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18 November 2021

Norfolk Vanguard Request for Additional Information

Dear Mr Leigh,

Planning Act 2008 and the Infrastructure Planning (Examination Procedure) Rules 2010

Re-determination of application by Norfolk Vanguard Limited (Applicant) for development consent for the Norfolk Vanguard Offshore Wind Farm (Norfolk Vanguard)

Response to the Secretary of State's Letters dated 11 October 2021 and 26 October 2021

We refer to your letter dated 11 October 2021 which requested further information from the Applicant.

In response to the request for further information, the Applicant now encloses the following documents:

- Applicant's Response to the Request for Additional Information, which includes a copy of Norfolk Boreas Limited's comments on Interested Parties' representations submitted on 21 October 2021
- 2. In Principle Habitats Regulations Derogation Provision of Evidence Appendix 2 Alde-Ore Estuary SPA In Principle Compensation (Version 3)
- 3. In Principle Habitats Regulations Derogation Provision of Evidence Appendix 3 Haisborough, Hammond and Winterton SAC In Principle Compensation (Version 3)
- 4. In Principle Habitats Regulations Derogation Provision of Evidence Appendix 1 Flamborough and Filey Coast SPA In Principle Compensation (Version 3)
- 5. Updated Population Viability Analysis: Flamborough and Filey Coast SPA and Alde-Ore Estuary SPA (Version 2)
- 6. Extract of Schedule 17 to the draft Development Consent Order: Compensation to protect the coherence of the Natura 2000 Network (Version 2)
- 7. Summary of the Applicant's Negotiations on Compensation Sites for Ornithology

Requests for Information

As you will be aware, the Norfolk Vanguard application was submitted on 26 June 2018 and accepted for examination on 24 July 2018. The examination opened on 10 December 2018 and closed on 10 June 2019. Development consent was subsequently granted on 1 July 2020, but following an Order of the High Court made on 18 February 2021 the decision of the Secretary of State to grant consent was quashed. On 29 April 2021 the Secretary of State confirmed his intention to re-determine the application and sought representations, amongst other matters, on the procedure which the Secretary of State proposed to follow. Three further requests for



information have since been issued by the Secretary of State on 5 July 2021, 11 August 2021 and 11 October 2021.

During this period the need and urgency for the delivery of offshore wind has only increased. In November 2020, the Ten Point Plan for a green industrial revolution explained the critical role of offshore wind in order to build back better and greener, setting the target to produce 40GW of offshore wind by 2030. In December 2020, this was followed by the Government's Energy White Paper, Powering our Net Zero Future, which set out the vision to transition to clean energy by 2050, and the importance of offshore wind as a proven technology to deliver affordable decarbonisation at scale. The commitment to deliver 40GW of offshore wind by 2030 has recently been restated in the Government's Net Zero Strategy: Build Back Greener, published in October 2021. In short, there can be no doubt that there is an increasingly urgent need for the delivery of Norfolk Vanguard as part of a strategically coordinated development including Norfolk Boreas, to maintain the pathway for net zero by 2050.

The focus of the Secretary of State's requests for information have, in the main, been directed towards the potential impact of the onshore project substation, near Necton, and the potential for adverse effects on integrity of European sites, including the Applicant's proposed, without prejudice, compensatory measures. In the Secretary of State's letter of 5 July 2021 the Applicant was requested to provide additional information on:

- cumulative impacts of the proposal to locate the Norfolk Vanguard substation(s) at Necton:
- the potential cooperation agreement between Norfolk Boreas and Norfolk Vanguard;
- in the context of the OTNR, opportunities for a more coordinated approach to the design and delivery of the transmission infrastructure for the Norfolk Vanguard and Norfolk Boreas projects; and
- any additional information in relation to the proposed Sheringham Shoal and Dudgeon Offshore Wind Farm Extension projects.

In addition, information was requested on:

- compensation measures relating to the Alde Ore Estuary (AOE) Special Protection Area (SPA);
- updated in-combination assessments and compensatory measures relating to the Flamborough and Filey Coast (FFC) SPA (with a further request dated 11 August 2021 on updated in-combination assessments to include updated Collision Risk Modelling (CRM) and Population Viability Analysis (PVA)); and
- compensatory measures relating to the Haisborough Hammond and Winterton (HHW)
 SAC (with further requests dated 11 August 2021 to include evidence on recovery of
 sandbanks/sandwaves and 11 October 2021 on in-principle compensation measures,
 measures to avoid the need for cable rock protection within the HHW SAC (save at cable
 crossing points) and information on avoidance of reefs during cable installation); and
- the Dillington Hall Nature Recovery project (requested separately by letter dated 11 October 2021).

