

# **BRIEFING**

# Review of electricity market performance – advice and draft Cabinet Paper

Date:	29 May 2025			Priority:	High		
Security classification:	Sensitive			Tracking number:	BRIE	FING-RE	Q-0014912
Action sought							
			Action sough	t		Deadline	•
Hon Simon Watts Minister for Energy			Note MBIE's advice on the review of electricity market performance.  Provide guidance on the decisions			4 June 2025	
Hon Shane Jones Minister for Resources		Provide feedback on the early draft Cabinet paper.		4 June 2025			
Contact for telephone discussion (if required)							
Name		Position		Telephone			1st contact
Justine Cannon		General Ma Energy Ma		Privacy of natural persons			✓
Sharon Corbett Policy Direct Markets		ctor, Energy	Privacy of natural persons				
The following departments/agencies have been consulted							
Minister's office to complete:		☐ Approved ☐ Noted ☐ Seen ☐ See Minister's Notes		] ] ]	☐ Declined ☐ Needs change ☐ Overtaken by Events ☐ Withdrawn		
Comments							



#### BRIEFING

# Review of electricity market performance - preliminary advice and draft Cabinet Paper

Date:	29 May 2025	Priority:	High
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#### **Purpose**

#### To provide:

- MBIE's advice on the most pressing problems highlighted through the Review of Electricity Market Performance, and
- an initial draft Cabinet paper for your feedback.

### **Executive summary**

We agree with Frontier Economics (Frontier) that the market will not invest in sufficient generation and fuel that can be relied upon in a dry-year (hereafter referred to as dispatchable generation).

Without definitive action, we will continue to see high prices and a lack of confidence in our electricity system. While the lights may stay on, even in a dry-year, this will only be achieved by the gentailers doing deals with industrials to turn off or down, pressure on the cost of living, and a continued decline in energy-intensive industrial production due to high electricity and gas prices.

Proposed new approach to deliver security of supply and competition

Frontier has analysed a wide range of options to address this investment problem. MBIE broadly agrees with Frontier's preferred option to establish a government entity – "New Co" – to support investment in dispatchable generation resources (either through contracting or ownership). Our initial thinking is that the intervention can be more targeted than described by Frontier, by targeting just the capacity and fuel that the market won't deliver. In this way, it is less likely to crowd-out investments that are already happening and will preserve efficiencies that currently exist.

In essence, to solve the investment problem someone must be capable and accountable for ensuring we have the dispatchable long-duration cover that the market won't deliver. This is the role for New Co. Key features of this new approach to security of supply would include:

- New Co would operate within parameters set in legislation. It would need to meet the purpose
  of delivering the dispatchable long-duration generation capacity (and the fuel to run it) that New
  Zealand needs but that the market won't provide.
- The entity would identify the most cost-efficient means of providing this capacity and fuel, having regard to the full range of potential options over different timeframes:
  - To address short-term needs, the entity would likely take action to shore up existing fossil-fuelled assets. This could include contracting with the gentailers and controlling how they maintain and operate some of their existing fossil-fuelled assets.
  - To address longer-term needs, the entity would make decisions to introduce new generation assets and associated fuel options (e.g. LNG imports, domestic gas, potential new fuels).

- The assets involved would be required to be bid into the market at a regulated price in particular with their offer capped at its variable cost. The entity would also be required to sell forward contracts, with a portion of contracts specifically designed and available to meet the needs of independent generators and retailers, and also industrials.
- The requirement to bid at variable cost and to offer forward contracts means the entity will operate efficiently and without distorting the market. It also means most costs will be recovered through the market, with a levy only needed to recover shortfalls.

This new approach to security of supply will (1) deliver security of supply New Zealand needs but the market is not providing by ensuring delivery of dispatchable long-duration cover, (2) moderate spot and contract prices by directly addressing scarcity, and (3) support renewable generation development.

It will also address competition concerns. The gentailers control New Zealand's limited supply of dispatchable generation, and do not have incentives to share access to it in ways that suit all electricity users. The proposal for forward contracts for New Co's capacity to be available to meet the needs of independent generators, independent retailers and industrial users will constrain the gentailers' ability to exercise market power and lift the independent players up to the gentailers' level in terms of risk management.

