

**IWEA Response to
SEM-14-045**

**Integrated Single Electricity Market
(I-SEM)**

**High Level Design for Ireland and Northern Ireland from 2016
Draft Decision Paper**

25th July 2014

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1. Executive Summary

IWEA welcomes the publication of the draft decision on the Integrated Single Electricity Market (I-SEM) High Level Design for Ireland and Northern Ireland from 2016. We believe that this is the most important consultation for the industry in recent times and will have a significant impact on the future of the electricity system in Ireland. As an industry we are in the process of an energy transition, which is set to continue into the future, to an energy system with increased levels of renewable generation. **It is essential that the market design is fit for purpose for a market which will have 40% of electricity produced from renewables (primarily wind) in 2020, and that the suitability of the market for the trading of electricity from wind energy is given appropriate consideration from day one.** A long-term stable market which encourages investment and appropriately reflects costs is needed.

In our response to this proposed decision IWEA highlights the areas of the proposed decision of which we are supportive as well as highlighting where changes are required to ensure an appropriate market framework for wind energy into the future.

We have also restated our preference for a long term price based capacity remuneration mechanism, and our concerns around the proposed reliability options, noting that any design principle of a CRM needs to ensure that wind generation receives fair payment for its capacity credit contribution to system security.

On the basis of legal advice, IWEA is of the view that if the Proposed CRM were to be adopted, there is a potential for it be challenged legally on grounds that participants in the wind sector have a legitimate expectation of receiving remuneration payments under the Current CRM. We would further argue that the Proposed CRM discriminates against participants in the wind sector in contravention of overarching European policy aims of preventing discrimination against renewables in the I-SEM, on the basis of a lack of cost-reflectiveness and that there could also be disproportionate interference with property rights contrary to Article 1.

IWEA has also presented a number of further considerations for the SEM Committee with reference to the renewable energy targets, the requirements under the RES Directive, and the need for a market that is accessible, transparent and fair for all generators.

IWEA believes it is essential that a detailed project plan is provided which gives information in relation to the different workstreams which need to be brought forward and the timeframes associated with them. This should be published without delay.

2. Introduction

The Irish Wind Energy Association (“IWEA”) is Ireland’s leading renewable energy representative body representing more than 200 members involved in wind energy development in Ireland and also in Northern Ireland, through NIRIG (Northern Ireland Renewables Industry Group), set up in collaboration with RenewableUK.

IWEA represents members across the island with projects across the spectrum, in operation, under construction and awaiting connection. In Ireland IWEA members are involved in the majority of pre Gate 3 connected projects but also involved in more than 85% of the MW of contracted projects in Gate 1, 2 and Gate 3.

Through NIRIG we represent more than 25 company members that have developed over 85% of renewable generation operational in Northern Ireland today and who will contribute a significant majority of renewable energy required to deliver the 2020 targets.

The IWEA membership base includes all large, medium and many small developers as well as financial, legal advisory, consultancy, contractors and other service providers involved in the renewables sector in Ireland and Northern Ireland.

Our membership covers the full range of wind energy projects which all need to be considered in the new market design, including:

- >10MW wind farms in the market & under ROC support
- >10MW wind farms in the market & under REFIT support
- >10MW wind farms in the market & out of support
- Out of market wind farms & under ROC support (optional <10MW)
- Out of market wind farms & under REFIT support (optional <10MW)
- Out of market wind farms & out of support (optional <10MW)
- Uncontrollable wind farms & under ROC support (either <5MW or with derogations)
- Uncontrollable wind farms & under REFIT support (either <5MW or with derogations)
- Uncontrollable wind farms & out of support (either <5MW or with derogations)
- Future connections under new CfD support in NI
- Future connections under new yet to be defined subsidy scheme in ROI

These energy projects are owned and operated by a range of parties from small independent generators, medium and large developers, independent portfolio players and utilities. The resources and capabilities of these parties vary significantly and this needs to be taken into consideration in the market design. **The current SEM allows for this range of capability and company resource, and this is a feature that needs to be maintained in order to promote equity and fairness in the transition to a new market.**

3. Comments on the Draft Decision Paper – Energy Trading Arrangements

3.1 Forward Market

Proposal: The I-SEM will have only financial trading instruments for within zone trading.

IWEA welcomes this proposal as it prevents generation and demand “disappearing” from price formation in the market by notifying physical positions to the TSO in advance of the day-ahead market. For the avoidance of doubt, the right to physically contract a generator to a supplier (or other counterparty) should not be prohibited; the supplier (Intermediary in the current design terminology) would then have to participate with the generator in the market arrangements to follow under the same obligations as non-contracted generation. This is the basis for the REFIT PPAs which are currently in place where wind generators are contracted to suppliers. The retention of Intermediaries is something that needs to be clarified in the decision paper as it could have a significant impact on REFIT PPAs.

- It is essential that the concept of Intermediaries remains in the new market design.
- It should still be possible under the new market design for a party to act on behalf of and fully represent all legal, financial, and operational obligations of a generator in the market. This is important for smaller generators who do not have the resources to actively trade in the market themselves.
- There should be transparency in relation to the revenues earned by the intermediary on behalf of the generator so that the generator can ensure they are getting a fair price for their generation and are being treated similarly to other generators being represented by the intermediary. We believe this is facilitated by the gross generation trading in all timeframes, with each wind generator or a user-defined portfolio of generators attributed to a single trading unit.
- IWEA urges that the island of Ireland should be treated as a single zone, and that additional complexity of a two zone solution should be avoided. If the SEM were split into two zones it would have implications for Intermediaries and existing PPAs.

Proposal: Subject to further discussions and agreement with other neighbouring markets, Cross-Zonal trading will be supported only by Financial Transmission Rights (FTRs).

IWEA welcomes cross-zonal financial transmission rights in the forward timeframe as this leaves Interconnectors free for physical export as required. It also promotes liquidity of physically traded power in other market timeframes. This also prevents market power on interconnectors with participants holding capacity.

3.2 Day-Ahead Market

Proposal: The European Day Ahead Market will be the 'exclusive' route to a physical contract nomination.

We support the proposal that the Day Ahead market will be the 'exclusive' route to a physical contract nomination. This design feature ensures a prohibition of trading physical power in the day-ahead timeframe except within the interconnector coupled European PCR market via the Euphemia algorithm. This promotes liquidity and price formation in a public market and ensures market transparency. Along with the decision that the Intraday Market is exclusive, this also ensures that wind-dominated trading periods access export on Interconnectors to stabilise market prices and reduce potential curtailment.

IWEA welcomes the proposal to relax the mandatory requirement to participate in the Day-Ahead Market. Mandatory participation in the Day Ahead Market is particularly unsuited to a market with large amounts of renewable generation. This would force wind generation to take its position earlier than might be accurate and therefore setting interconnector flows and the starting dispatch position of marginal conventional generation on that basis. At a European-level, the wind industry has lobbied for the importance of shorter gate closure to allow more trading up to 1-hour out as better wind forecast become available. It seems counterintuitive that in a market with planned 40% renewables, much of it wind, to require participation in a timeframe 12-36 hours out. The market framework must have flexibility to enable wind generators to react to price signals for the maximum benefit of wind generation to be obtained for all stakeholders.

As outlined in our previous submission to the original consultation there are a number of effects that mandatory day ahead participation are likely to have on the market which call into question any of the benefits which may arise. These include:

- Forecast/imbalance risk
- The risk to the merit order position of generation close to the margin
- The possibility of gaming prices in the DAM in the absence of price regulation
- Potential reduction of liquidity in the IDM (where a lack of liquidity has been identified in other European markets)
- It provides the opportunity of neighbouring European Market traders to potentially exercise market power intraday.

We also strongly urge the SEM Committee to recognise the benefits that IWEA sees in wind trading in the Day-Ahead Market to the extent that it is reasonable to do so based on forecast accuracy and capability.

