

Commerce Commission notes on EDB DPP3 Workshop on innovation and dealing with uncertainty held 8 March 2019

Introduction

The Commission

- Introduced the topics of innovation and uncertainty.
- Highlighted that we were interested in particular in whether options are in the long-term interest of consumers, consistent with s 52 A of the Act.

Innovation

Introduction

The Commission

- Introduced the general idea of innovation, challenged attendees about whether there is scope for more innovation in the electricity industry, and what role they can play in making that happen.
- Explained how the Commission understands innovation, and how it is distinct from emerging technology.

Innovation and Participation advisory group (IPAG) recommendations

The Commission

- Noted the draft recommendations made by the Electricity Authority's IPAG relating to innovation in how the grid is used.
- Drew attention to the recommendations which may involve the Commission, both in a DPP and ID capacity.

Attendees

- Also drew attention to the innovation capability survey the EA conducted last year.
- A representative from the EA clarified that their survey was more forward looking (about capability and process), compared to the Commission's information gathering work, which was more present-focused.

Incentive rates

The Commission

- Noted the importance of the capex and opex IRIS retention rates for influencing EDB investment/expenditure decisions, and how this could be linked to capex bias where the capex rate is lower.

Attendees

- Pointed out that under a revenue cap, there is no ability to collect additional revenues as a result of innovation. Sought guidelines for when innovation revenues can be included in the RAB.
- Noted that there is no financial benefit for EDBs from innovation where it does not lead to lower overall costs during the period.

- Questioned what innovation spend should be included in Asset Management Plans, noting that when revenue is capped, innovation spend will be among the first to fall off.
- Pointed to other benefits from innovation besides efficiency, in particular sustainability, and the need to remain competitive. Only when various factors are tied together do you see the benefits.
- Highlighted not just incentive rates, but the different treatment of opex and capex, with opex based on historic trends, and capex being forward looking.
- Questioned whether incentives are poorly understood.
- Asked whether a change to the incentive rate was enough in isolation and considered that it probably was not.

Consumer-facing benefits of innovation

The Commission

- Asked EDB attendees about whether they can explain the consumer benefits of innovation.
- Noted that in the Powerco CPP application assessing the benefits of specific innovation projects was difficult, as there wasn't the level of detail provided.

Attendees

- Pointed to the benefits of EV charging systems, and how increases in the visibility of the network may benefit consumers. Acknowledged the role of smart metre data in this.
- Noted the high up-front cost of smart grid investments, and that benefits in network performance may only be seen on the longer term through more optimal investments. The counterfactual (the difference between the scenario with the smart grid investment versus without it) get less certain as time goes on.
- Raised the idea of 'enabling investments' where EDBs must take action to enable innovation beyond the metre. Process electrification given as an example.
- Highlighted concerns about costs accruing to EDBs but benefits accruing to other participants in the market; and the need to focus on whole-of-system benefits.

Load control

The Commission

- Pointed out the importance of existing load control technology for managing peak demand.
- Asked EDB attendees whether they maintain these assets, and how load control could be important in the short term while we wait for new demand response technology to mature.

Attendees

- Acknowledged the importance of load control and their investments in it.
- Raised concerns about new connections not opting to include load control in hot water systems, and in increasing use of gas hot water.

- Agreed there was a need to take a scientific approach to making innovative load control investments, but saw a risk of suboptimal investment.
- Pointed out the risk of duplication where existing assets (like smart meters) have capabilities that are not realised.

Collaboration and innovation funds

The Commission

- Discussed the idea of centralised funding for innovation. Asked about whether the DPP had a role to play here, how the funding would work, and who gets the benefits.
- Noted the limits under the DPP and pointed to the role third parties could play.

Attendees

- Noted the current uncoordinated approach to innovation, and the risk that it would not occur efficiently.
- Pointed to the benefits from increased disclosure in enabling innovation by third parties.
- Used the example of the smart tech working group as a centralised point for innovation. Raised the issue of scale in New Zealand, and that a degree of centralisation makes sense.
- Pointed to the importance of equal access.
- Generally considered the current model inadequate, and that the DPP does not encourage innovation.

Uncertainty

Introduction

The Commission

- Started by acknowledging the increasing uncertainties EDBs and the wider electricity industry face.
- Made it clear that DPP3 may not be able to address all uncertainties.
- Wanted a further articulation from attendees about what the problems are.
- Pointed out six existing and potential uncertainty mechanisms.

Four-year regulatory period

The Commission

- Included the option to set a four-year DPP as one of the options for dealing with uncertainty.
- Noted that the test is that the four-year period must be in the long-term interest of consumers and would better meet the purposes of Part 4.

Attendees

- Said that this may be problematic for EDBs seeking debt-funding, as the credit facilities many use are set assuming five years of fixed revenue.
- These problems related to the higher cost of shorter tenor debt, and the increased cost of more frequent placement of interest rate hedges.

- Asked about the IRIS implications of a four-year period.

Large connections

The Commission

- Asked about the particular uncertainties created by one-off large consumer connections.
- Questioned attendees about the role of capital contributions in funding such projects.
- When comparing this issue to Transpower's major capex project mechanism, highlighted the level of scrutiny applied to MCPs.
- Noted the importance of maintaining incentives to carry out these projects efficiently.

Attendees

- Cited a particular example of major electrification of process heat.
- Discussed the short time frames involved, the commercial pressures that customers in competitive markets face.
- Raised the risk that, because Transpower can offer new connections under a New Investment Contract outside IPP revenue, customers may direct-connect even where it is less efficient overall to do so.
- Said capital contributions may not always be available, as the customer may prefer repayment overtime to the upfront cost.
- Noted the risks of delay in any Commission approval process.
- Pointed out that the change from a price cap to a revenue cap has exacerbated this problem, as higher costs will not be offset by higher revenues.

Volume growth

The Commission

- Asked about the possibility of ad hoc reopeners for unforeseen demand growth (in particular caused by EV uptake).
- Pointed to the complexities in implementing something like this, and the IM changes that would be required.
- Asked attendees about their ability to identify and explain potential local constraints in advance.

Attendees

- Noted the high uncertainties around demand growth, the investment that could be needed in response, and the risk of non-recovery of investment the current settings create.
- Said that the (investment) solution may not be one-off projects, but instead broader-based responses (including LV monitoring).

Regulatory uncertainties

The Commission

- Pointed to the existing change event reopener as a means of dealing with regulatory uncertainties

Attendees

- Cited potential vegetation management regulations (tree regulations) as a particular cause of concern.
- Acknowledged the existing reopener but had concerns about the 1% revenue threshold.

Quality standard variation reopener

Attendees

- Noted that the quality standard variation reopener is untested, and that it is not clear what's required and what criteria will apply to assessing engineering and statistical evidence.

Participating organisations:

Ampli
Electricity Authority
Mercury Energy
New Zealand Institute of Economic Research (NZIER)
Powerco
The Lines Company
Utilities Disputes
Waipa Networks
Alpine Energy (*remote*)
Eastland Network (*remote*)
Horizon Networks
Network Tasman
Electricity Authority

Aurora Energy
First Gas
Major Electricity Users' Group (MEUG)
Orion NZ
PWC
Unison
Vector Energy
Wellington Electricity Lines Ltd
EA Networks
Genesis Energy (*remote*)
KPMG (*remote*)
Top Energy (*remote*)