

Submission by Bord na Móna

to the consultation on

Proposal for Implementation of the European Target Model for the SEM

SEM/12/004

Date 20th April 2012



Consultation Paper on Proposals for the Implementation of the European Target Model for the Single Electricity Market

Response to Consultation

1 Introduction

Bord na Móna (BnM) welcomes the opportunity to make a submission on the Consultation Paper on Proposals for the Implementation of the European Target Model for the Single Electricity Market.

The overarching message contained in this response is that BnM acknowledges the need (and obligation on the RAs) to ensure that market mechanisms are in compliance with the European Target Model (ETM). However, it is critical for market participants, consumers and the general economic wellbeing, of both jurisdictions on the island, that the physical realities of the power system and Governments' policies are at the forefront of objectives during the High Level (re) Design process.

While there were specific consultation questions posed in SEM-12-004, it has been tacitly acknowledged that it may be premature for a consultee to formally frame a submission based on answers to theses questions. This paper instead outlines cogent arguments which underpins BnM's high level message.

2 Comments

In the first instance, BnM appreciates the magnitude of the task at hand. In addition, the level of interaction and consultation is to be commended, particularly as the outputs from the consultation process to date have resulted in specific work-streams being identified as areas of work which require more detailed study.



Furthermore, Bord na Móna appreciates the efforts made in garnering 'transitional arrangements' for the SEM, and is of the opinion, given that the ETM is still in effect a 'moving target', that full use of this additional time be employed in redesigning the SEM so as to reach an enduring solution which is both compliant with the final characteristics of the Target Model and ensures the provision of secure, reliable, and affordable electricity to consumers on the island of Ireland.

2.1 (De)Coupling SEM's redesign with the realities of the Power System

Bord na Móna is fundamentally of the belief that any redesigned SEM cannot be effective if the realities of the current, and future, power system are not 'hardwired' into the market design. In this instance, the realities facing the power system, are such that it is

- A discrete synchronous power system, it will always be an isolated island system separated from the large GB and pan-European networks
- Inter-Connection (IC) will likely remain less than 1000 MW by 2020
- System Non-Synchronous Penetration (SNSP) level > 50% at present (higher that any other European country) and expected to reach $\approx 75\%$ by 2020
- Largest in-feed unit could exceed 20% of system demand under certain scenarios

When these factors are considered in the round, and contrasted against the physical characteristics of power systems in continental Europe, it is Bord na Móna's opinion that the secure, reliable, and affordable operation of the power system will require **Central Dispatch** as a key element of the market design.

Eirgrid have initiated a significant work program, DS3, to develop the provision and remuneration of support services required for the operation of the power system in order to comply with the identified target levels of RES-E. Bord na Móna believe it is important, given the potential relationship between any SEM market redesign and the



redesign of system services, that the interaction between these two processes are consulted on in tandem.

2.2 Retention of Capacity Payment Mechanism (CPM)

Participants, who invest in the SEM, accept that there are always certain and quantifiable 'market' risks associated with their business plan. However, there is an onus on the Regulating Authorities to ensure consistency and regulatory certainty in their decision making. This regulatory certainty is essential for both the investing directors/stakeholders and the capital markets, either directly or indirectly funding the development.

In this regard, retention of the CPM is a critical feature of the electricity market design which must be retained. The CPM has historically been the driver which secured identified investment needs in the SEM and continues today to be the touchstone on which investor confidence is based. A redesigned SEM which fails to incorporate a facility in which capacity is remunerated could threaten investor confidence and be viewed by the funding community as 'regulatory reneging'.

On a power system where the target level of RES-E generation in the period to 2020 and beyond will ensure significantly reduced capacity factors for thermal plant, which however, will still be required to meet up to 60% of demand, some form of additional remuneration above and beyond 'energy' payment will be required. There will also be an enhanced requirement for replacement reserve and fast acting flexible capacity which, will in the main, be provided by thermal plant of various types as an element of a balanced system portfolio. The alternative scenario, i.e. an energy only market, as well as impacting of generator's revenue adequacy, would also, as identified during the original high level design process for the SEM, lead to the risk of considerably higher levels of price volatility, with adverse knock-on effects for consumers.

It is therefore BnM opinion that the CPM must remain.



Bord na Móna acknowledges that the above point has been made by numerous parties and tacitly accepted by the RAs at various consultation workshops. We also welcome the additional work being commissioned by the RAs to understand how the CPM can be physically accommodated within the SEM's re-design.

