

Date: Thursday 18 March 2021	Start time: 1pm	Finish time: 4pm	Venue: Powerlink's Virginia office and Teams (hybrid meeting)	Meeting no: 20
Facilitator: Gerard Reilly (Powerlink)		Minutes: Kiara Bowles (Powerlink)		
<p>In-person attendees: Ian Christmas (Edify Energy) Dean Gannaway (Aurizon) Henry Gorniak (CS Energy) Mark Grenning (Energy Users Association of Australia) Robyn Robinson (Council on the Ageing)</p> <p>Online attendees: Andrew Barger (Queensland Resources Council) Georgina Davis (Queensland Farmers' Federation) John Gardner (CSIRO) Chris Hazzard (St Vincent de Paul Society) Mark Henley (AER CCP) Bev Hughson (AER CCP)</p> <p>Powerlink panel members: Jenny Harris Narelle Fortescue Simon Taylor Daniel Andersen</p>	<p>Apologies: Claire Hamilton (Shell) David Hiette (BHP Billiton) Steven Jones (Energy Queensland) Slavko Jovanoski (AER) David Prins (AER CCP) Chris Evans (Powerlink)</p>	<p>Powerlink presenters: Paul Simshauser Matthew Myers Glen Titman Brody Ward</p> <p>Powerlink observers: Rachael Maundrell Hannah Higgs</p>		

1. Welcome and introductions

- Gerard Reilly, Acting Executive General Manager People and Corporate Services

2. Powerlink Strategy 2021 onwards

- Paul Simshauser, Chief Executive

Summary:

- Powerlink is facing a fundamental transformation of the energy sector and is preparing for this new role through our strategy development.
- Overview of the Integrated Electricity Pathways work examining different potential energy futures incorporating pumped hydro and high voltage direct current + batteries and gas. Discussion on the impacts of minimum demand on the transmission network's operation.
- An early insight into the four strategic objectives as part of the new business strategy which will 'go live' in July 2021.

Comments (C), questions (Q) and response (R)

Q. You mentioned before some of the realities of the Regulatory Investment Test for Transmission (RIT-T). Regarding Renewable Energy Zones (REZs), does the current RIT-T model support REZs or are they neutral?

R. I think the RIT-T can theoretically support it, but I think we will be very old and grey by the time we get it over the line. I also think there's a very high risk that we'll be doing it in response to a crisis. That's my bigger concern. REZs cost money and we can't just default everything to electricity consumers, not when you're talking about these big pieces of infrastructure. The conversation that we've been having with our government shareholders and our Board is the notion of Powerlink actually starting to take on some risks that we've never taken on before. That we might actually go out there and start to house some of that capacity and 'salami slice' the charging, so that it goes out to the generators as they connect, rather than imposing costs on a first connecting generator or trying to add it into the Regulatory Asset Base. I guess that's a big difference and what it means is we'd better get it right.

I think we're on pretty solid ground, we're currently on about 24 per cent renewables in Queensland. Our target is 50 per cent. We'll probably feel pretty good about the first couple of REZs we do. When we're at 48 per cent, I'm going to feel a little more nervous about that final limit we need to make. But we'll work that out when we get there.

But I think at least over the current medium-term planning horizon, as an organisation, we should feel confident to make these decisions on behalf of our shareholders, our consumers and our connecting generator customers. When you get it wrong, and provided it's small, it's okay and you live through it. But not when it's wrong in a big way. As prudent operators and custodians of a business that's owned by Queenslanders, we've got to get these right. We don't want to get any of them wrong.

C. The Australian Energy Market Operator's (AEMO's) Integrated System Plan (ISP) didn't rate the North Queensland REZ highly when you took into account potential transmission augmentation as well.

R. AEMO is doing the best they can, but they are trying to model a whole universe and they're using very broad assumptions. Queensland is modelled as if it's got no transmission losses or no transmission congestion. It's modelled as a single region. All the modelling that we did was quite different. When we modelled the state, we actually modelled intraregional constraints. We modelled Queensland as a number of sub-regions, so we were able to really fine-tune what those outcomes look like, and we can see those sweet spots, at least after seeing it pop out under those conditions.

C. As consumers we're still concerned that development of the North Queensland REZ will trigger additional transmission network investment that ultimately will be paid for by consumers and not the generators.

C. Investment by consumers would only be triggered if there was a risk the lights would go out. That's a different test to having a whole range of generators who for example are congested and can't get their generation out. So if it's congestion on moving power from Townsville down to Mackay, that's the problem for the generators.

