ELEXON

Issue 98 Workgroup 3 Summary

Summary

1. Meeting Objectives

The Chair welcomed attendees and presented the meeting objectives:

- Recap of Workgroup Meeting two
- Discuss and confirm the solution(s)
- Confirm next steps following the conclusion of the Issue group

2. Discussing the solution options

- 2.2 Following an action from meeting two, NGESO gave the Workgroup an update of further information regarding the Modern Dispatch Instructor (MDI) work stream.
- 2.3 The Workgroup discussed five different scenarios using the MDI:
 - Minimum Flat Top time a stability function that would preserve a BMU at a steady MW figure for a minimum length of time as part of a BOA. The workgroup felt this is a parameter which could change over time depending on plant operating conditions and the operators understanding of the units they are working with.
 - Minimum Delta MW a stability function that would prevent a BOA from moving a unit's flat top until a deminimis value is met. There was some concern from the workgroup that Ofgem could take issue to this parameter, potentially arguing that it results in greater procurement of energy than otherwise necessary.
 - Near MEL/MIL/SEL/SIL action where a BMU would be taken to a technical limit if an instruction would otherwise take the BMU close to that limit.
 - Splitting Large MW values using multiple BMUs to deliver a large instruction, reducing non-delivery risk. NGESO noted they don't/wouldn't determine delivery risk in advance.
 - State of Energy representing the maximum amount of energy a BMU can deliver (e.g. state of charge, fuel availability).
- 2.4 NGESO confirmed to the Workgroup that all the dynamic parameters are included within the algorithm.
- 2.5 NGESO suggested to the group that if there are specific options that the group decided would see value in a more detailed impact assessment before any Code Modifications are raised, then that is a potential recommendation.
- 2.6 NGESO confirmed that each of these potential dynamic parameters would be introduced via a code change process, and there would be the opportunity to provide input as they are further developed.

3. Conclusions

- 3.1 The following solution options were presented to the Workgroup:
 - Option 1 Grid Code wording change
 - Option 2 Non-monotonically increasing Bid/Offer prices
 - Option 3 Multiple sets of Dynamic Parameters
 - Option 4 New Ancillary Services where needed
 - Option 5 Explicitly model sub-assets
 - Option 6 Dynamic SEL/SIL (GC0126) + others
 - Option 7 Additional Dynamic Parameters
- 3.2 The Workgroup wished for Option 1 to be pursued. The Workgroup also asked NGESO to speak to their IT team to investigate what parts of the IT systems can be changed prior to a new IT system going live.
- 3.3 The Workgroup decided that Options 3, 5 and 6 should be considered going forward.
- 3.4 The Group decided that Option 2 cannot be progressed right now as it is still under investigation

- 3.5 The Workgroup decided that Option 4 was already being looked at separately and hence does not need to be pursued.
- 3.6 Option 7 was discussed at length, but the group is not looking to pursue Option 7.
- 3.7 NGESO noted that a number of the IT constraints faced were of a fundamental mathematical nature rather than due to lack of throughput or ability at NGESO to develop systems, and were open to exploring more practical options to mitigate those constraints.

4. Next steps/Actions

- **Elexon** to send out updated slides including the slides covering the MDI.
- NGESO to speak to their IT team to find out what is potentially deliverable under the current IT systems.
- Elexon to issue the Issue Report to Workgroup members for review.