We note the current market is functioning well for investment in new renewable generation. While uncertainty around supply, demand and government policy has influenced investment in recent years, there is now a strong pipeline of new renewable generation projects and batteries underway – driven by both gentailers and independent generators.



#### **Recommended action**

The Ministry of Business, Innovation and Employment recommends that you:

a **Note** MBIE agrees with Frontier's view that the most pressing problem is a shortage of dispatchable long-duration cover and the market will not deliver the investment to solve this problem.

Noted

b **Agree** that the preferred option to present to Cabinet is a new approach to security of supply whereby a single party is accountable for determining the long-duration cover needed and ensuring it is delivered.

Agree / Disagree

Note that this approach can also address competition concerns by constraining gentailers' ability to exercise market power and ensuring independent players can access firming contracts suitable for their needs.

Noted

d **Agree** that consideration should not be given to Frontier's recommendation related to electricity in the Emissions Trading Scheme and that the Cabinet paper will reflect this.

Agree / Disagree

е	<b>Agree</b> that consideration should not be given government ownership of Genesis, Mercury a gentailers) and that the Cabinet paper will refle	nd Meridian (the three Mixed Ownership Model
		Agree / Disagree
f		gy Regulator, while having merit, should not be s on delivering the new approach to security of
		Agree / Disagree
	Out of scope	
		Noted
h	Provide feedback on the draft Cabinet paper	by Wednesday 4 June.
		Provided
i	<b>Note</b> that MBIE intends to provide you with a found to enable you to undertake Ministerial consults June.	
		Noted
	stine Cannon	Hon Simon Watts
	eneral Manager, Energy Markets uilding, Resources and Markets, MBIE	Minister for Energy
29	/ 05 / 2025	/ /
	on Shane Jones inister for Resources	
	<i>/ /</i>	

#### **Background**

- 1. Frontier Economics (Frontier) provided its final report on the Review of Electricity Market Performance (the Review) on Friday 23 May 2025.
- 2. As requested by the Minister for Energy, this briefing provides MBIE's advice on the most pressing problems highlighted through the Review: the lack of investment in dispatchable long-duration cover and the resulting impact on competition. In your joint meeting with officials on Thursday 22 May 2025 you directed us to focus on addressing the biggest issues.
- 3. We have also attached an initial draft of the associated Cabinet paper (Annex 1) to get your early feedback on how you want the problems and options pitched for Cabinet's consideration, noting Cabinet has directed you to report back in June 2025 [ECO-24-MIN-0245].
- 4. The Frontier final report has been provided to the two independent peer reviewers, with their peer reviews due on Friday 6 June 2025. Our advice could change depending on the substance of the peer review reports.
- 5. Note that, as with Frontier's report itself, MBIE's advice in this briefing is market sensitive and should be handled accordingly.

#### Managing dry-year risk

#### The pressing problem is a lack of investment in dispatchable long-duration cover

We agree with Frontier that the market will not solve dry year risk

- 6. The underlying problems with our energy system are shortages of firm fuel and firm electricity generation capacity. In 2024 this resulted in extremely high wholesale electricity prices, industrial firms being paid to curtail production to support the electricity system, and wood and pulp processing firms exiting the country. Transpower recently released its draft Security of Supply Assessment for consultation which warns of higher risks of electricity outages starting in winter 2026.
- 7. Frontier Economics found that from the perspective of managing dry year risk and providing firming capacity, New Zealand's energy security and reliability hangs in the balance. In their view, without definitive action by Government, dry year risk will lead to increased prices, loss of supply and economic disruption that will drive industry out of New Zealand.
- 8. In 'normal times' the market would be expected to respond to high prices by investing in new capacity. However, we agree with Frontier that the following combination of factors makes this highly unlikely:
  - a. Our declining domestic gas production which is falling faster and further than the market anticipated is causing a significant fuel availability risk for investment in gas generation.
  - b. Investors are unwilling to invest in thermal assets and fuels when future government policies could ban that technology or harm the ability to recover costs.
  - Investors have an aversion to investment in thermal assets, caused by both
    preferences to focus on ESG considerations and share market recognition of stranded
    asset risk of thermal assets.
  - d. Investors struggle to capture sufficient returns for investment in assets to address dry year risk (recognising such an investment will suppress prices) and competitors can free-ride on the investment made by someone else.

