Some reflections on state of climate transition in SA

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Deputy Chair

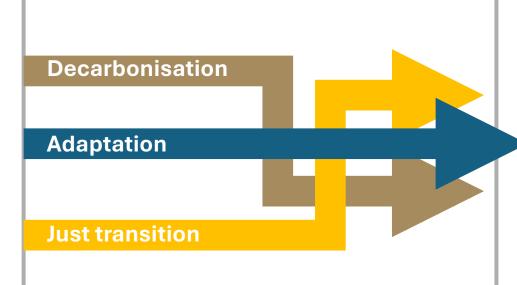
Presidential Climate Commission



Three inter-related transitions

South Africa 2024

- High vulnerability to climate change
- Low-productivity, carbon-intensive economy
- Weak public sector & poor implementation
- Extreme levels of inequality & poverty
- Decreasing per capita income
- Active civil society and strong social base for Just Transition

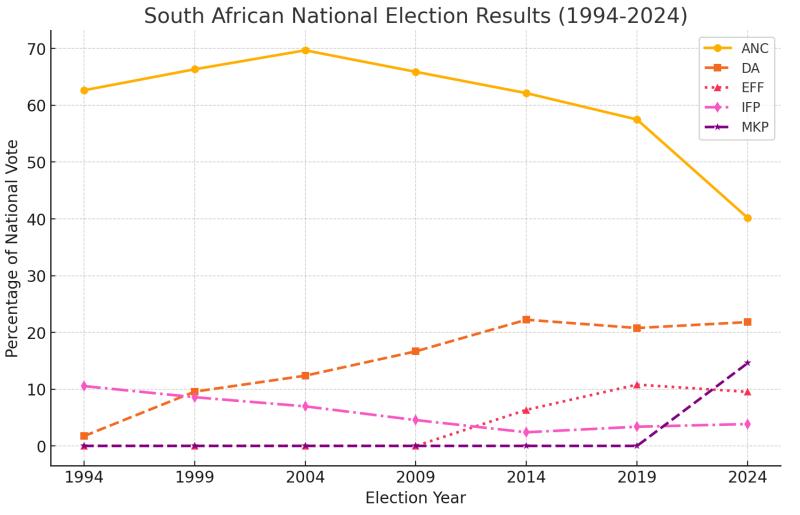


South Africa 2050

- Economy & society resilient to climate risks
- Net-zero economy
- Growing investment to GDP ratio & competitive economy
- Effective & enabling state
- Dramatically reduced levels of inequality, unemployment & poverty
- Social inclusion and just transition

Source: WB SA CCDR 2022

Political context



- Ten-party Government of National Unity established after 2024 elections
- GNU Statement of Intent does not explicitly mention climate change but signals broad policy continuity
- GNU includes pro-business DA which supports accelerated energy transition
- New technocratic Minister for Electricity & Energy supports more diverse energy mix

Opening of Parliament Address by President, 18 July 2024

- "Over the next five years, we will seize the enormous opportunity in **renewable energy** for inclusive growth.
- South Africa has some of the best solar and wind resources in the world.
- As we undertake a just transition towards renewable energy, South Africa must create a **green manufacturing sector** centred on the export of green hydrogen and associated products, electric vehicles and renewable energy components.
- We have seen, for example, how the Northern Cape has already attracted billions of rands of investment in renewable energy projects.
- Work is underway to set up a Special Economic Zone in Boegoebaai to drive investment in green hydrogen energy projects.
- We already have a huge pipeline of renewable energy projects, representing over 22,500 MW of new generating capacity, estimated to be worth around R400 billion in new private investment. Investments such as these will create many jobs."

Opening of Parliament Address by President, 18 July 2024 (cont.)

- "Just this week, we saw the largest-ever private energy project connect to the grid near Lichtenburg in the North West, with over 390,000 solar panels that will add 256 MW to the grid.
- We will see more of these projects taking shape across our country in the months and years to come. As these investments reach fruition more jobs will be created.
- Our **Just Energy Transition Investment Plan** sets out a clear path to invest more than R1.5 trillion in a just transition, including support for workers and communities in Mpumalanga and other coal-producing regions.
- South Africa is undergoing a **renewable energy revolution** that is expected to be the most significant driver of growth and job creation in the next decade and beyond."