- Prices received are likely to be slightly better.
- Revenues will be higher for ROC and new renewable CfD supported generation.
- The potential for market upside and reduction of R-Factor reconciliation cash-flow will be better for REFIT-supported generation.

In summary, we support the relaxation of the mandatory Day-Ahead Market, and urge the SEM Committee to realise that market incentives will be there for wind generation to trade insofar as it is sensible in that market. We warn against the temptation that may exist for the SEM Committee to influence the design of jurisdictional support schemes (such as a change in REFIT or the future renewable CfDs). As outlined later in the response there is a need for further discussion and consultation on the interaction of support schemes with the new market arrangements, with the participation of government departments. We believe that there should be liquidity in the Day Ahead Market and there should be no barriers for participants to trade.

IWEA supports the proposed decision that the European Day Ahead Market will be the ‘exclusive’ route to a physical contract nomination and the proposed relaxation of the requirement for mandatory participation in the Day Ahead Market. We stress that relaxation of the mandatory day-ahead nature should not be accompanied by further influence on non-market arrangements that result in an effective requirement for day-ahead participation within this consultation.

Proposal: Unit-based participation for generation in general, with (gross portfolio) aggregation arrangements for DSU, demand and (some) variable renewable generation.

IWEA welcomes the proposed decision to allow aggregation for variable renewable generation. The paper refers to “(some)” variable renewable generation. Clarification is required as to what it meant by this. IWEA believes that aggregation should be available to all variable renewable generation that have highly correlated output, should they choose to use it.

Aggregation of wind generation allows the required flexibility (for reporting purposes under subsidy) for different classes of windfarm, e.g. REFIT, RO’s, CfD, while at the same time ensuring unnecessary forecasting overhead is not imposed in the balancing market for managers of larger portfolios of owned and contracted wind-farms. We believe this flexibility should be restricted to wind generation (in contrast to conventional generation which should remain traded on a unit level), given its highly correlated nature, its shared control signals from the TSO, and that wind’s impact to the overall system is best captured at a macro-level, rather than on an individual level. IWEA believes that transparency will be required where portfolio bidding is in place to ensure that generators within the portfolio have sight of the overall performance of that portfolio, and hence the value of their own generation.

3.3 Intraday Market

Proposal: Continuous intraday trading will be the exclusive route to Intraday physical contract nominations (with scope to introduce periodic implicit auctions as/if these develop at the European level)

Similarly to the day-ahead market, IWEA welcomes that physical power must be traded within the interconnector-coupled Shared Order Book Function (SOBF) intraday market, for the same reasons as given above. IWEA would note however that the timeframe for implementation of the harmonised European intraday trading platform is unclear, and it is almost certainly the case that it will not be in place for very long before the introduction of I-SEM, if at all in advance of 2017. Given this, IWEA encourages the SEM Committee to begin considering how the I-SEM Intra-Day Market would function in the interim.

Proposal: Unit-based participation for generation in general, with (gross portfolio) aggregation arrangements for DSU, demand and (some) variable renewable generation.

IWEA welcomes the proposed decision to allow aggregation for variable renewable generation. Again, clarification is required as to what is meant by “(some) variable renewable generation”. We would ask that this be defined as all renewable generation that has highly correlated output, should they choose to use it.

3.4 Balancing (or process for reaching feasible dispatch)

Proposal: Starting point for dispatch is detailed and feasible production plans required for all market participants following DAM.

IWEA supports the proposal that the starting point for dispatch is based on the DAM, however it is essential Priority Dispatch is also taken into consideration in the dispatch schedule. Irrespective of the market incentives placed on individual generators to forecast generation and trade appropriately, by definition TSO forecasts of an entire industry wind portfolio will have lower percentage error than the sum of the errors of individual windfarms and portfolios. It is important that neither Priority Dispatch generators nor marginal conventional generators see unnecessary physical running uncertainty within the all-island jurisdiction that may arise from ignoring the most accurate Priority Dispatch forecasts available. Further consideration needs to be given to this, in particular the implementation of Priority Dispatch, in the detailed design phase. Consideration should also be given as to how Variable Price Taker status will be maintained for windfarms, which is presently necessary for intermediaries and for tie-break rules, and what implications this has for efficient market dispatch.

There may be a requirement to review the definition of intermediaries. This was originally set up as representing wind generation on a price taking basis. In a market where the intention is to promote trade in different timeframes this may need to be reviewed and importantly consulted on.

IWEA would also like to reiterate that TSO wind generation forecasts should be published for all market participants. These forecasts should also be updated within day. This would enable participants to trade based on these forecasts.

Proposal: Mandatory participation in Balancing Mechanism (BM) after DA stage

The SEM is likely to continue to have a high reserve requirement relative to other markets and more flexible generation will be needed. Constraint dispatch and scheduling is likely before IDM gate closure. To that end, the TSO should have access to appropriate prices for early balancing actions, necessary for defining a dispatch schedule informed by both the day-ahead market trades and their own wind forecasts. **All generators (and not just those who are technically capable to deliver INC/DECs to the balancing market over the timeframe where they may be called by the TSO) should be required to submit INCs/DECs and the balancing market should be priced accordingly.** This will increase liquidity in the offered services, which is important for a highly constrained system such as the all-island market. IWEA believes there would be one INC/DEC provided for each portfolio of wind traded in the market. It is essential that Priority Dispatch is maintained in the new market arrangements, and detailed consideration will need to be given to the mechanics of this in the detailed design phase.

Proposal: Unit-based participation in BM for generation in general

As outlined above, IWEA proposes that for each portfolio of aggregated wind, there would be one INC/DEC provided. As noted above, further clarity will be required as to how Priority Dispatch will be implemented.

Proposal: Marginal pricing for unconstrained energy balancing actions

IWEA believes that further consideration should be given to imbalance pricing and settlement than that reflected in the draft decision paper.

The choice of setting imbalance pricing on the marginal MW of energy balancing actions appears to be a hasty decision made with no rationale as to its choosing, or impact assessment of the consequences. The SEM is a small market with high levels of constraint, large reserve requirements as a proportion of needed demand, and demanding scheduling requirements to manage the daily load variations. As wind investment continues, new services are envisaged under DS3 to further constrain generator's physical operation. In that context, on the assumption that the DAM is functioning correctly serving the right level of energy, there may be an order of magnitude greater non-energy balancing actions (like constraints today) relative to the energy balancing actions that will set the imbalance price. If the last MW of energy balancing action sets the imbalance price, this means:

- There is a lot of stress placed on the “flagging and tagging” process in the National Control Centre, which may rely on human judgment depending on its implementation
- The level of non-energy balancing actions relative to the energy balancing actions may make the correct identification of energy balancing actions (and indeed the very last MW of same) difficult
- For these reasons (human operation of a difficult job on the constrained Irish system) it may result that imbalance prices calculated on the margin may have more to do with individual operator actions of flagging and tagging than actual production costs.

IWEA believes that the flexibility in the Balancing Network Code should be used to ensure that balancing prices are not overly penal and/or unpredictable – particularly for smaller players – adding significantly to the risk of trading wind in the market and allowing parties to exercise market power. Balancing actors should be paid as bid, but balancing causers need volatility to be reduced.

Consideration could be given to imbalance pricing mechanisms which result in less volatile prices. **It is key that this is consulted on further in the next stage of the consultation.**

There are a number of ways the balancing prices could be softened in the new market design, some of which are outlined as follows:

- Average price over the last, e.g. 150MW of balancing actions. This would ensure that a price spike for the last MW of energy balancing required would not set the price for all imbalance.
- A balancing pool where the price is averaged over all participants out of balance.

- A different imbalance settlement regime for wind generation which allows for limits of wind forecasting capability. This could be similar to the system used in the market pre-SEM, where there was a 2 tier balancing mechanism. This involved one price for small imbalances with another larger price for larger deviations. Renewable generation imbalances were all priced at the first tier price.

