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Dr Paul Kerin
Chief Executive Officer
ESCOSA
GPO Box 2605
Adelaide SA 5001

By email: Paul.Kerin@escosa.sa.gov.au

Dear Paul

re: Proposed Amendments to the Electricity Transmission Code

ElectraNet wrote to ESCOSA on 26 November 2012 proposing various amendments to the new Electricity Transmission Code (the 'New Code'), which takes effect from 1 July 2013.

Further to our recent discussions, the following additional information is provided to inform the Commission's consideration of the proposed changes.

1. Basis of demand forecasts

ElectraNet proposed that the definition of forecast agreed maximum demand for non-radial exit points (i.e. Category 3, 4 and 5) should be based on a 10% probability of exceedance forecast methodology.

However, it is proposed that this standard should also apply to transformer capacity for Category 2 exit points, recognising the requirement for N-1 transformer capacity at these locations. This would require the proposed new definition in clause 10.1 of the New Code to be amended to include Category 2 exit points in relation to transformer but not transmission line capacity.

As highlighted previously, the adoption of 10% probability of exceedance demand forecasts involves a marginal increase in risk to supply reliability. However, the impact of the application of these forecasts on ElectraNet's load driven capital program for the 2013-14 to 2017-18 regulatory period is a reduction in forecast capital expenditure requirements of approximately $80 million. Key deferrals include augmentation of transformer capacity at East Terrace and Mount Barker and a rebuild of the Keith substation (timing is linked to a demand driver).

ElectraNet considers that changing the basis of the connection point demand forecasts as proposed will help to achieve a better balance between reliable electricity supply and associated costs to consumers.

2. Reclassification of Kanmantoo Substation

The proposed reclassification of the Kanmantoo substation to category 2 will deliver the following customer benefits, consistent with the methodology applied by AEMO in its analysis supporting ESCOSA's most recent review of the Electricity Transmission Code reliability standards:

Table 1 – Kanmantoo Economic Assessment

Reliability Standard Category	2017-18 Forecast Demand (MW)	Unserved Energy (MWh/annum)	Annual Cost of Unserved Energy ($USE)	Project Life NPV (incremental cost)[1]
Category 1	2.7	27	$1.22m	
Category 2	2.7	1	$0.15m	$4.2m
		NPV of net unserved energy saved		$17.9m
		NPV net benefits of augmentation		$13.7m

This analysis takes into account the size of the load, the value of unserved energy and the incremental cost of the additional network assets required to achieve the increased standard of reliability. The value of customer reliability used in the analysis is $46,000/ MWh.

Consistent with the latest demand forecasts, the completion of this project is now required by the summer of 2017-18. It is therefore proposed that the reclassification of this exit point should take effect from 1 November 2017.

As previously advised, AEMO considered this project in its assessment of ElectraNet's capital project forecast for the forthcoming regulatory period, which was concluded in June 2012. AEMO acknowledged the reliability benefits estimated by ElectraNet of the proposed upgrade had been undertaken using the model and assumptions adopted by AEMO in its advice to ESCOSA. ElectraNet understands that AEMO is supportive of the upgrade on the basis of the estimated reliability benefits and incremental costs estimated by ElectraNet, and therefore is supportive of the reclassification.

ElectraNet would be happy to provide any further supporting information required to assist the Commission in the consideration of the proposed Code changes.

Please feel free to contact Simon Appleby for any further queries on (08) 8404 7324.

Yours sincerely

Rainer Korte

Rainer Korte
Executive Manager Network Strategy and Regulatory Affairs

[1] Cost and benefits are reduced from the figures quoted in ElectraNet's letter of 26 November 2012 due to a shorter analysis period.