ANC lekgotla statement on energy security & infrastructure development – Jan 2025

"Commitment to Energy Security and Infrastructure Development.

- One of the key resolutions ... is the urgent need to accelerate energy security, starting with the stabilisation of Eskom ...
- The ANC has committed to a bold plan to address the energy availability, including expediting the rollout of renewable energy as part of a just energy transition.
- Eskom's challenges are being resolved and will contribute to economic recovery, industrialisation, and job creation.
- We welcome the work being done with local government and ESKOM to resolve the challenges of debt and load reductions."

SONA February 2025

- We have built meaningful partnerships between government and business, labour, civil society and other social partners to drive growth and development.
- we will work with our municipalities to establish professionally managed, ringfenced utilities for water and electricity services to ensure that there is adequate investment and maintenance.
- We are engaging local and international financial institutions and investors to unlock R 100 billion in infrastructure financing. A project preparation bid window has been launched to fast track investment readiness. This includes revised regulations for public private partnerships, which will unlock private sector expertise and funds.

SONA February 2025

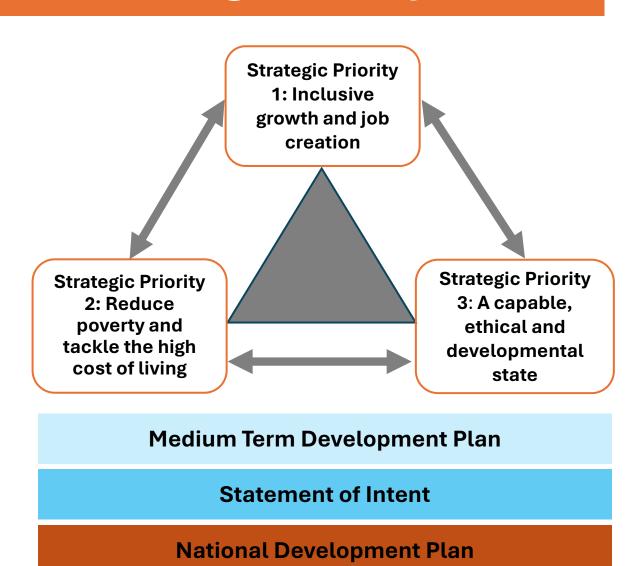
• The measures we have implemented through the Energy Action Plan have reduced the severity and frequency of load shedding, with more than 300 days without load shedding since March 2024. While the return of load shedding for two days last week was a reminder that our energy supply is still constrained, we remain on a positive trajectory. We now need to put the risk of load shedding behind us once and for all by completing the reform of our energy system to ensure long-term energy security. The Electricity Regulation Amendment Act, which came into effect on the 1st of January, marks the beginning of a new era. This year, we will put in place the building blocks of a competitive electricity market. Over time, this will allow multiple electricity generation entities to emergé and compete. We will mobilise private sector investment in our transmission network to connect more renewable energy to the grid.

SONA February 2025

 As we reform our energy system, we are continuing to build successful multilateral partnerships in the global effort to halt the devastating impact of climate change. Our Just Energy Transition is gaining momentum. Over 13 billion US dollars have been pledged by the international community and significant private capital is being invested locally. We are determined to meet our carbon reduction commitments, and will do so at a pace and scale that our country can afford.

Approach to the draft MTDP: Three Strategic Priority Areas

- The draft MTDP 2024-29 proposes three strategic priorities which are: i) Inclusive growth & job creation; ii) Reduce poverty and tackle the high cost of living; iii) Build a capable, ethical & developmental state.
- Inclusive growth and job creation will be viewed as an Apex priority. All spheres of government, clusters and sectors will prioritise relevant economic interventions.
- The three strategic priorities are interrelated and interlinked.
- A capable state plays a key role (direct and indirect)
 within the economy through regulation, network
 industries and by creating an enabling environment, and
 that law and order are maintained.
- The social wage is a key instrument for poverty reduction and is a safety net for the vulnerable. It also ensures that we have a skilled and healthy workforce, enabling infrastructure and basic services.