The Applicant has now provided the fullest possible responses on all of the above matters by the respective deadlines of 2 August, 25 August and 19 November 2021 (the Response).

However, with respect to the additional information provided on compensation options and strategies in relation to the AOE SPA, FFC SPA and HHW SAC, the Applicant wishes to reiterate, as made clear in the Response, its firm position that these compensation options and strategies are not required. Nor were they required by the Secretary of State in his original decision letter on Norfolk Vanguard of 1 July 2020.



Updated Population Viability Analysis: Flamborough and Filey Coast and Alde-Ore Estuary SPA

The requirement for Hornsea Project Three to provide compensation for in-combination impacts on the FFC SPA does not automatically mean that all future projects which have the potential to affect the FFC SPA should also provide compensation. As made clear by the Applicant during, and subsequent to, the Examination, PVA is a fundamental tool for demonstrating whether there would be any decline in relevant populations at either the FFC SPA or AOE SPA, and hence a potential AEoI, or merely a very small reduction in population growth rates which could reasonably be concluded to be de minimis with no potential to give rise to AEoI. In all instances the PVA results were such that the Applicant concluded the latter and that the change in population growth rates as a result of Norfolk Vanguard's contribution, in combination with other projects, would in fact be so small as to be indiscernible. The SoS appears to recognise the importance of PVAs in this respect, having requested that they be provided for both Norfolk Vanguard and Norfolk Boreas.

Although the Secretary of State has not requested updates to the PVAs presented for Norfolk Vanguard on 25 August 2021, given Natural England made such a request with respect to the similar PVA provided for Norfolk Boreas, and this resulted in a request from the Secretary of State to update PVAs for the Norfolk Boreas project in his letter of the 22 September 2021, the Applicant has engaged with Natural England and agreed to update certain PVAs for the Norfolk Vanguard project. Norfolk Boreas Limited produced updated PVAs for the Norfolk Boreas project addressing Natural England's comments, which were submitted on 21 October 2021. For gannet and kittiwake the Norfolk Boreas updated PVA demonstrated that Natural England's requested changes made no material difference to the results obtained, and in its submission for the Norfolk Boreas project on 21 October 2021 Natural England, having undertaken a similar update of the previous PVA themselves, acknowledged this point (i.e. that their requested revisions made no material difference to the results and conclusions). For this reason Natural England (21 October 2021) based their assessment and advice for gannet and kittiwake for the Norfolk Boreas project on the original PVA results submitted on 20 August 2021. The methods used for the Norfolk Vanguard PVA were identical to those used for the Norfolk Boreas project, and therefore the results of the PVA for Norfolk Vanquard for gannet and kittiwake presented on the 25th August 2021 also remain reliable and robust. No PVA update has therefore been prepared for these species, and the previous version submitted contains the relevant information in relation to gannet and kittiwake.

However, for guillemot and razorbill, for which Natural England made additional recommendations for the Norfolk Boreas project to use larger initial population sizes and to present a wider range of impact magnitudes, the updated PVA results differ by a slightly greater degree (i.e. compared with gannet and kittiwake) and hence the Norfolk Vanguard PVA for these species has been updated in line with the PVA updates submitted for the Norfolk Boreas project. In addition, the previous Norfolk Vanguard PVA did not include modelling of the Alde-Ore Estuary SPA lesser black-backed gull population (as this has not been requested by the Secretary of State). Therefore, for completeness, this species has been added to the updated Norfolk Vanguard PVA alongside the revised guillemot and razorbill PVA. These are submitted in the Updated Population Viability Analysis: Flamborough and Filey Coast SPA and Alde-Ore Estuary SPA (ExA.AS-2.D.13.V2).

In addition, on 21 October 2021, Natural England withdrew their advice to the Norfolk Boreas project that collision risks should be re-calculated using revised avoidance rates as recommended in a recent reanalysis of collision monitoring data undertaken by Cook (2021, under commission to Natural England). Instead, Natural England advised Norfolk Boreas (submitted on 21 October 2021 to the Norfolk Boreas request for further information) to continue to follow the previous joint Statutory Nature Conservation Agency guidance (JNCC et al. 2014)

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and apply the avoidance rates in Cook et al. (2014). The Applicant agrees that it is not appropriate to use the avoidance rates recommended in the recent update given that the results are very strongly influenced by one particular study which (as agreed now by Natural England) was conducted in a manner which means the data are very unlikely to be reliable. Full details on this are provided in MacArthur Green (2021) attached as Appendix 3 to the Updated Population Viability Analysis: Flamborough and Filey Coast SPA and Alde-Ore Estuary SPA (ExA.AS-2.D13.V2). Consequently, the estimated collision risks for the project, and also other wind farms included in the cumulative and in-combination assessments, are unchanged from those submitted by the Applicant on 25 August 2021.

