

MINISTRY IN THE PRESIDENCY FOR ELECTRICITY



Ministerial EAP Update

Dr Kgosientsho Ramokgopa Minister in the Presidency for Electricity 06 August 2023



THE PRESIDENCY REPUBLIC OF SOUTH AFRICA



GENERATION PERFORMANCE







GENERATION PERFORMANCE

GENERATION OUTLOOK FOR PERIOD 31 July 2023 – 04 August 2023 (5-Day-Avg)

GENERATION OUTLOOK FOR PERIOD 24-28 JULY 2023

Date (08:00 daily)	Capacity Available (MW)	Planned outages (MW)	UCLF, Partial Losses & outage delays (MW)	Partial Load Losses (MW)	p.m. peak forecasted (MW)	Units at Risk (MW)	Outage Slip (MW)	Load Shedding Stages (range)
31-Jul-23	29170	2774	16326	6412	30996	8725	2190	Stage 2/4
01-Aug-23	29326	2307	16364	6920	31485	8150	2060	Stage 2/4
02-Aug-23	29753	2307	15931	6607	30977	8150	1991	Stage 1/4
03-Aug-23	29604	3039	15391	6607	30871	8025	1991	Stage 1/4
04-Aug-23	28533	4014	15345	5791	28835	9020	1991	Stage 1/4
Average	29277	2888	15871	6467	30633	8414	2045	



GENERATION PERFORMANCE

GENERATION OUTLOOK - TRENDLINE (May 2023 Baseline / YTD)





GENERATION PERFORMANCE

GENERATION OUTLOOK - TREND LINE





July 2023 Average





THE PRESIDENCY REPUBLIC OF SOUTH AFRICA



ONE YEAR UPDATE - ENERGY ACTION PLAN



The Energy Action Plan:

Overview of progress to date and launch of the national energy saving campaign

6 August 2023

One year of the Energy Action Plan



NECOM NATIONAL ENERGY CRISIS COMMITTEE

Progress to date

Overview of progress

Not yet commenced	Completed	On track	Some delays, no intervention	Off track, intervention needed	Critical challenges



Objective 1: Fix Eskom and improve availability of existing supply



The performance of Eskom's generation fleet is showing sustained improvement, enabling less severe load shedding than expected over the winter period. This is due to a reduction in unplanned losses to less than 16000 MW, from over 18000 MW. Generation available from wind power has also been higher than expected.



Intensive work is underway to return additional units at Kusile and Medupi power stations to service on an expedited basis. An interim solution has been found to expedite the return of Medupi Unit 4 from August 2024 to April 2024. Kusile Units 1-3 are on track to return to service by November 2023 as planned, while Unit 5 will synchronise with the grid in October 2023 and Unit 6 in May 2024.



National Treasury has finalized a substantial debt relief package finalized for Eskom, totaling R254 billion, alongside debt relief for municipalities and a move towards unbundled, cost-reflective tariffs. This is a critical step to enable Eskom to invest in necessary maintenance as well as expansion of the transmission network.



Steps have been taken to increase the load factor of OCGTs and ensure that they can be utilised more frequently to curb load shedding. This includes the allocation of additional funding for diesel for the rest of the 2023 financial year, and the deployment of an expert team to address logistical challenges with diesel supply to Ankerlig.



Objective 2: Enable and accelerate private investment in generation capacity

Schedule 2 of the Electricity Regulation Act was amended in December 2022 to remove the licensing threshold for generation facilities. Since the implementation of regulatory changes, the pipeline of private sector generation projects has increased to over 100 projects representing more than 10 GW of new capacity, which will begin to connect to the grid from this year. A survey conducted by Eskom showed that the number of projects in development is even greater, at 66 GW.

Timeframes have been reduced significantly for regulatory approvals required by energy projects. For example, environmental permits are now issued in 57 days following the gazetting of renewable energy projects as Strategic Infrastructure Projects.

A One Stop Shop has been established to provide a single entry point for renewable energy projects to obtain the necessary authorisations. This includes an online platform and dedicated capacity in Invest SA to facilitate applications, follow up regularly and ensure that maximum timeframes are adhered to.



Eskom has leased land around several power stations in Mpumalanga to developers for private energy projects. In Phase 1, agreements have been signed for 1800 MW of capacity to be built where transmission infrastructure is already available.



Eskom has put in place mechanisms to buy power from companies that have extra capacity available, through the Standard Offer Programme and Emergency Generation Programme. These programmes have already unlocked close to 400 MW in immediately available power, with a further 600 MW in the contracting process.



Objective 3: Accelerate procurement of new capacity from renewables, gas & storage



A Ministerial determination has been issued and approved by NERSA for more than 14000 MW of new generation capacity to be procured from wind, solar and battery storage – the remaining allocation in the IRP 2019. This will allow further bid windows to proceed on an accelerated basis.



Three projects from the risk mitigation programme are already in construction, and will connect to the grid by the end of November 2023. An additional five preferred bidders for hybrid projects from the same programme have confirmed their intention to reach financial close within the coming months.



