gas and promote its use domestically (Sonko, 2019).

Parties with an environmental focus have been on the decline in recent years and have generally had limited influence on policymaking with some exceptions (Kande, 2021; Olivier, 2015). In 2012, one of the founders of *Rassemblement des Écologistes du Sénégal* (RES), Mr. Haïdar El Ali, was appointed Minister of Environment and Nature Protection, but his tenure was brief (April 2012 - September 2013) because his vision for the protection of environment was not supported by the government (Michel, 2015; RFI, 2012). Until recently, he was the Managing Director of the Senegalese Agency for Reforestation and the Great Green Wall (ASRGMV) (Senegal Presidency, 2022a).

Corruption can undermine the public trust in the government's ability to deliver on its promises. While Senegal made gains during the President's first term, efforts to fight corruption have stalled or even reversed in recent years (TI, 2021b). In 2021, its score on Transparency International's Corruption Perception Index fell for the first time in five years (TI, 2021a). Similarly, public perception of the extent of corruption within government is poor, with three quarters of the population saying that corruption has gotten worse in the past few years (Abdoulaye & Diallo, 2021; SYNCHRONIX, 2016).

While Senegal does rank well and has generally improved on the Mo Ibrahim Index of Governance in Africa over the past decade, the Index has not been updated since the 2019 report (MIF, 2020). The National Resource Governance Institute ranks governance of the oil and gas sector highly, but cautions that part of the good performance is due to the inapplicability of some indicators due to the sector's infancy (NRGI, 2021). There are also allegations of corruption and bribery regarding some of Senegal's oil and gas deals, some of which implicate the President (TI, 2021c). Corruption with the forestry sector has also been a concern (OFNAC, 2017; Olivier, 2015).

2.2 Institutional framework

The National Committee on Climate Change (COMNACC) ensures the coordination of climate action in Senegal. While COMNACC likely ensures that there is broad coordination amongst relevant players nationally, the extent to which it ensures focused inter-ministerial coordination is questionable, given its broad stakeholder participation. Senegal does not have a dedicated inter-ministerial entity that focused on transition related action.

As a result of the limited effective coordination of climate action, the need to transition to a zero emissions society has not been mainstreamed into sectoral policies. While reference to Senegal's NDC or other mitigation measures can be found in some sectoral policies, there is a lack of strategy encompassing all transition-related issues in a given sector. Actions are fragmented between and within ministries.

Senegal does not have an authoritative body with an explicit and clear mandate to provide transition-related advice to the government, though some agencies do advise the government on mitigation-related matters and may be capable of playing such a role.

Senegal has a good level of climate finance preparedness in some areas, like mobilising international climate finance. However, other areas, such as incorporating climate considerations into its domestic budget processes, still need work. More broadly, resources constraints (financial, human, technical) are an issue and limit the ability of key institutional players to act.

Effective coordination across ministries and agencies as well as with sub-national governments affects the ability of actors to align overarching climate policy targets efficiently and consistently.

The National Committee on Climate Change (COMNACC) coordinates Senegal's climate action. COMNACC brings together representatives from the President's and Prime Ministers' offices, the Senate, the National Assembly, relevant line ministries, technical institutions and civil society (Republic of Senegal, 2011a). Its mission is to coordinate, consult, train, raise awareness, manage and monitor in various climate-related spaces. It also strives to ensure consistency across programmes and projects. It has a number of working groups, including one focused on mitigation. The President and Vice President of the Committee serve two-year terms. The current President is from ENDA Energie, one of the main civil society organisations in Senegal, and used to serve as the mitigation group coordinator.

The Committee is very active, but it does face constraints, which may limit its effectiveness. The Committee and its working groups meet quarterly to discuss interventions to reach GHG emission reduction targets in Senegal. It publishes detailed progress reports every few years outlining the activities of each group (COMNACC, 2016, 2020).

Yet, the Committee is limited by the fact that it does not have permanent office space nor a stable budget (COMNACC, 2020). The Committee's work is also focused on the coordination, review and support of project-based activities, rather than policy development more generally. Given the structure of the Committee, with very broad stakeholder participation, including holding key leadership positions, the extent to which there is inter-ministerial coordination of government action taking place in this forum is also questionable. Senegal does not have a dedicated inter-ministerial entity that focused on transition related action.

