Electricity Pricing Event Report – Saturday 09 January 2016*

Market Outcomes: South Australia spot price reached $586.79/MWh for trading interval (TI) ending 1630 hrs.

FCAS prices in all regions and Energy prices for the other NEM regions were not affected by this event.

Detailed Analysis: 5-Minute dispatch price in South Australia reached $3,231.21/MWh for dispatch interval (DI) ending 1620 hrs. The high price can be attributed to moderate wind generation and generator tripping when interconnector flow was limited.

- The temperature in Adelaide reached a maximum of 34.8°C.
- The demand reached 1,770 MW for TI ending 1630 hrs.
- Wind generation was moderate at 252.68 MW during the high price TI.
- At 1609 hrs, AGL Torrens Island A unit 4 tripped from 96 MW.
- Cheaper priced generation was available during the high price interval but limited due to FCAS profile (Northern PS unit 2), or required more than one DI to synchronise (Hallet GT) or were constrained off by the S>>NIL_SETB_KHTB1 constraint equation (Ladbroke PS and Lake Bonney WF).
- During the high price interval, target flow on the Heywood interconnector was limited to 386 MW towards South Australia by the system normal constraint equation, V^S_HYCP. This constraint equation avoids the voltage collapse in Heywood area for the loss of the Heywood – Mortlake 500kV line. The target flow also violated the limit of 376 MW set by the system normal constraint equation, S>>NIL_SETB_KHTB1. This constraint equation manages the post-contingent loading on the Keith - Tailem Bend no. 1 132 kV line for the loss of the South East – Tailem Bend 275 kV transmission lines.
- During the high price interval, target flow on the Murraylink interconnector was limited to 165 MW towards South Australia by the voltage stability constraint equation, V^SML_NSWRB_2. This constraint equation avoids voltage collapse in Victoria for loss of the Darlington Point -Buronga (X5) 220 kV line.

South Australia dispatch price reduced to $50.29/MWh for the subsequent interval following the high price when:

- Demand reduced, which includes around 116 MW of non-scheduled generation coming online.
- A total of 502 MW of generation capacity was rebid from higher priced bands to the market floor price (MFP) of -$1,000/MWh.

** A summary was prepared as the maximum daily spot price was between $500/MWh and $2,000/MWh.*