Summary
Equity
Security
Sustainability
Build rate
Pipeline
Investment
Smart System

Energy Transition Areas	Measures	Outcomes	Trends
How does our energy system compare with the rest of the world?	World ranking[2]	Overall New Zealand ranked 9th among 99 countries. Breakdown of the ranking across the trilemma metrics:	Down from 8th in 2022
		- *Energy security: 9th*	
		- *Energy equity: 6th*	
		- *Environmental sustainability: 9th*	
Will my energy remain affordable?	Household energy bill	Down 7.2% vs 2015, and down 1.9% vs 2024 —as of Q4 2025[6]	Down 1.9% vs 2024
	Household electricity price	Down 1.1% vs 2015, and up 6.4% vs 2024 - as of Q4 2025[6]	Up 6.4% vs 2024
Will we meet our emissions targets?[1]	Renewable electricity	86%	vs 88% in 2023
	Renewable energy[3]	30%	vs 30% in 2023
	Electricity emissions	Down 64% vs 2005	Down 21% vs 2024
Are we building enough new generation?	Generation build rate	Above CCC required build rate recently; catching up from earlier under-build	3.2 TWh (2026E) vs 0.7 TWh (2025)
	Peak capacity build rate	Above required rate recently; still recovering from earlier under-build	353 MW (2026E) vs 151 MW (2025)
Will we have enough electricity when we need it?	Peak electricity risk[4]	Near-term risk remains elevated, but improving	Time to breach dropped from 3 years to 2 years between 2024 and 2025
	Dry year risk[5]	Risk remains high despite recent build lift	Time to breach dropped form 4 years to less than 1 year between 2024 and 2025

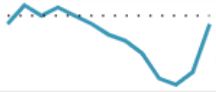
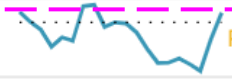
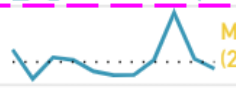
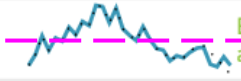
Equity measures are based on data available up to Q4 2025. Price impacts from recent Middle East conflicts are therefore not reflected.

Note: 1. As measured against the Climate Change Commission's Demonstration Path; 2. Based on the World Energy Council Trilemma Index. Breakdown of ranking by categories compares to top 10 countries only; 3. Renewable energy measures the total level of energy consumption, including transport and industry, that comes from renewable sources; 4. Peak electricity demand occurs when demand is highest across New Zealand, usually on winter evenings. The system needs enough flexible capacity to meet needs at these times; 5. A dry year occurs when there are low levels of inflows (rain and snowmelt) into New Zealand's hydroelectricity lakes and lake levels are low. The system needs enough flexible electricity to supply New Zealanders in a dry year; As the source data is based on SOSA 2025, the dry year risk doesn't reflect the impact of Huntly agreement; 6. In real terms (i.e. adjusted for inflation). * Where last year data is available.

TRANSPOWER Energy Transition Framework | Sector scorecard

On track · Watching brief · Off track

Update

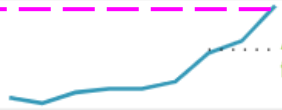
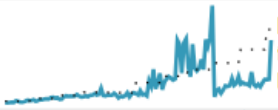
Dimension	Key metrics	Baseline year	Baseline actuals	CCC pathway	Update year	Update	Compared to last year*	Change vs baseline/tar... (%)	Trend	Commentary
Equity	Total household energy bill ($/year)	2015	6,380	n/a	2025	5,921	-2%	-7 %		Bigger change vs baseline reflects the cumulative adjustment for inflation since 2015**. LPG numbers are static.
	Retail electricity price (c/kWh)	2015	38.37	n/a	2025	38.0	+6%	-1 %		Prices are down 1.1% vs 2015 and up 6% vs 2024 in real terms
	Commercial electricity price (c/kWh)	2015	23.1	n/a	2025	23.6	+6%	+2 %		Prices are up 2% in real terms vs 2015
	Industrial electricity price (c/kWh)	2015	16.1	n/a	2025	22.2	+19%	+33 %		Prices up 33% vs 2015
Security	Major controllable outages (# / year)	1998-current	1	n/a	2025	0.4		-65 %		2025 5yr avg non enviromental outages is tracking to 0.4, lower than historical average
	Minutes of lost supply (distribution only) (Mins per customer)	2015-17	276	n/a	2022-25	370		+34%		Minutes of lost supply up 34% vs baseline period (2015-17)
	Dry year risk (Years)	n/a	n/a	Minimal >= 2 years until breach	2025	< 1 years		Less than 1 year		High dry year risk in near future
	Peak reliability risk (Years)	n/a	n/a	Minimal >= 2 years until breach	2025	>2 years		Just above 2 years		High to Moderate peak reliability risk in near future
Sustainability	Renewable energy as % of total consumed energy (%)	2005	27%	30% (2024)	2024	30%		+3%		Renewable energy share is up 3% compared to 2005, and align with CCC forecast for 2024
	Renewable electricity generation % (%)	2005	66%	87% (2024)	2024	86%		+19%		The renewable portion of electricity generation dipped below the CCC forecast by 1% in 2024, while remaining 19% above the 2005 baseline.
	Emissions from electricity generation (Mt CO2-e)	2005	9.3	2.4	2025	3.3		-64%		Electricity emissions down 64% vs 2005, and 37% above the CCC forecast for 2025
	Emissions from energy sector (Mt CO2-e)	2005	31.5	28.3	2025	25.9		-8 %		2025 emissions lower than CCC pathway.

Note: * Applicable to equity metrics only; comparison is made in inflation-adjusted values.;**The larger change compared with the baseline reflects the cumulative effect of removing inflation over the period — earlier nominal values have been adjusted downward more significantly due to cumulative inflation.

Equity measures are based on data available up to Q4 2025. Price impacts from recent Middle East conflicts are therefore not reflected.

Last Update: Apr 2026

Summary
Equity
Security
Sustainability
Build rate
Pipeline
Investment
Smart System

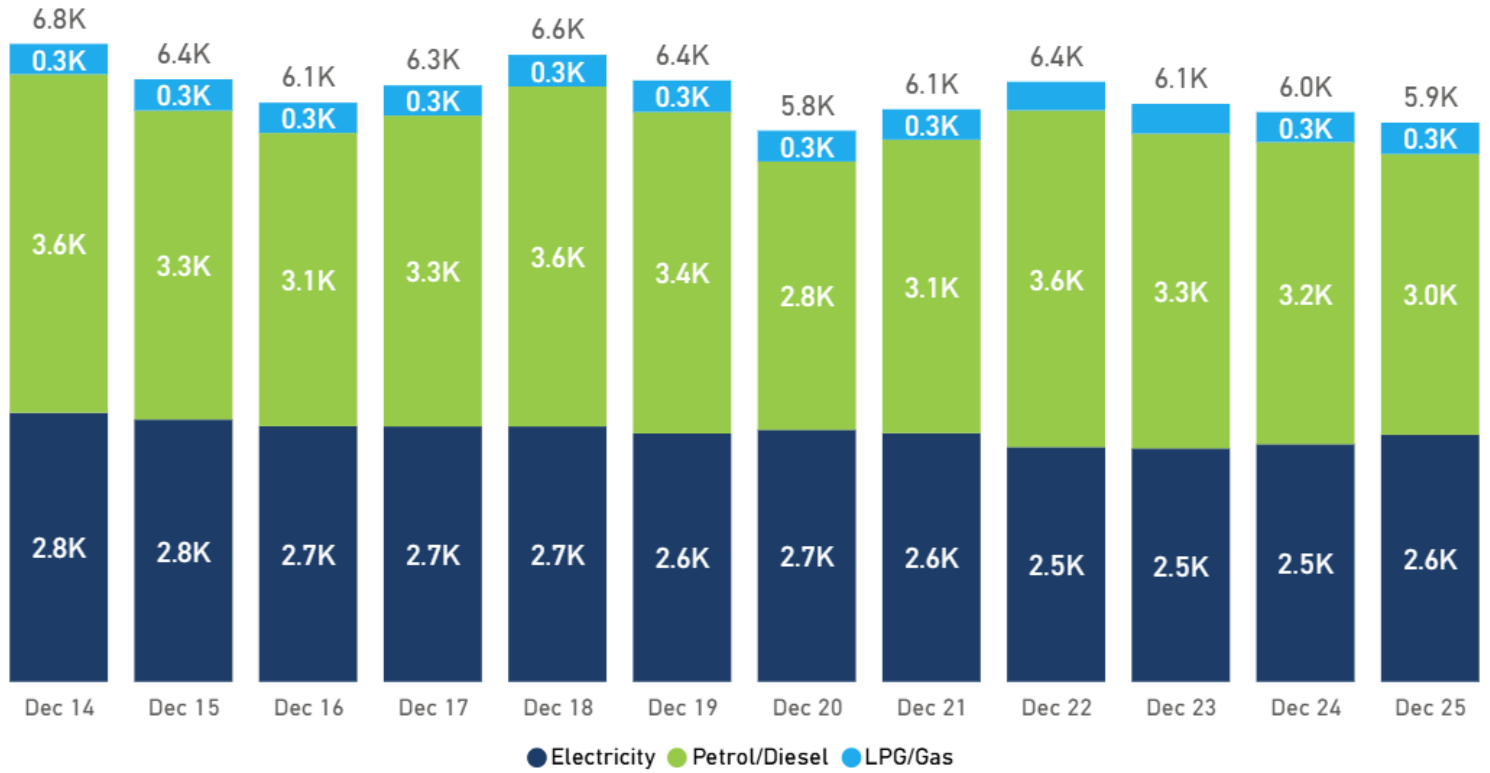
Dimension	Key metrics	Baseline year	Baseline actuals	CCC pathway	Update year	Update	Change vs baseline/target (%)	Trend	Commentary
Build rate	Generation build rate (GWh/year)	2018-20 annual ave.	377	1,150	2024-26 annual ave.	2,012	● +75 %		Above CCC required build rate recently; catching up from earlier under-build
	Peak capacity build rate (MW/year)	2018-20 annual ave.	25	151	2024-26 annual ave.	250	● +66 %		Above required rate recently; still recovering from earlier under-build
	Transport electrification rate (% of EVs)	n/a	n/a	15.2%	Mar 26	13.0%	▲ -2%		EV uptake fell below CCC projections after removal of the Clean Car Discount, with a brief early-2026 spike likely reflecting short-term factors.
Investment	Total sector investment ($/ year)	2015	2.38	n/a	2025	4.0	● +68 %		Sector Investment up 68% in 2025 vs 2015 level
Smart system	Change in Peak demand (MW)	2016-18 annual ave.	6,466	n/a	2025	6,842	▲ +5.8%		Peak demand continues to grow faster than energy demand
	Change in Energy demand (TWh)	2016-18 annual ave.	41.0	n/a	2025	41.4	▲ +0.8 %		Peak 5.8% vs Energy 0.8% compared to 2016-18
Pipeline	Generation pipeline (GWh)	n/a	n/a	n/a	2026 to 2031	15,463	▲ Not sufficient for 2030		Overall pipeline is growing, with the committed portion sufficient to meet energy demand through 2029.
	Peak capacity pipeline (MW)	n/a	n/a	n/a	2026 to 2031	1,350	▲ Not sufficient for 2030		Overall pipeline is growing, with the committed portion be sufficient to meet peak demand through 2029.

Last Update:
Apr 2026

TRANSPOWER **Energy Transition Framework** | Equity | Total household energy bill

Equity measures are based on data available up to Q4 2025. Price impacts from recent Middle East conflicts are therefore not reflected. Update

Total annual household energy bill - Last Twelve Month (NZ$/household - real)



Total household bill change - *last 12 months*

LTM25 vs LTM24	LTM25 vs LTM15
-$112	-$460
-1.9%	-7.2%

Household Bill Change by Energy Type
(Dynamic Base last 12 months period)

Electricity

LTM24

LTM25 vs LTM24 Electricity

$99	3.9%

Explanation:

- LTM Dec 25 household energy bills are -1.9 % lower than 2024 level, while electricity bills are 3.9 % higher;
- The total household energy bill calculates the average amount that each household in New Zealand pays for all energy use. This includes electricity, petrol/diesel for on-road transport, and gas/LPG. To calculate this, the total amount that households pay for each fuel is added up across the country and this amount is divided by the total number of households in New Zealand.

