

MINUTES

Meeting number: 13

Venue: Electricity Authority, Meeting Room 1, Level 7, ASB Bank Tower, 2 Hunter Street, Wellington

Time and date: 9:30am to 3:30pm, Tuesday, 7 May 2019

Attendees

- Tony Baldwin (Chair)
- James Flannery [arrived 9:32am, left 3:03pm]
- James Flexman
- Darren Gilchrist
- Stu Innes [left 11:10am, re-joined 12:10pm]
- Rebecca Osborne
- Bruce Rogers
- Matt Rowe
- James Tipping

In attendance

- Murray Henderson (Principal Market Analyst, System Operations, Transpower)
- Tim Street (Manager Wholesale Markets, Electricity Authority)
- Alistair Dixon (Principal Adviser Market Design, Electricity Authority) [items 1 and 6-9; left 9:34am, re-joined 9:55am, left 10:05am, re-joined 1:25pm]
- Mike Collis (Senior Adviser Wholesale Markets, Electricity Authority) [items 1-5; left 1:12pm]
- Hannah Hopper (Adviser Wholesale Markets, Electricity Authority) [items 6-9; joined 1:25pm]
- Rachel Holden (Consultant, Concept Consulting)
- Philip Beardmore (Director, Strata Energy Consulting) [items 1-5; left 1:12pm]
- David Reeve (Director, Sapere Research Group) [by video conference; item 2; joined 10:07am, left 11:10am]
- Simon Coates (Director, Concept Consulting) [items 1-5; left 1:30pm]
- David Hunt (Director, Concept Consulting) [items 6-8; joined 1:25pm, left 3:22pm]
- David Weaver (Consultant, Concept Consulting) [items 6-8; joined 1:25pm, left 3:22pm]
- John Culy (Associate, Concept Consulting) [items 6-8; joined 1:25pm, left 3:22pm]

The meeting opened at 9:34 am.

1 Administration

1A Apologies

No apologies were received.

1B Interest Register

The Chair tabled the MDAG interest register. There were no changes from the previous meeting.

1C Minutes of previous meetings

The Chair tabled the minutes of the previous meeting on Tuesday, 26 March 2019.

The group confirmed the minutes subject to Bruce Rogers' name being added to the attendees list.

1D Matters Arising

There were no matters arising at this time.

1E Action List

The Chair tabled the Action List.

1F Correspondence

No correspondence was tabled.

1G Authority work plan update

The group agreed to discuss this at the end of the meeting.

1D Matters Arising (cont.)

Saves and win-backs

The Chair gave an overview of the Authority Board's discussion of the MDAG's saves and win-backs recommendations paper at the Thursday 4 April Board meeting.

The Chair noted that the Board:

- was supportive of the MDAG's process and analysis of saves and win-backs
- felt MDAG's analysis was empirically sound and within the scope of the brief provided by the Authority
- considered the Electricity Price Review (EPR) panel had a broader scope than MDAG
- discussed the extent of any relationship between saves and win-backs and the two-tier retail market.

The Chair noted that MDAG's saves and win-backs recommendations paper was published on the Authority's website today.

The secretariat noted that the Board will write to MDAG setting out their response to MDAG's recommendations.

2 New generation technology: David Reeve (cont.)

David Reeve gave a presentation *Driver for future – low emissions* based on work he did for the Productivity Commission.

Following the presentation, the MDAG and David Reeve discussed:

- The practicalities of small-scale new technology participating the electricity market. David Reeve noted that transaction costs and co-ordination were two key issues for small-scale technology participation. However, David Reeve also noted that the development of power electronics and the ability to incorporate DC into AC more economically may make it more economic for small-scale generation to participate. In addition, David Reeve noted that new technologies could be designed or aggregated so that they act as large-scale generator (although this would come at a cost).
- The potential for the design of new technologies to get ahead of rules and that rules will influence how technology develops.
- The need to get new technology right early otherwise it could cause problems later. A member noted that there had been issues with early adoption of inferior irrigation technology.
- The potential for New Zealand's grid to have more than one system operator. David Reeve said it depended on how you define system operator, but having more than one system operator (addressing different aspects of operation, or different regions) was possible with the development of new technology.

