

24 March 2005

The General Manager Electricity Group Regulatory Affairs Division The Australian Competition and Consumer Commission PO Box 1199 Dickson ACT 2602

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Dear Sir/Madam,

SUPPLEMENTARY DRAFT DECISION: TRANSGRID NETWORK REVENUE CAP

Delta Electricity appreciates the opportunity to comment on the ACCC's supplementary draft decision on the NSW and ACT TransGrid Network Revenue Cap. Delta has decided to comment on the draft determination because of a concern that the major transmission augmentation projects proposed by TransGrid and excluded from the revenue cap will result in increasing material transmission network congestion in NSW. Delta also believes that augmentation of the 500kV ring, in addition to that proposed by TransGrid, is warranted.

The transmission network provides the means for generators to get their product to market. Material and persistent constraints on the network will limit generators' production, result in higher than necessary market prices and possibly reduce the reliability of supply to consumers.

TransGrid have appropriately identified the need to augment the network to the Sydney/Newcastle/Wollongong load centres. However, the draft determination proposes that the major project to provide this capacity, the Western 500kV ring, should be deferred. We understand that this deferral proposal is primarily based on advice from PB Associates that under increasing network constraints new generation would be incentivised to locate inside the 500kV ring. However, it is Delta's view that the increasing material constraints within the NSW network, that occur at times of high system demand, will need to be addressed by network augmentation within the revenue cap timeframe of 2004/05 to 2008/09.

Constraints

Delta believes that the draft determination's focus on alternative options to the augmentation of the network to the Sydney/Newcastle/Wollongong load centres, does not give sufficient weight to the materiality of NSW network constraints that have occurred over the last 12 months. The regulatory test now allows consideration of competition benefits that arise from an increase in competition between generators across the NEM resulting from freer flowing transmission lines. In the case of the Marulan/Bannaby component of the 500kV ring, not only will the constraints be relieved but also the



reliability of supply during peak demand periods will be enhanced. The table below summarises recent incidences of constraints north of Marulan, due to the Marulan to Dapto 330kV line.

| Constraint Event (Marulan-Dapto) 2004 - present | Minutes | Daily Average Spot Price (\$/MWh) |
|---|---------|--------------------------------------|
| 20/2/04 | 10 | 113 |
| 9/3/04 | 30 | 1293 |
| 30/11/04 | 15 | 1115 |
| 1/12/04 | 25 | 1160 |
| 14/1/05 | 185 | 572 |
| 8/2/05 | 130 | 347 |

It is important to note that the duration of constraint periods is increasing and that high spot prices resulted. Delta's analysis of cleared price sensitivity data for the 14th January 2005 determined that this one constraint alone, on a single day, increased the average spot price for the 2004/05 financial year by \$1/MWh. This equates to around an additional cost of \$68M to electricity consumers in NSW.

Further, around 600MW of generating capacity could not get to market. With tightening supply in NSW such constraints will at times of very high demands reduce the reliability of supply to consumers.

This assessment of the cost of constraints stands in stark contrast with the stated costs of moving excluded projects into the revenue cap determination. The elimination of one constraint could reduce the cost of electricity by at least \$1/MWh. This compares with a maximum increase in TUOS charges of \$0.40/MWh.

Western 500kV Ring Proposal

TransGrid's proposal for this revenue determination period is to only complete the Bayswater to Marulan/Bannaby legs of the 500kV ring. Delta supports this proposal to the extent that it addresses the problems of fault levels at Bayswater, the need for more system reactive power provision and insufficient network capability on the existing Bayswater/Mount Piper/Marulan link. However Delta is concerned that the proposal does not go far enough. The diagram below shows all the components of a full 500kV ring.



500KV NETWORK AUGMENTATION PROJECT COMPONENTS (shown in red)



Delta is concerned that the proposal to complete only the western components may significantly exacerbate congestion at Marulan. Delta believes that the 500kV ring project, if progressed, must include the Marulan/Bannaby to load centre component. In addition, there is a need for TransGrid to review the capacity of the connection between Mount Piper and Wallerawang and identify necessary upgrades on this connection to avoid future constraints.

Location of New Generation

Ideally the appropriate economic provision of transmission capacity (as assessed under the ACCC's transmission regulatory test) should align with the timing of new generation capacity development. The location drivers for new generating plant are essentially access to fuel, availability of water (if required) a close transmission connection point of sufficient capacity, and environmental approvals. The table below identifies the location of the potential new base-load generating capacity capable of supplying NSW load which may be commissioned within or shortly after the determination period.



Potential New Base - Load Generating Capacity

| Outside 500kV Ring | Inside 500kV Ring | |
|---|-------------------------|--|
| 2007 Mt Piper upgrade - 180MW | Eraring upgrade - 360MW | |
| 2007 Bayswater upgrade - 360MW | | |
| 2011 Mt Piper 3 - 750MW | | |
| 2012 Mt Piper 4 - 750MW | | |
| New Hunter Valley station - 750MW plus | | |
| New VIC and QLD generation - increased imports to NSW | | |

The siting of some peaking capacity within the 500kV ring is possible but such generation would only partially mitigate congestion and then only under certain market conditions. The conclusion drawn is that NSW's electricity growth in the major load centres will be largely supplied by new generating capacity outside the proposed 500kV ring. Given the timing of the potential generation developments, appropriate planning for additional transmission capacity to the Sydney/Newcastle/Wollongong load centre needs to start now.

In the case of the proposed Mount Piper unit 3 and 4 expansion, detailed evaluation of the project will need to commence within 12 months to meet the proposed completion date. Part of this evaluation will require a clear understanding of the future transmission capability, including network constraints and line losses. It is assumed that TransGrid can only provide forward network capability assessments based on those projects included in the revenue cap determination. Delta believes it is imperative that the revenue cap decision capture the need for likely network augmentations to ensure major new generation can be provided with appropriate transmission access to the regional node.

Conclusion

Delta strongly recommends that the ACCC review the draft decision to exclude the augmentation of the network to the Sydney/Newcastle/Wollongong load centres for the following reasons:

- 1. Material and costly network constraints are occurring now and becoming more persistent.
- 2. A realistic expectation that new base load generation will locate outside the proposed Western 500kV ring.
- 3. The need to maintain supply reliability at times of high system demands.

In determining the design of the augmentation, consideration must not only be given to fault level issues and the need for reactive support, but also to where an increase in transmission capacity will deliver the largest economic benefit to the consumers of NSW. It is Delta's view that the 500kV



western link and the 500kV Marulan/Bannaby to load centre link are required to proceed in this regulatory period.

If you require clarification of any of the points raised above please do not hesitate to contact Mr. Tony Callan, Manager Energy Trading on (02) 9285 2712.

Yours faithfully,

JIM HENNESS

CHIEF EXECUTIVE