

IWEA response to the second Consultation on CRM in the I-SEM

08 February 2016

IWEA welcomes the opportunity to respond to this first consultation on the Capacity Remuneration Mechanism (CRM). The CRM has been a fundamental part of the market design on the island of Ireland to date and the move to the Reliability Option (RO) is a significant change which presents a serious challenge to the wind industry. With the increasing levels of wind generation in the market, it is important that wind generation can participate in all aspects of the market and that the capacity credit of wind generation is recognised.

In our submission to the I-SEM High Level Design Draft Decision, we highlighted the significant concerns that the wind industry has with the choice of CRM, the Reliability Option. From a wind perspective Reliability Options are problematic because they create implicit penalties when market prices go high in the reference market. By definition, zero cost variable generation drives prices low when it is available (particularly when it comprises such a portion of market demand). Therefore, penalties may occur during periods of high demand AND low wind. This means that wind may be punished most severely out of any technology class under the RO. Wind would have to account for this unfair penalty into its RO offer, likely making it uncompetitive. Defining the penalties in this manner, i.e. implicitly saying that periods when wind contributes to a high demand requirement are not periods where there may be a requirement for security of supply, is clearly discriminatory.

In terms of IWEA's stance on the treatment of wind under the CRM, IWEA believes that a design principle of the CRM should be that wind generation receives fair payment for its capacity credit contribution to system security. Any other outcome would be discriminatory and would not comply with the new State Aid Guidelines. Wind has an established capacity credit as outlined in the Generation Capacity Statement and this capacity credit needs to be recognised. Furthermore, the design of the CRM should not promote interconnector imports relative to how neighbouring markets CRM's promote interconnector exports. While IWEA is cognisant of the desirability of cross-border participation in capacity markets where technically and economically feasible, the design of the CRM should be such that impacts on interconnector flows are minimised and imports on the interconnector are not rewarded at times of high wind, resulting in wind curtailment.

Consultation Questions

Interconnector and Cross Border Capacity

A) Which of the approaches to the treatment of cross border capacity do you prefer and why? (For the Provider Led and Interconnector Led approach, please specify whether you prefer the "Performance based" or "Availability Based" variant).

The current arrangements in relation to the interconnector participation in the CRM lead to uneconomic flows on the interconnector based on the energy price differential between I-SEM and the GB electricity market. It is essential to ensure that the treatment of interconnectors in the new arrangements does not lead to market distortion. Distortion could also arise from different treatment of interconnectors in different jurisdictions.

It was noted at the stakeholder forum that providers of capacity in other jurisdictions would not be excluded from participating in other capacity mechanisms, and therefore there is a possibility of double payment for capacity with no increased performance requirement. This would also have the potential to lower the bids from these participants and giving them a competitive advantage over domestic providers of capacity.

In relation to the options for how the interconnector should be treated, IWEA has the following comments:

- **Net off demand.** IWEA believes that this is the simplest solution to implement at this time until there is further clarity on what the harmonised European solution will look like. This will also allow market data to be gathered which could then be used for interconnector derating. Following on from the approach used in GB (which satisfied the State Aid Guidelines) this approach would allow a bedding-in period for generators on the island of Ireland, with the interconnectors to come later.
- **Interconnector led.** IWEA has concerns in relation to the Interconnector led approach. The use of historical data would not be appropriate in light of the current distortion arising from the existing CRM mechanisms where the interconnector flow does not reflect the difference in energy prices between the SEM and the GB electricity market. It would also be extremely difficult to forecast the price differential as this is likely to change based on the new trading arrangements.
- **FTR led.** IWEA does not support this option.
- **Provider led (Performance or Availability based).** IWEA believes that there could be merit in the provider led approach, and that this should be performance based. If this was to be availability based it would put generators in other jurisdictions at an advantage against participants on the island of Ireland which are participating on a performance basis, thereby creating undue discrimination. In relation to the derating of these providers, account would need to be taken of the particular technology and the interconnector availability.
- **Hybrid of Provider and Interconnector.** IWEA believes this option is overly complex at this time for the reasons highlighted under the individual options above.

IWEA proposes that the approach to net off demand is used until there is further clarity at a European level as to what the harmonised solution might be. This is also the simplest solution to implement and will allow a number of years of data to be generated which could be used in any future analysis.

