

ESB WIND DEVELOPMENT RESPONSE TO SEM-09-107

1. Introduction

ESB WD (ESB Wind Development) welcomes the opportunity to comment on this consultation paper. However in general we feel that there is insufficient information within the consultation to accurately define the favoured option for both TLAFs and TUoS charges. In particular for the level of information presented, ESB WD cannot comprehensively assess the best option for TUoS charges looking into the future and would request that the TSO provide more detailed information, particularly in relation to the dynamic options.

ESB WD is a significant investor in the wind sector in the SEM both currently and into the future. As an investor, key decisions and assumptions have to be made at the time of committing to an investment decision. In this regard it is clearly preferable to have transparency and predictability insofar as is possible with regard to components that can impact on the original investment decision. Once the investment decision is taken, there is a limited capability of the generator to respond to subsequent changes in TLAFs and TUoS charges.

With regard to the consultation paper, we advocate establishing clearly stated principles and objectives for TLAF and TUoS regimes. Any proposed methodology to calculate TLAFs and TUoS charges can then be best assessed against these principles to evaluate the extent to which it conforms with the previously established principles.

While it is possible to comment on the proposals advanced in the consultation paper, it is also clear that further development work and information need to be available to comment in a more comprehensive way.

2. TRANSMISSION LOSS ADJUSTMENT FACTORS (TLAFs)

Short Term Compression Factor

ESB WD sees advantages towards introducing Compression Factors for the short to medium term as we believe that this step will reduce the volatility with regard to TLAFs to an extent and recommend that the compression ratio be adjusted to minimise the volatility further.

However we believe that this ‘quick fix’ does not improve the predictability and transparency associated with TLAFs. Predictability and transparency are two critical factors in relation to TLAFs and developers should be in a position to predict TLAFs into the future for their own wind farms as opposed to waiting for the TSO to produce a list of TLAFs each year for the following year. The danger with the developer not being in a position to predict TLAFs is that variable TLAFs may impact greatly on the economic viability of wind projects. This issue was raised at the workshop in Dundalk where developers spoke of TLAFs for their projects changing from positive to negative values over the course of a few years. Indeed, currently on the EirGrid website (<http://www.eirgrid.com/customers/transmissionlossadjustmentfactors/>), TLAFs for 2009, 2010 and 2011 can be viewed. If we take one ESB WD project as an example, Derrybrien Wind Farm, it is advised from the website that the yearly average TLAF for this project is as follows:

§ 2009 – 0.988

§ 2010 – 0.962

§ 2011 – 0.972

In a market of low wholesale prices and marginal returns this level of volatility is having a significant adverse impact on business returns and introducing uncertainty into future investment decisions in other windfarms.

ESB WD is aware that the 2011 TLAFs are based on certain assumptions and were published in 2009, however it is clear from these figures that the volatility¹, predictability and transparency with regard to current TLAF methodology is deficient. We welcome the TSO’s proposal to alleviate volatility with the introduction of Compression Factors; however we feel that predictability and transparency are also critical issues which need to be addressed. We believe that the following points may aid to increase both the transparency and predictability whilst reducing the volatility of TLAFs.

§ Publish and warrant the compressed TLAFs for the lifetime of implementation of Compression Factors in October 2010, when the 2011

¹ Note: we purposely differentiate between volatility and predictability. Variations yr. on yr. that are predictable can ultimately be factored into initial investment decision. Non predicable variations cannot, hence presenting risk at the investment evaluation stage.

TLAFs are due to be published. This will eliminate all predictability issues concerning TLAFs in the short term.

- § Create a document outlining in clear detail all assumptions (generation and network assumptions) on a regular basis to ensure that the developer can clearly view all conditions modelled in a particular year.
- § Publish all hypothesis considered in the Plexos constraint and unconstraint model to ensure transparency. It should include the efficiency and load factors of future generators.
- § Initiate workshops and invite developers to understand the complexities of determining TLAFs which will aid with transparency.
- § Publish the model used to calculate Marginal Loss Factors in PSSE software.

ESB WD believes that implementation of these measures may remove predictability and transparency issues with regard to how TLAFs are calculated.

Medium Term Splitting Option

ESB WD does not see benefit in introducing a medium term Splitting Option as we feel that this adds extra complication to an already complicated methodology.

The Purchase of Losses option appears to be the favoured option of the TSO. We advocate that all efforts should be made by the TSO to expedite the further development of this option, both in terms of the principles referred to in the introduction and further detail as regards the actual calculation and charging methodologies. This will enable market participants to better understand and more comprehensively assess and comment on these proposals. .