Achieve more rapid, inclusive and sustainable economic growth and job creation

Outcome: Increased infrastructure investment and job creation

Invest in infrastructure development in key sectors of energy, communications, water and transport infrastructure, and focus on underserviced areas.

Simplifying the regulations on public-private partnerships to enable greater investment in both social and economic infrastructure development.

Maintenance of public infrastructure through dedicated programmes and establish systems to support this.

Outcome: Energy security and a just energy transition

Continue to implement the Energy Action Plan and achieve long-term energy security.

Expedite the rollout of the Transmission Development Plan and focus on expanding and strengthening the transmission network.

Implement the Just Energy Transition Investment Plan (JET-IP) and ensure that South Africa's transition to a low-carbon economy supports communities and workers in Mpumalanga and other affected areas.

Set up the special economic zone in Boegoebaai to drive investment in green hydrogen energy projects.

Outcome: Supportive and sustainable economic policy environment

Ensure that macroeconomic policy and a sustainable fiscal trajectory in support of growth and employment.

Development an integrated economic strategy that aligns fiscal policy, monetary policy, competition policy, industrial policy, innovation policy and trade policy.

Outcome: Increased investment, trade and tourism

Prioritise the implementation of the African Continental Free Trade Area to increase our exports to the rest of the continent.

Strengthen economic diplomacy with our largest trading partners and potential trading partners.

Outcome: Science, technology and innovation for growth

Grow and transform SA's science, technology and innovation capabilities, human resources and research infrastructure.

Invest in digital identity and payments, expand access to affordable broadband, and increase training for young people in digital skills.

JETP funding pledges so far (\$m, true JETP marked green)

\$'m	Grants	Highly concession al loans	Concessional loans	Commercial investments	Guarantees (not real money)	Export credits	Total	Of which true JETP
Canada	1.00		91.00	=	<u>=</u> 2	18	92.00	92.00
Denmark	23.00	-	58.00	65.00	-	1-	146.00	81.00
European Union / EIB	124.00	=	1,080.00	216.00	÷	-	1,420.00	1,420.00
France / AFD	4.00	÷	1,080.00	2	÷	-	1,084.00	766.81
Germany / KfW	292.00	_	1,548.00	<u> -</u>	= :		1,840.00	1,522.81
Netherlands	167.00	-	-	-	, -	-	167.00	167.00
Spain	16.00	-	-	378.00	+	1,890.00	2,284.00	16.00
Switzerland	51.00	4	2	-	2.	-	51.00	51.00
United Kingdom	45.00	-	<u> </u>	500.00	1,300.00	<u> </u>	1,845.00	45.00
United States of America	63.00	-	¥.	1,000.00	-	9 <u>4</u>	1,063.00	63.00
African Development Bank	₩//	X	300.00	-	90	A S	300.00	300.00
Climate Investment Funds	50.00	450.00	900.00	300.00	L .	P=	1,700.00	1,700.00
World Bank	=	-	1,000.00	_	-	18	1,000.00	1,000.00
Total pledged	836.00	450.00	7,687.00	3,034.00	1,300.00	1,890.00	12,992.00	7,224.62
Total deployed	630.00	0.00	600.00	0.00	100.00	0.00	1,330.00	1,230.00

Source: Krutham Dec 2024

Some GNU legislative achievements

Climate Change Act 2024

- Creates vertical and horizontal climate governance
- Establishes PCC as permanent statutory body
- Empowers Minister DFFE to prescribe emissions trajectory and set sectoral targets
- Establishes cross-government adaptation planning system

Electricity Regulation Amendment Act 2024

- Unbundles Eskom & establishes NTCSA
- Creates competitive electricity market with multi-market model
- Strengthens NERSA's role in licensing and regulating fair & efficient market
- Encourages private sector participation to improve energy supply

Presidential Climate Commission

- Set up by President in 2020 as an independent multi-stakeholder advisory body
- Has since undertaken research, consulted widely and made recommendations on:
 - NDC 2021
 - Just Transition Framework 2022
 - KZN Floods 2022
 - JET Investment plan 2023
 - Electricity plan 2023
 - Komati decommissioning process 2023
 - Just Transition Financing Mechanism 2024
 - State of Climate Action 2024
- Inclusive approach has allowed consensus on contentious issues
- PCC mandate and functions now given statutory power