- 9. MBIE agrees that, taken together, these factors mean neither the market nor our existing regulatory institutions and levers can address dry-year risk without additional government intervention.
- 10. Notably, the market is functioning well for investment in new renewable generation. While uncertainty around supply, demand and government policy has influenced investment in recent years, there is now a strong pipeline of new renewable generation projects and batteries underway driven by both gentailers and independent generators.

Without definitive action, supply will stay 'on the edge' meaning high prices and reduced industrial production in dry years

- 11. Our best assessment of what will happen without definitive action now is continued high prices and a lack of confidence in our electricity system. While the lights may stay on, even in a dry-year, this will only be achieved by the gentailers doing deals with industrials to turn off or down, and a continued decline in energy-intensive industrial production due to high electricity and gas prices. Wet years might disguise the problem somewhat, but spot and forward electricity prices will remain high.
- 12. The status quo is not optimal. Households and businesses alike no longer have confidence that the current market settings are delivering for them. Our gas and electricity prices are becoming more unaffordable, and our energy security margins continue to tighten.

#### A range of options have been considered to address the investment problem

- 13. Frontier considered a range of potential options that have been adopted internationally to enhance investment in capacity, and what they consider to be the status quo.
  - a) Implementing the status quo this would include the market progressing with the Huntly Heads of Agreement, further developing the Huntly Firming Option and the Electricity Authority implementing the Energy Competition Task Force level playing field proposals.
  - b) New Co a new Crown entity would be established to ensure the delivery of longduration dispatchable generation resources and fuel (either through contracting or ownership).
  - c) Default regulated provider under this option, Genesis Energy would be formally designated to provide a pre-determined amount of firm capacity to the market under a regulatory scheme.
  - d) A strategic reserve similar to the previous Whirinaki reserve generation solution, this solution would see the System Operator procure capacity that is kept outside of the market and used only in specific emergency situations when hydro capacity is low.
  - e) A capacity market this form of market pays generators for making capacity available regardless of actual electricity generation. This option represents a major market overhaul of our existing market design with extensive regulatory and administrative costs.
  - f) Mandatory contracting this would require retailers to have contracts for firm supply that would cover a dry year risk.
  - g) Tradable certificates under this option retailers and large users would be required to procure certificates for secure supply based on their market share.
- 14. Annex B of the Frontier final report provides further detail on the options and Frontier's assessment of them. The primary (and essential) criterion is that the solution delivers an expectation of reliable supply during dry years i.e. that it addresses the fundamental investment problem discussed above. Confidential advice to Government



#### A new approach to security of supply is needed

To solve the problem, someone must be capable and accountable for ensuring we have the dispatchable long-duration cover that the market won't deliver

- 15. Under MBIE's preferred option (option b) in the table above), the key shift from our current system design is that a single party is made accountable for determining the long-duration cover that the system needs and ensuring that cover is delivered. Box 1 below provides further detail on how this new approach could work in practice.
- 16. MBIE considers that this shift is necessary. As described earlier, and for a combination of reasons, the market alone will not optimally deliver the cover we need for dry year. This new approach to security of supply will:
  - a. **deliver security of supply** by requiring delivery of dispatchable long-duration cover
  - b. **moderate spot and contract prices** by directly addressing the scarcity and risk that has been causing prices to rise
  - c. **support renewable generation development** by retaining the energy only market which is delivering a healthy pipeline of renewables and ensuring access to firm contracts for independent renewable generators (see below).
- 17. We therefore recommend you seek Cabinet's agreement to progress work on this new approach to security of supply.

#### Box 1: Illustrative example of the new approach to security of supply

Please note: this is illustrative only pending the detailed design steps set out in paragraphs 18 to 22.

 A Crown entity would be established with the purpose of delivering the dispatchable long-duration generation capacity (and the fuel to run it) to address the projected

shortfall – i.e. what the market won't provide – according to parameters set by the Government in legislation.

