

Gaelectric Holdings Plc.

Response Paper to:

DS3 System Service Qualification Trial Consultation

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Public

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1 INTRODUCTION

Gaelectric Holding Ltd ("Gaelectric") welcome this opportunity to engage with the TSO's on the DS3 technology trial proposal. The technology trial will be of the upmost importance for facilitating market entry for new technologies and increasing the number of providers. This is fundamental to the TSO's reaching their targets of 75% SNSP by 2020.

As a consequence of increasing competition amongst prospective providers of DS3 services, tariff rates should fall over time. This will ultimately result in savings to the consumer, however this cannot be expected in year one. New system service providers are experiencing significant costs to undertake the required development and installation of projects capable of meeting the increased requirements of the TSO's. With this in mind, Gaelectric have provided feedback to the queries posed in the consultation document. Furthermore, we have identified a number of issues on which we seek clarification. Some of these are listed below with others referenced in response to the consultation questions.

Technology Trial

It is clearly stated that is a Technology Trial, not a service provider trial. This means that once a system service has been demonstrated by one technology, it proves that the technology can provide the system service in question - regardless of the owner.

Gaelectric's intention is to install a Lithium Ion battery. Lithium Ion batteries are already installed in Northern Ireland. Should this project successfully participate in either/or the provenability and measurability trial, this should be sufficient for all prospective owners of Lithium Ion batteries. Furthermore, should existing projects currently hold a HAS contract, this should be sufficient to prove that all projects of this technology type are capable of providing this system service.

Event Definition

Gaelectric seek more information on how each individual system service will be assessed. More specifically, a clear definition must be provided of each "event" that against which the provenability and measurability will be assessed. Detail of the technical characteristics of these "events" (e.g. frequency deviations of FFR) must be clearly stated before commencement of the trials. This will enable participants to ensure the capability of their project and ultimately the success of their trial.

Dual Participation

While the Provenability Trial is specifically aimed at wind, demand side and other technologies, nowhere in the paper does it prohibit a project from participating in both the Provenability and Measurability trial simultaneously. Gaelectric seek clarification that our understanding is correct and an "other technology" could participate in both the provenability and measurability trial. Furthermore, should the provenability trial proceed as proposed, could this technology apply for an interim tariff for the Inertia and Reactive power system services.

Implications for Enduring Auction

Not all prospective DS3 providers will successfully apply to participate in the technology trial. For this reason the product of the technology trial must be clear guidance on the "proof" required of prospective participants to successfully qualify for the enduring auction. This proof must be transparent and robust. At recent workshops it was implied that evidence from systems larger than 30GW would not be considered. No justification was provided for this arbitrary figure. Gaelectric believe that evidence from other systems should be eligible as proof to participate in the enduring auction.

Gaelectric believe only accepting one system service provider in each jurisdiction is too low and leaves the TSO's too exposed to potential failure of the provider in the Measurability trial. For this reason we believe more than one service provider should accepted. This will also offer more potential system service measurement mechanisms for the TSO's enabling them to make the most cost effective choice. This will act as proof for prospective participants in the enduring auction and should boost competition.

Details of the proof required for the enduring auction should extend to Inertia and Reactive Power services as well as the Reserve and Ramping products as determined by the technology trial.

2 CONSULTATION QUESTIONS

Q1: Do you agree that the Qualification Trial Process should focus on both "Provenability" and "Measurability"?

Gaelectric agree that it is prudent on the part of the TSO's to mandate proof Provenability and Measurability from prospective DS3 providers. Notwithstanding this position, the TSO's must bear in mind that the aim of this process is to clarify what technologies have proven that they can participate in the enduring DS3 arrangements and what constitutes proof.

As it's currently phrased, "proof" it is subjective and ambiguous. Gaelectric want to avoid any circumstance in which proof of provenability and measurability provided by participants in the enduring DS3 arrangement may be deemed unsatisfactory in the opinion of the TSO. For the results of this process should provide detail on what type of proof is acceptable to the TSO's to participate in the enduring DS3 arrangement.

Q2: Do you agree that the Provenability Trials should focus on proving only two System Services, as representative of all System Services in those categories of System Services?

Gaelectric seek clarification on how the volume of each of the Reserve and Ramping products will be calculated. From the proposal, it seems that the volume of SOR and TOR1 is capped at the volume of POR that can be generated by the prospective participant.

Similarly, under the proposal to use RM3 as the indicative ramping product, the volume of all ramping products will be capped at the generation a plant can be ramped to within 3 hours from a cold start.

If the above assumptions are correct, overestimation of RM1 volumes availability may occur. Similarly, underestimation of SOR and TOR1 may also occur.

Q3: Do you agree that the Provenability Trials should focus on the Reserve and Ramping categories of System Services?

Gaelectric believe that limiting the technology trial to these system services is a narrow approach. Provenability Trial participants, particularly emerging technologies, may also be capable of providing Inertia and Reactive power. Not being given the chance to prove Inertia and Reactive power through the Provenability Trial may harm the prospects of these projects successfully qualifying for Inertia and Reactive Power contracts under the enduring DS3 auction.