Coordination with the sub-national level is limited. COMNACC operates at the sub-national level through 14 Regional Committees on Climate Change (COMRECCs). The level of engagement of these regional committees is mixed (COMNACC, 2020). Some, like the capital city of Dakar, are quite active, while others are not yet operational (Le Quotidien, 2021). At the time of writing (July 2022), the websites for each of the regional committees were not functioning (COMNACC, n.d.). COMNACC has

consistently flagged the lack of engagement by the regional committee in national affairs as one of its constraints (COMNACC, 2016, 2020). While coordination may be lacking, some researchers have noted a greater engagement at the sub-national level as there is increased awareness about climate impacts and the need to cut emissions (Waisman et al., 2021).

Senegal's overarching policy framework is set out in its 2035 Plan for an Emerging Senegal (PSE) which guides its development agenda. The plan has three strategic pillars: economic transformation, promotion of human capital, and enhancing good governance and the rule of law. The PSE is implemented through five-year priority action plans (PAPs). Sectors also develop five-year plans, but the implementation period does not always correspond to that of the PAPs (MAER, 2018a; MEDD, 2015b; MEP, 2019).

Overall, there is policy coherence between the PSE, as the overall development strategy, and the PAPs and other sectoral plans; however, there is little focus on GHG mitigation, let alone the need to transition to a zero emissions society. The 2019-2023 PAP has a clear emphasis on climate adaptation, one of its key goals, but another is developing the oil and gas sector, although it does include a GHG emissions limit for 2023 and reference to implementing the country's NDC (Republic of Senegal, 2018b).

The need to transition to a zero emissions society has not been mainstreamed into sectoral policies. Actions are fragmented between and within ministries and there is a lack of sectoral policies encompassing all transition-related issues in a given sector. When reference to the transition-related action is made, it is often limited to the general need to implement the NDC or limit GHG emissions (MAER, 2018b; MEP, 2019). The operational framework is also characterised by the creation of *ad hoc* committees dedicated to implement individual projects and programmes, which further limit mainstreaming.

Another important criterion is the existence and utilisation of a **knowledge infrastructure capable of supporting strategic planning and policy development**, as this aids in the elaboration and application of decarbonisation analyses in climate policy development.

Senegal does not have an authoritative body with an explicit and clear mandate to provide transition-related advice to the government, though some agencies do advise the government on mitigation-related matters and may be capable of playing such a role.

The executive bureau of the National Committee on Climate Change (COMNACC) does seek to provide advice to decision makers; however, the Committee does not have the means to commission its own research and thus is limited in this function (COMNACC, 2020).

The Council for Economic, Social and Environmental Affairs (CESE) is an expert body that advises the executive and legislative branches of government on the economic, social and environmental aspects of laws and policies. The environmental dimension was added to the Council's work as part of constitutional reforms in 2012 (CESE, n.d.-b). The Council is divided into 10 commissions. Climate change matters fall under the remit of the Commission on the Quality of Life, Environment and Sustainable Development (CESE, n.d.-a). The Council regularly publishes analysis and recommendations on specific themes, some of which relate to climate mitigation, and covers climate-related developments in its annual reports (CESE, 2016, 2021).

Generally, the government of Senegal relies on nationally established applied research institutes for scientific and technical guidance for policy development. The Centre for Ecological Monitoring *(Centre de Suivi Écologique, CSE)* created in 1986, provides scientific and technical support to the government on climate-related matters (CSE, n.d.-c). It has a Climate Office dedicated to providing guidance and support to decision makers (CSE, n.d.-a). While the purview of the Climate Office covers both adaptation and mitigation, the majority of its work focuses on the former. The Climate Office's website has not been updated recently, making the assessment of its latest activities difficult. However, it is clear from the CSE's Facebook page that the Climate Office is still active (CSE, n.d.-b).

Capital and resource constraints are significant barriers to effective climate governance, and have been an impediment for developing countries in the past (Bhave, Conway, Dessai, & Stainforth, 2016). **Adequate resources and capacity** need to be made available to implementers, and efficiently used by them, in climate policy processes.