- The entity would identify the most cost-efficient means of providing this capacity and fuel, having regard to the full range of potential options over different timeframes:
  - To address short-term needs, the entity would likely take action to shore up existing thermal assets
  - To address longer-term needs, the entity would make decisions to introduce new long-duration dispatchable generation assets and associated fuel options (e.g. LNG imports or domestic gas supply).
- The entity could ensure the capacity and fuel is provided through contracts or through direct ownership.
- The entity would be required to bid into the market at a regulated price in particular
  with its offer capped at its variable cost. This is the bidding behaviour expected by all
  generators in a competitive energy-only market.
- The entity would be required to sell forward contracts, with a portion of contracts specifically designed and available to meet the needs of independent generators and retailers, and also industrials.
- The requirement to bid at variable cost and to offer forward contracts means the entity
  will operate efficiently and without distorting the market. It also means most costs will
  be recovered through the market, with a levy only needed to recover shortfalls.

Detailed design would be undertaken at pace in the second half of this year

- 18. Subject to Cabinet agreement to proceed, we would propose the following steps.
- 19. We would commence detailed design of, and undertake targeted engagement on, the new security of supply mechanism. The design process would include consideration of:
  - a. Who would have responsibility for determining the required level of cover and what guardrails would sit around this (e.g. this could be based on existing security of supply mechanisms currently led by the System Operator but with target margins set in legislation to avoid the ability for gold-plating or overinvestment).
  - b. What rules are needed about the types of capacity and fuel that are in scope of this regime to ensure the regime addresses our investment problem but avoids crowding out investment that would otherwise occur on commercial terms.
  - c. How investment decisions are made, and what controls sit around these decisions, particularly for significant long-term investments such as infrastructure for LNG imports.
  - d. What rules are needed about how the mechanism interacts with the electricity market, including how the capacity must bid into the spot market and how contracts must be sold, including any packaging of hedges in a way that is desirable for independent parties (see competition section below).
  - e. How any out-of-market costs would be recovered, including the design of a levy mechanism, any upfront establishment costs, and expected fiscal impacts.
- 20. We would also progress the legislation needed to give effect to the detailed design features set out above.

- 21. We would also commence work with Treasury on options to establish a Crown Entity and the appropriate governance arrangements.
- 22. So that New Co is ready to commence operating as soon as the required legislation and funding arrangements are in place, there may be merit in establishing an interim team who would begin work to:
  - a. set out the projected investment 'gap' over time (how may GWh of dispatchable long-duration cover do we need for security of supply but the market won't deliver).
  - b. take into consideration the lead time and investment readiness of solutions (e.g. LNG imports, gas exploration, new technologies such as biogas).
  - c. design the mechanism(s) by which the entity will ensure delivery of dispatchable longduration capacity (e.g. PPPs, PPAs, other underwrite, support or ownership schemes).
  - d. develop a procurement strategy to ensure open, competitive and transparent procuring (to ensure it provides the lowest cost solutions).
- 23. To support all of the activities in paragraphs 19 to 22 above, we would contract expertise immediately, including commercial and electricity system expertise. This would be funded through the Budget 2025 initiative related to implementation of recommendations arising from the electricity market review.
- 24. We note that MBIE's initial thinking is that the intervention can be more targeted than that described by Frontier. Whereas the Frontier report speaks of an entity procuring all the Huntly capacity from Genesis and potentially all thermal assets, we think it may be possible to target just the capacity and fuel that the market won't deliver. The intervention is about providing a safety-net or insurance policy that benefits NZ Inc. but is not in any individual party's interest to provide. In this way, it is less likely to crowd-out investments that are already happening and will preserve efficiencies that currently exist.



Confidential advice to Government	
ut of scope	
MDIC's professed action can also address compatition concerns	

#### MBIE's preferred action can also address competition concerns

The gentailers currently control New Zealand's dispatchable capacity, which is needed by industrial users, independent retailers, and independent generators

- 33. The gentailers control New Zealand's limited supply of dispatchable generation, and do not have clear incentives to maintain or increase dispatchable generation, and to package access to it in ways that suit all electricity users. Meanwhile, as dispatchable generation capacity and the fuel to run it become increasingly scarce, the market power of the gentailers is increasing.
- 34. Independent retailers, generators and industrial users all need access to hedges backed by dispatchable generation for slightly different reasons:
  - a. Independent retailers need to ensure they can supply power to their customers when their customers need it which means securing deals to access the gentailers'

