

AEMC Public Forum



Transmission Connection and Planning Arrangements

Renewable Energy Developer Perspective

16 June 2016



Our generation, your future

Infigen - Australia's leading wind energy business



LAKE BONNEY 1

Location: South Australia
Status: Operational March 2005
Installed Capacity: 80.5MW
Turbine: 46 Vestas V66



CAPITAL

Location: New South Wales
Status: Operational January 2010
Installed Capacity: 140.7MW
Turbine: 67 Suzlon 2.1MW S88



ALINTA

Location: Western Australia
Status: Operational January 2006
Installed Capacity: 89.1MW
Turbine: 54 NEG Micon NM82



LAKE BONNEY 3

Location: South Australia
Status: Operational June 2010
Installed Capacity: 39.0MW
Turbine: 13 Vestas V90



LAKE BONNEY 2

Location: South Australia
Status: Operational September 2008
Installed Capacity: 159.0MW
Turbine: 53 Vestas V90



WOODLAWN

Location: New South Wales
Status: Operational October 2011
Installed Capacity: 48.3MW
Turbine: Suzlon 2.1MW S88

Renewable energy developer perspective

- Public forum - high level commentary
- Focus on changes to the connections framework for generators
- Why is a renewable energy generator perspective important?
- Infigen supports the objectives to reduce complexity, ambiguity and lack of clarity in the NER transmission connections framework. Equivalent improvements should also be made to the NER distribution connections framework
- Infigen supports the objective to redress the asymmetric power held by TNSP and DNSP monopoly service providers in connection negotiations
- Infigen supports contestability for all services related to *dedicated connection assets*, and for as many as is practical of services related to *identified user shared assets*
- These changes will improve outcomes for the connection of new renewable energy generation assets with regard to transparency, timeliness, cost and complexity of connections to electricity networks



Renewable energy developer perspective

Infigen supports the objectives to reduce complexity, ambiguity and lack of clarity in the NER transmission connections framework. Equivalent improvements should also be made to the NER distribution connections framework

- Infigen experience is that complexity, ambiguity and lack of clarity in the NER is not limited to the transmission connections framework. The distribution connections framework is similarly challenged.
- Renewable energy generation projects are typically smaller than thermal generation projects and more likely to be embedded in distribution networks. The ambiguity and lack of clarity in the NER connections framework is a hindrance to a clean energy transition objective.
- Our experience is that the approach to connection proposals varies widely between and among TNSPs and DNSPs given scope to interpret the NER to suit their circumstances.
- In addition, the Commission has noted that certain connection provisions in the rules as written cannot work in practice.



Renewable energy developer perspective

Infigen supports the objective to redress the asymmetric power held by TNSP and DNSP monopoly service providers in connection negotiations. To that end we also support contestability for all services related to *dedicated connection assets*, and for as many as practical of services related to *identified user shared assets*

- Infigen historical experience of dealing with network service providers has seen over-engineered and expensive connection assets designed and built, that are well in excess of our requirements
- Asymmetry in negotiating power, and in knowledge of the connection framework and processes, puts connection applicants at a distinct disadvantage to network service providers in connection negotiations.
- In that context the Commission's proposal to develop a model which improves outcomes for connecting parties with regard to the transparency, timeliness, cost and complexity of connections is welcomed.



Conclusion

- Australia's electricity generation fleet is transitioning to a clean energy future. The great majority of future generator connections in the NEM will be for renewable energy projects.
- The connections framework should not add to the barriers to clean energy investment that are inherent elsewhere in our electricity market structure, and in our history of energy and climate policy instability
- Infigen supports the objectives of the Commission's work and we think the scope of work should be expanded to cover the NER distribution connections framework.
- Infigen also supports the objective to redress the asymmetric power held by TNSP and DNSP monopoly service providers in connection negotiations. To that end we support contestability for all services related to dedicated connection assets, and for as many as is practical of services related to identified user shared assets.
- We think that these changes will improve outcomes for the connection of new renewable energy generation assets with regard to transparency, timeliness, cost and complexity. And finally we think that improvements in connection arrangements identified through the Commission's work should also be considered for application in Victoria's special case.