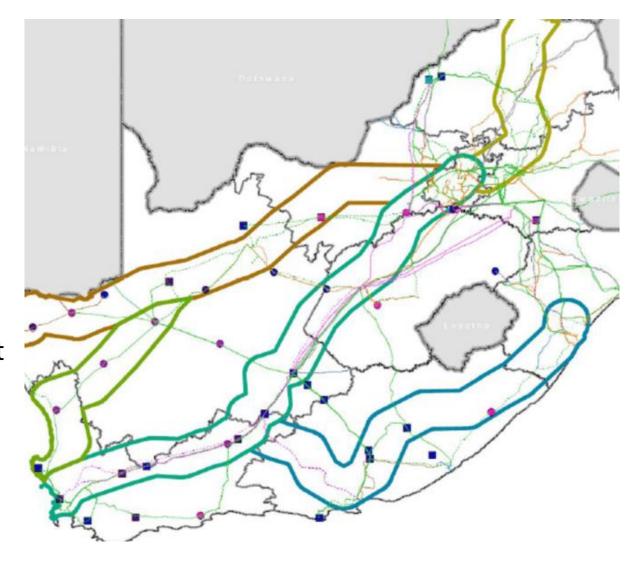


Energy regulations nearing completion

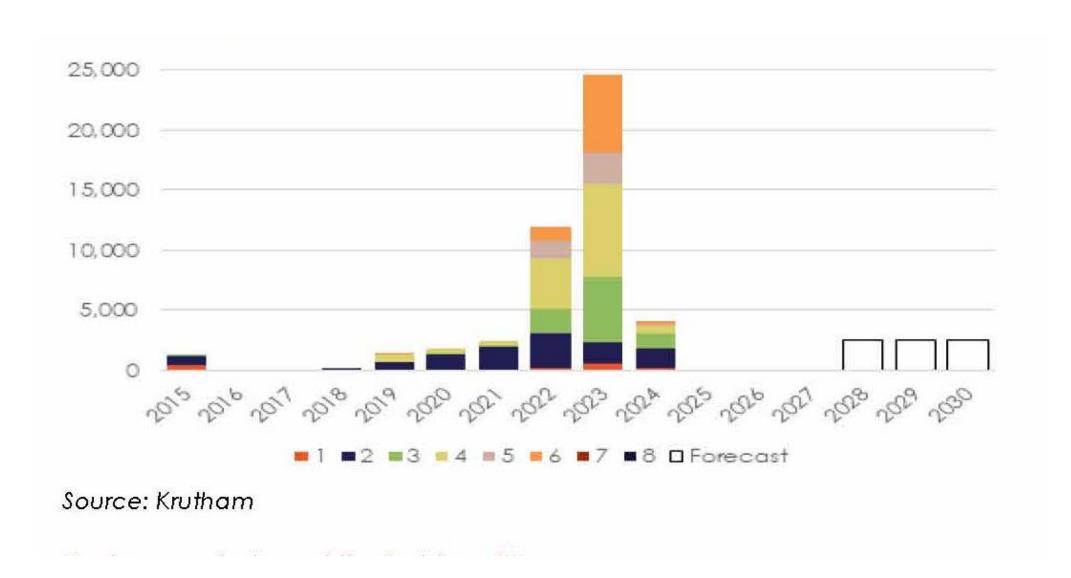
- Last year Minister Electricity & Energy reopened consultations on draft IRP, expected to be finalized Q1 2025.
- Wheeling framework public hearings completed, NERSA expected to finalise Q1 2025.
- Curtailment and net-billing rules to be finalized Q1 2025. Curtailment will unlock 2,680MW in the Western Cape and 790MW in the Eastern Cape.
- Energy one-stop shop launched in July 2023, full implementation expected in Q1 2025
- SA Renewable Energy Master Plan inexplicably delayed but due to be finalized in Q1 2025