Alde-Ore Estuary SPA

As noted in the Response and in the Applicant's submissions during and subsequent to the Examination, the Applicant remains firmly of the view that the Project does not give rise to AEol of the AOE SPA. This is on the basis that the predicted collision risk for LBBG is very small (2.6 individuals using Natural England's preferred methods, and 1.6 individuals using the Applicant's preferred parameters) and even these figures contain considerable over-precaution. Hence there is a very high probability that the impact will not be discernible against natural population variations. In fact, the in-combination total is lower than those for which the Secretary of State has previously concluded that no adverse effects on integrity will arise, for example in respect of the Galloper Offshore Wind Farm.

In his original decision letter of 1 July 2020 on Norfolk Vanguard the Secretary of State concluded (para 5.7) no AEoI on the basis that "the potential loss of a relatively very small number of birds through collision impacts does not contribute in a significant way to the total number of birds predicted to be impacted in-combination ("de minimis")". That Secretary of State conclusion continues to apply to the re-determination, and is further reinforced by the updated PVA.

Flamborough and Filey Coast SPA

As noted in the Response, and in the Applicant's submissions during and subsequent to the Examination, in light of the significant reductions in impact achieved through additional mitigation for the Project and the wider levels of over-precaution inherent in offshore ornithological impact assessment, the Applicant remains firmly of the view that the project does not give rise to any AEoI of the FFC SPA. In addition, Natural England is now in agreement that there will be no adverse effects on the integrity of the FFC SPA as a result of the project alone or in-combination with other projects on gannet, guillemot and razorbill (for all wind farms including Hornsea Project Three, Norfolk Boreas, East Anglia ONE North and East Anglia TWO).

In respect of kittiwake, the Applicant has presented an updated PVA which clearly demonstrates that even when the total in-combination impacts are modelled, using Natural England's preferred methods and on the most precautionary basis, there will only be very small reductions in the population growth rates. This would not cause population declines, and the difference in the growth rates predicted with and without the Norfolk Vanguard wind farm would almost certainly be undetectable. The conclusions from the PVA and assessment are unchanged from those presented during the Examination and provide further support for the Applicant's position throughout the application and examination process that there will be no AEoI of the FFC SPA due to the Norfolk Vanguard wind farm either alone or in-combination with other plans or projects.

In his original decision letter of 1 July 2020 on Norfolk Vanguard the Secretary of State concluded (para 5.7) no AEoI on the basis that "the potential loss of a relatively very small number of birds through collision impacts does not contribute in a significant way to the total number of birds predicted to be impacted in-combination ("de minimis")". That Secretary of State



conclusion continues to apply to the re-determination and is further reinforced by the PVA.

Haisborough, Hammond and Winterton SAC

The Applicant has provided the additional requested material in the Response, and as noted in the Response, and in the Applicant's submissions during and subsequent to the examination, due to the mitigation measures which have been committed to, there would be no AEoI of the HHW SAC.

During the course of the assessment, examination and re-determination process the Applicant has committed to a comprehensive and significant suite of mitigation measures designed to reduce the scale of effects on the HHW SAC, to promote rapid recovery of Annex I sandbanks and Sabellaria spinulosa reef, and where possible to avoid all interaction of the Project with Annex I features. The extensive list of these measures includes a commitment not to use cable protection in the priority areas to be managed as reef within the HHW SAC, unless otherwise agreed. Due to implementation of these mitigation measures the maximum possible size of Annex I habitat loss that could be caused by the project would be extremely small. The Applicant has also committed to decommission any cable protection (if required at all) placed within the HHW SAC apart from at cable crossing points, and not to use cable rock protection. Therefore, the Secretary of State can have confidence that the cable protection will be decommissioned, thus ensuring that the impacts of cable protection would be long term temporary. In addition, in the Applicant's submission of Further Information on 25 August 2021 the Applicant produced further evidence in relation to sandbanks which demonstrates that for the conditions experienced at the HHW SAC, dredged sandwaves are expected to recover fully and within a short period.

In his original decision letter of 1 July 2020 on Norfolk Vanguard the Secretary of State concluded (para 5.8) no AEoI on the basis that "the Applicant has demonstrated that the area of the site affected will be relatively small (in the case of reef, kept to a minimum through micrositing), any affected features are able to recover, and all cable protection will be removed at the time of decommissioning". That Secretary of State conclusion continues to apply to the redetermination.