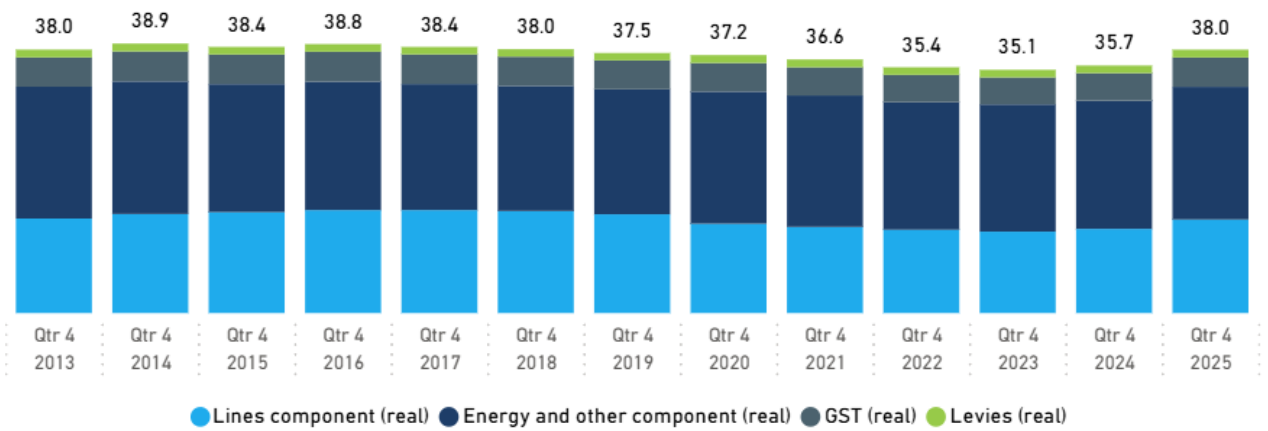
Notes:

1. Adjusted to most recent prices based on Statistics New Zealand - Consumer Price Index; 2. LPG retail price has been assumed to be to be constant at NZ$67.8 per GJ for all years.

Source: NZ MBIE - Energy Statistics; Stats NZ; NZTA Motor Vehicle Register; NZ Ministry of Transport - 2023 Annual Fleet Statistics; Stats NZ; Transpower analysis

Equity measures are based on data available up to Q4 2025. Price impacts from recent Middle East conflicts are therefore not reflected. Update

Retail electricity price (c/kWh - real)[1] - rolling last 4 quarters



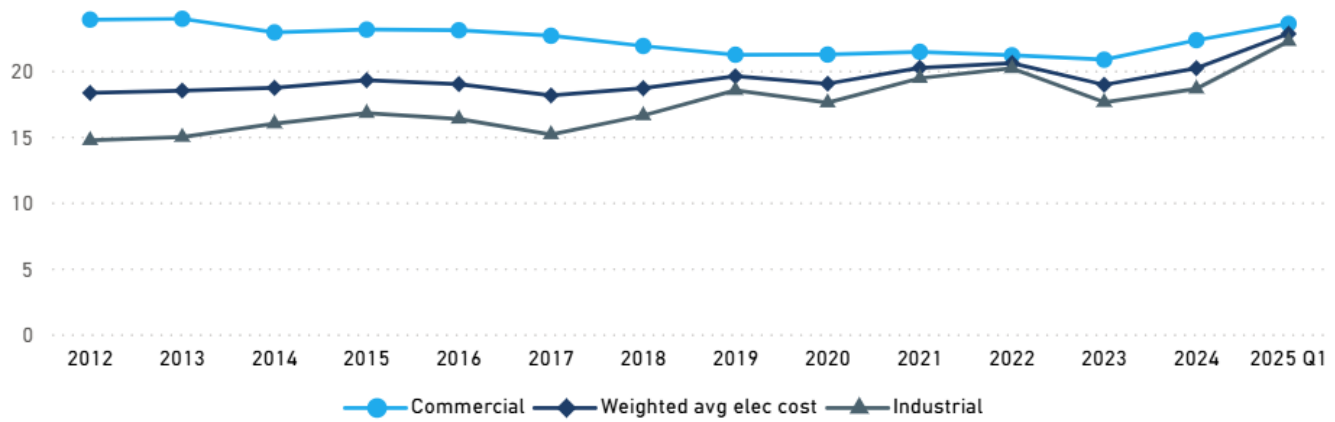
Real

Nominal

Latest quarter YoY >

- Prices presented in the chart are real average rolling last 4 quarters MBIE-reported sales-based electricity costs for each quarter, with the latest data collated from report for Q4 2025.
- 2025 Electricity price up 5% vs 2024 level in real term.
- The retail electricity price (GST inclusive) represents the average price households pay for electricity in New Zealand. This price includes several components such as transmission, distribution, generation, metering, and retail services. MBIE reports this data in two main components. For clarity in presentation, GST and Electricity Authority levies have been shown separately.
- *Lines component* – covers transmission and distribution network charges.
- *Energy and other component* – includes generation, retail, metering, and other related costs.

Electricity Price (c/kWh - real)[2] - March Year



Real

Nominal

>

- Prices presented reflect MBIE-reported annual electricity prices for each March year-end, with the latest data collated for Q1 2025.
- Commercial electricity price up 6% vs 2024 level in real term.
- Industrial electricity price up 19% vs 2024 level
- The commercial and industrial electricity prices are the average prices that businesses pay for their electricity in New Zealand. An industrial customer is a very large user of electricity that is usually connected directly to the transmission network. Their electricity bills are lower than commercial users because they buy in bulk and usually do not have a distribution component to their bill. Commercial customers are small to medium enterprise, commercial buildings or smaller manufacturing facilities that are connected to a distribution network.

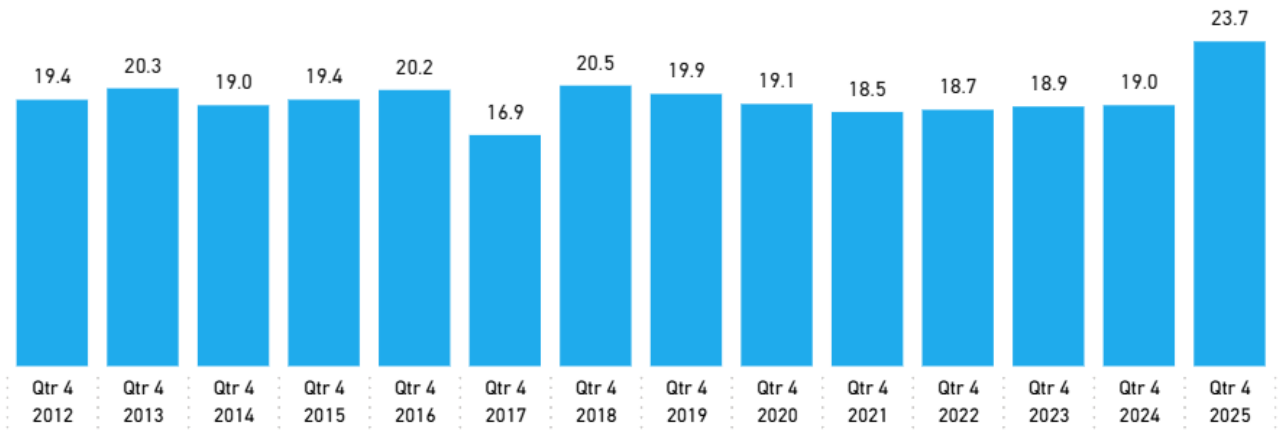
Note: 1.Presented prices are adjusted for GST, 13.04% after 2010 and 11.11% prior and a constant 0.5% EA levy, both of which have been presented individually; 2. Consumption weighted average commercial and industrial electricity price; Consumption based on estimated sales.

Source: NZ MBIE – Energy Statistics - Sales-based electricity costs; MBIE - Energy Prices

Equity measures are based on data available up to Q4 2025. Price impacts from recent Middle East conflicts are therefore not reflected.

Update

Residential gas prices (c/kWh - real) - rolling last 4 quarters

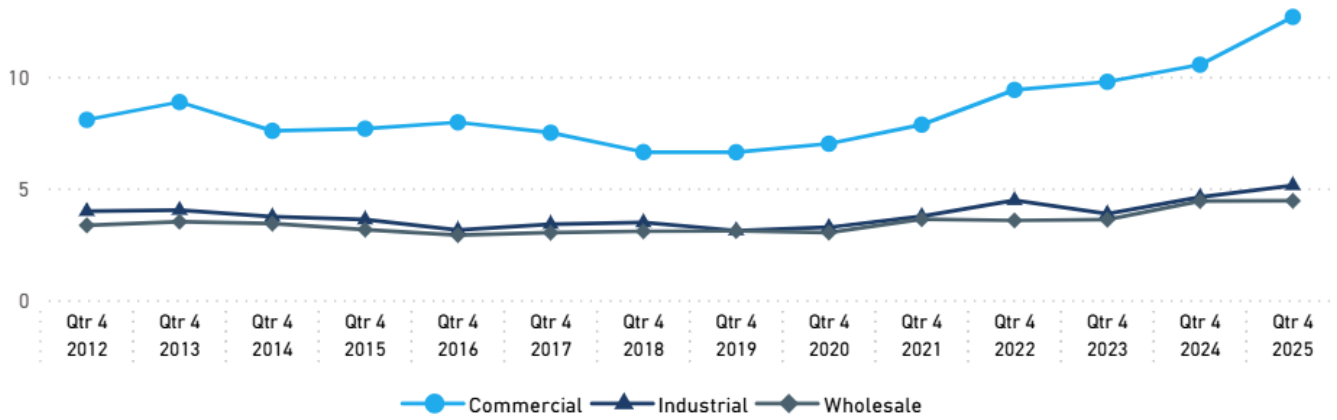


Real

Nominal

- Prices presented in the chart are MBIE-reported real gas prices for each quarter, with the latest data collated from report for Q4 2025.
- 2025 residential gas prices up 24.5 % vs 2024 levels.
- Gas prices appear lower than electricity prices on a cents-per-kWh basis; However, this comparison does not account for appliance efficiency. While gas heaters use gas and heat pumps use electricity, the relevant comparison is the useful heat delivered per unit of energy input. Evidence from EECA's *Electric Homes Technical Report (2024)* shows that electric heat pumps typically deliver around **three to four times** more useful heat per unit of input energy than gas heaters› This means significantly less input energy is required to achieve the same heating outcome, so affordability depends on both energy prices and end-use efficiency, not fuel prices alone.