Transmission

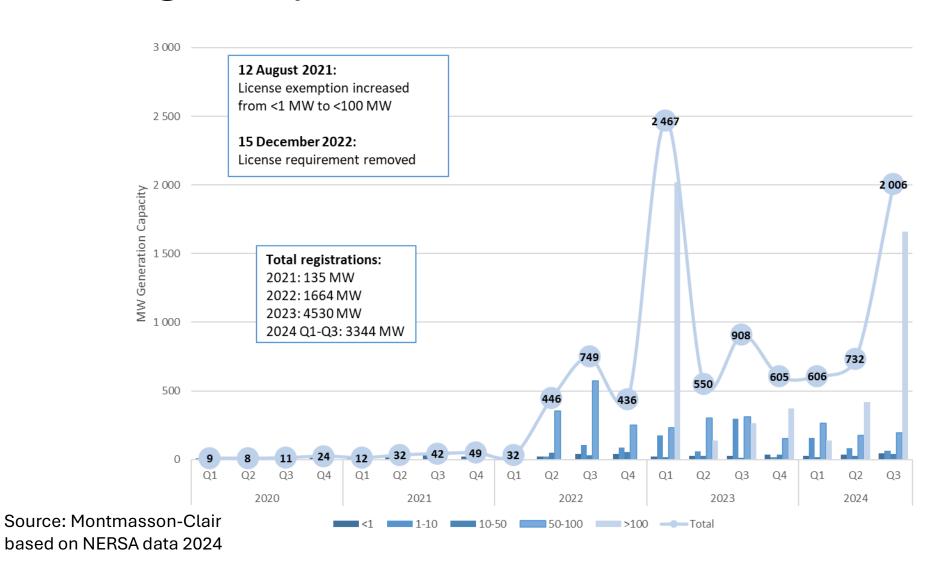
- NTCSA board announced in early 2024, began trading in July and officially commenced operations in October.
- Market code and market operator licence required before launch of market and system operator on 1 April 2026, to be finalized Q1 2025 and Q3 2025 respectively.
- Eskom TDP estimates 14,000 km of transmission lines required / 10 yrs, but build rate is less than 10% of target
- NT & DoEE launched RFI for Independent Transmission Project (ITP) in Dec 2024. First completed ITP unlikely before 2028.



Load shedding history and forecast

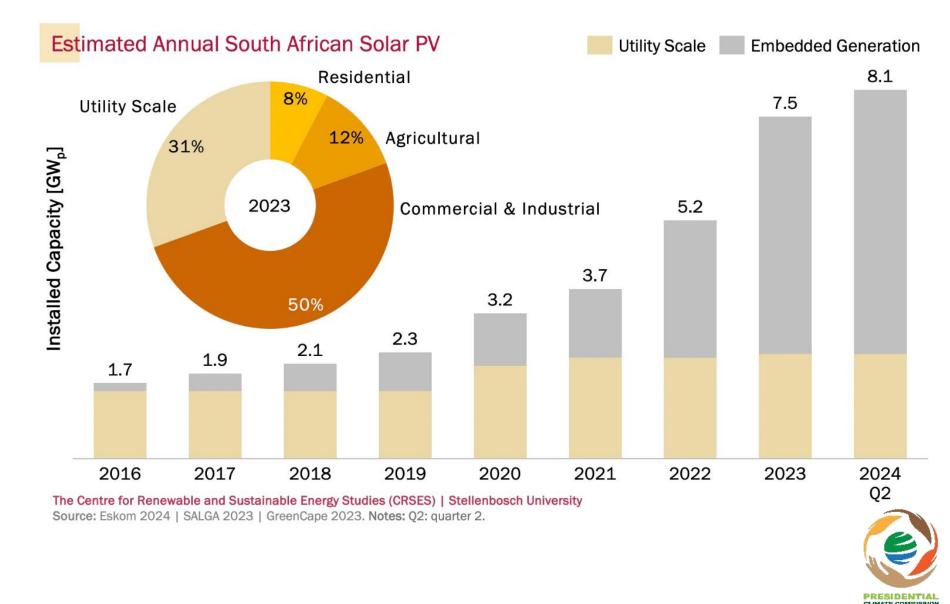


Power generation capacity registered with NERSA under licensing exemption conditions

