Meeting Date: 8 August 2019

MEETING WITH THE ELECTRICITY AUTHORITY BOARD

SECURITY
AND
RELIABILITY
COUNCIL

The Security and Reliability Council (SRC) are meeting with the Electricity Authority Board on 8 August 2019. During the formal part of that meeting, they are due to discuss: feedback on advice; the Electricity Price Review; the independence and impartiality of the system operator; Electricity Authority projects that promote reliability.

Note: This paper has been prepared for the purpose of the SRC. Content should not be interpreted as representing the views or policy of the Electricity Authority.

Contents

Meeting with the Electricity Authority Board	2
Background	2
Agenda	2
Feedback on the quality of advice	2
EPR recommendation 'G2': A review of security and resilience of electricity supply 3	3
Independence and role impartiality of the system operator	4
Authority 2019/20 work programme items with implications for security/reliability	4
Questions for the SRC to consider	5
Attachments	5
Appendix A: Biographical profiles of the Authority Board members	6
Dr. Brent Layton (Chairperson)	6
Susan Paterson ONZM	6
Allan Dawson	7
Sandra Gamble	7
Mark Sandelin	8
Lana Stockman	8

Meeting with the Electricity Authority Board

Background

This paper provides information to support the SRC with its meeting on 8 August 2019 with the Electricity Authority (Authority) Board. It summarises the key issues the SRC are likely to discuss with the Board. In addition, it includes biographical profiles of the Authority Board members (Appendix A).

Agenda

The SRC and the Authority Board will meet for half an hour of formal meeting time before breaking for lunch and having another half hour of informal discussions while mingling.

The agenda for the half hour of formal meeting time is set out in Table 1 below.

Table 1: Agenda for joint meeting of the Authority Board and SRC

#	Agenda item	
1	Feedback on the quality of advice	
2	Electricity Price Review (EPR) recommendation 'G2': A review of security and resilience of electricity supply	
3	Independence and role impartiality of the system operator	
4	Authority 2019/20 work programme items with implications for security/reliability	

With only 30 minutes of formal meeting time and over a dozen attendees, the above is an ambitious agenda. If the Government's EPR announcements have been made prior to this meeting, more time may need to be allocated to item #2 in which case item #4 may have little or no time for discussion.

Feedback on the quality of advice

The SRC members' survey highlighted that the SRC desired closer interaction with the Authority Board. The SRC Chair is keen to ensure the SRC is delivering useful advice to the Authority.

Accordingly, a key opportunity created by this meeting is for the Board to give the SRC any feedback on the quality of the SRC's advice. It is also an opportunity for the SRC to give the Board any feedback on the quality or timeliness of the Board's responses. As such, SRC members should be prepared to give any feedback to the Board.

EPR recommendation 'G2': A review of security and resilience of electricity supply

The expert advisory panel to the EPR consulted on option 'G2' – a review of power system security, reliability and resilience. The panel's consultation proposal is set out in Figure 1 below.

Figure 1: EPR consultation material for option 'G2'

G2: Examine security and resilience of electricity supply

The Minister of Energy and Resources would ask the Electricity Authority to conduct a thorough review of the security, reliability and resilience of the electricity supply, in response to the range of technological and other developments that, as noted in our first report, have the potential to profoundly alter the way the electricity sector works. A review would examine whether the electricity supply was positioned to meet those challenges in the decades ahead.

The Electricity Authority would assign the task to the Security and Reliability Council to complete within 12 months. The review should include the Council's own terms of reference and work programme; Transpower's policies and procedures for risk monitoring (as system operator responsible for managing the power system and operating the wholesale electricity market); the Electricity Authority's market development work programme and market performance monitoring functions; and other relevant matters, including matters overseen by agencies such as the Commerce Commission and Gas Industry Company.

Some submitters said security of supply should not be taken for granted, particularly in light of the many uncertainties facing the sector. 188 Others emphasised the need to focus less on security and more on resilience. 189 We think both are important.

We favour this option.

¹⁸⁸ For example, BusinessNZ Energy Council said that question was not simply whether current arrangements would ensure sufficient new generation to meet demand, but whether there will be sufficient generation to meet demand and maintain security of supply, especially if very low emissions are planned for the electricity sector, pg6.