Gas Prices (c/kWh - real) - rolling last 4 quarters



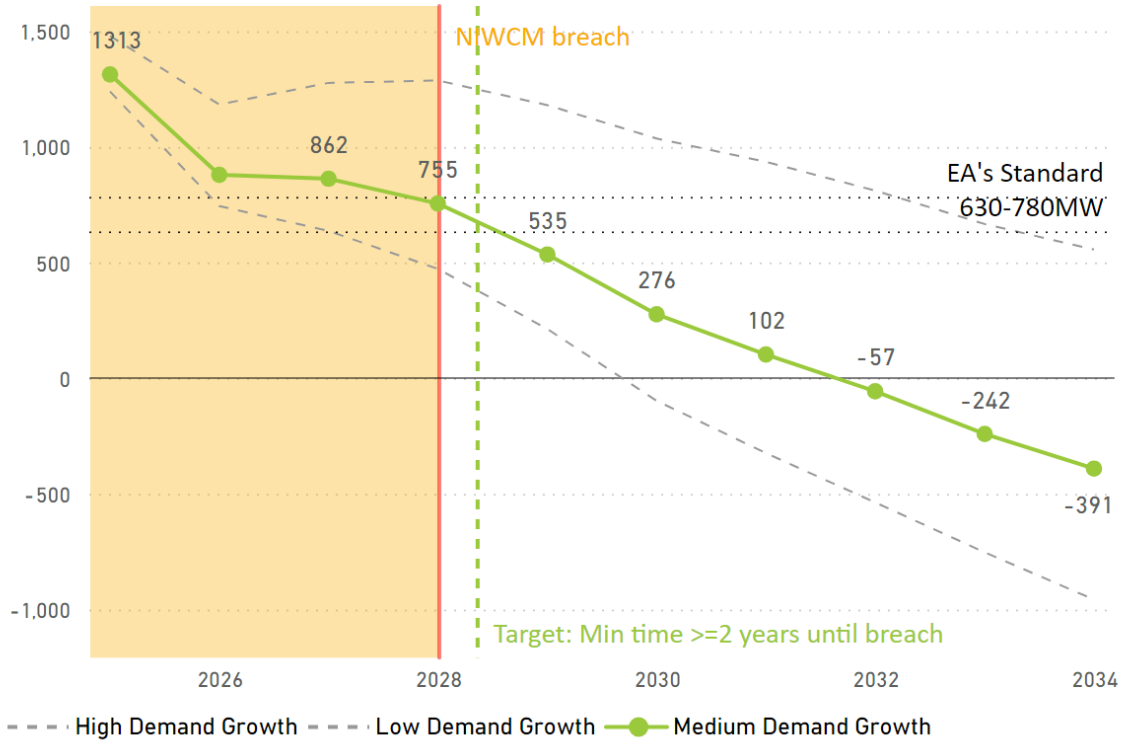
Real

Nominal

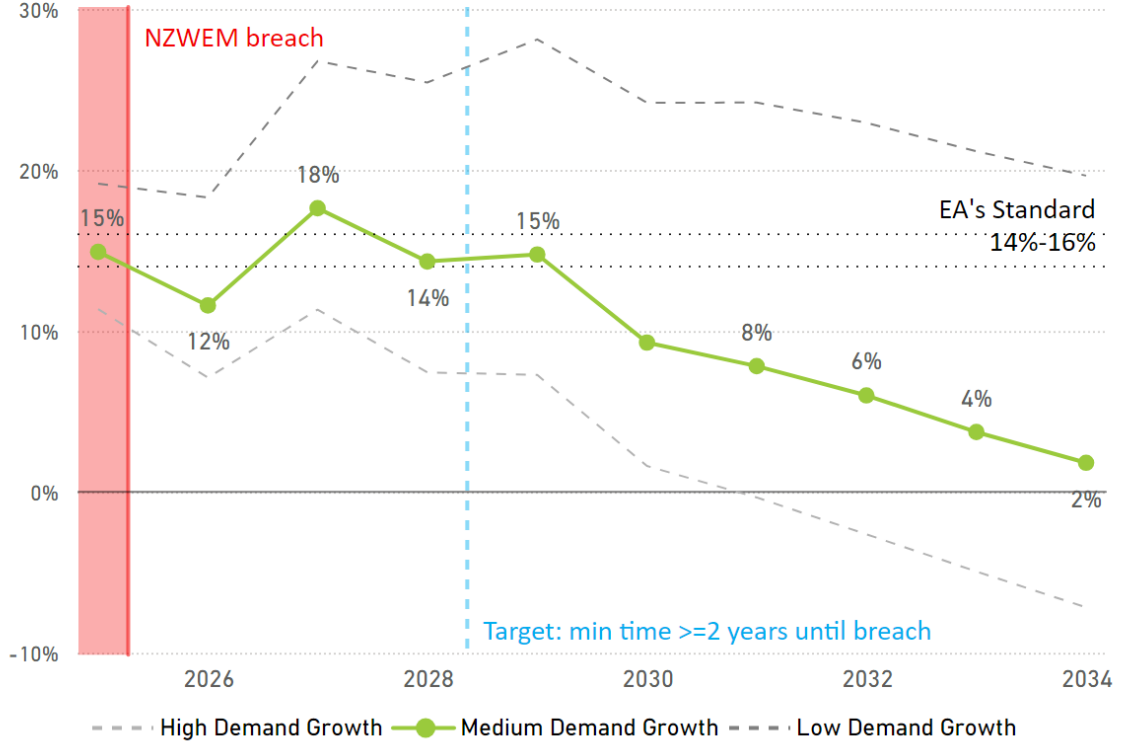
- Prices presented in the chart are MBIE-reported real gas prices for each quarter, with the latest data collated from report for Q4 2025.
- Commercial gas prices up 20.3 % vs 2024 levels.
- Industrial gas prices up 11.4 %vs 2024 levels.
- Wholesale gas prices up 0.2 % vs 2024 levels.

Source: MBIE - Energy Prices

NI Winter capacity margin projections (MW)



NZ winter energy margin (NZ-WEM) projections (%)



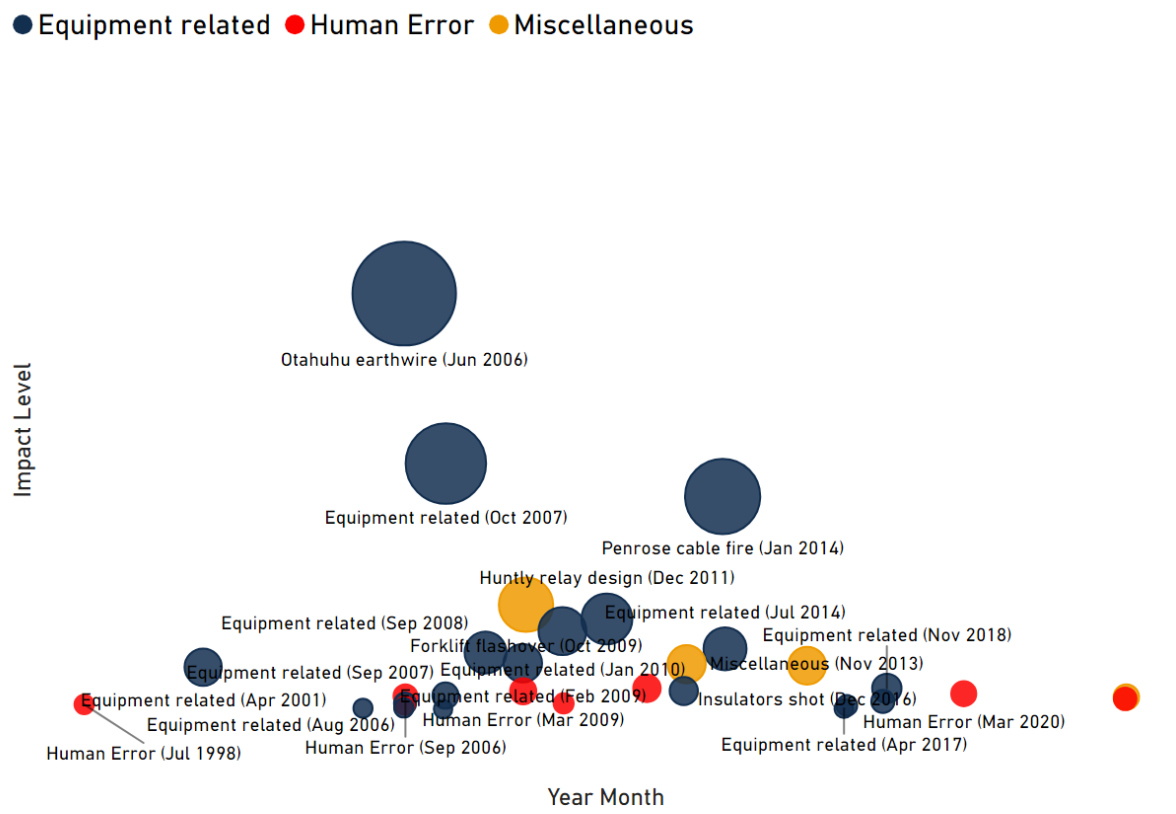
Explanation:

- The North Island Winter Capacity Margin (NI-WCM) represents the level of additional 'peak capacity' that the North Island has to maintain system reliability. It is yellow because we have about 2.5 years before we breach threshold limits. Peak capacity is generation or demand that can be easily controlled (e.g., hydro, gas or batteries) rather than weather-dependent generation like solar and wind. Peak capacity is used to provide power during peak demand periods, which are highest on winter evenings in New Zealand. A time of 2 years until a breach of the Electricity Authority's security standard is recommended for the target, as this is the time it will take to develop new batteries or demand response required to improve margins.
- The winter energy margin measures whether New Zealand has enough electricity to meet its needs in dry years. it red because we have less than 1 year before we breach the limits. New Zealand is highly reliant on hydroelectricity to produce power. However, hydroelectric dams can only store 6 to 8 weeks of water. In a year without much rain (a 'dry year'), the electricity system needs additional electricity to fill the hydroelectricity gap, which is currently supplied by coal and gas.

Sources: Transpower - Security of Supply Assessment 2025

Update, no change

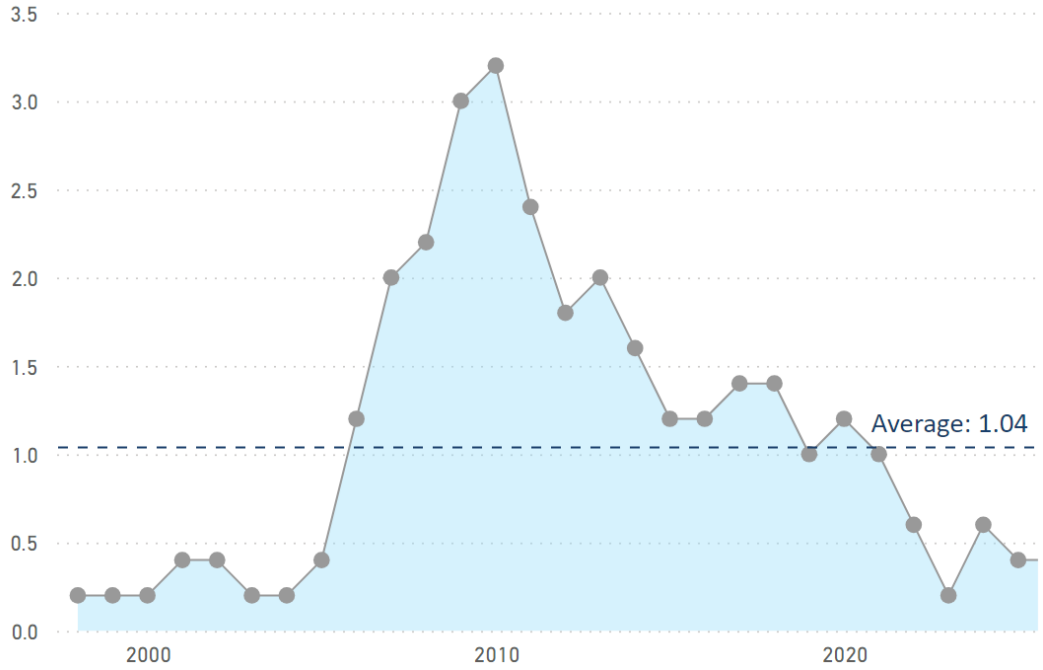
Major power outages in New Zealand



Category

Environmental | Equipment related | Human Error | Miscellaneous

5-year rolling average count of major outages (#)

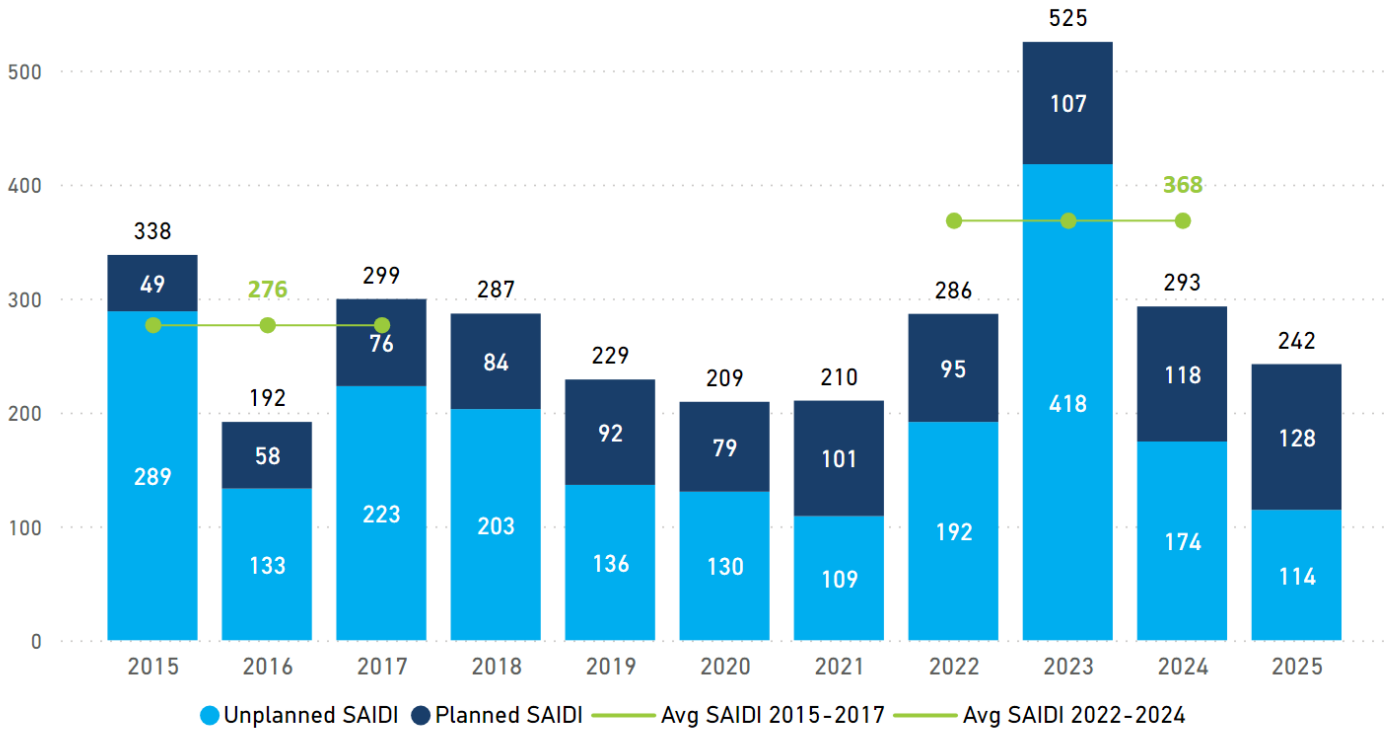


Explanation:

- The 5-year rolling average of major ***non-environmental outages*** from 2022 to 2025 is below the historical average of 1.04 per years;
- Major outage event is defined as one with an energy not served value of greater than 100 MWh, which may have a significant impact on households and business. For context, the average annual household energy consumption is 7 MWh in NZ, according to MBIE data as of Mar 2025.

Sources: Transpower data; Transpower analysis

SAIDI (minutes per customer)



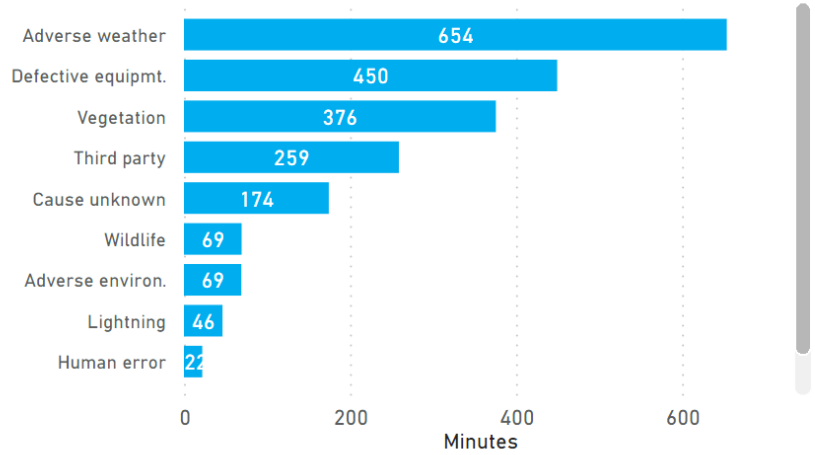
Year

All

Category

Planned SAIDI | Unplanned SAIDI

SAIDI by type (minutes)

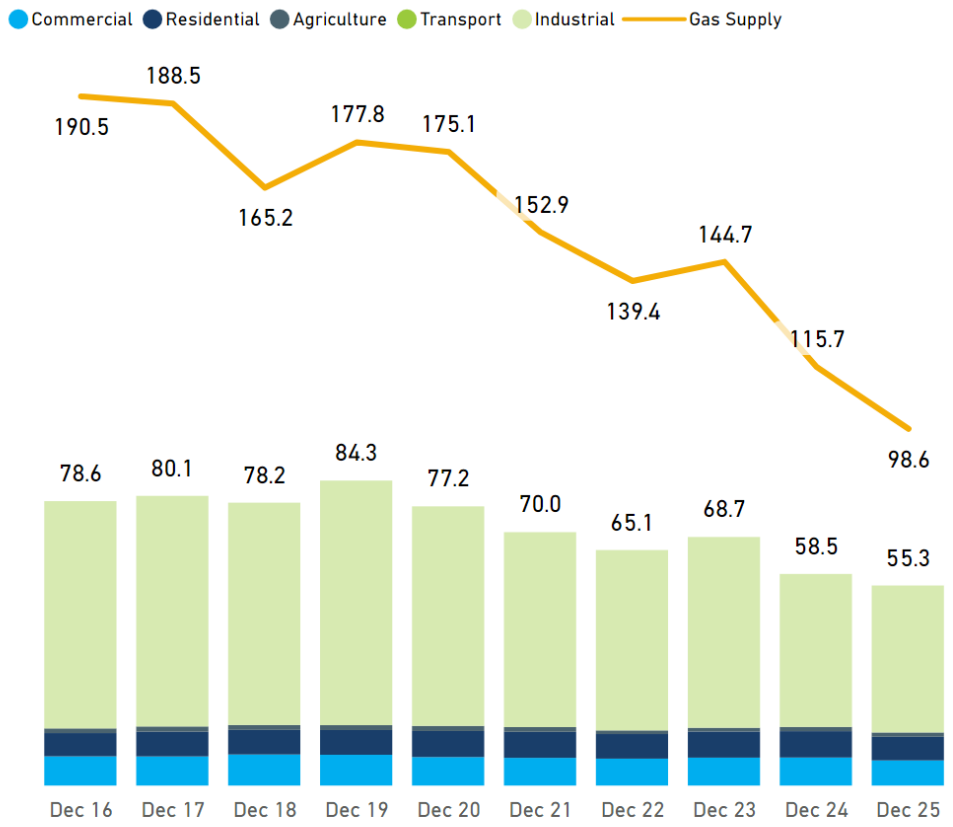


Explanation:

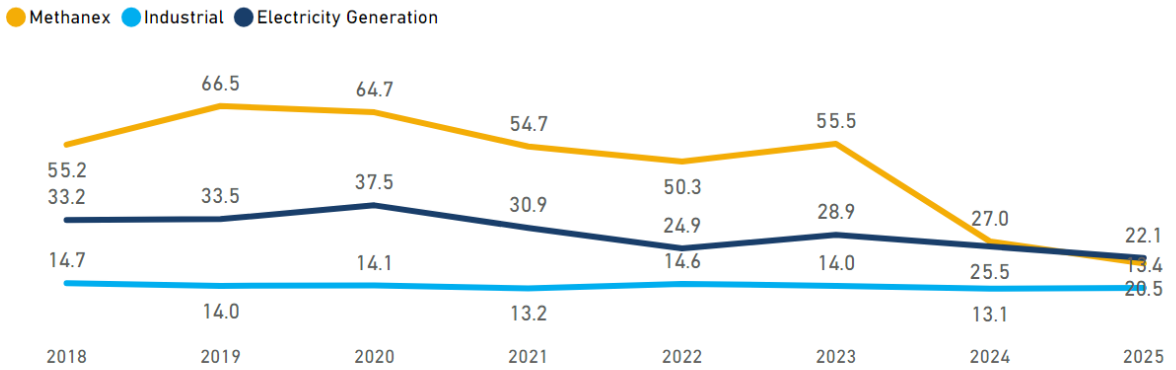
- Lost minutes of supply have increased by 34% over the past three years compared to the 2015–2017 baseline. A portion of this rise is attributable to the impact of Cyclone Gabrielle in 2023.
- The System Average Interruption Duration Index (SAIDI) measures the average number of minutes of electricity supply that each customer in New Zealand loses in a year due to distribution network (lines companies) outages.
- Planned SAIDI is where a lines company reduces electricity supply in a planned way to build or maintain lines – this is less disruptive for customers as it is accompanied by a planned notification.
- Unplanned SAIDI is where electricity supply is disrupted unintentionally and can be caused by a number of factors (e.g., asset failure, human error), which impacts customers more significantly.
- Some outages caused by natural disasters are excluded from SAIDI measurements as it is considered out of the control of the industry.

Sources: NZ Commerce Commission - Performance Accessibility Tool

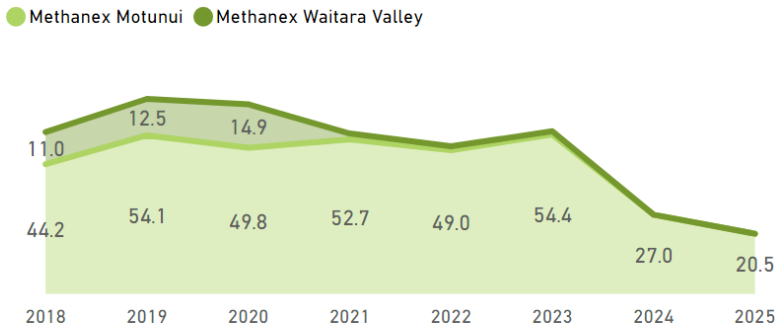
Sectoral Consumption and Gas Supply (PJ) - rolling last 4 quarters



Gas Consumption by Major User Group (PJ)



Gas Consumption by User (PJ)



User Group

Methanex

Year

All

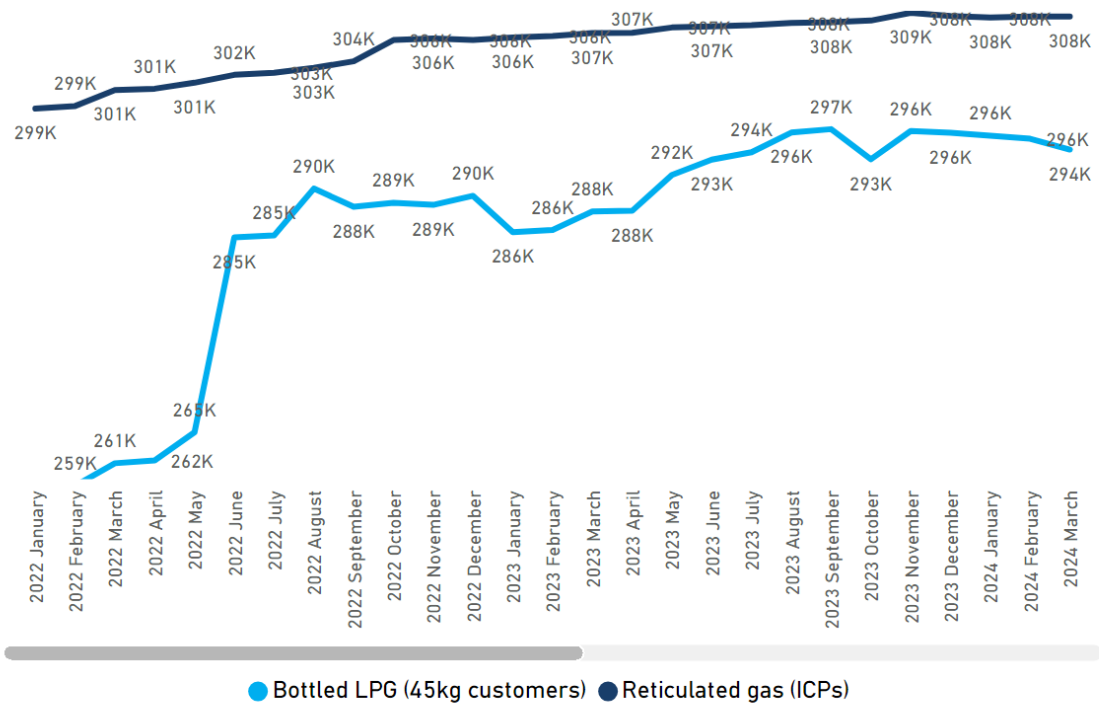
Explanation:

- The sectoral demand chart shows that industrial gas demand closely tracks supply, reflecting that large users are more directly exposed to gas availability and tend to reduce consumption when supply tightens due to curtailment or operational constraints, rather than discretionary flexibility. Residential and commercial demand is less responsive in the short term, reflecting the essential nature of gas use.
- The major user charts reinforce this pattern. Large users such as Methanex account for a substantial share of total demand and show sharper reductions in consumption during periods of constrained supply, indicating that they absorb a disproportionate share of supply tightening. This helps maintain gas availability for electricity generation and smaller end users when supply is limited.