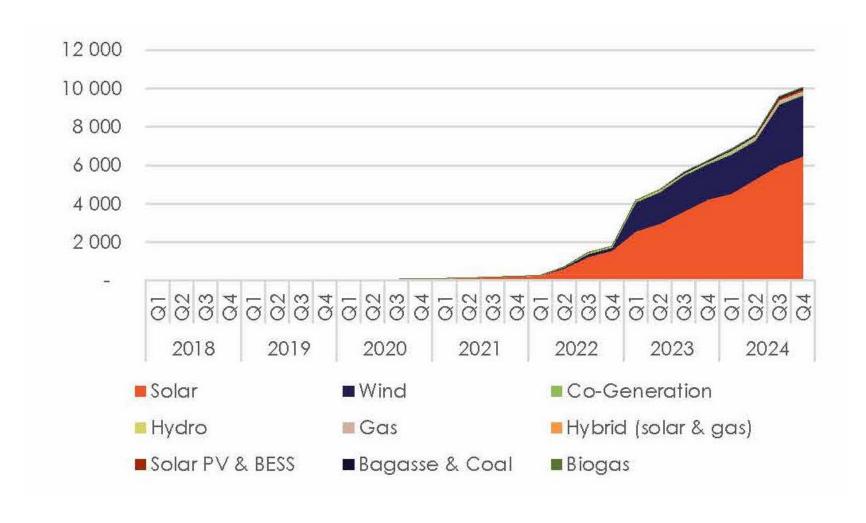


When it comes to new generation, private installations of solar PV have kept us in the game

- Approx. 10GW of RE procured across multiple bid windows since
 2011, but only 6GW installed
- Stop-start nature of REIPPP and constraints due to grid access have been disappointing
- Private sector generation has passed the 10GW mark



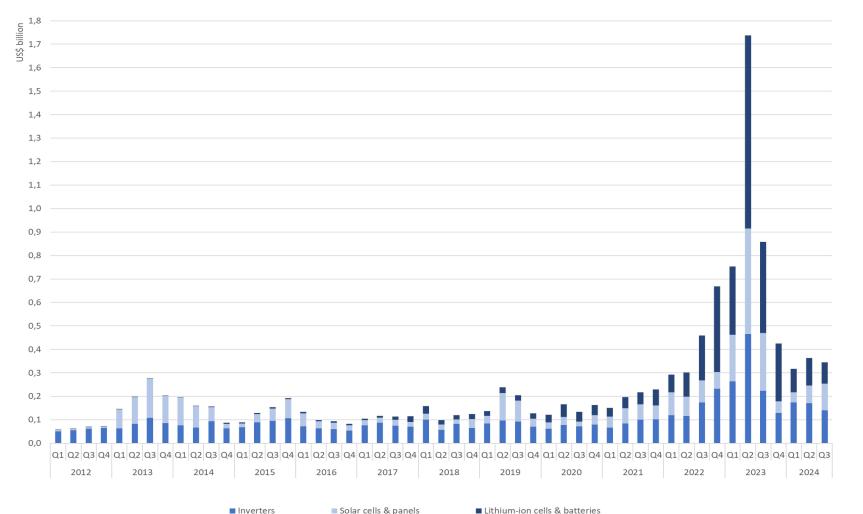
Private sector cumulative generation



- Over 10GW of private sector generation added
- Approx 4GW of mining and other industrial capacity coming online in 2025
- Another 1-1.5GW of roof top solar.

Source: Krutham Jan 2024 based on NERSA data

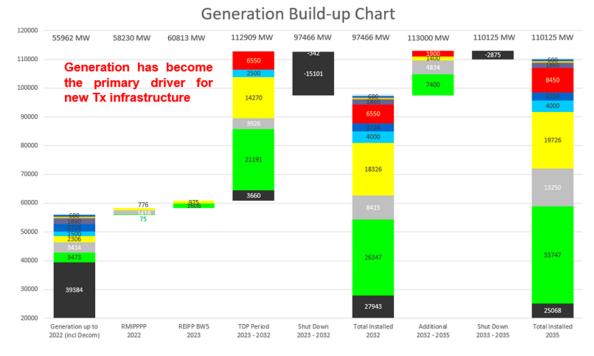
SA imports of solar panels, lithium-ion batteries and inverters in US \$ billion