B) Should the de-rating of interconnectors be based on historic performance, or include forward modelling to project how its performance could change in the future?

As outlined above, the use of historical data would not be appropriate in light of the current distortion arising from the existing CRM mechanism where the interconnector flow does not reflect the difference in energy prices between the SEM and the GB electricity market. It would also be extremely difficult to forecast the price differential as this is likely to change based on the new trading arrangements. Therefore IWEA proposes that the “net off demand” approach is used until there is further information available in relation to market prices and interconnector flows.

C) If there is a preference for the “Interconnector led performance based” approach there will be a need to allocate total interconnector flows between specific interconnectors. Which of the specific approaches set out in 2.4.6 do you prefer? These approaches were:

- ***Balance interconnector utilisation;***
- ***Pro-rata to interconnector metered flow; and***
- ***Complex power flow modelling***

n/a

D) If there is a preference for the “FTR led” approach, which of the specific approaches set out in 2.4.15 (net or gross) do you prefer for the allocation of non-day-ahead flows?

n/a

E) If there is a preference for the “Performance based Provider Led” approach, which of the specific approaches set out in 2.4.25 do you prefer for the allocation of intra-day and balancing market trades?

- ***As traded***
- ***Pro rata to Reliability Option (in which case – do you prefer “gross” or “net”)***
- ***Ignore – all in Balancing Market***

IWEA believes that providers of capacity in other jurisdictions should be treated on the same basis as capacity providers on the island of Ireland. The option selected needs to reflect this and not create any market distortion.

F) If there is a preference for the “Hybrid” approach:

- ***Should this be paired with the “Delivery Based” or “Availability Based” provider led approach?***
- ***Should Interconnector participation be mandated or voluntary?***

IWEA does not support the Hybrid based approach, however, if it is chosen it would need to be “Delivery based”.

Secondary Trading

A) Do respondents agree that direct secondary trading of Reliability Options should be permitted?

IWEA supports the proposal to allow secondary trading. We believe this is a fundamental requirement of the Reliability Options which will allow participants to manage their availability and risks of participation by having the ability to sell on their obligations. It seems at this stage that the contract design will not cater for planned outages so it is essential that participants are able to manage this risk.

Further clarity is required in relation to how this will be implemented and the timelines associated with secondary trading. IWEA believes that this functionality could be of use to wind generators if trades close to real time are permitted and with aggregator participation.

B) Should secondary trading of Reliability Options be via an organised secondary platform? If so, which one of the options is preferred?

IWEA believes that an organised secondary platform should be used as this will increase liquidity for secondary trading and increase the likelihood of participation. A mandatory centralised market place would be the most appropriate option for promoting liquidity.

C) Do respondents believe that “back-to-back” trading to lay-off exposure to difference payments should be permitted?

Back to back trading may provide additional flexibility to participants, however we would not see this as being a replacement for direct secondary trading.

D) With respect to the creation of a centralised Reliability Option secondary market platform:

1. Is there likely to be sufficient demand for secondary trading to justify the cost of the development of a centrally organised platform;

IWEA believes that secondary trading is a fundamental part of the Reliability Option design and that complexity should not be a barrier. In relation to the level of demand, this is difficult to know at this stage and will depend entirely on the detailed rules which are yet to be defined.

II. Do respondents think that capacity providers should be allowed to acquire Reliability Option volume in excess of their de-rated capacity (plus the tolerance margin), and if yes, how the limit on Reliability Option volume for the net primary and secondary volume should be structured?

The purpose of a secondary market is to enable flexibility from capacity providers to be able to manage the risk associated with the Reliability Option. While it may not be appropriate to allow generators up to 100% of their capacity, the secondary market provides participants with tools to manage the risks. As you get closer to real time generators will have a better idea in relation to availability based on planned outages, forecasts etc., however there won't be any further certainty in relation to unplanned outages. However, if secondary trading is permitted at short timeframes this will allow participants to enter the secondary trading arrangements when a forced/unplanned outage has occurred.

IWEA believes that further analysis is required on what the appropriate limits might be under the secondary trading arrangements.

III. What limits should be placed on secondary trading timeframes, including: the timing of secondary trade execution - how soon after the auction should they be allowed, and how late in relation to real time delivery should they be allowed; and the length of the Reliability Option contract which can be traded?

