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## **Offshore Transmission Owner (OFTO) End of Tender Revenue Stream – Consultation concerning policy development**

We refer to the consultation issued 11th March 2021 and welcome the opportunity to respond to the consultation.

Equinor is a global energy company, employing over 650 people in the UK. It is the UK's largest supplier of crude oil and the largest supplier of natural gas, meeting more than 25% of UK demand. It operates the Mariner oil field and three offshore wind farms including Hywind Scotland, the world's first floating wind farm. Equinor and partners are building Dogger Bank, the world's largest offshore wind farm.

Offshore wind farms need to have certainty that the offshore transmission system is fit for purpose and operated and maintained at the necessary standards for the full lifetime of the wind farm. As per the current framework, following the end of the initial Tender Revenue Stream (TRS) the transmission assets will be fully depreciated and as a result the OFTO's annual income will be very limited. This represents a challenge as the incumbent OFTO or any new OFTO needs to have sufficient incentives to continue to operate, or an interest to bid for, any possible extension of the transmission asset.

Another challenge from a generator perspective, is that it is difficult for the offshore wind farm to guarantee a specific future lifetime for the wind farm. This could represent a potential risk in any OFTO re-tender process by adding uncertainty to the process and may discourage the incumbent or future OFTO bidders to own and operate potential OFTO extensions.

Based on the above we recommend the follows:

- At the end of the TRS period the transmission assets are financially depreciated to almost zero. It is a risk the incumbent OFTO or any new OFTO would not be interested in taking on an extension. We therefore suggest that the offshore transmission assets be transferred back to the generator. This would ensure that the generator would be able to control risk (including decommissioning) towards the end of the operating lifetime of the offshore wind farm.

- If the ownership of the offshore transmission asset cannot be transferred back to the generator, our preference would be for the incumbent OFTO's license period to be extended. Further we believe that the generator should be in charge for any investments in the offshore transmission system as identified by the health reviews and regulations must also allow the generator to continue to offer an O&M service agreement to the OFTO.

We have in the appendix provided detailed response to relevant questions. We would welcome the opportunity to present our response to the consultation in more detail.

Yours sincerely,

Torkel Sjoner

Equinor ASA

## Appendix: Detailed response to the Consultation

**Q1: should asset health reviews be carried out on generator assets no later than five years before the end of the revenue stream, with the health review for the offshore transmission assets following shortly after that? If no, please set out alternative timelines and reasoning.**

We agree with the proposal assuming that carried out means concluded/completed no later than 5 years before the end of the revenue stream. This will give both the generator and OFTO time for procurement of long lead items if lifetime extension is decided.

**Q2: should generation and transmission health reviews be carried out by the generators, but informed and agreed by OFTOs and Ofgem, given that generation is likely to be the main driver for any extension? If not, please provide reasons.**

We agree with the proposal.

As it is the generators business case which is likely to drive any lifetime extension of the wind farm (and hence the transmissions assets). All offshore transmission assets to date have been designed and constructed by the wind farm operators. This has secured low cost and low risk developments. The “generator build” model should also be the preferred option for any necessary transmission re-investments. Generators should therefore be responsible for and carry out the transmission health reviews. The scope of the review should be informed and agreed by the incumbent OFTO and Ofgem. In special cases a generator may prefer the incumbent OFTO to carry out the transmission health review, the regulations should be sufficiently flexible to also allow this.

**Q3: should generators pay for their own health reviews and those of the associated transmission assets? Please provide reasons for your response.**

Generators should pay for the health review of their assets. If generators carry out the transmission health reviews, generators should also pay for the reviews. If the review is carried out by the incumbent OFTO, the OFTO should pay in the first instance and then be allowed to recover its economic and efficient cost through the revenue stream.