This is by no means an exhaustive list of the options and is provided purely for illustrative purposes. We note that some of these options may be more feasible or appropriate than others however should illustrate that there is a **need for further consultation** on how the balancing mechanism should work and to ensure it is not penal to wind generators and unduly costly for consumers.

Of interest to note, are that the recitals to the Third Directive set out an overarching duty of non-discrimination and virtually every obligation under the Third Directive is subject to these principles.

Specifically in the context of security of supply, recital 35 of the Third Directive states:

*“In order to ensure effective market access for all market players, including new entrants, non-discriminatory and cost-reflective **balancing mechanisms** are necessary... national regulatory authorities should play an active role to ensure that **balancing tariffs are non-discriminatory and cost-reflective**. At the same time, appropriate incentives should be provided to balance the in-put and off-take of electricity and not to endanger the system. Transmission system operators should facilitate participation of final customers and final customers’ aggregators in reserve and balancing markets.”*

An imbalance price setting regime is required which is transparent, repeatable and not sensitive to human discretion in the choice of balancing plant (e.g. one operator taking a mid-merit start-up cost earlier in the day to avoid running a peaking unit for an hour, relative to another operator who foregoes the start-up cost and calls balancing actions from a peaking unit).

There is also a need to ensure that there are market wide market power mitigation measures in place to ensure that market power cannot be exercised in the balancing timeframe as well as all other market timeframes. This would be particularly emphasized by the marginal pricing mechanism which has been included in the draft decision.

For the reasons set out above, none of which appear to have been adequately considered or consulted on by the SEM Committee, further consideration of the imbalance mechanism, including consultation on the choice of number of marginal MW that set the imbalance price is necessary. We welcome the SEM Committee’s commitment to consult further on Imbalance Settlement, which we believe should include appropriate consideration of different technologies ability – with best efforts – to be balance responsible.

Proposal: Pay as Bid for non-energy actions (possibly combined with local market power mitigation measures)

IWEA welcomes this proposal and supports the need for local market power mitigation measures for non-energy balancing actions if required. As already stated we recognise the key role that the TSO will have in flagging and tagging balancing actions which will drive energy and non-energy balancing prices and believe that this process must be as transparent as possible. Consideration should be given to market wide bidding rules in the BM.

3.5 Imbalance

Proposal: Unit-based imbalance settlement

As outlined above, IWEA proposes that for each portfolio of aggregated wind, there would be one INC/DEC provided.

Proposal: To have a single imbalance price

IWEA strongly welcomes the proposal to have a single imbalance price as this most accurately reflects the actual cost to the system. IWEA does not support dual imbalance pricing that would introduce more penal imbalance costs for intermittent wind generation. The decision of a wind developer to trade two windfarms as part of a portfolio or as separate units has no bearing on out-turn physical system running costs. In a market with 40% renewable energy, it would be punitive and restrictive to put dual imbalance pricing in place. A penal imbalance price for wind negatively affects bankability and is contrary to policy objectives.

Proposal: Inclusion of an Aggregator to provide a route to market for small players

IWEA welcomes the inclusion of an aggregator of last resort to ensure a route to market for small players. However, IWEA is concerned that this arrangement is proposed as a transitional arrangement and not an enduring solution. This seems to place more emphasis on developing a market for market services companies rather reducing barriers to trade to the Day-Ahead Market to generation licence holders. It is essential that there is market certainty in relation to these arrangements. Without this certainty no bank will facilitate 15-year investment reliant on a “transitional” structure, and the transitional nature undermines its very purpose: reducing barriers to entry . It should be noted that some generators will also have finance arrangements beyond the 15 years of support and certainty is also required that there will be a path to market for these. Aggregator of Last Resort terms should leave room for efficient market services to develop.

The SEM Committee have a responsibility towards licensed entities first and foremost, including recognition that there should be an efficiently functioning market. Placing emphasis on developing secondary markets of “market interface services/aggregation” while placing barriers to participation for smaller generators by placing risk around an enduring trading arrangement is an inappropriate emphasis of the SEM Committee’s statutory functions.

IWEA has supported the variation in Option 3 as we believe, among other things, it represents the best opportunity for more effective operation of Interconnection and therefore reduction of curtailment. A trade-off in the selection of Option 3 has been increased complexity of trading relative to the Single Electricity Market. This increased complexity represents a de facto higher barrier to entry for the small generator developer. Barriers to entry create needless inefficiencies and unnecessary rent allocation between market participants. For example, if a small developer has a fixed cost of self-market

participation, that cost will be reflected in any Power Purchase Agreement that can be struck with a third party utility. That same utility may have negligible marginal incremental operational cost in trading that generator.

If the regulatory rules around supporting market participation for small players have any uncertainty that they will not carry for the duration of the investment, projects will be unable to secure finance on that basis. The generator will also have no competitive tension in negotiating a Power Purchase Agreement. The fixed costs of market participation for each individual generator will then be reflected in every Power Purchase Agreement offered by a utility, when the utility itself bears negligible marginal cost. In this way barriers to entry turn into profit for larger players.

It is agreed that the enduring solution should not hinder the emergence of market aggregators, however it should also represent a realistic and viable option for generators to participate and should not be priced to act as a disincentive to use from the outset.

Therefore IWEA proposes that the aggregator of last resort should be an enduring feature of the market. Its success should not be defined by the number of participating generators in the scheme, but rather as a regulatory tool to reduce barriers to participation in the market.

3.6 Other complementary actions to support I-SEM efficiency:

Proposal: xv. Encouragement of forward financial market liquidity

IWEA supports this principle in general. This, along with an appropriately designed CRM, will be the main mechanisms under which wind generation will ultimately invest without the need for subsidy. We have a concern that the interaction of the Reliability Options and Forwards Trading may create unnecessary complexity. This complexity arises from the potential drafting of the CfD instruments themselves (particularly if the Reliability Option single strike price were to evolve in the future into a “curve”, as seen in the New England market). Complexity reduces liquidity; IWEA does not support unnecessary complication of the forwards market, either in general for the benefit of the all-island consumer or strategically for the future development of non-subsidised investment in wind generation.

Summary of IWEA's response to the Proposed Energy Trading Arrangements

- IWEA welcomes the proposal that the I-SEM will have only financial trading instruments for within zone trading. This should not undermine the existing PPAs for renewable generation in the market and the concept of intermediaries should remain. The island of Ireland should be a single zone.
- IWEA welcomes cross-zonal financial transmission rights in the forward timeframe.
- We support the proposal that the Day Ahead market and Continuous Intraday trading will be the 'exclusive' routes to a physical contract nomination (with scope to extend to Intraday Auctions).
- IWEA welcomes the proposal to relax the mandatory requirement to participate in the Day-Ahead Market. This is an essential element of the market design for a market with increasing levels of renewable generation, in particular wind.
- IWEA welcomes the proposal to allow aggregation for variable renewable generation.
- IWEA welcomes that physical power must be traded within the interconnector-coupled Shared Order Book Function (SOBF) intraday market.
- All generators should be required to submit INCs/DECs in the balancing market.
- IWEA believes that further consideration should be given to imbalance pricing and settlement than that reflected in the draft decision paper given the context of the all-island system and the potential unnecessary costs faced by consumers and wind generators.
- IWEA welcomes the proposal for Pay as Bid for non-energy actions and supports the need for local market power mitigation measures for non-energy balancing actions.
- IWEA welcomes the proposal to have a single imbalance price.
- IWEA welcomes the inclusion of an aggregator of last resort to ensure a route to market for small players. However, IWEA believes that this should be an enduring solution rather than a transitional arrangement as proposed, but should leave room for market services to develop over time.

4. Comments on the Draft Decision Paper - Capacity Remuneration Mechanism

IWEA is firmly of the view that a CRM is required, and should be long-term price-based with wind generation earning its capacity credit at the market rate for reasons of equitable treatment with other generation. The need for a long-term price-based mechanism is further underlined by the potential for highly volatile capacity prices in any auction based process, particularly given the small size of the all-island market.

