



CMM TECHNICAL WORKING GROUP – INVESTMENT SUBGROUP

MEETING NOTE

Thursday 28 July 2022 (2-4pm AEST)

Chair: Neil Gibbs

Attendees: Connie Liang (Epuron), Bill Jackson (ElectraNet), Marilyn Crestias (Clean Energy Investment Group), Martin Hemphill (Renewable Energy Systems), Shevy Moss Feiglin (AGL), David Heard (Finncorn), Tom Gibson (Online Power), Ben Davis (ESB), Amanda Sinden (ESB), Jess Hunt (ESB), Tom Livingstone (ESB), David Swift (ESB), Arista Kontos (ESB)

Apologies: N/A

Time	Topic	Key points/action items
2:00	Welcome, objectives & agenda	<ul style="list-style-type: none">• Meeting objectives:<ul style="list-style-type: none">○ Clarify the project plan for the investment work strand over the next 2-3 months○ Update TWG members on the ESB’s consideration so far of how to approach:<ol style="list-style-type: none">1. enhancing information around congestion zones2. designing the connection fee model, and3. parties subject to the access regime.○ Obtain TWG feedback on the initial issues raised under these three areas.
2:05	Project plan	<ul style="list-style-type: none">• The ESB provided an outline of the draft timetable for the investment work strand from July – September 2022, including the grouping of targeted questions for TWG considerations (slides 3-5). <p>Discussion - focus issue for detailed design:</p> <ul style="list-style-type: none">• Regarding ‘efficient retirement decisions’, the ESB clarified that the access model is not intended to force facility owners to make a particular decision, but rather to avoid conferring a windfall gain on incumbents that distorts this decision in a way that would not have otherwise occurred.
2:15	Congestion zones & enhanced network information	<ul style="list-style-type: none">• The ESB presented on its consideration of how to enhance information around available transmission capacity for investors, supported by defining congestion zones, for the group to discuss (slides 6-14). This covered:<ul style="list-style-type: none">○ Opportunities to enhance existing information



		<ul style="list-style-type: none">○ How to quantify available transmission hosting capacity, including defining zones of congestion and capturing diverse output profiles○ The process for quantifying transmission hosting capacity. <p>Discussion:</p> <ul style="list-style-type: none">● AEMO is currently developing the Connections Simulation Tool (CST), which will allow proponents (and their consultants) to run studies against a four-state PSCAD model. The model reflects the current state, rather than a forward-looking representation, of the network.● It would be useful if the model could capture transmission investment that is underway in the area and the impact on congestion in the network if the applicant was to connect there. This suggested change to the Simulator should also allow applicants to view the combined impact on the network of connecting multiple potential projects, including both generation and load.● Action: <i>The ESB will consider the whether CST (or a variation) is suitable to use as a basis for this work, with the aim of building on this, taking into account the group’s suggestions.</i>● It would be useful to have a measure of available transmission capacity in a certain area of the network. This could include:<ul style="list-style-type: none">○ Transparency around the cause of transmission limits – i.e. whether it is based on a thermal constraint or a voltage constraint as investors may have a solution to the latter.○ Information around how much generation will result in thermal limits being reached in a zone or, vice versa, how much load (e.g. storage) is needed to alleviate congestion in a zone. This may mean the zones should be defined “electrically” rather than geographically (capturing the complexities of meshed network configuration).○ Note that Castalia provided suggestions for a methodology for calculating such a measure in their report to CEIG (February 2022; see pages 27-28).● Information around available transmission capacity should be forward-looking by capturing increments of new transmission planned under the Integrated System Plan.● Additional information to accurately assess network curtailment of planned generation projects at a specific node would assist developers, in particular:<ul style="list-style-type: none">○ Transparency of generator trip or runback schemes, including TNSP special protection schemes○ Improved guidance to help consultants identify and formulate more complex constraints (voltage, transient and oscillatory stability).● The system strength framework offers a good basis for this work as it provides good detail in the information for proponents.
--	--	---



		<ul style="list-style-type: none"> • Powerlink’s TAPR notes constraint times (including whether the system was intact or there was an outage). TransGrid’s TAPR provides line utilisation percentages (with N-1). • The ISP REZ appendix includes information about the indicative increase in transmission limits associated with proposed projects. • Action: <i>The ESB will look at all the useful information in existing individuals TAPRs and consider whether and how to make that consistent across all TNSPs’ TAPRs.</i>
<p>3:15</p>	<p>Connection fees</p>	<ul style="list-style-type: none"> • The ESB presented on its consideration so far of the Connection Fees model (slides 15-18). This included exploring: <ul style="list-style-type: none"> ○ when connection fees apply ○ the costs that we are trying to reflect in the connection fees ○ the interaction with the connection process. <p>Discussion:</p> <ul style="list-style-type: none"> • There was some support within the group for reflecting, in Connection Fees, the net present value of future congestion on all parties as a result of planned new project. • There was some support for simplification via batching, by setting a fee level for a tranche of capacity over a period of time. • It was also suggested that all fees be calculated with an accuracy percentage range, that is then refined as the proponent moves through the connection process. This would facilitate proponent financial modelling. • The ESB clarified that the connection fees are intended to provide incentives for new investors to locate in areas with existing spare capacity, but not altogether stop new investors who still wish to locate in a congested area of the network. • Action: <i>The ESB to further consider whether, and how, a proponent’s connection fee can be updated after connection to account for generator exits and, in turn, available transmission capacity in the area.</i>
<p>3:40</p>	<p>Parties subject to the access arrangement</p>	<ul style="list-style-type: none"> • The ESB put questions to the group for initial discussion (slide 19) around which participants should be subject to the access arrangements (e.g. connection fees). This included: <ul style="list-style-type: none"> ○ whether generators connected to the distribution network should be included ○ what happens to dual function assets ○ what happens to existing connections that are modified. <p>Discussion:</p> <ul style="list-style-type: none"> • Distribution level generators tend to be relatively small (compared to transmission connected generators) – as such, it may not be worth the additional complexity and cost to model them if they are not making a huge impact to network congestion. It may be preferable to, initially,



		treat them as if connected to their local TNSP, and re-assess in the longer-term after the reform has been implemented.
3:50	Next steps	<ul style="list-style-type: none">• The ESB confirmed that the upcoming TWG investment group session will focus on the queuing model and sought feedback on the key matters for consideration under this model (slide 22).• The ESB also updated the group on key milestones moving forward (slide 23).
4:00	Meeting close	