Our assumption is that should a service provider qualify and successfully complete the Measurability Trial for the 3 "fast" services, this would be sufficient proof to qualify for the enduring DS3 auction for these services. Should this not be that case, the points previously made regarding the omission of Inertia and Reactive Power from the Provenability Trial are also applicable to the "Fast" services.

Q4: Do you agree that the technology classes targeted in the Provenability Trials should be wind, demand side and 'other technologies'?

This is a Technology Trial, not a service provider trial. This means that once a system service has been demonstrated by one technology, it proves that the technology can provide the system service in question - regardless of the owner. With this in mind, Gaelectric agree that the provenability trial should be confined to these technology categories.

Q5: Do you agree that the Measurability Trials should be technology neutral?

Gaelectric believe that the technologies that are most capable of providing measureable fast service should be selected for the measurability trial.

Q6: Do you agree with the proposed service provision volumes and proposed number of Service Providers to be included in the Provenability and Measurability Trials respectively?

<u>Provenability Trial</u>

Gaelectric believe that more volume should be attributed to test the Provenability of "other technologies". Other technologies contains a potential mix of many different types of generators and therefore we believe a greater volume be ringfenced to allow a greater number of prospective participants. This should allow a greater number of technologies be proven, and subsequently, a greater number of prospective DS3 system service providers for the enduring auction.

Implicit in the split of the volumes for the provenability trial is a competitive advantage for providers in NI. There are most installation sites in ROI with a greater volume of system service required in this jurisdiction. For this reason we request further information on why the volumes were split 50:50 across each jurisdiction despite one jurisdiction being 3 time the size of the other.

Gaelectric would also like the TSO's to provide detail on what Wind turbines will be included in the Provenability trial and what, if any, differential characteristcs may be considered.

Measurability Trial

Regarding the Measurability Trial, Gaelectric believe that only 1 service provider in both ROI and NI is too low. Such a low number of service providers to test measurability for each of the 3 fast services limits the number potential methods of measurement and technologies that can prove their measurement capabilities.

Measures must be taken to ensure that the mechanism for measuring the chosen fast system service is not prohibitively expensive. Should a prohibitively expensive measurement mechanism be tested and chosen, only those that can afford that measurement mechanism would be capable of providing the system services. This may result in an anti-competitive outcome.

Furthermore, limiting the measureability trial to such a small number of service provider's leaves the TSO's exposed to failed tests. Should a provider fail there test, the reasons for failure must be made public so that prospective providers know whether it was a project or grid related issue. This will allow them to change their designs accordingly.

Q7: Do you agree with the minimum sizes of Providing Unit proposed for the Provenability trials?

Gaelectric are in broad agreement with the minimum installed capacities for the provenability trials.

Q8: Do you agree with the proposed evaluation criteria for the selection of participants to take part in the Provenability Trials?

Gaelectric strongly object to the inclusion of an "expected payment per MWh" as an assessment criteria in applications to the provenability trial. We believe the objective of this should be for the most appropriate and capable technologies to attempt to prove their ability to provide the system service in question.

Furthermore, existing generators providing DS3 system services under the interim Tariff arrangement will receive the Interim Tariff rate. Projects providing the same system services under the technology trial should be paid the same rate as those providing them under the interim tariff. Any discrepancies are unfair and anti-competitive.

Q9: Do you agree with the proposed evaluation criteria for the selection of participants to take part in the Measurability Trials?

Partaking in this process is contains significant risk. This is because no measurement mechanism has been proposed by the TSO's and therefore it is in collaboration with Industry that a measurement mechanism must be created. For this reason, it is unfair for participants shoulder the risk of developing and installing a project to help the TSO create a measurement mechanism and have this payment entirely contingent on the success of the trial. We therefore suggest the TSO's to structure this payment differently such that a portion of this payment is transferred for to cover development/upgrades to project infrastructure. The balance should then be transferred upon successful completion of the measurability trial. Such an arrangement would be reflective of the risk taken on by participants when building a project without knowing the required specifications.

Q10: Given the stated aims of the Qualification Trial Process, are there different criteria that would better achieve those outcomes than what is proposed here? If so, what are they and how will they work?

Not all applications received from prospective DS3 providers will be successful. Therefore Gaelectric seek clarification and confirmation in the decision paper of the following issues.

I. This is a technology trial, not a system service provider trial. The difference here is that once a technology is has passed its provenability/measurability requirements, it is proven for all installations of that technology – regardless of the owner. We therefore request the TSO's to acknowledge this in the decision paper.
II. The result of the measurability trial should be the "proof" required for potential technologies to partake in the enduring DS3 auction.
III. For technologies that did not succeed in their bid to partake in the provenability trials, detailed technical characteristics of the proof required to successfully qualify for the enduring auctions should be provided. T

3 CONCLUSION

Gaelectric would like to take this opportunity to thank the TSO's for engaging with Prospective DS3 providers on these issues. We look forward to clarification of our queries in future engagements. In the meantime, if there are any further questions on any of the points raised within this document, please do not hesitate to contact us.