In our previous submission IWEA put forward an initial preferred position:

- For a long-term price based mechanism.
- That wind generation should receive capacity payments for its capacity credit contribution to system security.
- The design of the CRM should be such that impacts on IC flows are minimised and imports on the IC are not rewarded at times of high wind, resulting in wind curtailment.

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.

IWEA also has concerns relating to the impact of the change in CRM on the PSO and CFD budgets in Ireland and Northern Ireland respectively. Any changes to the market revenues received by wind generators will have a follow impact on the REFIT calculations and hence the PSO.

4.1 Reliability Options

IWEA is strongly opposed to the proposal to have a capacity remuneration mechanism based on reliability options (RO). The reliability option creates 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, CfD penalties occur during periods of high demand AND low wind. Therefore, wind will be punished most severely out of any technology class by 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. Wind has an established capacity credit as outlined in the Generation Capacity Statement. **IWEA outlined in our previous consultation the need for a long-term price based mechanism. In our view the reliability option will be discriminatory unless such a capacity credit mechanism continues to work alongside the reliability option for wind generation.** The principle is as follows:

- System Operator determines the level of generation that will meet the LOLE standard
- Wind capacity credit is taken away from this volume, e.g. 1000MW of wind may have a capacity credit of 200MW.

- The reliability option auction is run for the adjusted target, and a CfD premium price clears.
- Wind, exempted from CfD requirements, perhaps except to the extent it is generating during high price events, receives the CfD premium price x its capacity credit.
 - “perhaps except to the extent it is generating during high price events” could be an agreement on the detailed design, that wind generation receiving the cleared CfD premium would not receive payment in excess of the CfD strike price
- Costs of the CfD premium are recovered from demand customers.
- Wind does not influence the price received, and therefore does not distort the appropriate pricing of “missing money”.

The SEMC should also give consideration as to what will happen to CfD premium pricing if wind deems it impossible, or is effectively excluded for any reason, to participate in these auctions. If the generation target is not adjusted for wind capacity credit, then more conventional generation than necessary will clear in the auction, **raising costs for consumers**. If the generation target is adjusted for wind capacity credit but wind is not paid as per the mechanism above, consumers will be getting available wind capacity credit for “free”, **an inappropriate allocation of value from wind generators to consumers**. If wind cannot in practice participate in the RO, then any theoretical contribution of wind should be excluded from that calculation. The SEMC should not attribute a theoretical allocation to wind if in practice it is unachievable. Such an approach would raise questions of discriminatory design of the RO mechanism.

We accept that participation in RO auctions is theoretically technology neutral as suggested by the SEM Committee, but we stress that the penalty structure is technology specific. If we look at wind that does attempt to participate in the reliability options as a fully obligated participant (in terms of CfD payments and explicit penalties) we see that wind will need to fund not only the cost of its capital but also will need to fund/insure against 100% of high price events under the CfD as a straight loss (as wind by definition is unlikely to be generating during those times) and explicit penalties. This will make wind appear much more expensive than its capital requirements; if a windfarm were to be successful the consumer would not be paying just “missing money”, but also unavoidable penalties. This would be wholly inappropriate. A CRM is designed to provide a balance of risks and incentives which incentivise the provision of capacity. The ability of generators to respond to those incentives varies, as does their ability to shoulder the risks of potential penalties. CRMs that remunerate intermittent generators, for example, must recognise the fact that their availability varies with time. Currently, intermittent generators in the SEM receive a capacity payment based on their production in a given period (since wind generators, for example, dispatch their entire available capacity). An alternative model, as used in the ISO New England capacity mechanism, is to make a payment to intermittent generators based on their de-rated capacity. For the purposes of the capacity market, intermittent capacity is de-rated to the median output level observed in the previous five years, during certain “reliability hours” in summer and winter. There is also no penalty in the New England CRM associated with intermittent generators failing to fulfil the obligation.

There is also concern that the CRM based on reliability options which is being proposed does not provide a good signal for demand side participation. This is also a concern as any new market design should facilitate a transition to a market with increased renewable generation and demand side participation.

We note that this mechanism involves not only being technically available, but also traded in the appropriate market against which the RO CfD is struck. Given the general emphasis on Day-Ahead Markets throughout the SEM Committee discussions, it is likely that the reference market will be the Day-Ahead Market. This market will reflect the financial outcomes of forecast market outcomes 12 to 36 hours out, with 40% of energy served from renewable, primarily variable sources. This definition of security of supply events will also completely miss the impact of tripping generation after the Day-Ahead Market closes on security of supply; the individual generator will be penalised for with imbalances, but the financial penalty of the CRM will have missed the physical security of supply event.

The SEM Committee may be of the view that an RO would have good theoretical appeal in an energy market. However, in a small “lumpy” system such as the all-island market, where single generator trips can lead to security of supply issues even with comfortable generation margins, where there are legally binding obligations that 40% of energy is served by price-suppressing highly-correlated variable generation with acknowledged issues with forecasting accurately 12 to 36 hours out, setting a day-ahead capacity signals on a market price seems ill-considered for the pragmatic context of the all-island system. This is the context in which the RO option would be viewed in any discriminatory design legal challenge.

Concerns have been raised in relation to the process by which the proposed decision was arrived at in relation to the CRM. There is concern that insufficient detail was provided and that a complete and robust appraisal of all the options was not carried out.

As a final but important point, IWEA has significant concerns that the CRM based on reliability options with the price determined by auction would result in highly volatile capacity prices, particularly given the small size of the all-island market. During periods of projected surplus capacity prices would tend to zero with correspondingly high capacity prices during periods of projected deficit. The ability and propensity to anticipate surpluses and shortages is much greater in a small system such as the I-SEM and may not be solvable by longer auction lead times. Regulatory intervention is therefore required to ensure that capacity prices determined by an auction based process are not highly volatile.

4.2 The legal context

IWEA have sought legal advice on the proposed CRM and the following points are noted.

4.2.1 Legitimate Expectation

IWEA contends that should the Proposed CRM were to be adopted, there is a potential for it be challenged on grounds that participants in the wind sector have a legitimate expectation of receiving remuneration payments under the Current CRM.

The argument being such that, when deciding to invest in Ireland, affected participants relied to a significant degree on the regulatory arrangements in place at the time, including the Current CRM as set out in the Code, and on the understanding that these regulations would continue into the future.

What is legitimate expectation?

In broad terms, the doctrine can be described as a means of “*safeguarding the citizen against haphazard and unfair changes in administrative policy and practice*”¹ by providing a mechanism to compel a public authority to “*follow certain procedural steps because it has indicated to a person that such a procedure would be followed in his case*”.²

Breach of legitimate expectation

IWEA contends that there is a breach of doctrine of legitimate expectation (particularly on the basis that the decision to establish the Current CRM was arguably not a statutory function in itself).

We believe the Proposed CRM goes beyond what might be considered a proportionate means of achieving the desired level of competition in the market.

IWEA believe the proposals would in fact have an anti-competitive effect on the market in general, as a result of reducing the ability of a large section of market participants i.e. wind generators, to competitively bid for ROs. It should be noted that purported anti-competitive effect on the market as a whole would be taken into consideration by any court should it be asked when balancing competing interests in order to ascertain the existence of a legitimate expectation, as was the case in *Nurendale Limited v Dublin City Council* [2009] IEHC 588.

4.2.2 Discrimination

The regulatory framework supporting the I-SEM taken together with overarching constitutional rights in this jurisdiction do afford participants in the I-SEM a certain level of protection from discriminatory policy making which we ask the SEM Committee to review.

EU Anti-Discrimination Rules

In the first instance, specific obligations of non-discrimination exist under the Third Directive under which, as discussed above, the Proposed CRM is being formulated. The recitals to the Third Directive set out an overarching duty of non-discrimination and virtually every obligation under the Third Directive is subject to these principles.