The Chair asked David Reeve what aspects of the Code he thought could adversely affect economic participation of new generating technologies. David Reeve noted that:

- many of the technical requirements in the common quality parts of the Code are difficult for solar and other new generating technologies to meet, but having too much technology that doesn't meet the common quality requirements could create other problems
- some definitions in the Code (such as grid, GXP and GIP) might not define the best boundaries going forward and this could be a barrier to developing new technology. A member noted that if the definition of grid was changed then any parties who own any part of the new grid would have to meet all the obligations of a grid owner.

3 New generation technology: brainstorming session 1

Simon Coates gave a brief presentation *Participation of new generating technologies in the wholesale market*. The presentation set out the issues the Authority had asked the MDAG to address and outlined what would happen in the two brainstorming sessions (items 3 and 4 on the agenda).

A member argued that the scope of MDAG's new generation technology project should also include certain aspects of consumer-scale new technology (not just utility-scale new technology), to the extent that consumer-scale new technology could be aggregated.

MDAG members split into three groups to brainstorm Code issues affecting new technology participation in the wholesale electricity markets. The three groups considered solar, wind, storage (batteries, pumped-hydro, batteries plus solar/wind), and other new technologies (hydrogen, wave, tidal, etc.).

4 New generation technology: brainstorming session 2

Members reported back to the meeting on their discussions in brainstorming session 1.

The group noted that some of the key issues affecting the participation of new generating technologies could be grouped under the following main headings:

- capturing the full cost and value impact of new technologies and reflecting this in price
- forecasting generation (particularly for intermittent generation sources) and capturing of information
- definitions in the Code being too restrictive in some cases to enable new technologies
- transaction costs for participation of new technologies in the electricity market.

The group noted that many of the issues were common across the different types of new technology.

5 New generation technology: wrap up and next steps

The group requested the secretariat to arrange for Simon Coates to:

- (a) synthesise all the material discussed in the brainstorming sessions
- (b) consider the prioritisation of issues
- (c) put together a strawman new generating technologies work plan
- (d) present (a)-(c) at the next MDAG meeting.

Action – 13.1: **Secretariat** to arrange for Simon Coates to synthesise all the material discussed in the new generation technology brainstorming sessions, consider prioritisation of new generation technology issues, put together a strawman new generation technology work plan, and present this at the next MDAG meeting.

6 Trading conduct when pivotal

The Chair noted that at the last meeting it was requested that the secretariat:

- (a) consider whether it's possible to discern a change in South Island generator offer behaviour following the Authority's investigation into the June 2016 UTS claim
- (b) present analysis of the pivotal pricing problem to the MDAG
- (c) prepare a two-pager setting out an option reflecting where the MDAG plans to head on the review of spot market trading conduct provisions in relation to pivotal conduct.

The Chair noted that David Weaver would present initial findings on (a) under agenda item 6 and (c) would be considered in agenda item 7. John Culy and David Hunt would report back on (b) at the next MDAG meeting.

David Weaver presented Concept's initial findings on whether there were any systemic changes in offer behaviour or market outcomes following the UTS claim in June 2016 and the Authority's open letter to Meridian in May 2017.

The group discussed whether the analysis provided enough evidence to conclude that offer behaviour had changed since 2016/17. The group considered that there was not enough evidence to come to a clear view.

Concept asked MDAG what their hypothesis was prior to seeing the analysis. The group said it was that, since the Authority's letter to Meridian, Meridian had been managing their offers to reduce the chance of the HVDC binding and moving offered generation to other parts of the day. Concept noted that under this hypothesis you might expect to see a flatter daily offer profile, which was opposite to what the analysis shows.