2.3 Facilitation of Renewables – a building block for the High Level (Re)Design

Notwithstanding the commitment given by the RA's to further investigate the facilitation of renewables when considering market design, the pertinent question that must now be asked is where 'renewables' sit on the hierarchy of evaluation criteria to be employed during the redesign of the SEM.

Both jurisdictions which are party to the SEM have similar and stretching mandatory renewable energy targets for 2020. RES-E form a key component of the action plans designed to the facilitate the achievement of theses targets. Assessment of these action plans indicate that the large scale deployment of intermittent wind energy on the power system will be the main vehicle to achieve these targets.

It is noted that the consultation paper states¹ that during the original key assessment objectives for the SEM, "the Regulatory Authorities accepted that a market cannot be designed specifically around renewable generation". In Table 4 of the current consultation paper, 'Environment/Renewables' remains relegated as a 'Secondary Objective'. Given the legislative and policy drivers supporting renewable energy and the impact that increasing levels of intermittent non-synchronous generation will have on the physical power system, and hence the market design overlaying this system, it is Bord na Móna's opinion that the facilitation of the deployment of Renewables on the power system be made a primary assessment objective during the SEM redesign process.

¹ SEM-12-004 at pp 29



EU and National Energy policy is now aligned with the aims of the EU's 3rd Climate and Energy package, which are clearly focused on the decarbonisation of the power system. In the context of an all island power system this will be achieved mainly by the increased penetration of non-synchronous intermittent wind energy onto the power system. The safe and secure management of the anticipated levels of wind generation to be installed on the power system must therefore be considered as a key objective in the SEM redesign.

2.4 Evolutionary or Revolutionary considerations

It has been stated above, that as a result of how the consultation process has developed, it would be premature for a participant to proffer answers to the formal questions posed in the SEM-12-004. A natural corollary is that plumping for a preferred option from the list of evolutionary / revolutionary options is also premature at this point in time.

However, the fundamental design features which have been responsible for the SEM's success to date, together with its inherent RES friendly characteristics, and the practical fact that the ETM is still a moving target, all suggest that minimum change is a prudent approach at this stage of the evolution towards full scale integration with a fully functioning pan-European market and associated power system. Bord na Móna would therefore be of the opinion that **principles underpinning** Option 4, i.e. the 'overlaying' of financial instruments on the existing SEM market structure, **merits further detailed investigation.** Bord na Móna appreciates that simply layering CfDs on top of the SEM does not directly address either the vexed question of firmness or cover potential volume risks, however, the concept(s) behind this option should be brought forward in to the next phase of the consultation process.

2.5 Other unresolved questions

While sections 2.1 - 2.4 of this submission concern what are in effect High Level Design principles that we believe should form the core of the SEM redesign, there are



a number of operational issues, certainly not an exhaustive list, which are brought to the attention of the RAs. It is possible that some of these matters may be resolved as part of the additional discrete work packages being commissioned by the RAs at present. In terms of a redesign market,

- How are predictable price taking generators (PPTG) that are currently afford priority dispatch in the market, but are then dispatched away from the contracted/nominated positions to be recompensed and returned to their preinstruction status?
- It is critical for investors in Renewable generation, that a clear definition and understanding of **Total Market Revenues**, in the context of REFiT support for RES generation, accompany all future scenarios
- Mitigation of the impact on 'Self-Suppliers' following the abolition of a pool market, which has the potential to 'concentrate the market'?
- In the absence of a single ex-post price, how is a 'mid-merit' plant to be defined, in the context of SEMC decision relating to the qualification criteria of Hybrid plant status in section 4.5 of SEM-11-062?

3. Conclusions

Our message to date is that, notwithstanding the obligations, yet to be fully defined, of the ETM, any market redesign must be cognisant of the physical realities of the power system. In addition, the redesigned market must be 'RES friendly' in order to ensure that key EU and National policy objective in term of decarbonisation the power system are achieved and the redesigned market must also generate confidence among investors (existing and new).



The obvious conclusion from these considerations is that the CPM and the features of Central Dispatch should be retained as high level design criteria and that the SEM characteristics which have propelled the island of Ireland into a world leader for facilitating RES-E must be retained or perhaps enhanced. In addition, financial 'overlays' which minimise structural changes to the SEM, must continue to be investigated.

It therefore seems logical, that the next step in the redesign process, having now identified areas of concern to participants is to define or redefine the fundamental characteristics which should underpin the market, in a manner analogous to that employed during the design of the original SEM.

Bord na Móna will continue to enthusiastically engage with the RAs and other stakeholders in this consultation process.

For and on behalf of

Bord na Móna,

Dr John MacNamara

20th April 2012