**Q4: what sort of confirmation/guarantee/representation of the intention to extend would developers envisage giving? What would this be subject to?**

Following the completion of the health reviews of the generator assets and transmission assets, generators should confirm to Ofgem its intention to extend the lifetime of the wind farm including a plan setting out the necessary steps. The wind farm operator will however not be able to guarantee in any form the length of the intended lifetime extension many years ahead.

We want to highlight that our expected lifetime of a wind farm is well beyond 20 years and we do not consider this to represent an “extension”.

**Q5 – should the incumbent OFTO or the generator be responsible for any further investment required to enable an extension of the regulatory revenue period?**

All offshore transmission assets to date have been designed and constructed by the wind farm operators. This has secured low cost and low risk developments. Transmission costs and transmission availability are important risks the generator will have to assess and mitigate for lifetime extension wind farm operations. The “generator build” model should be the preferred option if the transmission health review reveals need for additional investments to extend the lifetime. Generators should therefore be responsible and in charge for any further offshore transmission investments.

**Q6 – should the tender revenue period be extended with the incumbent OFTO, or licences retendered through open competition?**

Following the end of the initial tender revenue stream the transmission assets will be fully depreciated. The annual income to an OFTO will at this stage be relatively limited. It will represent a challenge to ensure that the incumbent OFTO has the right incentives to continue and it may dampen any interest from others to participate in any re-tendering of the assets. Additionally, it will be difficult for an offshore wind farm to guarantee a specific future lifetime for the windfarm. This would represent a potential risk for any OFTO re-tender process.

Due to the above, unless the transmission assets can be transferred back to the generator, our preference would be for the incumbent OFTO tender revenue period to be extended with the generator bearing the cost of any required further investments.

**Q7 – do you consider that there is a threshold to be met to determine which approach to be taken (if there is to be any further regulatory revenue period at all)? For example, the extension period is above a certain number of years, or the tender revenue stream is above a certain value?**

Please see our response to Q6. Furthermore, to reiterate, it is hard for us to quantify how a future OFTO extension TRS would work and provide an incentive to an OFTO, considering the value of the transmission asset is nearly zero at the end of the initial OFTO license period.

**Q8 – where retendering takes place, what safeguards or mitigations would need to be implemented to enable bidders to be comfortable about the level playing field between incumbent OFTOs and other bidders?**

We would expect the incumbent OFTO to share all relevant information available to it, and in addition to the transmission health review, also share the maintenance record of the transmission assets for the previous 20-year lifetime.

**Q9 – are the timelines proposed practical? Do any of the timings need to be extended or reduced, and if so, why?**

We would suggest that the regulatory framework and regulations provide Ofgem with sufficient flexibility to adjust the timelines should it be required. We do also expect Ofgem’s final decision to be made prior to the generator making its final investment decision.

In our view it will be too late if Ofgem issues its final decision two years before the end of the existing regulatory revenue period and we therefore suggest that Ofgem's decisions are issued no later than three years before the end of the existing regulatory revenue period. This will allow for sufficient time to meet required decommissioning requirements or upgrades (if extended) especially for long lead items.

**Q10 - should there be only one extension period granted, or do you think that if the process is established, that more than one extension could be possible for the same OFTO asset?**

As explained above it will be very difficult for a wind farm operator to confirm/ guarantee the length of the extension. This could be solved with an "open-ended" OFTO licence / tender revenue stream combined with a notification period from the generator of 1 year or less, alternatively the regulations need to allow multiple extension periods.

**Q11 – we would welcome your views on which of the proposed cost mechanisms ("building blocks" or "cost plus") you consider would be more appropriate for establishing a revenue stream for the extension period, or if an alternative should be considered?**

It is hard for us to quantify how a future OFTO extension TRS would work and provide an incentive to an OFTO, considering the value of the transmission asset is nearly zero at the end of the initial OFTO license period.

As indicated in earlier responses, we propose that generators should be in charge of any further transmission investments needed to extend the lifetime and that our preferred option is for the OFTO license and tender revenue period to be extended with the incumbent OFTO. Based on these assumptions we believe a cost-plus mechanism will be most appropriate.