The group discussed whether it was worthwhile doing more analysis on whether there were any changes in offer behaviour following the June 2016 claim. The group agreed that Concept should do some more analysis.

The group requested that the secretariat arrange for Concept to:

- look at DC transfers versus national storage to determine if the relationship has changed
- do VSPD runs and see whether there has been a change in how much the DC has bound
- analyse whether wind changes have been correlated with offer changes
- look at whether the HVDC has been utilised less in recent years using a sample of trading periods.

Action – 13.2: **Secretariat** to arrange for Concept to do further analysis of whether there have been any systemic changes in offer behaviour or market outcomes in the South Island following the UTS claim, including analysing DC transfers versus national storage, assessing whether there has been a change in how much the DC has bound, and analysing whether wind changes have been correlated with offer changes.

7 Discussion of possible approach for promoting efficient trading conduct

The Chair tabled the two-pager *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal*.

Members agreed that the two-pager was a good step forward. Members agreed that the Chair would present the approach in the two-pager to the Authority Board on Wednesday 8 May to get their view on the MDAG's proposed approach.

A member noted that the secretariat should check whether James Flannery (who left the meeting early) had any views on the two-pager. It was suggested that the two-pager could form the basis of a short discussion paper.

Action – 13.3: **Chair** to present the approach in the two-pager *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal* to the Authority Board on Wednesday 8 May for their comment.

Action – 13.4: **Secretariat** to check whether James Flannery had any views on the two-pager *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal*.

Action – 13.5: **Secretariat** to start drafting an initial trading conduct discussion paper based on the two-pager *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal*.

8 Authority 2018/19 work programme milestone for trading conduct

Tim Street, Manager Wholesale Markets, speaking as the Authority's representative, reminded the group that the target for the *Review of spot market trading conduct provisions* project in the Authority's 2018/19 work programme is for MDAG to publish a discussion paper, if any. Tim noted the Authority's preference for the MDAG to produce something by 30 June 2019 so this target can be met.

The group discussed options for meeting this target. The group agreed that the two-pager *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal* could be turned into a brief discussion paper that could be released in time to meet the target and potentially be followed by a workshop based on the discussion paper. Tim Street noted that the Authority wanted to encourage Advisory Groups to be innovative in

how they engaged with interested parties, and using the two pager as the basis for a discussion paper and possible workshop would be consistent with this.

9 Publication of meeting papers

The group decided:

- not to publish Concept's presentation on offer behaviour in the South Island *South Island Market Changes* – MDAG would consider publishing Concept's analysis once it had completed the further analysis requested and may give Meridian and Contact an opportunity to review the analysis before publishing it.
- that the Chair would decide whether to publish the *Outline of possible approach for promoting efficient conduct by generators and ancillary service agents when pivotal* two-pager, without alteration, on the Authority's website following Authority Board feedback on Wednesday 8 May
- to publish *New generating technologies: high-level overview for the Market Development Advisory Group* on the Authority's website subject to the scope of the high-level overview (on slide 2) being changed to allow for consideration of small-scale generation technologies
- to publish all other meeting papers, without alteration, on the Authority's website.

1D Matters Arising (cont.)

Joint Board/MDAG/IPAG meeting and the Authority's work programme

The Chair noted that he, James Flannery, James Tipping and Rebecca Osborne would be attending the joint Board/MDAG/IPAG meeting tomorrow.

The group considered a current draft of the Authority's work programme for the 2019/20 financial year.

Members noted that:

- there were some really good projects on the work programme that needed to be progressed
- the Authority needed to make sure it had enough money set aside to do enforcement
- it was inefficient to drop projects that were nearly finished
- load forecasting had been dropped off the Authority's work programme despite it having significant benefits and it not requiring much resource from the Authority.

The meeting ended at 3:41pm.

I, Tony Baldwin (MDAG Chair), certify that the minutes recorded disclose all issues discussed at the meeting (date at the top), are recorded truthfully and without bias.

Signature: 

Date: (19.06.2019)