Sources: 1) MBIE Quarterly Natural Gas data tables; 2) GIC - Gas Production and Consumption.

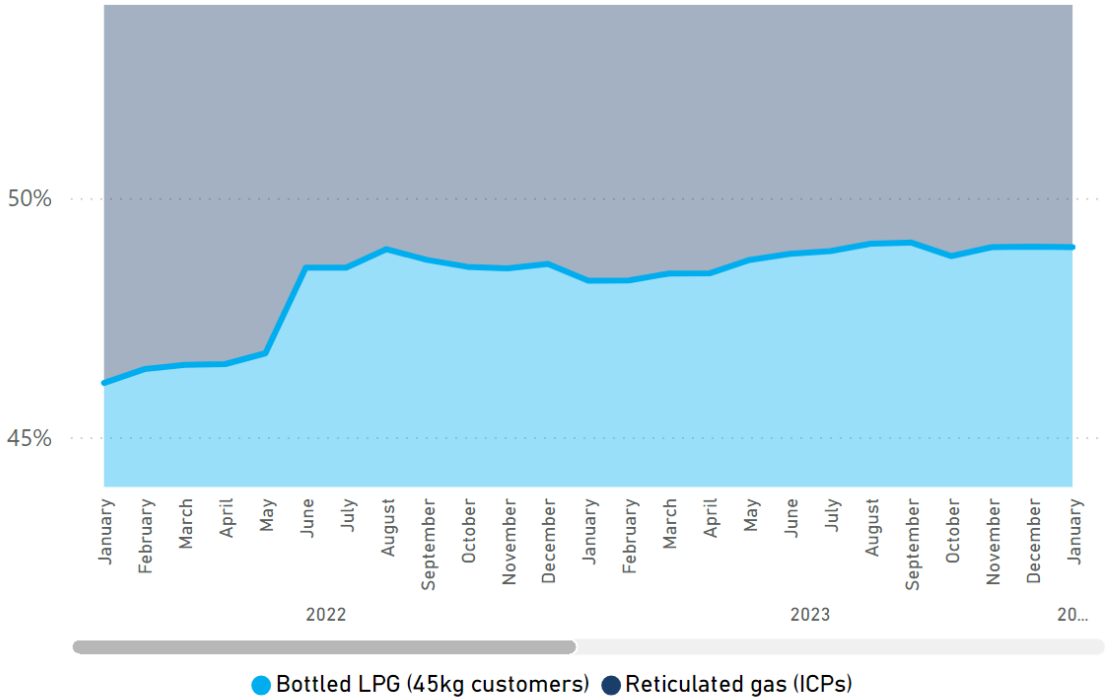
Gas-related customer points by supply type

Customer points represent ICP connections for reticulated gas and customer accounts for bottled LPG. These are not unique households.



Share of gas-related customer points by supply type

Customer points represent ICP connections for reticulated gas and customer accounts for bottled LPG. These are not unique households.



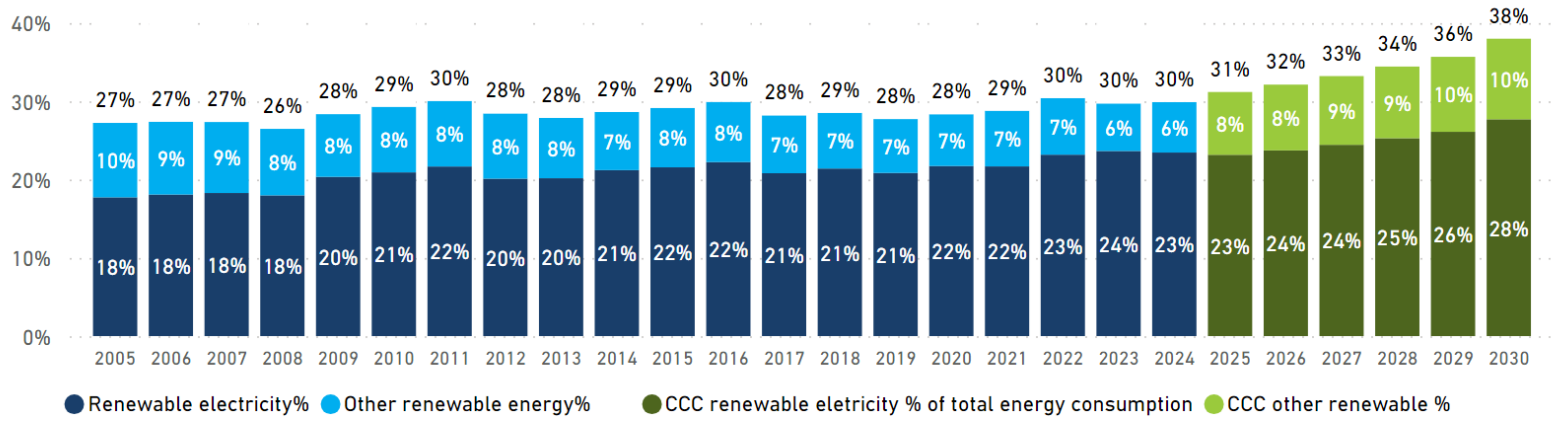
Explanation:

- Bottled LPG customer points have grown faster than reticulated gas, while gas ICPs show a slight decline in 2025. Slower growth in gas connections may reflect increasing electrification and might also be influenced by the relatively high upfront cost of connecting to the gas network.
- The changing LPG–gas share suggests some divergence in usage trends, but it is difficult to determine whether this reflects direct substitution between LPG and reticulated gas. Any transition away from existing gas connections is likely to be gradual, given the costs associated with disconnection.

Note: Measures show average annual gas-related customer connection points, combining 45 kg bottled LPG customer accounts and active gas ICPs, calculated as the average of monthly figures. LPG data reflects a methodology change from January 2022; earlier data is not comparable and is not presented.

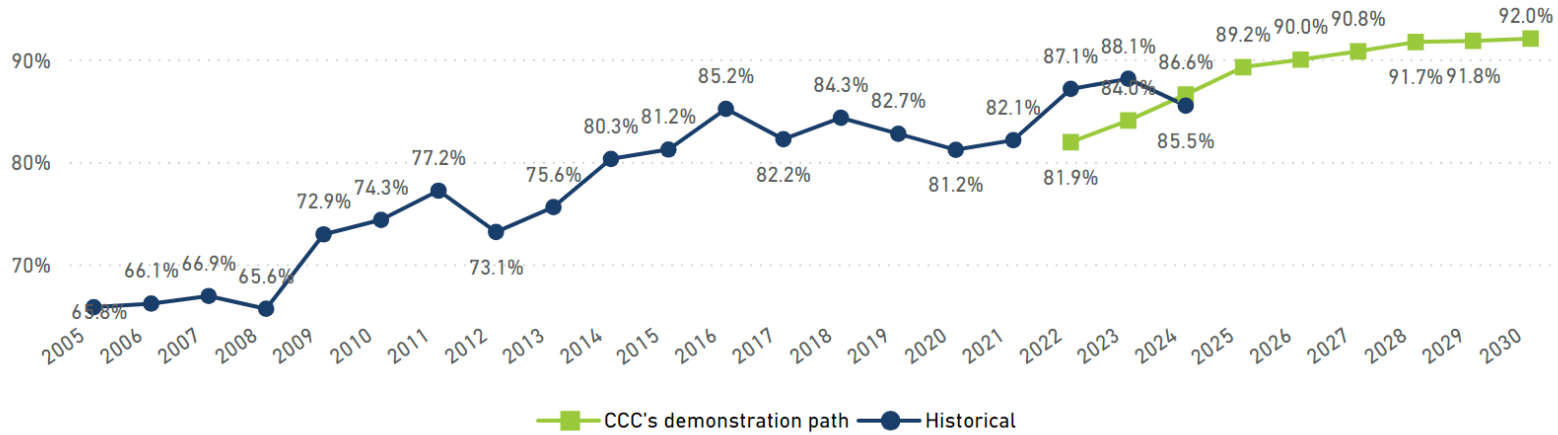
Source: Gas NZ; GIC

Renewable share of total consumed energy (%)



- Renewable energy share of total consumed energy is 29.9%, slightly lower than CCC forecast of 30% in 2024.
- Renewable energy share of total consumed energy is the total proportion of all energy (including transport and heating) that is produced by renewable sources. In New Zealand, electricity generation is ~85% renewable today but the total energy consumed is only 28% renewable, because a lot of fossil fuels are still burnt outside of the electricity sector for uses like petrol in cars. Most renewable energy comes from electricity (23%), with nearly all of the rest coming from wood-based biomass (7%).

Renewable electricity generation (%)

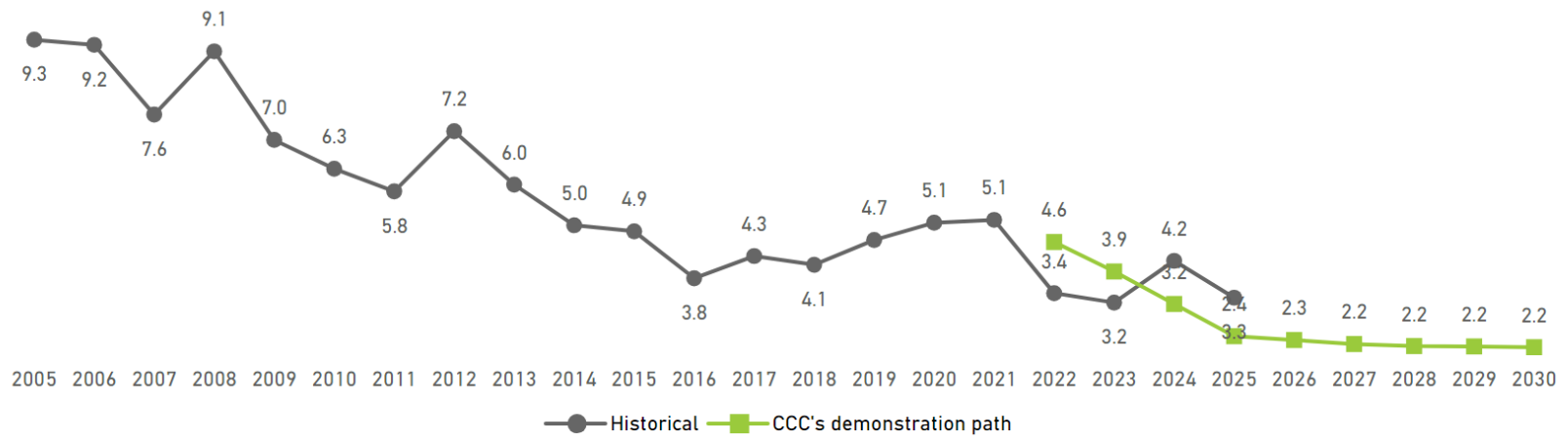


- Renewable electricity 85.5% in 2024, lower than CCC forecast of 86.6%.
- Renewable electricity % is the total proportion of electricity that is produced by renewable sources. In New Zealand, the renewable electricity % can fluctuate up and down year-on-year due to the electricity system's heavy reliance on hydroelectricity. Renewable electricity % tends to be higher in a wet year and lower in a dry year. As a result, it is not necessarily the year-to-year movements that matter most, but that the general trend is increasing through time.