Q. So are the generators going to fund the decongestion?

R. With all these REZs, we don't envisage any end-use consumer paying a cent for it. If consumers were paying for it, it would be because there was a genuine risk linked to price impacts and reliability levels that would be unacceptable to you. That's the only basis upon which we'd ever think about putting it into the Regulatory Asset Base. But different organisations and governments have got different views on how they want to crack this, and of course their problems are different to ours. Our long 'stringy' grid is all of a sudden becoming quite an asset to us in terms of geographic coverage.

C. It's important to reinforce that our approach to REZs is very different to the way that other states are going about their REZs.

C. When you start having a sub-national government force generation into a market, based on legislative settings and not what the market's doing, that is going to make it tricky. If there's anything that's likely to ruin a good plan, it will be things happening over the border that we just have no way of predicting or controlling, because they're not using the laws of markets. Elements like supply and demand, and customer preferences, are not necessarily being used.

Q. Is that progressing to the end of a traditional market you alluded to? Because it'll only take one more jurisdiction to maybe take a similar step like Victoria's done?

R. I always emphasise to government that you obviously need to guide markets when you're going through a transition, because markets aren't always great at transitions. But I don't think you should go straight to the bottom like this and start adding a whole lot of costs onto consumers' electricity bills through the distribution network price. The reason for that is, you're effectively raising a tax and the most regressive way of raising tax that I am aware of, is to increase the price of electricity. It's a terrible burden on low-income households. When you raise the price of electricity, we harm our most vulnerable customers.

3. Update on Revenue Determination process

- Matthew Myers, Manager Revenue Reset

Summary:

- Thank you to the Customer Panel for lodging a submission on 'capable of acceptance' which was included as an appendix in the Revenue Proposal, lodged to the AER in January 2021.
- Discussion on upcoming regulatory milestones, in particular the publication of the AER Issues Paper (24 March 2021) and AER public forum (8 April 2021).
- Powerlink has released several customer overview documents to help customers and stakeholders understand key topics.

Comments (C), questions (Q) and response (R)

C. There was some really good discussion as the Customer Panel prepared our 'capable of acceptance' statement, based on how we felt as a group at that time. In hindsight, we tried to capture the essence of 'capable of acceptance', but what we recognised was it's probably one of the first cabs off the rank that should have come up for us to understand what it actually meant, to get an insight into Powerlink's expectations as such. I recognise how the literal interpretation of even an individual word would come across. Because there was such enthusiasm in seeking our insights, some felt that it might have been a little bit over the top. I don't think we had really clearly articulated what it meant in our mind. I think we'd be a lot wiser next time around in the use of this language.

C. The challenge was because there were different interpretations within the panel as to what 'capable of acceptance' meant, and even for our own organisation what that would mean. It meant that we weren't able to form a clear consensus. That's why most of the feedback we provided is framed around our views on the quality of the engagement process itself and the associated information exchanges. We've tried to communicate what we felt about the quality of the engagement, rather than being able to pin down and say yes, we accept the proposal.

C. Yes, we had a 'lessons learned' session with Powerlink's Executive Team the other day. One of the things that actually came out of that was around the concept of 'capable of acceptance' among us too. We look back on the process and think we probably should have explored some ground rules, or criteria, earlier on. I think it became quite iterative, because there were movements based on some of the advice to Australian Gas Networks, and there was the famous Table 7 that came out that we have had a look at and done a self-assessment on. I think we'd almost look next time around to potentially co-designing what 'capable of acceptance' means, if we were continuing with this perspective. Because it

shouldn't just be about what are our expectations of 'capable of acceptance' are, we really want to hear from you as customers about what that looks like for you.

The information you provided was still really helpful and important to us. We wanted to make sure that everything was represented in full, and we didn't want to take that information and cherry pick it. There is a section in our Revenue Proposal about improvements as well – we wanted to make sure the proposal wasn't all just one-sided. There's really meaningful improvements in there like us getting out and talking to regional stakeholders a bit more, having regular forums and that sort of thing.

C. We're deliberately not trying to influence panel members on what 'capable of acceptance' should look like. Although we had some initial views, we didn't want to say to the Customer Panel that we think this concept looks like X, Y and Z. We wanted customers to propose what that looked like to you individually and in particular our customers in Queensland.

C. I think it's one thing to put it up as an aspiration, but when you try and make it real, that's when the hard work comes in, like putting the actual frameworks and boundaries and that sort of thing around it. That was a challenge for everyone. Because nobody has done something like this before, there's not really a precedent that we could really heavily rely on. I think this will continue to mature as the industry does. I think it's really exciting about how this will evolve over the coming 12 months.