IWEA believes that there should be flexibility in relation to the timing of secondary trading from the time of auction up to real time. This will help with liquidity and accommodate the different requirements of participants, e.g. catering for planned outages where there may be sufficient notice available, or for forced outages where short notice is more appropriate.

While there may be some opportunities for wind generation with ex-post secondary trading, there are concerns in relation to possible market power implications by reducing the exposure of inefficient plant to difference payments.

IV. Should the Capacity Market Delivery Body maintain the processes and capability to undertake pre-qualification throughout the year, and what service standards are required for processing new applications?

IWEA supports this proposal to have the capability to undertake pre-qualification throughout the year.

V. Should a secondary acquirer of a Reliability Option start from a zero position against each "stop-loss" limit, or should the loss transfer?

IWEA believes that the loss should transfer with the Reliability Option to ensure fair treatment of all participants and not providing any undue advantage to using secondary trading.

Detailed Reliability Option Design

Reliability option contract length questions

A) Principle of Longer Term Reliability Options:

I. Do respondents agree that plant requiring significant investment should be able to avail of longer term Reliability Options?

IWEA supports this proposal. Longer term contracts are essential to ensuring the investment case of new plant which can provide the required capacity and flexibility to the system. IWEA would note, however, that consideration be given to the objective outlined in the Government White Paper, published in December 2015, which outlines the policy pathway to 2050 and 2100:

“Our vision of a low carbon energy system means that greenhouse gas (GHG) emissions from the energy sector will be reduced by between 80% and 95%, compared to 1990 levels, by 2050, and will fall to zero or below by 2100.”

It is essential that any long term contracts take this policy objective into account and support the transition to a low carbon energy future.

II. Do respondents agree that existing plant should be restricted to reliability options with a term of 1 year?

IWEA supports this proposal where no significant investment is required.

III. Do respondents believe that longer term Reliability Options should only be available to new-build plant, or should also be available to existing plant where significant investment is being made to enhance or maintain its capability to provide capacity?

IWEA believes that where significant investment is being made longer contracts should be available. There would need to be prescriptive methods of determining what costs are included, e.g. long run costs, to ensure that projects are being assessed on an equal basis. The length of contract available should be commensurate with the level of investment required.

B) Classification of plant as new, upgrade or existing

I. Do respondents have a view on which approach should be used to classify capacity providers as “new”, “upgrade” or “existing”?

IWEA supports the cost threshold approach as this is the most transparent of the options presented. The “expert judgement” approach appears to be subjective and may also have unnecessary costs associated with it.

II. Do respondents prefer the approach of classifying providers as “new”, “upgrade” or “existing”, please indicate your view of the criteria, evidence and thresholds that should be used to inform this classification.

As above.

C) Maximum available Reliability Option lengths

I. Do respondents have a view on the appropriate maximum Reliability Option lengths that should be available to new-build and upgraded plant?

The contract timelines should be aligned with the DS3 contract timelines for technologies that are capable of providing DS3 services and supporting the transition to a low carbon energy system. As outlined above the length of contract available should be commensurate with the level of investment required.

II. How do respondents view the Reliability Option lengths in relation to the five generic frameworks set out in this section.

As outlined above the length of contract available should be commensurate with the level of investment required.

Stop-loss limits questions

D) Do respondents favour the I-SEM Capacity Year running from October to September, with annual stop loss limits applying over that I-SEM Capacity Year?

IWEA supports this proposal to use the I-SEM Capacity Year running from October to September for annual stop loss limits.

E) Do respondents believe that “per event/day” and “per month” limits are required in addition to the annual stop loss limit?

IWEA supports increased granularity for the stop loss limit in addition to the annual stop loss limit, propose that the “per event/day” limit is most appropriate.

F) Which approach do respondents favour for the definition of the Per Day/event limit?

G) Please provide views on the appropriate levels for the each of the proposed stop loss limits.