If this medium term option was eliminated the long term option could be implemented sooner rather than later. ESB WD are aware from the workshop that the TSO stated that certain procedures and calculations required for the splitting option are also required for the long term Purchase of Losses option, however we

feel that the whole implementation process surrounding the Splitting Option could waste valuable time that could be more wisely spent by System Operators and market participants in developing and delivering the Purchase of Losses option by keeping the longer term deliverables more sharply in focus.

However should this Splitting Option be implemented, ESB WD believe that the loss factor should be allocated to suppliers. This should simplify the SEM market and provide more confidence to generators. Additionally, suppliers will not be adversely affected because they are already paying for generator losses through the SEM price.

Long Term Purchase of Losses

As commented in the previous section ESB WD proposes that:

- (i) Long term principles and objectives of TLAF regime are established.
- (ii) Proposed methodologies are further developed such that they can be meaningfully be assessed and considered and commented upon.
- (iii) The Purchase of Losses option appears to be the favoured option of the TSO. We advocate that all efforts should be made by the TSO to expedite the further development of this option

In this context we make the following preliminary comments, subject to greater clarity on structure:

- § It could give extra incentive to the TSO to reduce losses on the system by dispatching efficient plant.
- § The metering infrastructure will guarantee accuracy in terms of loss measuring which ultimately leads to a more efficient grid.
- § With an appropriate structure, key items such as predictability, volatility and transparency of TLAFs may be removed for generator investment decisions.
- § We believe that this process may also aid with the implementation of GRID 25 as with the TSO being accountable for losses on the current transmission system, future projects which may alleviate these losses could be expedited.

However ESB WD has the following initial queries which we would like addressed in relation to Purchase of Losses:

- § How do the System Operators propose to implement this option?
- § Are system losses firstly estimated by the System Operators at the beginning of the year and then compared with the actual losses at the end of that same year?
- § Who initially pays for the System Operators estimated losses?
- § At the end of the year, if there is a difference (plus or minus) between the actual and predicted losses, what happens to the excess/deficit?

It is our opinion that the TSO should utilise all efforts, both internally and externally to further develop this process with further engagement of market participants.

3. TRANSMISSION USE of SYSTEM CHARGES (TUoS)

In line with comments regarding TLAFs we believe it important to clearly establish in the first instance the principles that will underpin the methodology to be deployed. ESB WD feel that the currently proposed option for implementation of TUoS Charges (Option 4 – Dynamic Model with Postage Stamp) is not transparent and will lead to issues surrounding year on year predictability. ESB WD is aware that setting the maximum Locational Element of the Signal to 60% is a measure proposed to reduce yr. on yr. volatility however we feel that this does not sufficiently resolve the issue.

For example ESB WD has recently received a connection offer for a Gate 3 project and two of the projects deep reinforcement works are as follows:

- § *‘Reinforcement of corridor between south west region and mid west region’.*
- § *‘Reinforcement of network in Greater Dublin area’.*

We feel that these deep reinforcement works (and hence TUoS charges) are impossible to lacking in detail and predictability and may result in *any* figure being charged to ESB Wind Development. More importantly ESB WD has no way of calculating how this figure is being charged. To alleviate our concerns we feel that the following points should be implemented by the System Operators:

- § All infrastructural developments within GRID 25, both new infrastructure and uprates to existing infrastructure should be made available to all developers.
- § Updates should also be given at least two times per year regarding the status of the planned infrastructural work for the following year. This update should outline the status of issues such as planning, landowner and respective timelines.
- § The PSSE model used for each year between 2010 and 2025 should be made available to developers to ensure that developers may be in a position to predict TUoS charges for their own projects.
- § Initiate workshops and invite developers to understand the complexities of determining TUoS charges which will aid with transparency.
- § The TUoS charge for each project in Gate 3 should be included in the connection offer. This TUoS charge should be included for each year between 2010 and 2025 based on the current status of GRID 25 within each particular year.

We feel that implementation of these points will be a first step in ensuring that both transparency and predictability will be enhanced whilst minimising volatility associated with TUoS charges.

As a result of the discussion above ESB WD cannot take a view on which option listed is most beneficial to existing and future wind farms. As such ESB WD would like to see more analysis being carried out by the System Operators in relation of how the TUoS Charges for each option would be applied to Gate 3 projects. From this we would be in a position to comment on our favoured option for TUoS charges.