Power Purchase Agreements have been signed with 19 projects from Bid Window 5 of the renewable energy programme totalling 1759 MW. Of these, 1009 MW have achieved commercial close (of which 784MW is already in construction) and a further 300 MW are anticipated to reach close and proceed to construction by the end of September 2023.



Six projects from Bid Window 6 with a total of 1000 MW are on track to reach commercial close by the end of September 2023. This will bring the total amount of new capacity under construction from the last two bid windows to over 2300 MW.



Eskom is working to import more power from neighbouring countries, such as Botswana, Mozambique, and Zambia. An additional 400 MW of power is already being imported from Cahora Bassa in Mozambique following the strengthening of the transmission line to South Africa.



Objective 4: Unleash business and households to invest in rooftop solar



Government has introduced special tax incentives for businesses and households who install solar and a revised bounce-back loan scheme to help small businesses go solar. Expanded incentives were announced in the 2023 Budget, including a rebate of 25% of the cost of solar panels and an increased capital depreciation allowance of 125% in the first year of installation under section 12B.



A draft Net Billing Framework has been developed to standardize net billing across municipalities, and is awaiting approval by NERSA. This will ensure that all distributors have an export credit in place for small-scale embedded generators to feed power into the grid.



The amount of rooftop solar capacity in South Africa has more than doubled since the Energy Action Plan was announced – an exponential increase. Total installed capacity has increased to more than 4000 MW, helping to reduce load shedding over the winter months.

Month	Estimated installed rooftop solar (total)
July 2023	4412 MW
April 2023	3368 MW
January 2023	3077 MW
October 2022	2338 MW
July 2022	2264 MW



Objective 5: Fundamentally transform the electricity sector to achieve energy security



The National Transmission Company of South Africa is being established as an independent entity responsible for managing the national electricity grid. This will ensure that the national grid remains in public ownership, while creating a level playing field to allow for private sector participation in electricity generation.



The Electricity Regulation Amendment (ERA) Bill was formally tabled in Parliament on 20 July 2023. In addition to outlining the powers and functions of the Transmission System Operator, the Bill will establish a competitive electricity market to enable greater efficiency and competition between multiple electricity generators.



In parallel to the introduction of the ERA Bill, a market code is being developed which will outline the rules of the market. This will ensure that the market can be established without delay once the Bill is enacted.



The 2019 Integrated Resource Plan is being reviewed and updated to take into account changes in Eskom's Energy Availability Factor as well as in the cost and efficiency of various technologies. This will provide an indicative, forward-looking plan to guide the optimal energy mix for South Africa.



Work is underway by NECOM and the Just Energy Transition Investment Plan (JET-IP) PMU to explore models for private sector financing of transmission infrastructure. This would significantly accelerate the strengthening and expansion of the transmission network, by crowding in private capital off Eskom's balance sheet.



National Energy Saving Campaign

Click to save



Laying the groundwork for an energy-secure future

NECOM is taking charge and leading the effort to end load shedding and make our energy more reliable, affordable and sustainable.

Energy savings is a key pillar in NECOM's communication strategy.

Demand-side management is the fastest and most cost-effective way to reduce demand, particularly during peak hours and periods of high demand.

Right now, we can reduce demand if all South Africans take part.

Our aim is to show South Africans how easy it is for each and everyone to TAKE CHARGE and help reduce load shedding.



Demand is tracking below projections – we need to keep this up



Ending load shedding as quickly as possible

We will be launching a campaign to show South Africans what they can do to help **LIGHTEN THE LOAD**, by thinking about how their own energy usage might have an impact on their wallets and the energy demands of a nation.

By reducing the amount of electricity that we use through simple actions, we can **reduce load shedding** while **saving on energy bills**.



Top tips for households



Switch off your geyser over the evening peak, from 5 to 9pm.

To make it even easier, set an alarm on your phone to remind you to switch off.



Set your geyser temperature to 60 °C.

The lower the setting, the less energy used to heat up the water. You'll save up to 5% for every 10-degree reduction. Set the thermostat on your geyser to a comfortable 60 °C (any lower than 55 °C is not recommended as at this level, bacterial growth can occur.



Plug in appliances only when needed.

Unplug appliances and electronics when you're not using them. Even when they're turned off, they still draw power. Some may draw 50% of their usual pull even in standby mode. And it all adds up.

Top tips for business



Plug in office equipment to match working hours.

Unplug computers, printers and other non-essential office equipment when not in use. Even when they're turned off, they still draw power.



Invest in energyefficient lighting.

Switch to energy-efficient lighting systems, with motion sensors that trigger only when a space is occupied. Replace your old incandescent bulbs with LED bulbs.



Conduct an energy audit to identify areas where energy can be saved

Once you've had a professional energy audit, work with your team to develop and implement an energymanagement policy and strategy. Track usage and set targets to optimise energy usage.



takechargesa.co.za

Link to website



THANK YOU