**Q12 – should there be a set cost mechanism for determining the TRS for any future regulatory revenue period across all projects? Or should the cost mechanism be determined on a project by project basis, depending on the required extension length and risk profile?**

It is important that all projects are treated objectively and transparently. We would therefore expect Ofgem to publish a set cost mechanism prior to any TRS being determined.

**Q13 – are there any additional cost elements that you think should be considered when Ofgem is calculating the tender revenue stream for a further regulatory revenue period?**

No further comments to our response to Q11.

**Q14 - what market value (if any) do you think the OFTO assets will represent at the end of the regulatory revenue period? What are the component parts of this value?**

At the end of the regulatory revenue period the transmission assets will be fully depreciated. The market value will be limited to scrap value, transformers/reactors may have some additional value. To the existing wind farm the assets however will have a significant value as we expect the technical lifetime of the transmission assets (substation, cables and transformers) could be 40 years or more.

**Q15 – do you agree that decommissioning funds and liability should be transferred across in full to any new OFTO?**

Yes.

**Q16 – do you expect decommissioning costs to be higher after the period of an extension or similar to those expected after the initial regulatory revenue period?**

The decommissioning costs could be the same or higher, depending on upgrades done and the subsequent decommissioning of these. However, we do not see that the transmission decommissioning cost will increase significantly unless new export cable(s) are required.

**Q17 – do you agree that, in the event of an extension, the incumbent OFTO should pay any availability liabilities due at the end of the original regulatory revenue period?**

Yes.

**Q18 – are there any indications that insurers are willing to reinstate LEG3/06 exclusion clauses or equivalent (where this has been removed) after a period without further failure events? If so, how long might that period be?**

No indication currently that insurers are willing to reinstate LEG3/06. However, if there is a period with little/no failure events then it is assumed the insurer's position most likely will change. It is difficult to guess the length of this period.

**Q19 – noting the difficulty of forecasting the insurance market, what are your views on the likely availability and cost of LEG3/06 exclusion clauses (or equivalent) for the period of any further revenue period?**

Any extension may cause insurers to either provide more restricted coverage or ask for detailed surveys and testing of the cables / transmission systems. The insurance costs are likely to rise if they choose to provide LEG3 coverage.

**Q20 - is there a need to move away from LEG3/06 (or equivalent) insurance clauses in any further revenue period due to the age, suitability, and specific nature of this type of cover for ageing assets?**

It would appear so, not from a want from the buyer / owner / generator, but a lack of product from insurers.

**Q21 – do you consider that a more centralised solution for cable insurance risk might be required? Why? Would this bring confidence back to the insurance market and attract new investors to the OFTO extension asset class?**

Yes. The offshore wind (OW) industry should consider developing a fund in order to provide for this risk. A fund is likely to be more cost efficient than the insurance market, assuming that administrative costs of a fund would be lower than the insurer costs. The OW industry is increasing in size, and hence could carry such a fund. This would be possible if all OFTO's insurances were to be catered for by a fund, then the costs might also carry the repairs. If this is done, this would mean that this risk moves away from the traditional

insurance market and carried ultimately by the OW industry. There are examples of successful industrial insurance mutualisation. This would enable the OW industry to develop a product that they want for their own needs. How, and by whom, funding shall be secured, needs to be assessed with great care.

**Q22 - would operating the OFTO assets with minimal insurance to first failure be a viable option for higher risk assets with uncertain futures?**

No. Unless, there is 100% confidence in the inspection, testing and maintenance regimes.

**Q23 - are you currently exploring or investigating any other potential models or approaches to insurance that maybe appropriate for an OFTO asset during any further revenue period?**

We have considered the fund approach for a CCS asset, and this approach could be used for offshore transmission assets like cables as well. This is described in Q21. However, the idea has not matured into any product, yet.