IWEA proposes a stop loss limit of 1 for wind generation based on the following principles:

- The intention of the difference payment is to incentivise participants to be available at times of system scarcity. Wind generators are not able to act on this incentive due to the nature of the resource.
- A stop loss limit of 1 would enable wind generators to participate in the Reliability Auction and for the capacity credit of wind generation to be taken into account, without wind generation being exposed to the significant risk of difference payments, which they are not well placed to manage.
- With the decision to remove compensation for curtailment, there is a risk that wind generation will not receive the energy payments in a scarcity event, and will therefore not have the ability to pay the difference payments. This is outside the control of the generator

and places additional unacceptable risk on wind generation which is not placed on other generators in the market.

IWEA proposes that, because of the different treatment of wind generation in the market in relation to curtailment, it is appropriate to have a different stop loss limit to other types of generation to manage the additional risks which are specific to wind generation.

Commissioning Window and Implementation Agreements

Rather than answering the specific questions within this section IWEA would like to highlight the following general principles:

- IWEA believes that the timelines for the CRM and the DS3 contracts and commissioning windows should be aligned, where a project has qualified for both and can support the transition to a low carbon energy system.
- The commissioning window needs to be of an appropriate length to ensure delivery of the projects and minimise risk. The required commissioning window may vary depending on the technology type.
- It is appropriate that there are incentives to ensure delivery of contracted projects, however IWEA has no strong view on what the level of incentivisation should be.
- Ongoing monitoring of progress is important to ensure that projects are on track. Care should be taken that these requirements are not too onerous.
- Consideration also needs to be given to delays which are beyond the control of the developer, e.g. delays to grid connection, and how this would be treated in the Implementation Agreements.

H) Is a period of four years from the Auction Date to the start of the first Delivery Year appropriate?

I) Does setting the Long Stop Date at 18 months after the start of the first Delivery Year strike the correct balance between the costs incurred by the market and the ability for delayed or longer-running capacity projects to be completed?

J) Are the proposed milestones reasonable?

K) Are there any other milestones, especially prior to Substantial Financial Commitment, which could be used to add security to the delivery of new capacity?

L) What proportion of the contracted capacity is appropriate to use to identify Substantial Completion?

M) Is six-monthly reporting appropriate?

N) Do any (or all) of the reports need to be independently verified?

O) Does 18 months provide sufficient time after the Auction Date to achieve Substantial Financial Commitment?

P) Is it appropriate to terminate a Reliability Option for failure to achieve Substantial Financial Commitment?

Q) Should failure to achieve any other milestones (within a suitable window) trigger termination of the Reliability Option?

R) Is it appropriate to partially terminate a Reliability Option if it can achieve 'Minimum Completion'? What level should be set for Minimum Completion?

S) If a Reliability Option is terminated under the terms of the Implementation Agreement, should this project be 'sterilised' for a period of time following the termination and be unable to participate in capacity auctions?

T) Should the I-SEM consider terminating Reliability Options if the information submitted as part of the qualification process is discovered to be false or misleading?

U) Do respondents agree that the level of the performance bond should be based on a pre-estimate of the cost to the market of non-delivery of contracted capacity?

V) Do respondents agree with the principle that the level of performance bond should rise over time, reflecting increased costs to the market? If not, what alternative principle should be used and why?

W) At what level in €/MW does the performance bond create a serious barrier to entry? Does this differ for small vs large plant or for different technologies?

X) Do respondents agree with the principle that use of a fixed €/MW level for all participants, regardless of size, to set the size of the performance bond does not fully capture the costs and risks to the I-SEM and that a more complex approach is needed? Do participants have an alternative preferred method for handling the greater risks to the I-SEM created by larger new capacity projects?

Y) How should the level of the performance bond change over time? Should this have any link to the milestones?

Z) Do you consider that the Time To First Delivery (/Time to LSD) proposed here for the CRM should also apply equally to the delivery of System Services under the DS3 arrangements? If you consider that the time (s) should be different, on what basis / what rationale should they differ?

Level of Administered Scarcity Price

A) Which of the options do respondents prefer (and why) for the enduring level of the Full Administered Scarcity Price (FASP)?

I. VoLL;

II. EU Consistent (e.g. with GB);

III. Euphemia Cap; or

IV. Existing SEM PCAP

IWEA has significant concerns in relation to the Administered Scarcity Price as we consider that wind generation may be overly exposed to prices in the balancing market arising from forecast error.