Specifically in the context of security of supply, recital 35 of the Third Directive states:

¹ Hogan, *Administrative Law in Ireland* (3rd edn, 1998)

² McDermott, *Contract Law* (3rd edn, 2006)

“In order to ensure effective market access for all market players, including new entrants, non-discriminatory and cost-reflective balancing mechanisms are necessary... national regulatory authorities should play an active role to ensure that balancing tariffs are non-discriminatory and cost-reflective. At the same time, appropriate incentives should be provided to balance the in-put and off-take of electricity and not to endanger the system. Transmission system operators should facilitate participation of final customers and final customers’ aggregators in reserve and balancing markets.”

Furthermore, Article 8 of the Third Directive provides that the Regulators must *“ensure the possibility, in the interests of security of supply, of providing for new capacity or energy efficiency/demand-side management measures through a tendering procedure or any procedure equivalent in terms of transparency and non-discrimination”*.

Protection against discrimination for participants in the renewables sector generally is further bolstered by Article 16(3) of Council Directive 2009/28/EC (the **“Renewable Energy Directive”**), which provides:

“Member States shall require transmission system operators and distribution system operators to set up and make public their standard rules relating to the bearing and sharing of costs of technical adaptations, such as grid connections and grid reinforcements, improved operation of the grid and rules on the non-discriminatory implementation of the grid codes, which are necessary in order to integrate new producers feeding electricity produced from renewable energy sources into the interconnected grid.

Those rules shall be based on objective, transparent and non-discriminatory criteria taking particular account of all the costs and benefits associated with the connection of those producers to the grid and of the particular circumstances of producers located in peripheral regions and in regions of low population density. Those rules may provide for different types of connection.”

It is widely accepted that member states must comply with the principles of equal treatment and non-discrimination set out in Article 20 and 21 of the European Charter of Fundamental Rights when implementing community legislation, as well as the principles of non-discrimination in the context of state aid as set out in Article 107 and 108 of the Treaty of the Functioning of the European Union.

Irish Constitutional Protection

I-SEM participants in Ireland may also be afforded constitutional protection against discrimination by virtue of Article 40.1 of the Constitution of Ireland, which provides that all citizens shall be held equal before the law. In an administrative law context, Article 40.1 has been relied on to establish the general principle that while public authority decisions may differentiate between persons on the basis of criteria set down by statute, the differentiation may not be arbitrary.³

Conclusion on the Application of Rules regarding Discrimination

³ *East Donegal Co-operative Livestock Mart Limited v Attorney General* [1970] IR 317

On the basis of IWEA's analysis, we would argue that the Proposed CRM discriminates against participants in the wind sector in contravention of overarching European policy aims of preventing discrimination against renewables in the I-SEM, on the basis of a lack of cost-reflectiveness.

4.2.3 Other Issues

- A. Another reference in this context is that of constitutional property rights. The recent UK decision in *Breyer Group Plc v Department of Energy and Climate Change* [2014] EWHC 2257, where contracts entered into between various solar energy generators on the basis of an anticipated entitlement of a specified feed in tariff rate were held to amount to property for the purposes of Article 1 of the First Protocol of the European Convention on Human Rights ("ECHR"). Consequently, when the UK regulator attempted to change the feed in tariff criteria, the court held that the solar generators were entitled to seek damages for a disproportionate interference with property rights contrary to Article 1.
- B. 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 not comply with the new Guidelines on State aid for environmental protection and energy 2014-2020 published by the European Commission⁴. State Aid support for capacity mechanisms should be:

(233) **The measure should:**

- (a) not reduce incentives to invest in interconnection capacity;
- (b) not undermine market coupling, including balancing markets;
- (c) not undermine investment decisions on generation which preceded the measure or decisions by operators regarding the balancing or ancillary services market;**
- (d) not unduly strengthen market dominance;
- (e) give preference to low-carbon generators in case of equivalent technical and economic parameters.**

4.3 Conclusion

In light of all the concerns around the proposed CRM, IWEA believes that further detailed consideration is required. We request that there is **further consultation on the CRM** and consideration should be given to the continuation of the existing capacity mechanism on a transitional basis until also the new energy trading arrangements have bedded in.

⁴ [http://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:52014XC0628\(01\)&from=EN](http://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:52014XC0628(01)&from=EN)

Summary of IWEA's response to the proposed CRM

- IWEA is firmly of the view that a CRM is required.
- The CRM should be long-term price-based.
- Wind generation **must receive capacity payments for its capacity credit contribution to system security.**
- The proposed Reliability Options appears discriminatory against wind generators, breaches legitimate expectations and has other issues such as being in breach of the new EU State Aids guidelines.
- In light of all the concerns around the proposed CRM, IWEA believes that further detailed consideration is required on the appropriate mechanism. We request that there is further consultation on the CRM and consideration should be given to the continuation of the existing capacity mechanism on a transitional basis until also the new energy trading arrangements have bedded in.

5. Further Considerations for the SEM Committee

Detailed Project Plan

IWEA is very concerned that the timelines for completion of the market design and the procurement, implementation and testing of systems will be very tight. It is expected that, in order to have the market implemented by December 2016, the market design will need to be decided by February 2015 so that the market systems can be procured. This compresses the window of time for the crucial detailed design phase of the project. **It is essential that a detailed project plan is provided which gives information in relation to the different workstreams which need to be brought forward and the timeframes associated with them and the process for consultation and industry engagement.** Given the timescales involved it is essential that this information is provided in the I-SEM high level design decision paper to ensure that the resources including industry are in place to participate in the detailed design phase as it is vital that meaningful stakeholder involvement is maintained through the next stages of this project.

Regulatory Impact Assessment

In our previous submission we had requested a robust regulatory assessment and cost benefit analysis of all the options be carried out. The Impact Assessment published along with the proposed decision provides a qualitative view of the preferred options for trading energy and capacity remuneration run under different scenarios. No impact assessment was carried out in relation to absolute priority dispatch. We also note that there was no examination from the perspective of different classes of participants of the different impacts arising from the design choices, in particular for Reliability Options. The impact assessment was purely at a market/consumer level, and for this and other reasons we believe the impact assessment to be incomplete. The impact on Variable Price Taker plant and key associated rules of intermediaries and tie-breaks needs to be assessed at this stage. All of this needs to be addressed in the final decision paper.

Legally Binding EU Renewable Targets

As outlined in our previous response, Ireland's need to support renewable energy stems from its EU commitments which establish a binding target of 20% of overall EU energy consumption coming from renewable sources by 2020 as well as a binding 10% minimum target for energy from renewable resources in the share of transportation fuels. Ireland's target under the Directive is for renewable resources to account for 16% of total energy consumption by 2020. Failure to meet these targets will result in significant EU sanctions. In line with these commitments, DCENR have put in place a target for electricity from renewable energy sources (RES-E) of 40% by 2020. The European Commission has also recently unveiled its proposal for a further renewable energy target to be binding towards 2030, and so the longer term perspective on the need for Irish renewable energy is now even clearer.

The new market design needs to ensure that the market design is suitable for increasing levels of renewable generation in line with government policy and the EU binding renewable targets and this needs to be evidenced in the final decision paper.

RES-E Directive obligations

The principles of priority dispatch and guaranteed transmission are set out in Directive 2009/28/EC of 23 April 2009 (the “Directive”, as transposed in Ireland by S.I. No. 147 of 2011). The RES-E Directive outlines also a number of obligations on the member state to enable the integration of renewable energy and to minimise curtailment. Article 16.2 states:

- a) *Member States shall ensure that transmission system operators and distribution system operators in their territory guarantee the transmission and distribution of electricity produced from renewable energy sources;*
- b) *Member States shall also provide for either priority access or guaranteed access to the grid-system of electricity produced from renewable energy sources;*
- c) *Member States shall ensure that when dispatching electricity generating installations, transmission system operators shall give priority to generating installations using renewable energy sources in so far as the secure operation of the national electricity system permits and based on transparent and non-discriminatory criteria. Member States shall ensure that appropriate grid and market-related operational measures are taken in order to minimise the curtailment of electricity produced from renewable energy sources. If significant measures are taken to curtail the renewable energy sources in order to guarantee the security of the national electricity system and security of energy supply, Member States shall ensure that the responsible system operators report to the competent regulatory authority on those measures and indicate which corrective measures they intend to take in order to prevent inappropriate curtailments.*

The new market design being developed needs to take these requirements of the RES-E Directive in its entirety into consideration and ensure that the market works in such a way that absolute priority dispatch is maintained as per the SEMC’s Next Steps decision paper and curtailment is minimised. The decisions in this consultation paper need to clearly show the evidence of adherence to the EU Renewables Directive (Directive 2009/28/EC of 23 April 2009).