Senegal is advanced in some areas of climate finance preparedness, while other still need work. Senegal has two national entities *(Centre de Suivi Écologique et La Banque Agricole)* accredited to the Green Climate Fund, and is involved in twelve approved projects with a total budget of USD 160m (GCF, 2022c, 2022b, 2022a). Work is underway to accredit additional entities, including the Priority Investments Guarantee Fund (FONGIP) and the Strategic Investments Fund (FONSIS). Pilot projects are also in the works to increase access to climate finance by local governments (AfDB, 2021; BIG, 2022). Greater access should assist Senegal in implementing its climate objections and achieve its conditional NDC target.

Senegal has some experience with carbon market mechanisms and carbon pricing. It participated in efforts to streamline the carbon crediting process under the Paris Agreement (The World Bank, 2019), and has agreed to sell carbon credits to Switzerland (BIG, 2021b; Confédération Suisse, 2021). It also has the most CDM projects in West Africa, a market mechanism under the Kyoto Protocol (Michaelowa et al., 2019).

Where Senegal has not advanced is in relation to incorporating climate considerations into its domestic budget processes (CABRI, 2021). For example, Senegal has not undertaken a climate public expenditure and institutional review, implemented climate budget tagging, nor issued green bonds, though this is not uncommon across the continent. However, work has been done on exploring domestic carbon pricing options for the country (Michaelowa et al., 2019).

Resource constraints are also an issue for its lead agency, MEDD. Over the last ten years, the budget dedicated to the management of environmental issues, including climate change, has been significantly reduced from USD 57.6m (31.25bn cfa franc) in 2011 to USD 47.2m (25.6bn cfa franc) in 2021 i.e. a decrease of almost 20% (MEDD, 2015b; Republic of Senegal, 2010c, 2020c). In the same period, the national budget has increased from USD 4.3bn (2.3tn cfa franc) in 2012 to USD 8.4bn (4.6tn cfa franc) in 2021 (Republic of Senegal, 2011b, 2020c). Continuous budgetary fluctuations are an obstacle to the smooth implementation of the transition.

Human and technical resources are also insufficient. In 2015, MEDD had about 1600 staff across all departments, a number that fell short of requirements (MEDD, 2015b). Efforts have been taken since then to increase staff levels, especially in the area of forest protection, although gaps remain (MEDD, 2015b, 2015a; Yanga, 2015). There have also been a number of efforts to strengthen the technical expertise of existing staff in various domains, including energy planning (IRENA and ECREEE, 2015).

2.3 Process for policy development, implementation and review

Policy processes		
Paris-compatible emissions pathway	Transparency framework	Ratchet-up mechanism

Senegal does not have comprehensive climate change legislation, although it does have some climate-relevant sector specific legislation. The country has not adopted a net zero target and some of its current plans, like shifting to fossil gas in its power sector, are inconsistent with a 1.5°C compatible pathway. But the country did begin preparing its long-term low-carbon development strategy in March 2022. Hopefully, the long-term plan will help the country bring its short-term mitigation efforts into greater alignment with a decarbonisation pathway.

The government of Senegal is in the process of developing a transparency framework. A project from ICAT (Initiative for Climate Action Transparency) led to the proposition of a national MRV system and to the preparation of a roadmap for its implementation. Senegal does not have a formal review or ratchet up mechanism for evaluating and enhancing climate action. However, it does have some monitoring and evaluation functions as part of its broader planning process, both within the Ministry of Environment and Sustainable Development (Ministère de l'environnement et du Développement Durable, MEDD) and across the government more generally.

A **defined Paris-compatible decarbonisation pathway** is an important component to aid the long-term planning for, and alignment with, the Paris Agreement's overall objectives.

Senegal is in the initial stages of developing a decarbonisation pathway and much work remains to be done. In 2019, Senegal joined the Climate Ambition Alliance, an initiative of the COP25 host Chile (Climate Ambition Alliance, 2019). Members of the Alliance agreed to work towards net zero CO_2 emissions by 2050. However, we have not found evidence of any net zero emissions discussions or action since that time and do not consider Senegal to have a net zero or long-term target. It should be noted, however, that Senegal did fulfil its other commitment as part of this Alliance: to submit a stronger NDC by 2020.

In March 2022, Senegal began preparing its low-carbon development strategy. The initiative is led by ENDA Energy, one of the country's main NGOs and current president of COMNACC, and is supported by the Ministries in charge of Environment and Petroleum (Togbe, 2022).

