

Metering

18th February 2015



Metering – SEM today

- SEM is an ex-post market based on perfect hindsight
- Meter data was deemed key in the determination of the market price
- This relates to the determination of the Market Scheduled Demand (N. 32)
- Uses ex-post metering from generation to determine the schedule load
- Pricing & Scheduling is a seven day function in the SEM



Metering – SEM today

- Derivation of market scheduled demand –
 - Actual output of all Price Maker generators
 - Less reductions in output of Predictable Price Takers
 - Less reductions in output of Variable Price Takers
 - Plus load shedding estimate
 - Plus SO-SO trades



Metering – SEM today

- This means that the pricing system requires -
 - Metered output for all price makers (*including Interconnector Units*)
 - Metered Output for all Predictable Price Takers
 - Metered Output for all Variable Price Takers
 - Dispatch Quantity for IRCU (*SO-SO Trades*)
- These became known as “Price Effecting Generation”



Metering – SEM today

- Calculation of actual availability for generator units with non-firm access considers –
 - Firm access for the generation site
 - Actual dispatch of the generators on the site
 - Load consumption on the site (*where this is metered separately, Trading Site Supplier Units*)
- Therefore, the metered demand on these sites is also Price Effecting



Metering – SEM today

- To support pricing of the SEM on D+1TD and D+4TD, this means that data classed as “price effecting” is required at D+1TD and D+3TD
- D+3 requirement supports ability to price full optimisation horizon (*from 6:00AM to 12:00AM the following day*)
- Metering classed as PEG and PED
- Separate classification for Non-Price Effecting as NPEG and NPED
- Applies to Autonomous generators and Supplier Units
- Data only required for the settlement process @ D+1WD and D+4WD



Metering – SEM today

- Arrangements for dual polling of meters put in place in Northern Ireland and Ireland
- Means the TSO can poll Price Effecting meters where they are distribution connected
- This means seven day support is only required by the TSOs
- Arrangements covered by agreements as well as Appendix L of the T&SC and Agreed Procedure 16



Metering – for the I-SEM

- Pricing in the I-SEM does not require metering
- Day-ahead and intraday markets are priced from EU algorithms based on offers to sell and bids to buy
- Imbalance pricing based on the cost of energy actions taken by the System Operator
- Pricing based on the activation of balancing “contracts”
- Meter data will only be required for imbalance settlement purposes



Metering – for the I-SEM

- *Given this, does the I-SEM need the concept of price effecting and non-price effecting metering?*
- *If no requirement for PE or NPE metering, does this imply a change to timing of meter data submission may be considered?*
- Dual polling arrangements are in place mainly to support the aggressive meter timelines for the SEM
- *Are these needed for the I-SEM?*
- *Should we consider the cost of maintaining these type or arrangements against the reduced benefits that they will deliver in the I-SEM?*



Metering – for the I-SEM

- Different arrangements between Northern Ireland and Ireland
- NIE T&D implementing systems to facilitate meter data process to support the FIT CfD for DECC
- *Can the I-SEM operate with a latest submission of meter data to allow data collected for this process to be also used for imbalance settlement if this is later?*
- *Can there be different arrangements for meter polling depending on jurisdiction?*



Metering – for the I-SEM

- Other detail items for consideration
 - *File Formats*
 - *Communications format*
 - *Unit naming conventions*
 - *Handling of assetless traders*



Metering – for the I-SEM

- Proposed working approach:
 - *Workshops with the SEM meter data providers*
 - *Requirements of each meter data provider to be considered & discussed*
 - *Detailed requirements to be documented and communicated*
 - *Work will be under the governance of the RAs*
 - *Most issues relate only to meter data providers and not the wider industry*
 - *High impact issues (e.g. timelines of data provision) subject to full consultation*



Metering Discussion