- dispatchable capacity through contracts for peak times and when our weatherdependent generation isn't operating.
- b. Independent generators looking to develop new renewable generation need to be able to package their intermittent outputs with the gentailers' dispatchable capacity in order to enter into offtake agreements and therefore secure project financing. Without firmed offtake agreements, the investment risks and capital costs of new renewable projects increase, slowing the pipeline of new generation. Helios Energy needing to sell its Edgecumbe solar project to Genesis Energy illustrates this.
- c. Industrial users who buy their power directly from the wholesale market need to secure deals with the gentailers with dispatchable capacity to ensure their demand is met.
- 35. It is important that independent parties can actively compete in the market. As Frontier notes, this will result in a more dynamic market that drives further innovation and better prices for customers.

We recommend regulating access to new firm capacity

- 36. As set out above, our (and Frontier's) recommended action to address security of supply would (1) increase the amount of dispatchable generation and (2) require forward contracts for the generation to be sold, with a portion of contracts specifically designed and available to meet the needs of independent generators, independent retailers and industrial users.
- 37. This regulated access to new dispatchable generation would:
  - a. Constrain the ability for gentailers to exercise market power. Frontier, the Market Development Advisory Group, and the Electricity Authority all concur that the primary source of market power risk in New Zealand relates to the provision of firming capacity.
  - b. Provide the opportunity for independent retailers and generators to achieve risk management cost efficiencies, akin to their vertically integrated competitors. They will be able to procure capacity that suits the size of their business without needing to rely on the gentailers for this service.
- 38. This could possibly replace the level playing field measures proposed by the Energy Competition Task Force, since it effectively achieves the aims of that workstream. Subject to your agreement, we could discuss this with the Task Force at the appropriate time.

Generation/retail separation will not address the investment problem, and could increase electricity prices

- 39. MBIE's view, consistent with advice from Frontier, is that splitting the gentailers into separate generation and retail businesses will not address the central issue in our market: that there is insufficient incentive for any party to invest in firm physical cover for our dry year problem which is the driver of the high prices we are experiencing.
- 40. Furthermore, as set out in advice MBIE provided in February [BRIEFING-REQ-0007758 refers]:
  - a. Splitting the gentailers in this way would not address the ability for generators that own flexible generation to exercise market power.
  - b. It could disrupt current investment by disrupting the affected companies' operations and business plans. Gentailers are currently the source of most of the investment in grid scale batteries which are important to meet peak demand on cold winter mornings and nights.
- 41. In addition, generation/retail separation could lead to higher prices being passed on to consumers due to lost efficiency benefits. This aligns with Frontier's advice. Frontier

- considers that there are several ways that vertical integration between retail and generation can increase operating efficiency, in particular relating to risk management, lower contracting transaction costs and strong investment incentives by providing guaranteed demand from retail operations.
- 42. The proposed approach, discussed above, would level the playing field between independent operators and gentailers without diluting the efficiency benefits that come with vertical integration.

#### Changing our regulatory arrangements could also support security of supply

We agree there are merits in establishing a new Energy Authority

- 43. Frontier recommended establishing a new Energy Authority by amalgamating the functions of the Electricity Authority and the Gas Industry Company (GIC). Frontier notes this proposed change does not reflect concerns about the way the GIC has operated, but rather it reflects the opportunities that amalgamation would bring.
- 44. This new entity would streamline and harmonise regulatory functions across both sectors, enabling more consistent, integrated and urgent action on the energy transition while capturing cost efficiencies from integrated operations.
- 45. Frontier notes that there has been significant convergence between the electricity and gas industries in the past 20 years. Frontier considers the current delineation is not fit-for-purpose given the need for heightened visibility of the gas sector for the efficient operation of the electricity market.
- 46. We agree there are merits in this recommendation. However, given the priority problems of dry-year cover and competition and the substantial reform we recommend to address those problems we recommend that work on a combined Energy Regulator should not be progressed at this time. We need the Electricity Authority to focus on the new approach to ensuring security of supply and competition. Moreover, we note Ministers' direction for us to focus on the biggest problems first and prioritise our efforts.