Note 1.Other renewable energy sources include biomass, biogas and geothermal. 2024 data for actual total energy consumption is not publicly available yet

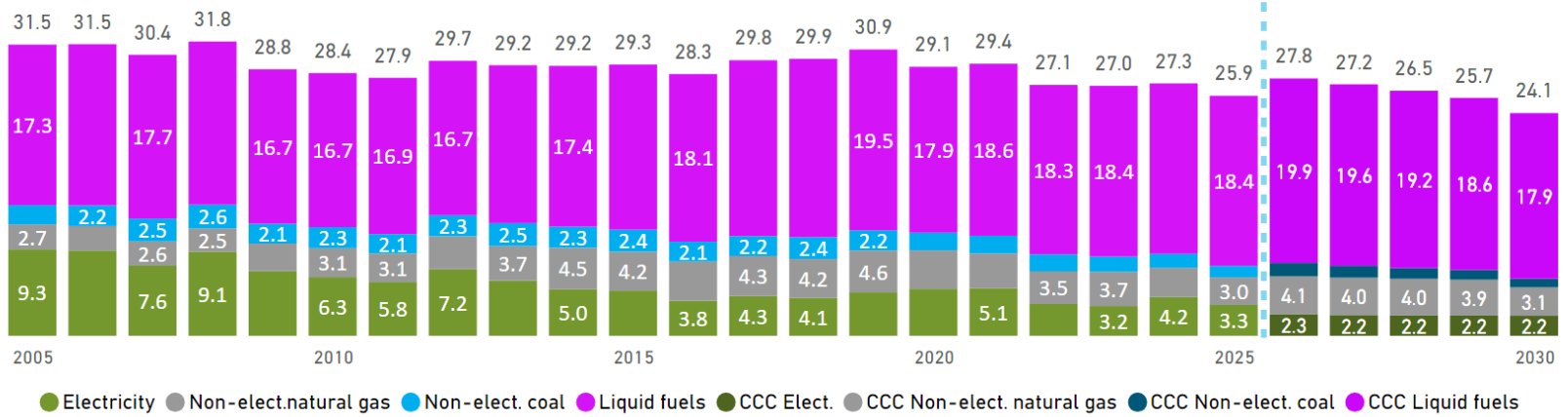
Source: NZ MBIE – Energy Statistics, Climate Change Commission - 2023 Draft advice to inform the strategic direction of the Government's second emissions reduction plan

Total electricity generation emissions (Mt CO2-e)



- Renewable generation emissions of 3.3 MtCO2-e, higher than CCC forecast of 2.4 MtCO2-e. This is due to the dry year in 2024, which leads to high consumption of coal.
- The total emissions from electricity generation measures emissions from all power plants in New Zealand. Electricity sector emissions can fluctuate up and down year-on-year due to the electricity system's heavy reliance on hydroelectricity. Emissions tend to be lower in a wet year and higher in a dry year.

Total emissions from energy sector (Mt CO2-e)

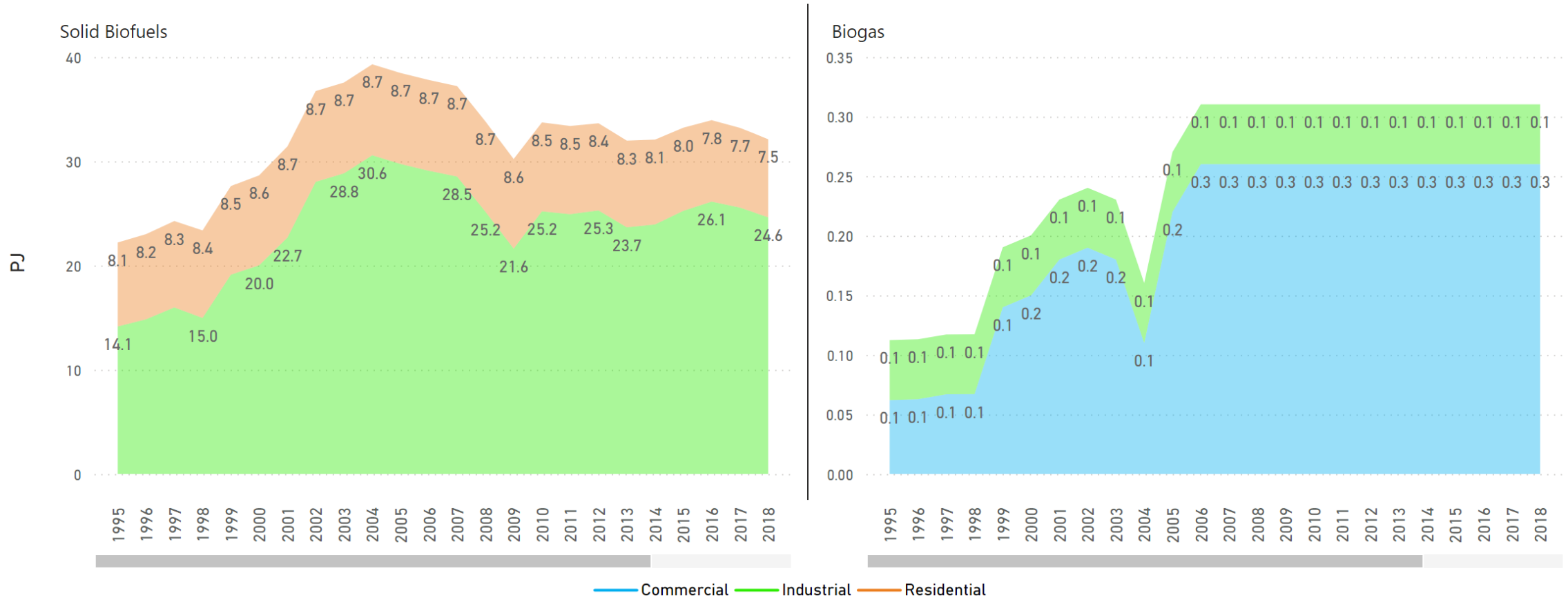


- Total energy emissions in 2025 of 25.9 MtCO2-e lower than CCC forecast of 28.3 MtCO2-e.
- Total emissions from energy measures nearly all emissions across our energy sector including electricity, non-electricity coal and gas (e.g., for heating industry or homes), and oil used transport. This analysis excludes non-CO2 emissions from liquid fuel, natural gas and coal, as well as fugitive emissions from oil and gas extraction, as this is not updated quarterly by MBIE which can result in a lag in data. The electricity sector can reduce its own emissions (predominantly those arising from electricity generation) and it can enable emissions reductions in transport and industry through electrification.

Source: NZ MBIE – Energy Statistics, Climate Change Commission - 2023 Draft advice to inform the strategic direction of the Government's second emissions reduction plan

New

Emerging Fuels – End Consumer Energy Use by Sector, Excluding Transformation (PJ)

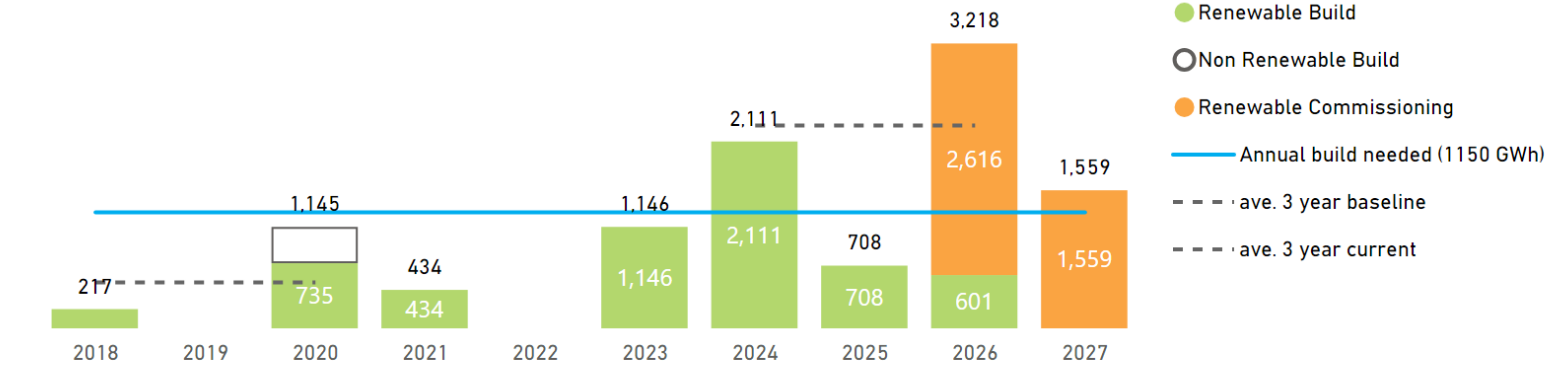


Explanation:

- Shows observed end consumer use of emerging fuels by sector, in petajoules (PJ).
- Data reflects final energy consumption by end-use sectors and excludes energy transformation.

Sources: MBIE - Energy Balance Tables.

New generation commissioned (GWh)[1]



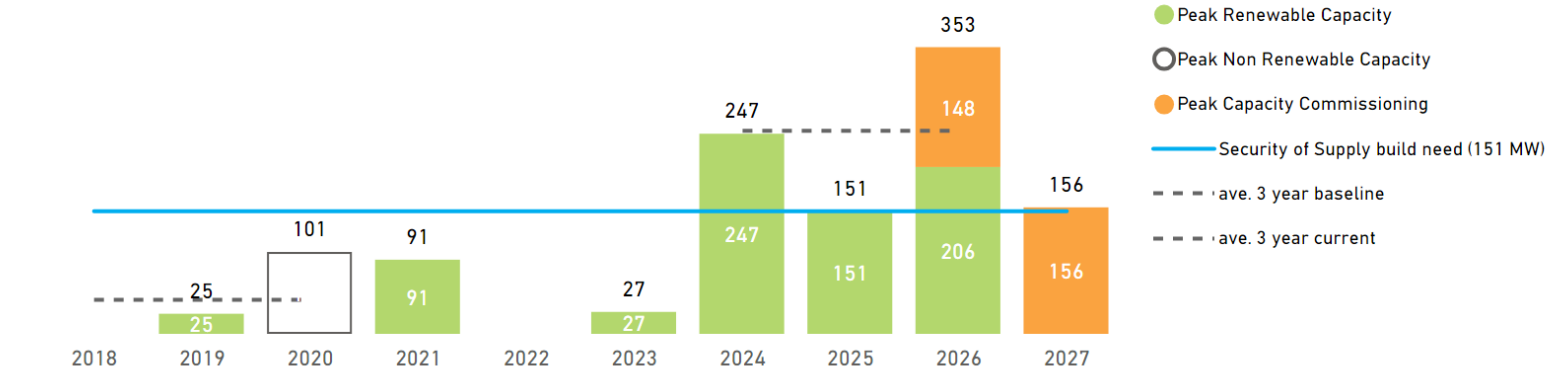
Generation build rate growth

Compares current annual ave. build rate (2024-2026) with baseline build rate (2018-2020)

x3.43
Build rate growth

+2K
Build rate change (GWh)

Winter peak capacity commissioned (MW)[2]



Peak capacity build rate growth

Compares current annual ave. build rate (2024-2026) with baseline build rate (2018-2020)

x4.98
Peak build rate growth

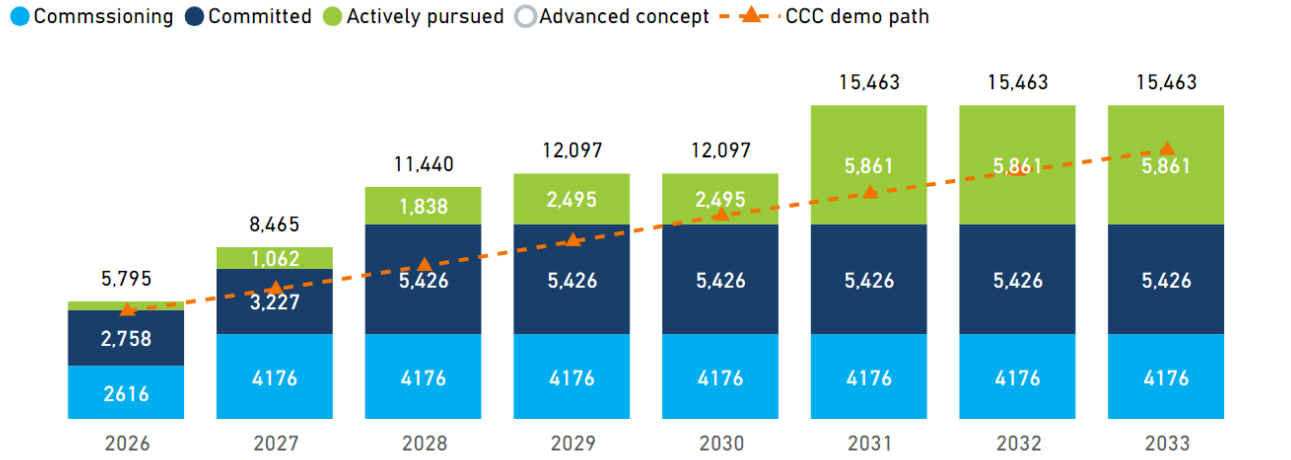
+208
Peak build rate growth (MW)

Explanation: Generation and peak capacity build rates compare current (2024–26) and baseline (2018–20) periods to assess progress toward electrification targets of annual build needed (CCC) for energy generation and ensure the North Island Winter Capacity Margin maintains a two-year buffer before breaching the Electricity Authority's security standard for winter peak capacity.