The secretariat understood that the Minister of Energy and Resources' recommendations for EPR were due to be considered by Cabinet on 29 July 2019. As at 1 August, no announcements have been made. If an announcement is made prior to 8 August, the secretariat will distribute relevant information to the SRC. If no announcement has been made, there will be very little worth discussing with the Authority Board.

If there is worthwhile discussion on EPR, the SRC should consider the implications on the security and resilience review in terms of:

- responsibility and accountability
- project scope, timing and budget.

¹⁸⁹ Vector's view was that the industry had always focused on security of supply, and attention had shifted only recently to the resilience of the energy system. "Recent events both locally and internationally reinforce the need for more innovative thinking around the principles of resilience", pg73.

The secretariat expects announcements would be published at https://www.beehive.govt.nz/

Independence and role impartiality of the system operator

At the 28 March 2019 SRC meeting, an SRC member asked the system operator to respond to their view that "the system operator being inside Transpower may hamper the independence and transparency of market and system operations, relative to an independent system operator." The SRC's 17 May 2019 letter of advice noted that "the SRC is interested in understanding the appropriateness of the system operator's separation from other Transpower roles and welcomes relevant evidence."

This meeting is an opportunity for the SRC and the Board to discuss the context for the SRC's advice. Some historical context can be found by examining policy-makers' expectations at the time the Transpower was legislated as the system operator.

Transpower was enshrined as the system operator in section 8(1) of the Electricity Industry Act 2010. Transpower was the system operator prior to 2010, but it was not legislated that the system operator had to be Transpower. At the same time some operational functions were moved from the Electricity Commission to the system operator.

The passage of the Act was informed by the work of the Electricity Technical Advisory Group (ETAG), which considered (in 2009) how electricity sector performance could be improved. ETAG did consider whether an independent system operator should be established to deal with potential conflicts of interest and to improve accountabilities (particularly in light of the security of supply functions that were being moved from the Electricity Commission to the system operator). The ETAG report:³

- noted that there was a risk that Transpower's additional functions would "create perceptions of conflicts with its grid operations and planning functions, increase its powers, and create mixed accountabilities"
- rejected establishing an independent system operator for cost reasons and to avoid the potential loss of synergies between system operations and grid operations
- did not set out what expectations there were of role separation between the system operator and grid owner. It did recommend that the Security and Reliability Council be established to assist in considering security of supply issues and to monitor Transpower's performance of its expanded role.

Authority 2019/20 work programme items with implications for security/reliability

If time permits, the Board may highlight a few key Authority projects that promote reliable supply of electricity. The SRC may wish to give feedback on the merits of individual projects and/or the overall suitability of the work programme to maintain or enhance power system reliability. Of the 19 projects on the Authority's work programme, six (see Table 2) have a significant link to power system security and reliability.

From paragraph 8.2 of the 28 March 2019 SRC meeting minutes. Part of the SRC's statutory function is to assess the performance of the system operator.

ETAG's discussion paper can be found here. Key paragraphs are paragraphs 226-230 (on whether to set up an ISO) and paragraphs 219-220 (the Security and Reliability Council).

The Authority's 2019/20 work programme is available from https://www.ea.govt.nz/about-us/strategic-planning-and-reporting/our-work-programme/

Table 2: 2019/20 work programme projects with significant links to reliability

#	Project name	Link to reliable supply
1	Extended reserve implementation	A key outcome of the first stage of this project is a change from the current two-block automatic under-frequency load shedding (AUFLS) to a more granular four-block arrangement. The Authority is working with the system operator to ensure this transition enhances the flexibility and resilience of the power system.
2	Transmission pricing review	These three projects will all have significant impact on the efficiency of price signals. Changes to price signals should have significant impact on peak demand and aggregate consumption of electricity, as well as incentives for supply-side investment. All of those impacts will have consequences on reliability of supply. In the case of its transmission pricing proposals, the Authority expects they will tend to increase peak demand as the current arrangements over-incentivise reductions in peak demand.
3	Spot market settlement on real-time pricing (implementation)	
4	Distribution pricing – monitoring distributors' adoption of more efficient prices	
5	Participation of new generating technologies in the wholesale market	These two projects have some potential to improve competition in the generation market by removing undue barriers to entry and exit. That could have an impact on reliability. That impact might be a modest positive impact on nationwide reliability, and/or a negative impact on reliability on low-voltage networks (if new technologies are not well integrated into the power system and associated markets).
6	Are there barriers to renewables in the wholesale market?	