A more sophisticated and comprehensive approach to market monitoring is needed

- 47. Frontier notes the important role market monitoring plays, including providing an early warning on emerging issues, ensuring participants are complying with the market rules, and determining if changes in polices or rules are delivering the expected effects. Frontier recommends the Electricity Authority should develop a more sophisticated approach to assessing market power and identifying and measuring barriers to entry. Frontier also considers the Electricity Authority should leverage Transpower's specialised expertise as System Operator, and its access to real-time operational data to further improve its market monitoring capabilities.
- 48. MBIE supports Frontier's call for a more sophisticated market monitoring approach and enhanced capabilities. We consider the Authority should progress this as a matter of priority. This is an important aspect of ensuring the proposed new approach to delivering security of supply and competition, described above, delivers the outcomes sought.

### Recap on broader elements of the Review

Some of Frontier's recommendations won't be progressed further at this stage

49. You have signalled that government decisions and actions should focus on the most significant and pressing problems in the electricity market. Accordingly, some of Frontier's recommendations will not be progressed further at this stage. In particular, you have signalled that officials should not give consideration at this time to Frontier's recommendations relating to:

- a. electricity in the Emission Trading Scheme
- b. the ownership structure of Genesis, Mercury and Meridian (the three mixed-ownership model (MOM) gentailers).
- 50. We note that those Frontier recommendations are independent of their recommendations on addressing investment in dry-year cover and competition concerns discussed earlier in this briefing.

We are providing separate advice on improving alignment and efficiency of the distribution sector

- 51. A number of Frontier's recommendations relate to electricity distribution businesses (EDBs) and the regulatory regimes they operate within. Frontier's key recommendation is that the existing 29 EDBs are amalgamated into five 'super EDBs'.
- 52. We agree with Frontier on the need to improve efficiency and alignment. We consider there is a range of levers that could achieve this, short of forced amalgamation. We are focussing on options to driving greater alignment across EDBs in capex, opex and for connecting customers.
- 53. We recently provided early advice on this including views of the Commerce Commission [BRIEFING-REQ-0013881]. In collaboration with the Electricity Authority and Commerce Commission we are developing further advice on recommended actions, which will be with you in June. We recommend progressing work on measures relating to EDB efficiency as a stage 2 priority, to enable focus on the dry year problem as the government's first priority as it is the biggest issue for security of supply and affordability.

A number of smaller, more technical, Frontier recommendations are also being considered

54. Frontier's Final Report includes a list of additional recommendations it has identified during the course of its review, many of them technical in nature. Following your agreement [BRIEFING-REQ-0013791 refers] we are engaging with the Electricity Authority and Commerce Commission on some of the more technical recommendations in the Frontier report. The second draft of the Cabinet paper will incorporate our advice following those discussions.

### Next steps

55. The table below sets out the proposed next steps leading up to the June Cabinet report-back on the Review.

Date or week	Task/action/milestone
Week beginning 2 June	Ministers discuss proposals with key Ministerial colleagues
Wednesday 4 June	Feedback from Ministers on draft Cabinet Paper
Wednesday 4 June, 4pm-5pm	Ministers for Energy and Resources meet in person with Frontier Economics to discuss their Final Report
Friday 6 June, 5pm	Final peer review reports received
Monday 9 June	Further draft of the Cabinet Paper provided
Tuesday 10 June	Full Ministerial consultation commences
Tuesday 17 June	Full Ministerial consultation completed
Thursday 19 June	Cabinet Paper lodged for ECO Committee

Wednesday 25 June	Cabinet ECO Committee
Monday 30 June	Cabinet

- 56. Next steps after 30 June, including announcements and publication of review materials, will depend on the Cabinet decisions:
  - a. If Cabinet agrees with the preferred approach as set out in this briefing, next steps on detailed design, legislation and entity establishment would be undertaken as set out in paragraphs 18 to 22 above.
  - b. We will work with your offices to prepare announcement materials and communication plans, including to account for the need to comply with requirements for market sensitive announcements.
  - c. The Frontier Report and Peer Review Reports will be published at the appropriate time and following your approval.

#### **Annexes**

Annex One: Initial draft Cabinet paper, Review of Electricity Market Performance

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Performance Withheld - Confidential advice to Government