C. The other thing I'd say too is that we know throughout the process, internally in Powerlink, we've been trying to push and challenge ourselves. I think it probably came out a little bit in the feedback too, that we've been pushing and challenging you guys as our customers as well, to go – right, what can you give us? What can you do? Because of the amount of effort that we're putting in, we're keen to get that back from you guys as well.

C. We've just had a discussion with the AER Board on 'capable of acceptance'. I think without betraying anything that's confidential, I think it's fair to say the AER Board is still really exploring deeply what it means to them. I think it's fair to say you are leading edge or vanguard. And I think it is fantastic.

C. Yes, hopefully the Issues Paper is framed in a way that reflects the Customer Panel's commentary around 'capable of acceptance'.

C. One of the big issues that they're grappling with, and this was the same issue they grappled with regarding 'New Reg', was to what extent if a network gets to something like what you've gotten to, does that mean a lighter touch in their review? That's another issue the AER is working through.

C. If they don't do that, to be honest, where's the incentive for networks to go down that path? If you're going to be treated like everyone else, there has to be some sort of recognition that you've put the effort in upfront. Surely there's got to be some recognition for the upfront engagement we've undertaken. I think we would be very disappointed if we were treated in the same way as our previous Revenue Proposal.

C. We agree with that. The issue is the AER and consumers coming to grips with this.

C. We have our session with the AER Board next week as well on all the issues we've published. These are all things that are part of our notes for discussion.

C. So we have the Issues Paper next week, there's then the online public forum on 8 April. I did want to just pause there briefly, as the AER has reached out to us to say it would be good if a member of the Customer Panel or RPRG were to also present at the forum.

C. Yes, I was contacted about that and we have had an email exchange through the Customer Panel group. I asked if they would be supportive of us giving a presentation at the Public Forum, the overwhelming response was yes, so it's going ahead.

C. I will also be doing a detailed presentation at the forum from the EUAA's perspective and this conversation will include our thoughts on consumer engagement.

C. We would encourage all of our Customer Panel to jump on. Even though Robyn (Robinson) will be presenting on behalf of the Customer Panel, we would encourage the whole group to join in.

C. Yes, you can register now to attend.

C. So even though Robyn will do a brilliant job on your behalf, I would recommend and hope that all of our panel members join in the session.

C. At our last RPRG meeting on 4 March, there was also discussion around potentially holding a meeting with Powerlink prior to submissions closing, so that if you have any questions or feedback you want to give to us before submissions close, we're happy to do that. There was also talk of the Customer Panel meeting without Powerlink representatives to potentially put together a submission. We would certainly encourage you to put in a submission. You've been heavily involved in the process and I think it's important for the AER and others to hear from you.

C. It's another interesting one, isn't it? How does it normally happen? Because we're such a diverse group. How does it work? I'd be really interested to hear.

R. We've used this approach before, to meet as a group without Powerlink and share our views, which would really help obviously if we wanted to write a submission. But I think it's our intention to have another meeting along those lines, to say what's your response, what are you thinking? Sometimes that just helps you firm up your views on what the submission might be, or it might highlight to the group you don't need to make a submission. It just helps for us all to get an understanding of where the others are coming from, and to get some confidence about this is where we've got different views.

Q. Were you thinking more about preparing a submission from the Customer Panel as a whole, or as a series of submissions from Customer Panel members on their own?

R. I think individual submissions are most likely, because I think we've talked before about how difficult it is to get a joint submission on such extensive content. We all have quite different perspectives on some of these issues. It's more straightforward to get a submission on the engagement process because that's what we've all experienced together.

C. I think it will be difficult to get a joint Customer Panel submission on opex, capex and incentive schemes. But we can have a discussion about these topics as a group and you can take on board what you feel is appropriate for your organisation to say.

C. In terms of timing, we're open to when we have a session with us in the room to answer any questions and have a conversation – if you think that's needed. We're in your hands as to when you want that to happen. And if you'd prefer it to happen before your own session or after your own session, we're happy to work with you on that.

Q. Is everyone happy to have a Teams meeting after 8 April?

C. I suspect the challenge will be for some of our Customer Panel members, especially those who represent a large number of individual businesses, who may or may not have their own positions on a range of matters. Getting the panel to collectively agree on a submission that represents all members of the panel will be nigh on impossible. That's why we could reach consensus around the material we provided with respect to the engagement process, as we could all account for and agree on how the process was conducted. But once we get into reaching agreed positions on specific matters, that will be far more complicated.