Some of the sectoral analysis conducted as part of its NDC implementation work also assessed the mitigation potential of measures out to 2050 (Dieye, 2021). That said, some of Senegal's planned NDC mitigation actions are not consistent with a 1.5°C compatible pathway (Climate Analytics, 2021). For example, Senegal plans to replace the fuel oil used in its thermal power plants with fossil gas, whereas it needs to decarbonise its power sector by 2035 at the latest to be 1.5°C compatible (Climate Analytics, 2021; Republic of Senegal, 2020a). Developing a long-term plan will hopefully help the country bring its short-term mitigation efforts into greater alignment with a decarbonisation pathway.

Senegal does not have comprehensive climate change legislation, though it does have some climate-relevant sector specific legislation (Republic of Senegal, 2010b, 2010a, 2018a). The country has recently revised a number of pieces of legislation in the energy sector (e.g. its oil, gas and electricity codes) (Republic of Senegal, 2019b, 2020d, 2021). These revisions are primarily aimed at supporting the expansion of the oil and gas sectors and the adoption of gas-powered electricity, though the electricity code does require the energy ministry to develop a national renewable energy production plan.

Senegal's law on environment *(Code de l'Environnement)*, adopted in 2001, does not explicitly address GHG emissions or mitigation measures (Republic of Senegal, 2001). The 2018 performance report of the Ministry of Environment has recommended updating the law to make it aligned with, *inter alia*, climate change concerns (MEDD, 2018a). Following this, the government has revised the law and adopted the draft of the new law on the environment on June 29, 2022 (Presidency of Senegal, 2022a).

However, at the time of this report, the document of the draft law is not publicly available to assess the extent to which it includes the transition-related issues.

While the country did pass legislation to promote renewable energy in 2010, its rapid uptake over the past decade has been limited due to a number of factors, including a lack of coordination amongst relevant institutions and access to finance (RADE, 2021).

An **enhanced transparency framework mechanism** is necessary in order to track progress towards achieving emission reduction targets in line with the Paris Agreement, as well as providing checks and balances for the government's climate commitments.

Senegal is in the process of developing its transparency framework (ICAT, 2021). A proposal for a national MRV system has been developed and a roadmap for its implementation prepared (Diagne, 2021; Seck, 2021). Scoping studies of MRV systems for the transport and energy sectors have also been undertaken and others are planned (ICAT, 2019; Ndiaye, 2019; Seck, 2021).

Capacity building efforts to support the development of an MRV system for the waste sector and enhance agricultural GHG emission inventories are also underway (DeSIRA, 2020; Kouazounde, 2020; SEI & ONG Page Verte, 2020). In a broader sense, COMNACC does undertake some monitoring and reporting functions. The Committee publishes progress reports every few years (COMNACC, 2016, 2020). Its website has a wealth of information on the Committee's activities and climate projects in Senegal generally; however, it is not always up to date. The website has had a number of hosts and its funding is project-based (COMNACC, 2020).

Senegal does have some monitoring and evaluation functions as part of its broader planning process, both within MEDD and across the government more generally. In 2015, Senegal set up the Harmonised Framework for Monitoring and Evaluation of Public Policies *(Cadre Harmonisé de Suivi-Évaluation des Politiques Publiques, CASE)* (Republic of Senegal, 2015b). Its main objective is to establish better coordination of public policy monitoring and evaluation, as well as the sharing and dissemination of PES results.

However, the implementation of CASE encountered difficulties. The 2019-2023 PAP includes reform measures to ensure that the CASE functions properly. Within the technical ministries, the Planning and Study Units *(Cellule de l'Évaluation de la Performance, CEP)* provide the monitoring and evaluation mechanism. However, the CEPs have difficulty fulfilling their roles due to human, financial and material resources constraints.

The MEDD tracks its expenditures against performance results as well as assesses its priority actions, interventions, projects and programmes of the coming year as part of its annual performance assessment. The results of this assessment are published in its Annual Performance Report (MEDD, 2017). The annual review makes it possible to assess the level of achievement of programmes of various Ministries, to identify constraints and to set out the prospects, with recommendations for improvement for the next phase or cycle (MEDD, 2018a). The MEDD's 2021 annual performance report has been completed, but was not available online at the time of publication (Ficou, 2022a).