Questions for the SRC to consider

The SRC may wish to consider the following questions.

- Q1. What further information, if any, does the SRC wish to have provided to it by the secretariat?
- Q2. What advice, if any, does the SRC wish to provide to the Authority?

Attachments

The following item is included as an attachment to this paper:

Biographical profiles of the Authority Board members (Appendix A)

Appendix A: Biographical profiles of the Authority Board members

Biographical profiles of the Authority Board members are set out below.

Dr. Brent Layton (Chairperson)



Dr Layton is a former senior fellow and chief executive of the New Zealand Institute of Economic Research (NZIER).

He has been a director or chair of organisations in sectors as diverse as banking and finance, health, scientific research, electricity, food processing, transport and information technology.

As a consultant prior to joining the Authority, Dr Layton's work has spanned macro and microeconomics and corporate finance. Much of his work has involved regulatory economics and responses to regulatory change.

In 2009, Dr Layton chaired the Ministerial Review of the governance and performance of the electricity market.

Susan Paterson ONZM



Susan is a pharmacist and MBA graduate from London Business School.

She has senior management experience in a number of companies in New Zealand, and during a decade in the USA and Europe, where she was also a strategy consultant with Boston-based Index Group.

Susan was project director for the Wholesale Electricity Market development Group (WEMDG) in the early 90s, a director of EECA and spent over 8 years on the Transpower Board from 1999.

Susan has many years' board experience and holds a number of directorships and board positions. Current board roles include:

- Chair of Theta Systems Ltd
- Chair of the Home of Cycling Charitable Trust
- Chair of Steel and Tube Holdings Ltd
- Goodman Property Trust
- Les Mills NZ Ltd
- Sky Network TV Ltd
- Arvida Group Ltd
- Tertiary Education Commission
- NZ Golf

Allan Dawson



Allan is the current Customer Manager for New Zealand Trade and Enterprise.

He was formerly the Chief Executive for the Independent Market Operator in Western Australia, and the Energy Market Company in Singapore, and worked on the development of New Zealand electricity industry rules and

arrangements in the 1990s.

He has chaired the Association of Power Exchanges, and two bodies in Western Australia: the Market Advisory Committee for the Wholesale Electricity Market and the Gas Advisory Board.

He brings strong governance, leadership, communication and relationship management skills, and experience in roles that directly interface with energy regulators.

Sandra Gamble



Australia.

Sandra is currently a non-executive director, with roles as an Independent Advisor to the Audit and Risk Committee at Sydney Metro, and Director of the Woodville Alliance, as well as Chair of its Audit and Risk Committee.

She was formerly the General Manager for Business Strategy and Resilience for the Sydney Water Corporation, where she held various committees Chair and Executive Convenor positions, and a director of Save the Children

She is an electrical engineer with significant experience working in the energy and water sectors, and brings strong leadership, communication and relationship management skills.

Mark Sandelin



Mark Sandelin is a Partner at law firm MinterEllisonRuddWatts. He has over 30 years' experience as a commercial litigator.

He also has significant corporate governance experience having served on the MinterEllisonRuddWatts Board for 16 years (6 years as Executive

Chair). Mark is also Deputy Chair of Fairway Resolution Ltd which is a crown owned entity.

He is Deputy Chair of Auckland Grammar School and has been on the Board for the past 7 years.

Lana Stockman



Lana has recently returned to New Zealand from Australia, where she was Vice President Regulation at Aurizon Network, a top-50 ASX listed company offering rail and road based freight and infrastructure solutions. She was also a General Manager at Energy Australia, a board member of the Electricity Retailers Association of Australia, and a member of the Ministerial Advisory Council on smart meters in Victoria.

Lana also has experience in the New Zealand electricity industry, including as an advisor to the Electricity Authority and its predecessor. She is degree qualified in both engineering and finance and coupled with a broad energy market experience, brings fresh thinking, and strong leadership, communication and relationship management skills.