- At peak, SA procured approx. 5GW of solar panels in 2023 (vs. 1,3GW in 2022.
- Together with batteries & inverters, = \$3,8b in 2023, double the value in 2022
- Over ten years, total value of imports = \$10b

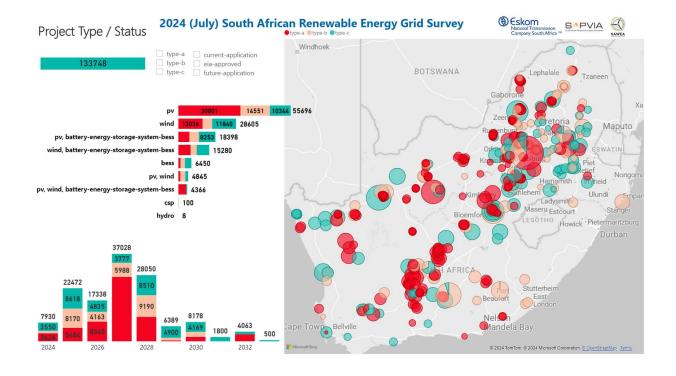
Source: Montmasson-Clair based on SARS data 2024

There are positive indicators that we can reach the recommendations made on renewable installations, with wind contributing at least 2-3 GW a year



The July 2024 South African Renewable Energy Grid Survey shows enough interest from developers to meet even the most ambitious capacity models.

The Transmission Development Plan is planning for about 45 GW of installed VRE Capacity by 2032.

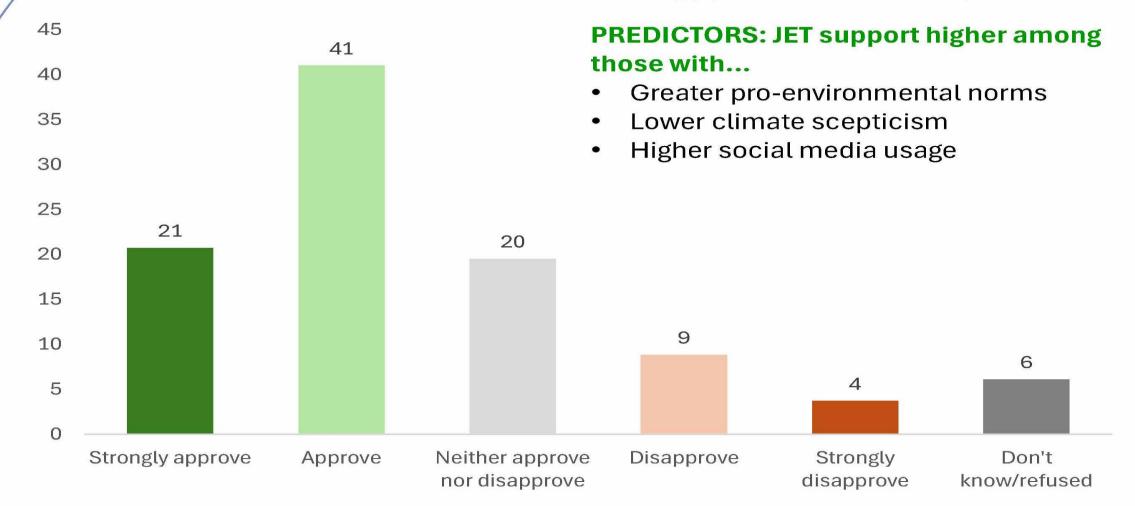




Support for the just energy transition



To what extent do you approve or disapprove of the actions being taken to change from coal to other sources of energy (like solar and wind)?



Summary of progress on climate transition

Mitigation

- DFFE preparing updated NDC and sectoral targets
- 2nd phase of carbon tax to be announced in budget speech
- NDoT reviewing green transport strategy
- SA's Article 6
 Framework should be completed in Q1

Adaptation

- National Adaptation Strategy adopted in 2017
- Only a third of actions in NCCAS are actively being implemented
- PCC has completed review of disaster management system and design of Climate Change Response Fund

Just transition

- Just Transition
 Framework adopted in 2022
- PCC published plan for jobs in Mpumalanga
- NBI is leading work on skills for transition
- Industrial development strategy for RE (SAREM) close to finalisation