Overall, the plurality and fragmentation of monitoring-evaluation frameworks impede proper ownership and coherent articulation of government strategies and national priorities (Republic of Senegal, 2018b).

Senegal has not put in place a formalised **ratchet up mechanism** to ensure a regular review and continuous updating of its NDC in line with the provisions of the Paris Agreement. However, Senegal did submit its update by the end of 2020, being one of only about a third of the countries who kept to this original deadline. It is realistic to expect that the country would maintain this five-year revision cycle.

2.4 Stakeholder engagement

Stakeholder engagement		
Level and scope	**Just transition**	**Exogenous non-state interests and influence**

Seeking broad buy-in for Senegal's transition-related policies and projects is limited. Stakeholder consultation occurs regularly, but there are questions as to its effectiveness. Public views are not often taken into consideration in policy development, and some fossil fuel projects, such as the ill-fated Sendou coal fired power station, are implemented, despite strong resistance from the population.

Senegal's fossil gas expansion plans are inconsistent with a Just Transition and risk creating stranded assets and high levels of unemployment. The oil and gas sector likely has significant influence on the government, while the impact of renewable energy sector, which is still in its infancy, is likely limited. Senegal is working on developing a roadmap for a Just Transition, as part of the Climate Action for Jobs Initiative, but would be better off ditching its fossil gas plans altogether.

Polling data suggests there is some public support for reducing emissions, but overall climate literacy is low. The government is currently working on a strategy to integrate climate change into the curriculum but the focus of the strategy is only on adaptation.

The government's **level and scope of engagement** with stakeholders reflects how well it is aware of external knowledge and the expectations of its constituents, which, in turn, affects the ability for sound government decision-making.

Stakeholder consultation occurs regularly during the policy development process (COMNACC, 2020; DEEC, 2020). The National Committee on Climate Change is also, by its very nature, a highly consultative body with broad representation. However, there are questions as to the effectiveness of those consultations. For instance, some trade unions have pointed out that the process of involving the unions in the NDC development process has not run smoothly (Dieng, 2020). There has also been strong resistance to some fossil fuel development, like the ill-fated Sendou coal fired power station, but also to projects essential to the transition (AfDB, 2021; Feiger and Vasudevan, 2021; Sagne et Cissé, 2019). More efforts from the government can help to reinforce the meaningfulness of seeking the broad buy-in of non-state actors on transition-related policies and projects and programmes.

Climate education focused on mitigation is limited in Senegal. The government is currently working on a strategy to integrate climate change into the curriculum, but the focus of the strategy is on adaptation only (Ficou, 2022b; MEDD, 2021). Efforts are underway to build an interactive centre focused on climate change education: Center for Education to International Citizenship and Sustainable Development (Jean-Claude, 2021; Organisation de Solidarité Internationale, 2020). Some individual projects related to climate change education are being implemented in Senegal (Departmental Council of Gossas, n.d.; SENEAD, 2020). Historically, the government has focused on environmental education more broadly (MEDD, 2018b) and while the quality and access to higher education in general has been improved, the sector still faces a number of challenges (Dimé, 2018).

It is important that the transition towards net zero emissions is planned and implemented as a **Just Transition**, enabling wider benefits for the population as a whole and ensuring that no one is left behind.

At COP26, Senegal signed the *Global Coal to Clean Power Transition Statement,* committing itself to ensuring a just transition away from coal usage (UN Climate Change Conference, 2021). It is also working on developing a roadmap for a Just Transition, as part of the Climate Action for Jobs Initiative (ILO, 2022). More broadly, the country has been working on policies and plans related to the green economy and green jobs for close to a decade (CESE, 2016; ILO, 2015, 2018; MEDD, 2015c; PAGE, 2021; Republic of Senegal, 2019a). Its 2015-2020 National Strategy for the Promotion of Green Jobs created 2,000 green jobs and won an international award for its public policy (ILO, 2019).