Notes: 1. Energy and peak capacity are calculated using the capacity factor of new generation by energy type.; Commissioning data includes only new generators with a capacity greater than 10 MW; 2. The commissioning year is adjusted if the commissioning month falls after winter in the respective year.

Sources: Transpower data; Transpower Electricity Risk Curve and Simulated Storage Trajectories Assumptions Spreadsheet; Transpower analysis

Generation pipeline (GWh)

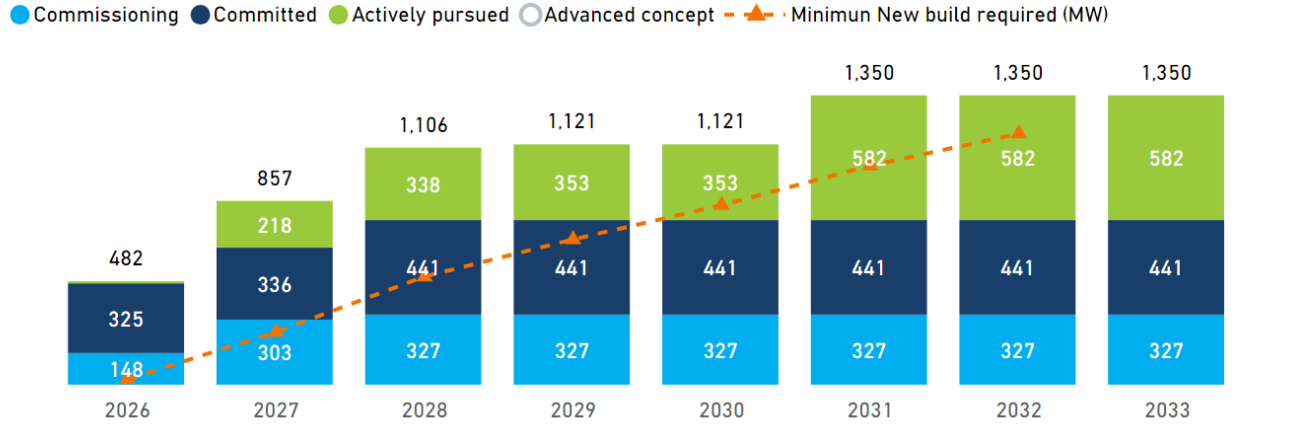


There is broadly sufficient energy in the pipeline through 2029 based on commissioning and committed projects. **From 2030 onwards, energy adequacy becomes dependent on the successful progression and delivery of actively pursued projects.**

The chart shows the scale and timing of new generation required to meet the CCC electrification pathway. The dotted line represents indicative CCC demand, while the bars show the EA generation pipeline by project status, using EA definitions.

- **Commissioning**: Under construction and expected to be commissioned in the next few years.
- **Committed**: Final investment decision (FID) made.
- **Actively pursued**: Pre-FID projects with key development milestones achieved.
- **Advanced concept**: Early-stage projects below the actively pursued threshold.

Winter peak capacity pipeline (MW)

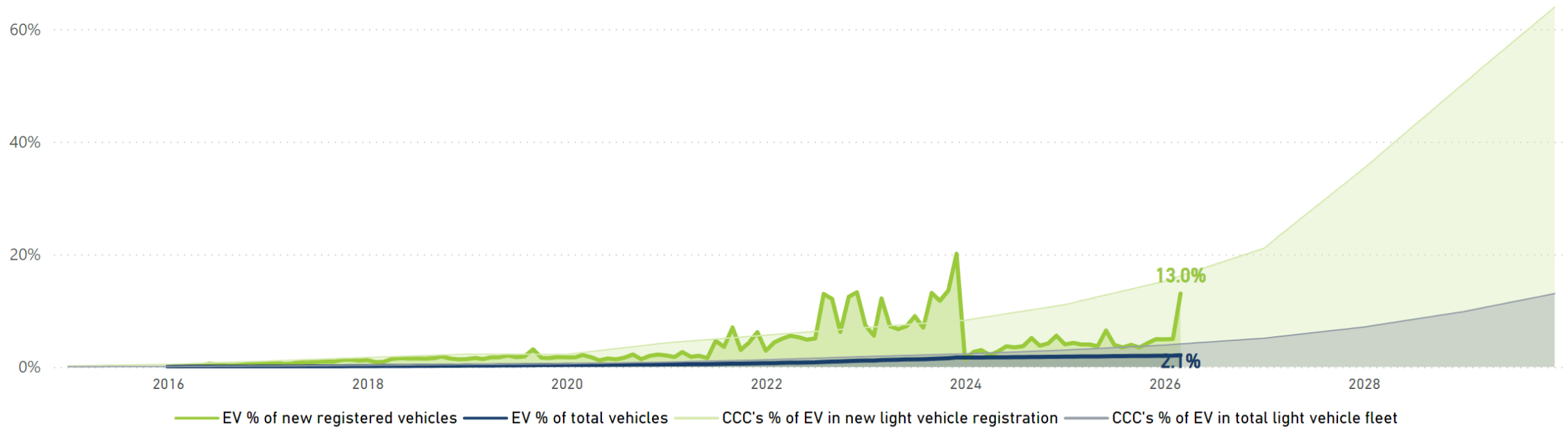


- This chart shows the peak capacity build rate and pipeline relative to the minimum new build required to maintain the North Island Winter Capacity Margin with at least a two-year buffer before any projected breach. The dotted line represents the indicative minimum capacity required over time, while the bars show the EA generation pipeline by project status.
- Overall, there is **broadly sufficient capacity in the pipeline through 2029** when considering projects that are commissioning and committed.
- Beyond this period, meeting the minimum capacity requirement increasingly relies on less-mature projects, indicating higher delivery and timing risk.

Notes: 1. Energy and peak capacity are calculated using the capacity factor of new generation by energy type.; 2. Pipeline includes grid-scale projects only; distributed generation will be added when data is available; 3. The 2033 peak pipeline target is not shown, as it is defined two years ahead and the WCM dataset ends in 2030.

Sources: 1. Commissioning projects - Transpower's data; Committed, Actively pursued and Advanced concept projects- EA generation investment pipeline.

Light vehicle EV adoption (Monthly %)



Explanation:

- The transport electrification rate assesses the uptake rate of light electric vehicles against the CCC's forecasts. Both in terms of new vehicles entering the fleet and the total fleet makeup, light electric vehicle uptake are sitting at roughly half the CCC forecast to date.
- The annual light vehicle registrations measures the % of vehicles entering the fleet (both new and used) that are electric. The total light vehicle fleet measures the % of vehicles that are electric in the total New Zealand light vehicle fleet. The sharp increase towards the end of 2023 was driven by the end of Clean Car Discount, prompting many people and dealers to register and even pre-register their vehicles.
- The significant decline in EV registrations in Jan 24 can be attributed to policy changes implemented by the government including Termination of the Clean Car Discount effective from Jan 24, introduction of Road User Charges from Apr 24 and increase in ACC levies for EVs.
- The uptick in March 2026 is attributed to external factors, including geopolitical developments (e.g. Iran-related tensions), which may have influenced fuel price expectations and consumer behaviour.

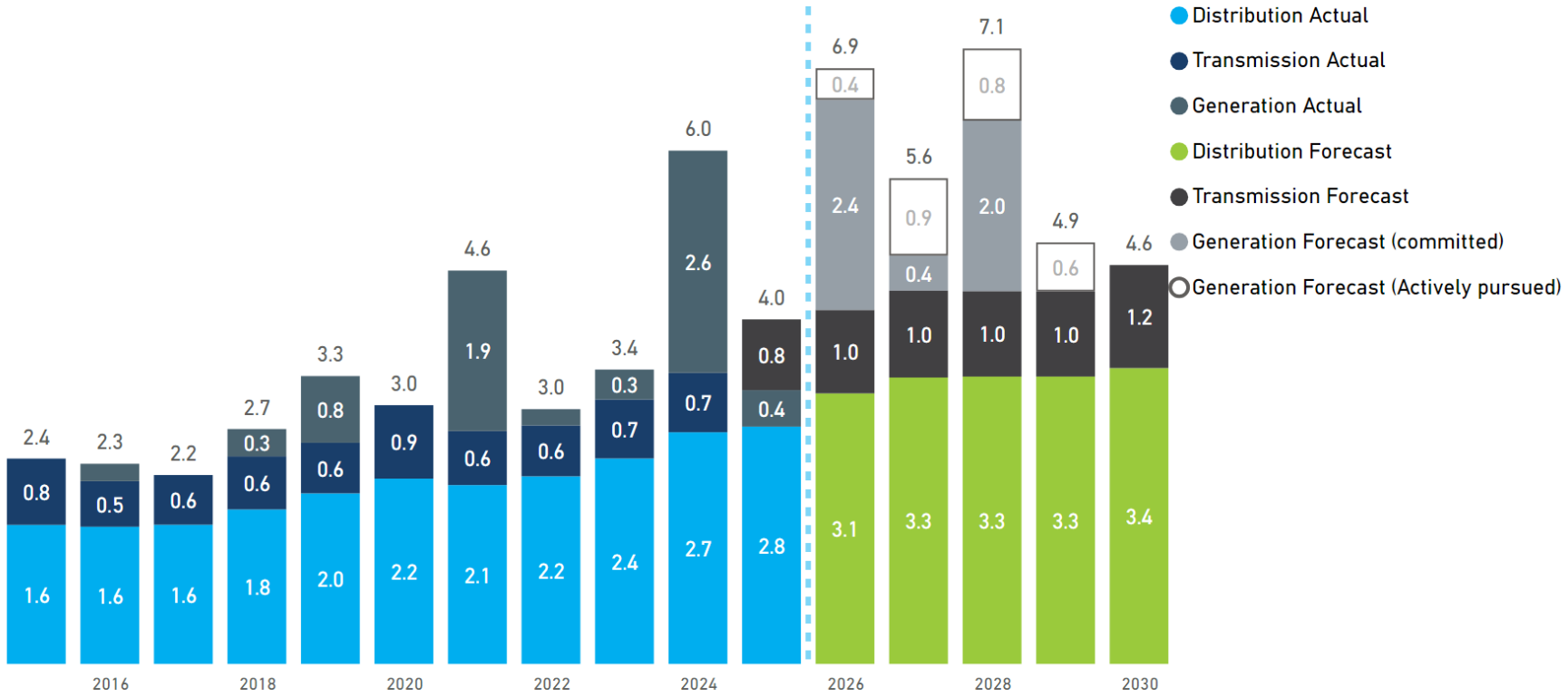
Notes: The Climate Change Commission (CCC) provides annual EV % targets, while the Ministry of Transport (MoT) reports monthly actual registrations. To compare these datasets, we use linear interpolation to estimate monthly CCC targets from the annual values.

This gives us a smooth, month-by-month progression that aligns with MoT's data. This method assumes steady growth throughout the year, making it easier to track progress against CCC's long-term goals.

