Modification Proposal

MP No: 136
(mandatory by BSCCo)

Title of Modification Proposal *(mandatory by proposer)*:

Marginal Definition of the 'main' Energy Imbalance Price

Submission Date *(mandatory by proposer)*: 1st August 2003

Description of Proposed Modification *(mandatory by proposer)*:

The 'main' energy imbalance price will be calculated at the highest priced energy action i.e. the most expensive ('marginal') MWh in the Net Imbalance Volume (NIV).

For example, when the market is short (NIV >0), System Buy Price will be the main price and will be calculated at the price of the most expensive accepted whole or part offer/purchase in the NIV stack. Similarly when the market is long or balanced (NIV ≤ 0), System Sell Price is the main price and will be calculated at the price of the most expensive bid/sale in the NIV stack.

For the avoidance of doubt, the concepts of NIV tagging and market price for the 'reverse' imbalance price remain unchanged from those introduced by P78 "Revised Definition of System Buy Price and System Sell Price".

To facilitate this marginal methodology, there will be a requirement to change the Balancing Services Adjustment Data (BSAD) variables submitted by the Transmission Company. In parallel with this modification proposal National Grid intend to progress changes to the BSAD Methodology Statement.

Description of Issue or Defect that Modification Proposal Seeks to Address *(mandatory by proposer)*:

The current definition of the 'main' energy imbalance price, using an average price methodology, significantly understates the cost of the marginal balancing action. This occurs particularly in times of energy shortage (i.e. high demand and/or low generation availability) when the marginal cost of balancing energy is likely to be high, and the differential between the average price and the marginal price is the greatest. For example, on 10 December 2002, Offers were accepted up to £9,999/MWh for periods 35 and 36, however the System Buy Price was £270/MWh and £261/MWh respectively due to averaging effects.

The consequence is that imbalance prices have failed to reflect the true underlying marginal cost of balancing the system and thus have not provided the appropriate signals to the forward markets with the result that participants have insufficient incentives to mitigate the risk of not being able to achieve a balanced position at Gate Closure.

Impact on Code *(optional by proposer)*:

Section T, Paragraph 4.4 would need to be revised.

Section Q, Paragraph 6.3 may need to be revised.

Impact on Core Industry Documents *(optional by proposer)*:

None identified

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Impact on BSC Systems and Other Relevant Systems and Processes Used by Parties *(optional by proposer)*:

Change to imbalance price calculation software

Impact on other Configurable Items *(optional by proposer)*:

None identified

Justification for Proposed Modification with Reference to Applicable BSC Objectives *(mandatory by proposer)*:

The two main concepts of NIV tagging and market price for the 'reverse' imbalance price introduced by P78 are considered to better facilitate the BSC Objectives. This modification will not alter these concepts, however, it builds and improves upon the existing incentives to balance within the current methodology.

The calculation of the 'main' imbalance price, using a marginal methodology, will provide more appropriate price signals to incentivise Market Participants to contract forward in order to mitigate the risk of not being able to balance at Gate Closure. This is because marginal pricing provides an undiluted signal to the market as to the underlying cost of supplying the last increment of energy required to balance generation and demand.

By enhancing the incentives to balance, this modification will increase the level of competition by encouraging Parties to trade ahead of Gate Closure. This will better facilitate the applicable BSC Objective (c) "Promoting effective competition in the generation and supply of electricity, and (so far as consistent therewith) promoting such competition in the sale and purchase of electricity".

In addition, this modification will benefit the operation of the Transmission System when security of supply is an issue and will therefore better facilitate applicable BSC Objective (b) "the efficient, economic and co-ordinated operation by the Transmission Company of the Transmission System".

Details of Proposer:

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Details of Representative's Alternate:

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Attachments: YES

If Yes, Title and No. of Pages of Each Attachment:

Supporting paper entitled "Marginal Imbalance Pricing" (5 pages).