Q. I don't know whether there's anyone from the AER on the line?

R. No, nobody from the AER was able to join us today.

Q. Does the AER have an expectation that members of our Customer Panel are giving their feedback under the guise of the organisation they represent? Or whether you are giving feedback as members who participated in our process?

R. That would make a very big difference.

Q. I don't know whether the AER has discussed that concept with anyone at today's meeting?

R. Normally somebody would write a submission on behalf of the organisation they represent, but in some cases a business has engaged a consultant to work with the customer group to create a joint submission. But again it's quite a difficult path to tread, to find those various commonalities and have people prepared to put their names to it.

C. The EUAA submission will be from the EUAA, but I will clearly say I'm a member of the Customer Panel and RPRG, and that has been key in informing me in my ability to give you these comments.

Actions:

- ***Robyn Robinson to present on behalf of the Customer Panel at the AER Public Forum on 8 April 2021. All Customer Panel members are encouraged to attend the online forum.***
- ***Customer Panel to consider holding a meeting with Powerlink, or without Powerlink attendance, to discuss potentially lodging a submission on the Revenue Proposal (due on 24 May 2021).***

4. RIT-T update

- Glen Titman, Acting Manager Network & Alternate Solutions

Summary:

- Overview of RIT-T consultations recently completed, in progress and upcoming.
- 2 x two-stage RIT-Ts to commence in April 2021 regarding managing voltages in South East Queensland and maintaining reliability of supply in the Cairns region.

Comments (C), questions (Q) and response (R)

C. For our two big RIT-Ts coming up, they're linked to managing voltages. There is a major issue with minimum demand – it can result in producing high voltages, which need to be addressed with voltage control.

Q. Would you mind explaining to a non-technical person why high voltages are bad for our network?

R. Voltages need to be kept at appropriate levels to maintain the transfer of electricity. If the voltage gets too high or low it makes it difficult to transfer power.

C. Also in the event of a contingency, if you're sitting at the high end of voltages, you could damage your plant.

C. With the retirement of synchronous generation, and impacts of solar PV, the whole network can be affected by the need to manage those voltages. We're looking at the potential implementation of 275kV reactors across the network.

Q. So the reactors just help to stabilise the voltage?

R. It's all about voltage control, so at this point the plan is to implement up to three reactors across the SEQ network. Obviously, there is the ability for non-network solutions in this space, especially batteries could assist, and you've also got contracting out to synchronous generators to actually stay on. We didn't receive any input into the CQ reactor project we recently put in, it's actually out for consultation at the moment, I think it closes in a week or two. But there was definitely interest shown in the SEQ area, and there's a possibility we could now receive some submissions. We are progressing down the two stage RIT-T process without the Project Assessment Draft Report and obviously if anyone does put a submission in then it will go through the three-stage process.

Q. When we release RIT-T documentation, we directly notify anyone on our non-network solution list?

R. Yes and we send an email to the Customer Panel as well, so members are informed about these milestones.

Q. How many non-network solutions have you been able to implement?

R. I believe we've got a non-network solution as a temporary measure at the moment. And we're looking to actually contract directly with that synchronous generation.

Q. Would you like us to find out in the last five years precisely how many non-network solutions got offered and how many came to fruition?

C. I know we've said for some time at our RIT-T update sessions that every time people are getting closer and closer, and I think that technology is getting better. I suspect we're reaching a threshold moment that we are on the verge now of a lot of non-network solutions reaching that viability stage we just haven't seen over the last period of time.

C. With this one as well, I would actually expect there might be a hybrid solution. So we might end up putting multiple reactors in on the network, however a battery or synchronous generator could come into at least meet that portion of the need.

C. We're definitely open to all kinds of scenarios there.

C. I'm looking forward to what the impact of the TransGrid rule change is going to have. The systems services will change because I'm concerned there that we're going to have a lot of network solutions and synchronous condensers. When in fact consumers are going to be left with a stranded asset risk or a 50-year synchronous condenser, when after 25 years they're not needed.

C. It's really interesting to reflect too, that now we've used the network and have really relied on generation to come in and fill the void. But now that we're transitioning to a new way of operating with renewables coming on, I think everyone's shifting into what those non-network services actually look like. We're really at this transition point to understand how do we evolve and get greater value from those non-network services in the future. I think there's going to be a much greater advantage as you get more batteries in the system, as the capabilities around aggregation

come online. It's great for customer participation. We're now trying to work out how we can position and guide the market. How do you actually get those customer loads and generation to work together to provide these services going forward?