Sources: Ministry of Transport; Climate Change Commission - 2023 Draft advice to inform the strategic direction of the Government's second emissions reduction plan; Transpower analysis

Update, methodology update

Total expenditure (NZ$b) - real



Type

All

Group

All

Investment Growth

68%

Sector Investment is up 68% in 2025 compared with 2015 (Generation investment includes committed projects only)

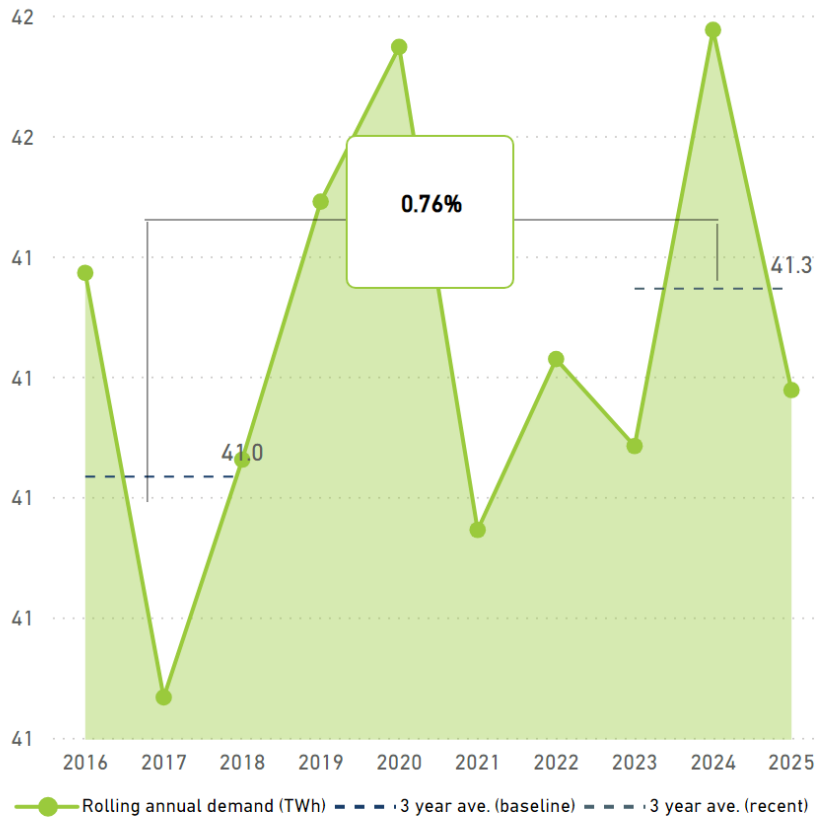
Explanation:

- Investment increased by 33 % in 2025 ($4.0b) compared with 2020 levels ($3.0b).
- The investment figures outline historic and forecast investment across the sector. They includes both capex and opex for transmission and distribution. For generation, they include capex for new generation projects but excludes generation opex. Distribution forecast figures are based on 2024 AMPs, which may underestimate required investment.
- Forecast generation expenditure is estimated by applying technology-specific capital cost assumptions to EA generation pipeline volumes. The resulting figures are indicative, order-of-magnitude estimates for system-level context. Forecast estimates are high-level, reflect grid-connected generation only, and exclude distributed generation.

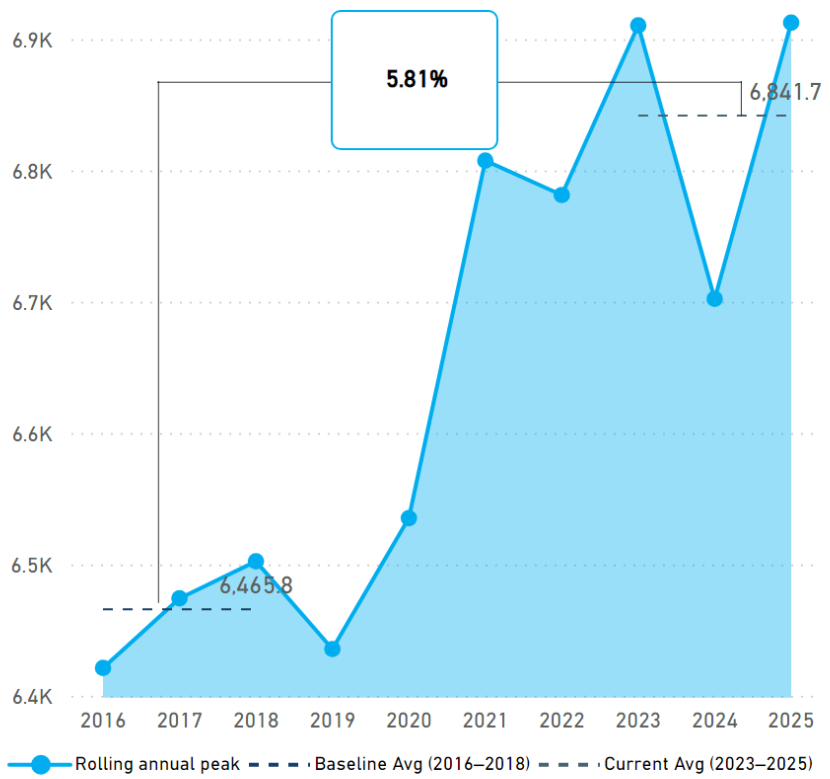
Notes: Dollar values have been adjusted to real 2025 dollars; Distribution expenditure comprises data from all 29 electricity distribution businesses in New Zealand; forecast values based on asset management plans (AMPs) submitted by EDBs to the Commerce Commission; Generation expenditure is based on BCG analysis for historical data before 2022. Data for 2023–2025 is sourced from press research and forecast values are estimated using EA pipeline volumes and benchmark capital costs by technology.

Source: NZ Commerce Commission - Performance accessibility tool; New Zealand electricity distributors; Transpower RCP4 consultation document; Transpower disclosures; Transpower's 2025 generation stack; Press search; Transpower analysis; BCG report

Electricity Demand (TWh) Through Mar - Rolling 12-Month



Peak electricity demand (MW) Through Mar - Rolling 12-Month



Total Demand Growth

0.76%

VS

Peak Demand Growth

5.81%

Peak Demand growing faster (x7.64 times)than electricity demand

Explanation: Changes in the growth rates of energy consumption and peak electricity demand can signal shifts in how efficiently electricity infrastructure is being utilised. Currently, peak demand is rising faster than total energy demand, reflecting short-term dynamics like increased electrification, distributed generation (e.g. solar PV), and changing consumption patterns. Over time, a system where energy demand grows faster than peak demand typically indicates smarter, more efficient electricity use—enabled by better load management and demand-side flexibility. BCG estimates that smarter system utilisation could avoid billions in infrastructure investment, as much of the cost is driven by the need to meet peak demand.

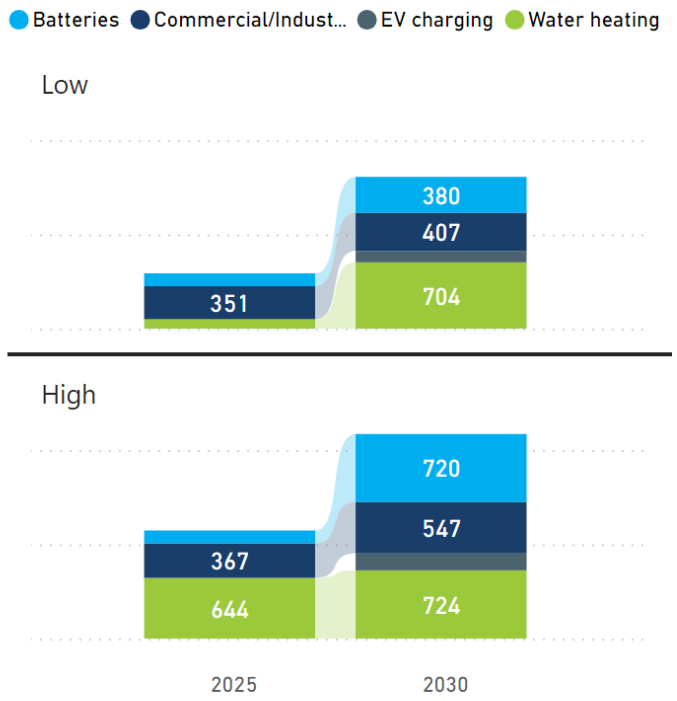
Sources: EMI and EM6; Peak demand is H20 peak in the last 12 months period.

TRANSPOWER Energy Transition Framework | Smart System | Flexibility indicators

New

System-wide flexibility data is not yet available through a single, comprehensive public dataset. The Energy Transition Framework consolidates modelled FlexForum and EECA estimates alongside MBIE observed data to provide an indicative view of flexibility progress. Improved visibility will require coordinated, industry-wide data development.

FlexForum - Modelled Flexible Capacity (MW)



EECA - Modelled Demand-side Flexibility (GWh)

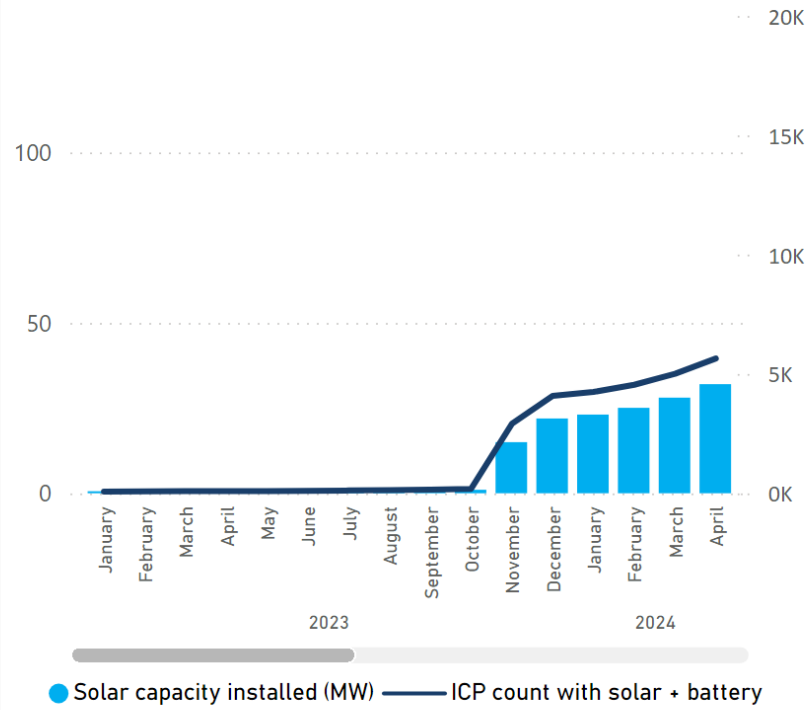
Estimated current demand-side flexibility

1,350 GWh

By 2040, increasing to

2,000 GWh

EMI - Installed Solar with Batteries (MW) & ICP counts



- FlexForum estimates provide a one-off snapshot of deployed (2025) and potential (2030) flexible capacity in MW, presented under low and high cases.
- EECA modelling estimates the volume of electricity demand that could be shifted away from peak periods under different uptake and incentive assumptions, expressed in GWh, and projected through to 2040.

EMI reports solar capacity and ICP count for residential **solar-with-battery** installations, but not the associated battery capacity. This measure is therefore best read as an uptake indicator for paired solar-and-battery systems, rather than installed BESS capacity.

Sources: FlexForum; EECA; EMI

Update

Calculation Methodology

Dimensions	Measures	Unit	Methodology
Build rate	Generation build rate	GWh/year	Calculated based on Capacity * capacity factor by enenry type * hours in year Capacity is based on: 1. Commissioned capacity from Transpower data for all existing generations 2. Commissioning capacity based on Transpower ERC supply data for new build capacity greater than 10MW
Build rate	Peak capacity build rate	MW/year	Calculated based on: Nameplate capacity*capacity factor by energy type 1. Commissioned capacity from Transpower data for existing generations 2. Commissioning capacity based on Transpower ERC supply data for new build capacity greater than 10MW
Build rate	Transport electrification rate	% of EVs	Directly based on % of EVs in monthly light vehicle registrations and % of EVs in total light vehicle fleet
Equity	Commercial electricity price	c/kWh	Directly obtained from MBIE Energy prices
Equity	Commercial gas price	c/kWh	Directly obtained from MBIE Energy prices
Equity	Industrial electricity price	c/kWh	Directly obtained from MBIE Energy prices
Equity	Industrial gas price	c/kWh	Directly obtained from MBIE Energy prices
Equity	Residential gas price	c/kWh	Directly obtained from MBIE Energy prices

Data Source

Dimensions	Measures	Source	Datapoints	URL
Build rate	Generation build rate	Transpower	Commissioned Generation	
Build rate	Generation build rate	Transpower	Commissioning Generation (>10MW)	
Build rate	Peak capacity build rate	Transpower	Peak build rate (MW/year)	
Build rate	Transport electrification rate	Ministry of Transport	EV % of total LV	
Build rate	Transport electrification rate	Ministry of Transport	New EV registrations % of total new registered LV	
Equity	Commercial electricity price	MBIE	Commercial - c/kWh	
Equity	Commercial gas price	MBIE	Commercial - c/kWh	
Equity	Industrial electricity price	MBIE	Industrial - c/kWh	
Equity	Industrial gas price	MBIE	Industrial - c/kWh	
Equity	Residential gas price	MBIE	Residential - c/kWh	

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We recommend you:

1. Undertake your own due diligence of the information within the Energy Transition Framework dashboards, including any referenced sources accessible to you; and
2. Seek independent expert advice before making any decision based on the information contained in these dashboards.