These positivie developments notwithstanding, Senegal's fossil gas expansion plans are inconsistent with a Just Transition and risk creating stranded assets and high levels of unemployment. Job creation is a key issue for the government as close to a quarter of the population is unemployed (ANSD, 2022). However, fossil gas is not the answer. CAT analysis has shown that if Senegal does not pursue fossil gas and increases renewable energy in the power mix in line with 1.5°C pathways, it could create, on average, 6,700 job years per MWh annually over the next decade compared to 1,500 job years under its current plans (CAT, 2022). If the country is able to decarbonise its end use sectors through much higher electrification rates, the shift could generate up to 1.4 million job years.

Non-state actor interests and influence also have the ability to shape government policies, either to accelerate or impede the speed of the transition to a zero emissions society. Such influence may come from groups directly affected by the transition, either positively or negatively, or from the general public. An important consideration is to what extent these stakeholders can access and utilise country-specific analyses to influence the policy agenda.

Polling data suggests there is some public support for reducing emissions, but overall climate literacy is low (Stokes et al., 2015; UCESA, 2021). Three quarters of the population support policies to cut GHG emissions and more than half think it is a serious problem (Stokes et al., 2015). Only about half of Senegalese think the government is doing enough (UCESA, 2021). However, people consistently say that unemployment, health and education are the top problems facing the country when asked (Diallo et Diallo, 2021). Climate change does not rank in the top ten, though electricity does.

Only about a quarter of the population are considered "climate literate" — where people are aware of climate change, its anthropogenic causes and negative consequences. This percentage is slightly below the average for the 34 African countries polled by Afrobarometer, though general awareness of the issue is on the rise (Afrobarometer, 2021; Selormey et al., 2019).

The first demonstrations to raise awareness and demand action to combat climate change took place in 2015 (Werntz, 2015). Marches and protests in support of climate action have continued to take place, though generating interest amongst the general public in these events can be difficult (Africa News, 2022; Peyton, 2019).

Senegal has an active civil society (ENDA ENERGIE, n.d.). For example, a number of non-governmental organisations, farmers' organisations, research institutions, multi-stakeholder platforms, consumer associations and local elected officials, have organised a coalition to advocate for more sustainable agricultural practices (agroecology) to take advantage of the political interest of the President in this area (DyTAES, 2020a, 2020b; Head of State, 2019). The coalition *Dynamique pour la Transition Agroécologique au Sénégal (DyTAES)* is largely focused on adaptation measures, though some groups also work on mitigation related activities. A number of groups have been active in pushing back on the use of carbon credits as a solution (CGLTE OA, n.d.). As noted above, there has also been strong resistance to some fossil fuel development (AfDB, 2021; Feiger and Vasudevan, 2021).

Many of these organisations are nevertheless limited by a lack of capacity, ranging from a lack of the technical skills needed to engage in policy discussions to general organisational constrains (European Union, 2021). The knowledge basis to support stakeholder advocacy is limited: there is some country specific analysis available but much of it is not focused on transition pathways (Climate Analytics, 2021; FAO and Centre de Recherche sur les gaz à effet de Serre agricoles de la Nouvelle-Zélande, 2019; GGGI, 2021; IEA, 2021; IRD, 2021; Netherlands Enterprise Agency, 2022; UNIDO, 2017). The situation may improve in the near future, as ENDA Energy has begun developing deep decarbonisation pathways earlier this year (Togbe, 2022).

While Senegal's renewable energy sector has been growing, it is still in its infancy and its potential impact on government is likely limited. For example, the Business Council of Renewable Energies of Senegal (COPERES) was established in 2015 (COPERES, n.d.). The Council has been actively working with some government agencies on various initiatives, but this palls in comparison to the access of the oil and gas sector (AFRIMAG, 2021; COPERES, 2020a). The Government did issue a decree in 2020 to exempt renewable energy equipment from some taxes, thus supporting the industry, a move COPERES applauded (COPERES, 2020b; IISD, 2020).

The oil and gas sector likely has significant influence on the government (Netherlands Enterprise Agency, 2017). Industry representatives have regular high-level meetings with government officials (Presidency of Senegal, 2022c, 2022b). There are allegations of corruption and bribery in relation to some of Senegal's oil and gas deals (TI, 2021c).

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The Consortium

NewClimate Institute is a non-profit institute established in 2014. NewClimate Institute supports research and implementation of action against climate change around the globe, covering the topics international climate negotiations, tracking climate action, climate and development, climate finance and carbon market mechanisms. NewClimate Institute aims at connecting up-to-date research with the real world decision making processes.

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