While the Reliability Option provides a hedge against the ASP for conventional generators, wind generation will not be able to hedge to the same extent, either through not being able to participate in the RO or through the derating which would be applied. It is essential that exposure to ASP is minimised until the tools are in place to manage this exposure, such as a liquid intra-day market, shorter gate closures and access to forecast information.

IWEA also has concerns that the introduction of a penal ASP will dis-incentivise participants from trading in the ex-ante timeframes. If there is an expectation of ASP, this will drive participants into the Balancing Market, which could further exacerbate the problem.

Further clarity is required on the interaction between the ASP and the TSO dispatch decisions as the ASP is triggered by a reduction in reserve. This is not driven by the market itself, but rather by TSO dispatch, therefore further clarity is required on this.

It should also be noted that, due to the nature of our system, the island of Ireland is more likely to be exposed to frequency events, and care needs to be taken to ensure that the correct parameters are used to ensure that ASP isn't applied more frequently than required.

A static approach would be preferable to a dynamic approach as this provides more certainty to participants.

Following on from the points outlined above, IWEA proposes that the ASP should be minimised. This is particularly important until there is more certainty in relation to the operation of the Intra-Day Market and the level of liquidity therein. The State Aid Guidelines outline that intermittent generation should be balance responsible only when the tools are there to manage the risks, including a liquid Intra-Day Market.

B) Do respondents agree with the definition of full load shedding (when Full ASP applies) as set out. If not please explain why, and your proposed alternative definition.

C) Do respondents agree that virtual bidding removes any incentives on capacity providers to withhold power from the DAM or the IDM to sell in the BM? Do you agree that this applies regardless of what market power controls are placed on DAM, IDM and BM bids? Do you agree that this applies regardless of the level of the Full ASP? If you do not agree, please explain why.

D) If stakeholders consider that it is appropriate to set the Full ASP at a lower level for an introductory period they should also set out, how long that introductory period should be and why, or alternatively the principles that the SEM Committee should employ in deciding when to move from the introductory full ASP to the higher rate full ASP.

E) If you favour a different level of Full ASP, either for an introductory period, or after any introductory period, please indicate the level and justify your response.

F) Do respondents agree with the proposed approach of using a static approach to setting the piece-wise linear ASP function at the inception of the I-SEM, and if not why not? If yes, do you agree with the proposed approach of setting the piece wise linear equation as a function of the remaining MW of available operating reserve?

G) What should the value of X in Figure 12 be?

H) How far in advance of the start of the Capacity Delivery Year should the piece-wise linear function be set. Does this need to be before the T-1 auctions?

I) Do respondents think that any changes need to be made to the governance of the target operating reserve policy. If yes, what are these changes?

Transitional Issues

IWEA notes that the proposal to have a glide path to the new CRM has been removed. IWEA would call on the SEM Committee to reconsider the Glide Path option as this provides a degree of certainty to projects under the current CRM. One of the obligations of the SEM Committee is to ensure revenue adequacy for licenced generators, and the glide path option would appear to be the most compatible with this objective. This provides certainty to generators for the market transition.

A) Which of the suggested options (annual auction, block auction, do nothing) do you prefer?

In the absence of glide path, annual auctions are the preferred option.

B) If you prefer the do-nothing auction, do you believe this should be accompanied by relatively low levels of Administered Scarcity Price?

IWEA does not support the “do nothing” option.

C) Are there any other transitional issues respondents feel that we should take account of when implementing the CRM?

IWEA urges the SEM Committee to reconsider the Glide Path option which was discussed previously.

Conclusion

In conclusion, IWEA welcomes the opportunity to respond to this consultation on capacity remuneration mechanism for I-SEM. In our response we have outlined a number of concerns in relation to the Reliability Option for wind, and some areas that we believe can be useful. In particular we would like to highlight the following:

- IWEA supports the proposals for secondary trading of reliability options and this should be a centralised market.
- A stop loss limit of 1 should be used for wind generation to cover the additional risk exposure associated with the removal of compensation for curtailment.
- The Implementation Agreements need to ensure there is sufficient incentive for projects to deliver, but also be realistic.
- IWEA is concerned in relation to the introduction of Administered Scarcity Pricing, the level at which this will be set and the exposure of wind generators to the ASP.
- IWEA calls on the SEM Committee to reconsider the glide path option outlined previously as a transitional measure.