IWEA notes that the draft decision paper states “*In approaching the Detailed Design Phase the SEM Committee considers that, where possible, the existing SEM Committee policy on specific matters such as losses, firm access, priority dispatch etc. will remain in place and would only be changed where material inconsistencies make it incompatible with the I-SEM design.*” It should be noted that **priority dispatch is a legal requirement under the RES Directive, and should not be treated in the same category as policy areas such as losses and firm access. This needs to be clearly noted and addressed in the decision paper for this consultation.**

Curtailment Mitigation

In the years up to 2020 there are a number of key initiatives that are all underway which are required and are expected to deliver significant results in curtailment mitigation. These initiatives include:

- Increasing the SNSP limit to 75%
- Decreasing levels of must-run generation
- Effective and efficient operation of interconnectors to ensure export at times of high wind
- Grid upgrades as required
- New System Services

Other key areas also which will also contribute positively to curtailment mitigation should be actively pursued by the TSOs and joint Regulatory Authorities. These include:

- Further interconnection
- Storage
- Demand side management including electric transport and heating enabled by smart metering

While some progress is being made with these initiatives, **it is essential that the new market design will support the requirements** listed above in relation to curtailment mitigation but also allow further development in these areas, in particular by ensuring that market mechanisms improve the efficiency of interconnectors, flexibility in demand participation (in particular closer to real time) and promoting flexible generation. **The market must reflect and reward participants who provide services to facilitate renewables in line with the responsibility as set out in the RES-E Directive.** IWEA welcomes the proposals for “Exclusive” trading in the European market platforms and financial trading in the Forwards timeframe as this should support more efficient interconnector flow. As noted above, the CRM based on reliability options which is being proposed is not compatible with renewable generation, does not provide a good signal for demand side participation, and absent appropriate regulatory measures is likely to result in highly volatile capacity prices. **This needs to be addressed in the decision paper for this consultation.**

Compensation for Curtailment

In our response to the SEM Committee Proposed Decision Paper on the Treatment of Curtailment in Tie-Break Situations (SEM-12-090) IWEA strongly opposed the proposal to reduce and remove the levels of compensation to wind generators for curtailment. We believe that the subsequent decision to remove compensation for curtailment is both retrospective and discriminatory. Compensating for curtailment provides an economic signal for the implementation of the mitigation measures required as per the RES-E Directive. If the cost of curtailment can be centrally collected the appropriate market products to incentivise the mitigation measures will be easier to implement. Removing this signal will remove the incentive for the RA’s in particular to address the wider issue of mitigation and the optimization of the investment in renewable generation.

The wind industry has been very supportive of the DS3 programme to date through representation on the Advisory Council and the Joint Grid Code Review Panel, attendance at public fora and regular meetings

with the system operators. IWEA has recognised the work being carried by EirGrid in this regard and is keen to see the programme progress. While we recognise that it is difficult to incentivise delivery of the DS3 programme, penalizing wind generation is not the solution. Consideration should be given to methods for incentivisation of the delivery of curtailment mitigation measures, including the DS3 programme. Innovative local solutions by participants should also be encouraged and facilitated.

The DS3 programme to increase the instantaneous SNSP limit from 50% to 75% has already been delayed. The risk to delay currently only rests with wind generators who are not in a position to manage the risks. Therefore IWEA is still of the view that **the removal of compensation for curtailment is not appropriate**.

In particular IWEA notes that this decision is premature in light of the market changes, and the removal of compensation for curtailment is unlikely to be compatible with the new market design proposed. Curtailment is a non-energy balancing action and so should be dealt with via the BM Inc/Dec bidding arrangements.

In the SEM Committee Decision on the Treatment of Curtailment in Tie-break situations (SEM-13-010) the SEM Committee outlines that generators would expect to see a significant reduction in curtailment levels resulting from substantial implementation of the DS3 programme:

*“The SEM Committee is of the view that based on the programme plans set out by the TSOs, **the DS3 programme will be substantially in place by 2018 which will ensure that levels of curtailment are lower than they might otherwise have been**. The SEM Committee will continue to over-see and support the work of the TSOs in this regard. The SEM Committee believes that **given these expected developments**, it is appropriate to signal now that the burden of compensation for curtailment will only be carried by consumers up to a defined point (2018 at the latest).”*

The delays which have occurred to date mean that these reductions in curtailment will not now occur in the expected timeframe. **In light of the above the decision to remove compensation for curtailment in Decision SEM-13-010 should now be withdrawn.**

REFIT and RO/CfD FiTs Timelines

IWEA would like to stress the **importance of the timelines for the market decision making and implementation**. Ireland has a mandatory target for 16% of our energy to come from renewables in 2020. As part of this target 40% of electricity generation is to come from renewables in 2020. Two of the main tools for implementing this policy are the REFIT support scheme in Ireland and the ROC scheme in Northern Ireland. The current REFIT support scheme closes in 2017, with generators required to be generating in this timeframe. In order to reach this timeframe projects will be seeking financial close in early 2016. The current Renewables Obligation support mechanism in Northern Ireland is also due to close in 2017 with the new support mechanism CfD FiTs due to be implemented during 2016. It is essential that there is certainty in relation to the market framework well in advance of these deadlines so that project promoters, investors and financial institutions can understand the market in which they will be participating. It is important to note also that all decisions in relation to the trading options of generators,

and their interaction with the REFIT and ROC schemes, need to be tied down in advance of these deadlines also, and interaction with government departments is required on these aspects. If there is uncertainty remaining beyond this point it will quickly begin to stifle investment and bring the development of the industry to a standstill. **It is essential that there is no market uncertainty in the lead up to 2016 as this will mean projects are unable to reach financial close ahead of the REFIT and RO deadlines, and the EU binding renewable energy targets will be missed.** This is likely to have severe repercussions for Ireland as a member state through increased costs to the consumer but also infringement proceedings.

Support Schemes

It is essential that the market design is compatible with support schemes, both existing and incoming. With the introduction of CfDs in Northern Ireland in 2016/17, it is essential that there is a reference price that these wind farms can easily achieve. An achievable reference price (as reflected potentially in actual revenue received) for all generation companies, or indeed multiple reference prices as currently with above and below de minimis generation, would also be highly desirable for the REFIT support scheme ex-ante calculation, to minimise impact on R-Factor reconciliations and overall impact on the PSO consumer.

Ideally these reference prices should be at a timeframe where there is suitable liquidity and the price can be easily achieved. A reference price should be stable and representative of a liquid and efficient market. Generators need to be able to have equitable access to the market to achieve the reference price. **In particular for the existing support schemes such as REFIT, the choice of reference price / calculation of revenue should not add any incremental risk to the Supplier that was not already envisaged in the design of the support scheme.**

In order to ensure that REFIT payments are appropriate there is a need for market transparency of revenues. Generators under the REFIT scheme need to be able to show their market revenues in a clear and transparent manner. One of the benefits of the existing SEM is the level of transparency. IWEA believes that in order to achieve this it would be necessary that all energy is traded through the market arrangements and not through bilateral trades outside the market or through net bidding. We welcome the draft decision to ensure all trades are exclusive to the European platforms as will enable greater market transparency.

It is essential that there is further consultation on the interaction of support schemes with the market design with DCENR, DETI and industry involvement. The new market design must allow existing support schemes to continue as they currently work. The new market must also enable efficient operation of future support schemes which will be introduced.