C. It's redefining itself in many ways. We talk about one non-network solution as being line switching, which to me is a real oxymoron. In Victoria at times they've taken out three major transmission lines in the middle of the backbone of their system. Now Queensland has too on occasion, it's had no choice but to do that. But one thing triggers another, the minute you take it out the impedance changes and you've got an emerging system strength issue. So really in a sense, what you want to avoid is those absolute last resort type actions whilst switching your network out because that reduces your reliability, you could have a market impact, all those sorts of things. That's why we need to get into this new paradigm and avoid those sort of actions if possible.

C. Our concern about the TransGrid system strength rule change is not just a matter of network versus non-network solutions. They've given us comfort that the change will have a RIT-T requirement around the system strength requirements for the next five years. The question is then who pays? But we were concerned that the residual cost is left to consumers. We didn't get any comfort from the AEMC that the residual was not a small amount. They claim that when they're putting out their final ruling in the next month, they will have some analysis to give us comfort that residual will not be large. But I will get more comfort when I see more non-network solutions being used, because then the stranded asset risk for non-network solutions is much less than stranded asset risk for network solutions.

C. Regarding the Cairns RIT-T, we plan to go out by the end of this month with the first segment of this project for consultation. It'll actually be carried out as an analysis of a whole area between Cairns and Townsville with relevant built sections, however initially we're only going out to the first component, which is 16 kilometres through World Heritage Area Wet Tropics.

Q. It's a new line rather than a refit?

R. No, unfortunately we are actually limited by the options that we have through that area, because being a World Heritage listed environmental area, we aren't allowed to take another easement. So when the line was first established, there were restrictions on the amount of vegetation clearing and access we were allowed to do through that area.

Q. There's no bushfire risk?

R. There's no bushfire risk, but we're also not allowed to clear vegetation. So what we're doing is an options analysis around different variations of a refit project.

C. At a high-level, the cost per tower or per kilometre for these projects is probably going to be higher than a lot of our other projects, just because of the unique geographic constraints we're working within.

C. Unfortunately the transmission towers are 75 metres tall in order to clear the actual rainforest, so you're not really able to compare apples with apples. What we are doing though is having a look at the need for the helicopter landing platforms currently on the towers, so we won't necessarily replace like-for-like. With the current methodologies for carrying out the maintenance and refit works, a lot of it's actually done off the helicopters themselves, so they don't actually have to land anymore.

Q. A lot of the refit works won't be done 'live' anyway. Because of the size of the structures, we will be exceeding the \$40 million mark, so we will use the full three-stage RIT-T process commencing this month. We really have to work within the constraints of that World Heritage listed environment, so our risk mitigation strategy will obviously have an effect on the price of that refit work.

Q. Are these the biggest towers Powerlink has?

R. Yes, by a long shot because we require clearance over the canopy.

C. That was part of the arrangement back when the negotiation first went through for this project. We were only allowed to do one easement with minimal clearance.

Q. This is obviously a line we still require to maintain the reliability of power supply to Cairns?

R. Yes, this is our main double circuit 275kV line into the area.

Q. I don't know whether you're aware but the EUAA sent Paul Simshauser a rule change recently that we're proposing?

R. I'm not aware of that, Jenny (Harris) might be?

C. I'd highlight the opportunity if you want to come back and talk to us about that, please do.

C. Yes, and I've also been talking about our transmission colleagues as well.

C. If I could briefly explain the purpose of the rule change – it was put in by major energy users AGL and Delta. We're concerned about the increase in transmission costs with Project EnergyConnect. We are concerned around this, as is the AER, if you read their 5.16.6 (of the NER) review and preliminary project decision from December. What we propose is that there are certain trigger points in the rule change, which says if a transmission project is above X dollars and I think we're looking here at \$150 million. Then between \$150 million and \$500 million and there's a 15 per cent rise in the cost from the Project Assessment Conclusion Report (PACR) to the contingent project application, then you've got to go back and do the PACR again. It's just a graduated trigger point. Once the PACR's finished, you're finished consultation. We want a better measure of the capital costs.

5. Tour of Operations and Service Delivery's forensic laboratory

- Brody Ward, Primary Systems Support Engineer

Summary:

- The Customer Panel visited the forensic laboratory which investigates assets that experienced faults/failures on Powerlink's transmission network.
- We drive our assets hard to maintain a prudent and targeted approach to asset management. We want to understand when things do not go to plan so we can make sound investment and asset management choices possible to ensure a safe, cost effective and reliable network into the future.

6. Meeting closed 4pm