Given the direction of travel in Europe, the long term drive towards lower support for renewables and the expectation that at some stage in the future wind energy projects will be able to survive without support mechanisms, **it is essential to ensure that the market framework supports this**. The market design being introduced needs to ensure that projects no longer under support can achieve appropriate revenues to ensure continuation of these projects which are required to meet our renewable energy targets

Market Power Mitigation and Market Transparency

Market power mitigation measures in the current SEM such as the Bidding Code of Practice, Directed Contracts and the Market Monitoring Unit have been successful in delivering a fair and transparent market that has delivered substantial investment, not least in wind generation. The proposed ISEM introduces new challenges, particularly for wind generators with the prospect of balance responsibility. A robust market power mitigation strategy must be maintained, particularly in the intraday and balancing timeframes where market power considerations are heightened and risk exposures have increased from the current SEM.

Market transparency is an important consideration of market power mitigation. **It is imperative that there are mechanisms in place which provide for transparency of behaviour and outcomes in the market to ensure fairness for all market participants, particularly given the movement away from complex bid structures, BCoP and SRMC bidding rules to provide generators with the necessary discretion to manage their risks.** IWEA supports a series of carefully designed mitigation measures to manage all sources of market power within I-SEM (including through interconnector trades) on an ex ante and ex post basis.

There should be transparency in relation to the revenues earned by generators in the market. This is important to prevent market power being created in the Power Purchase Agreement space. Contracting generators can ensure they are getting a fair price for their generation and are being treated similarly to other generators contracted in the market.

Overall, the area of market power is a significant concern in the new market design due to the mix of market participants, from large utilities to small independent generators. **Any market design needs to take market power into consideration.**

Continuation of the Concept of Intermediary, and Intermediary of Last Resort

The option of an Intermediary acting on behalf of appropriate market participants should remain. This will ensure that existing relationships between industry parties can transition into the new market, with the Intermediary continuing to represent them in the market. Under the REFIT rules, all generators must have a bilateral contract (PPA) with a Licensed Supplier company, who then acts as its Intermediary in the market. Furthermore, new market participants need to be able to avail of this structure, as well as those no longer under support. For the avoidance of doubt, the obligation on the Intermediary to further trade power (as appropriate per the Option chosen by the SEM Committee) will remain in place. This ensures that smaller generators do not have to forecast and trade in the different market timeframes. No reference has been made to this in the draft decision paper **and IWEA requests that this be clarified in the final decision.** This will have a direct impact on existing PPAs and is of critical importance.

There may also be a requirement to review the definition of intermediaries. This was originally set up as representing wind generation on a price taking basis. In a market where the intention is to promote trade in different timeframes this may need to be reviewed and consulted on.

Participants operating under the Supplier Lite regime should be able to continue participating directly in the market, with no retrospective changes to their arrangements. The option of a supplier lite arrangement will also need to be an option under new market arrangements.

Currently in the SEM there is difficulty in obtaining PPAs for smaller projects (e.g. wind less than 1MW in size); the transition in I-SEM could result in this difficulty extended to even larger projects which currently have PPAs. Recent experience has shown that the uncertainty in relation to the changing market design is already leading to some wind farms not being able to get PPAs which extend beyond 2016. Certainty is required around the continuation of Intermediaries in the market as soon as possible. **It is therefore vital that a reasonably costed and supported centralised “PPA Provider of Last Resort” is made available as part of the market design.**

De-Minimis Generation

Some of IWEA members strongly believe that the De-Minimis level should be reviewed to ensure that smaller generators do not have to participate directly in the market and can form a PPA with a supplier such that their generation is netted off demand. This is also relevant for Supplier Lite participants. Given that IWEA represents a significant number of smaller members, who are impacted by the De-Minimis level, this issue is important to us.

The De Minimis level of 10MW should be retained at a minimum however in the context of the importance of this issue **IWEA again proposes that the RA’s consult on the raising of the current level of the De-Minimis in the context of the extent of changes proposed under I-SEM.**

Market Participation

The introduction of the new market design will bring a number of challenges including the potential implementation challenges for market participants and the ongoing costs of participation – market participant costs are unrealistically low in the initial impact assessment. It is essential that there is sufficient detail tied down ahead of time for trading systems to be developed, introduced, tested and trialled. **Market participants and service providers will need clarity around the requirements to be able to ensure the appropriate systems are introduced for interaction with the market.**

Furthermore, if through arbitrary market design choice there are costs, collateralisation, or procedures which introduce utility-level barriers to entry, e.g. if the correctly serious matter of market participation is considered synonymous with “expensive” and “difficult”, then these full costs will become reflected in Power Purchase Agreement pricing for all independent generators seeking to contract with a utility. **Such allocation of revenues would be inappropriate.**

Transition arrangements

There will always be some uncertainty with the introduction of new market designs with some initial issues likely to arise and possible unintended consequences. New dispatch methodologies and understanding pricing outcomes – particularly the imbalance price – are particularly relevant here.

Transition arrangements at the start of the market are entirely appropriate. While some consideration has been given to transition arrangements in the proposed decision, IWEA believes that an aggregator of last resort should be an enduring feature of the market and not a transitional arrangement. Consideration could be given to other **transitional measures including a softer break-in of imbalance pricing or settlement arrangements by greater averaging of energy balancing actions to determine imbalance prices** (notwithstanding the IWEA position outlined earlier in this response that further consultation is required on the balancing methodology to be used), **market maker obligations for all parties into particular markets, and continuation of the existing capacity mechanism until the new energy trading arrangements have bedded in (which would also facilitate necessary auction lead times).** Further consultation would be required on the transition arrangements. A “big bang” approach to market start, particularly off the back of such a short market trial, poses initial risks to all participants and customers which need to be addressed in the decision paper for this consultation.

Market Trialling

The timetable for the implementation of the new market only allows for 3 months market trial before market go-live. This timeline is very short especially considering the scale of the changes likely to be made to the market, coming to terms with the new commercial outcomes from trading, and the need for new trading systems and processes for participants. **There is a risk that if there are delays to the project timeline that the market testing period will suffer. Coordination with European participants during the market trial phase should also be considered. This needs to be addressed and outlined in detail in the decision paper to this consultation.**

Imbalance Pricing Mechanism

More consideration should be given to the imbalance pricing mechanism in the proposed market designs. With large amount of renewable generation in the market it is important that this is designed in such a way that suits the generation mix which is expected throughout the lifetime of the market. It is not appropriate that wind generation should be severely penalised for imbalance based on the nature of the resource when it is a policy objective to support the development of wind generation and it is expected to be the main single source of electricity generation in 2020. Therefore the balancing mechanism should take into account the variable nature of the wind resource and be designed in such a way as to ensure this price is as smooth as possible. In our comments on the Energy Trading Arrangements we have put forward some alternative suggestions as to how this could work.

IWEA believes that there should be further consultation on the imbalance pricing mechanism in the next stage of the consultation process to ensure that the mechanism is suitable for a market with high levels of renewable generation.

Impacts on PSO Levy

We note the large degree of wind generation which will remain under REFIT support in Ireland. Removal of capacity payments for wind, or unduly onerous imbalance costs placed on wind will mean a direct increase in the PSO Levy for Irish electricity consumers. **This would be inappropriate.**

Summary of Other Key Issues to be addressed in the Decision paper to this consultation

- It is essential that a detailed project plan is provided which gives information in relation to the different workstreams which need to be brought forward with the associated timeframes
- The new market design needs to ensure that the market design is suitable for increasing levels of renewable generation in line with government policy and EU binding renewable targets.
- The new market design being developed needs to take the requirements of priority dispatch and guaranteed transmission in the RES-E Directive in its entirety into consideration and ensure that the market works in such a way that absolute priority dispatch is maintained as per the SEMC's Next Steps decision paper and curtailment is minimised. The implications for Variable price taker plant need to be given further consideration.
- The new market design must support the requirements being put forward by the DS3 programme so that curtailment can be mitigated as much as possible as required but the RES-E Directive.
- The decision to remove compensation for curtailment is premature in light of the market changes, and the removal of compensation for curtailment is unlikely to be compatible with the new market design proposed.
- It is essential that there is no market uncertainty in 2016 as this will mean projects are unable to reach financial close ahead of the REFIT and RO deadlines, and the EU binding renewable energy targets will be missed.
- It is essential that the market design is compatible with support schemes, both existing and incoming. It is essential that there is further consultation on the interaction of support schemes with the market design with DCENR and industry involvement.
- The option of an Intermediary acting on behalf of appropriate market participants should remain. There was no reference to this in the draft decision paper, however it needs to be reference in the decision paper.
- Priority dispatch is a legal requirement under the RES Directive, and should not be treated in the same category as policy areas such as losses and firm access.
- It is imperative that there are mechanisms in place which provide for transparency of behaviour and outcomes in the market to ensure fairness for all market participants.
- The De-Minimis level of 10MW should be retained at a minimum however in the context of the importance of this issue IWEA proposes that the RA's consult on the raising of the current level of the De-Minimis in the context of the extent of changes proposed under I-SEM.
- Further market transition arrangements should be considered, particularly in light of the level of change required on participants and the limited duration of the market trial.
- IWEA believes that there should be further consultation on the imbalance pricing mechanism in the next stage of the consultation process to ensure that the mechanism is suitable for a market with high levels of renewable generation.

6. Next Steps

IWEA looks forward to the publication of the decision paper in September 2014 as this will provide clarity to the industry on the direction of the new market design. There remain a number of critical issues which need to be addressed in the decision paper as we have outlined in this submission.

In advance of the publication of the final decision paper there is also a requirement for a detailed project plan which identifies the workstreams and associated timelines for the detailed design phase. This will enable all stakeholders to ensure they have the appropriate resources in place to enable them to participate most effectively in the detailed design phase.

There are a number of areas which we have identified in this response which require further consultation, including the following:

- Energy Balancing Mechanism – we have identified concerns relating to the mechanism chosen and believe that further consultation is required in this area.
- Interaction with support mechanisms – IWEA believes that further consultation is required involving DCENR and DETI in relation to the interaction of both existing and future support mechanisms with the market design. The market design chosen should not interfere with existing support mechanisms.
- De Minimis generation levels – further consultation is required on the appropriate De Minimis levels for renewable generation.
- Aggregator of last resort – consultation with industry is required in relation to the design of an aggregator of last resort. This should be an enduring mechanism and should be appropriately priced to enable smaller participants to participate.
- Capacity Remuneration Mechanism – IWEA believes that further consultation is required on the capacity remuneration mechanism to ensure that the capacity credit for wind is appropriately reflected in the design.
- Market Power – consultation is required on market power mitigation measures (both domestically and from neighbouring markets) and measures to promote market liquidity.
- Consultation on market entry principles, covering such aspects as the participation fee, market interfaces and market collateralisation requirements, and centralised provision of forecast data and functionality to support smaller participants trade appropriately without undue overhead or cost.

Continued extensive industry involvement needs to be facilitated in the detailed design phase of the project and the timelines for this interaction should be identified in the decision paper to this consultation if not sooner. IWEA looks forward to continued engagement in this phase of the project.

7. Conclusions

IWEA welcomes the opportunity to comment on the draft decision on the I-SEM High Level Design for Ireland and Northern Ireland from 2016. In our response we have outlined in detail the aspects of the proposed decision which we support and those we believe require further work and/or change. In particular we would like to highlight the following:

Summary of IWEA's response to the Proposed Energy Trading Arrangements

- IWEA welcomes the proposal that the I-SEM will have only financial trading instruments for within zone trading. This should not undermine the existing PPAs for renewable generation in the market and the concept of intermediaries should remain. The island of Ireland should be a single zone.
- IWEA welcomes cross-zonal financial transmission rights in the forward timeframe.
- We support the proposal that the Day Ahead market and Continuous Intraday trading will be the 'exclusive' routes to a physical contract nomination (with scope to extend to Intraday Auctions).
- IWEA welcomes the proposal to relax the mandatory requirement to participate in the Day-Ahead Market. This is an essential element of the market design for a market with increasing levels of renewable generation, in particular wind.
- IWEA welcomes the proposal to allow aggregation for variable renewable generation.
- IWEA welcomes that physical power must be traded within the interconnector-coupled Shared Order Book Function (SOBF) intraday market.
- All generators should be required to submit INCs/DECs in the balancing market.
- IWEA believes that further consideration should be given to imbalance pricing and settlement than that reflected in the draft decision paper given the context of the all-island system and the potential unnecessary costs faced by consumers and wind generators.
- IWEA welcomes the proposal for Pay as Bid for non-energy actions and supports the need for local market power mitigation measures for non-energy balancing actions.
- IWEA welcomes the proposal to have a single imbalance price.
- IWEA welcomes the inclusion of an aggregator of last resort to ensure a route to market for small players. However, IWEA believes that this should be an enduring solution rather than a transitional arrangement as proposed, but should leave room for market services to develop over time.

Summary of IWEA's response to the proposed CRM

- IWEA is firmly of the view that a CRM is required.
- The CRM should be long-term price-based.
- Wind generation **must receive capacity payments for its capacity credit contribution to system security.**

- The proposed Reliability Options appears discriminatory against wind generators, breaches legitimate expectations and has other issues such as being in breach of the new EU State Aids guidelines.
- In light of all the concerns around the proposed CRM, IWEA believes that further detailed consideration is required on the appropriate mechanism. We request that there is further consultation on the CRM and consideration should be given to the continuation of the existing capacity mechanism on a transitional basis until also the new energy trading arrangements have bedded in.

Summary of Other Key Issues to be addressed in the Decision paper to this consultation

- It is essential that a detailed project plan is provided which gives information in relation to the different workstreams which need to be brought forward and the timeframes associated with them.
- The new market design needs to ensure that the market design is suitable for increasing levels of renewable generation in line with government policy and the EU binding renewable targets.
- The new market design being developed needs to take the requirements of priority dispatch and guaranteed transmission in the RES-E Directive in its entirety into consideration and ensure that the market works in such a way that absolute priority dispatch is maintained as per the SEMC's Next Steps decision paper and curtailment is minimised. The implications for Variable price taker plant need to be given further consideration.
- The new market design must support the requirements being put forward by the DS3 programme so that curtailment can be mitigated as much as possible as required but the RES-E Directive.
- The decision to remove compensation for curtailment is premature in light of the market changes, and the removal of compensation for curtailment is unlikely to be compatible with the new market design proposed.
- It is essential that there is no market uncertainty in 2016 as this will mean projects are unable to reach financial close ahead of the REFIT and RO deadlines, and the EU binding renewable energy targets will be missed.
- It is essential that the market design is compatible with support schemes, both existing and incoming. It is essential that there is further consultation on the interaction of support schemes with the market design with DCENR and industry involvement.
- The option of an Intermediary acting on behalf of appropriate market participants should remain. There was no reference to this in the draft decision paper, however it needs to be reference in the decision paper.
- Priority dispatch is a legal requirement under the RES Directive, and should not be treated in the same category as policy areas such as losses and firm access.

- It is imperative that there are mechanisms in place which provide for transparency of behaviour and outcomes in the market to ensure fairness for all market participants.
- The De-Minimis level of 10MW should be retained at a minimum however in the context of the importance of this issue IWEA proposes that the RA's consult on the raising of the current level of the De-Minimis in the context of the extent of changes proposed under I-SEM.
- Further market transition arrangements should be considered, particularly in light of the level of change required on participants and the limited duration of the market trial.
- IWEA believes that there should be further consultation on the imbalance pricing mechanism in the next stage of the consultation process to ensure that the mechanism is suitable for a market with high levels of renewable generation.

Given the significance of the issues raised IWEA would like to request a meeting with the SEM Committee in August to discuss.