Hornsea Project Four

Following the Secretary of State's letter dated 11 October 2021, we are aware that an application for development consent in respect of Hornsea Project Four was submitted to the Planning Inspectorate on 29 September 2021. The Hornsea Project Four application documents were made available on 8 October 2021 and a decision to accept the application for examination was made on 26 October 2021.

The Hornsea Project Four onshore cable route and associated infrastructure has a connection point near to Creyke Beck in Yorkshire and accordingly there will be no onshore interaction with Norfolk Vanguard and therefore no possibility of onshore cumulative impacts arising from Norfolk Vanguard and Hornsea Project Four.

In respect of offshore impacts, the Applicant has reviewed the relevant sections of the Hornsea Project Four application to determine if there are any changes to the collision estimates from the Preliminary Environmental Impact Report (PEIR) figures used to date, with those in the Environmental Statement (ES) which would need to be included in the Norfolk Vanguard cumulative and in-combination assessment. To undertake this, the Applicant compared the equivalent collision predictions from the PEIR and the ES (i.e. the ones identified in the Hornsea Project Four assessment as estimated using 'SNCB Parameters'. Hence, the ES collision estimates considered are directly comparable to those presented in that project's PEIR, as used by the Applicant). This like-for-like comparison has established that, following design



modifications for Hornsea Project Four, the predicted collision estimates have been reduced by 40%-50% (varying between species). A similar exercise was undertaken with respect to the Hornsea Project Four displacement assessment, as presented in that project's PEIR and ES. This also indicated that the ES displacement estimates were lower than those presented in the PEIR, by between 45% and 70% (varying across species).

Therefore, it is not considered necessary to update the collision or displacement figures for Hornsea Project Four used in the cumulative and in-combination assessment because it can be concluded that the current Norfolk Vanguard assessment continues to represent the worst case, and due to the reductions at Hornsea Project Four, contains an additional element of precaution.

Without prejudice compensation

Notwithstanding the above, and entirely without prejudice, the Applicant has developed proposed compensation measures over a considerable period of time, in consultation with a number of stakeholders, and to a significant level of detail. In addition, Vattenfall Wind Power Ltd has collaborated with ScottishPower Renewables to enable the delivery of joint compensation measures (if required by the Secretary of State) for the Norfolk Vanguard, Norfolk Boreas, East Anglia ONE North and East Anglia TWO projects.

For Norfolk Boreas, Norfolk Vanguard's sister project, some interested parties have suggested that the level of detail provided for the compensatory measures to date is insufficient to enable the Secretary of State to have confidence that the measures can be delivered and are secured, particularly in relation to negotiations to secure ornithological compensation sites. Whilst the Applicant has been asked to provide an update on negotiations with owners of infrastructure that could provide compensation for the HHW SAC, no request has been received in relation to ornithological compensation sites for the Norfolk Vanguard project. Notwithstanding this, in light of interested parties' comments on the Norfolk Boreas project, the Applicant has also provided an update on negotiations for ornithological compensation sites which are being progressed jointly with Norfolk Boreas and these are contained in the Summary of the Applicant's Negotiations on Compensation Sites for Ornithology (ExA.AS-3.D13.V2).

It is also important to remember that compensation measures have been proposed entirely without prejudice to the Applicant's position that there is no risk of AEoI. The degree of detail which can be provided can only be commensurate with the level of agreement on whether AEoI arises and, if it does, agreement on the nature and scale of the compensation to be provided. This is because these aspects will need to be reflected in land or commercial agreements and applications for permissions or consents (if any) required to deliver the compensation measures. In any event, this level of detail is not reasonably required by the Secretary of State in order to conclude that the compensation measures proposed are deliverable and can be secured. Indeed, the Secretary of State appeared to recognise this in the consent award for Hornsea Project Three which did not require compensation proposals to be developed to the extent some interested parties now request. Nevertheless, the Applicant has continued to progress the compensation proposals as far as possible, to give all interested parties confidence that compensatory measures could be delivered and secured in the event they were to be required by the Secretary of State. Letters from relevant landowners to confirm the current position on negotiations have also been provided (see Appendix 1 to 5 of the Summary of the Applicant's Negotiations on Compensation Sites for Ornithology (ExA.AS-3.D13.V1)), including a letter from The Crown Estate (Appendix 5 of ExA.AS-3.D13.V1) which notes The Crown Estate's in-principle support, in its capacity as landowner, should the Applicant be required to deliver ornithological and benthic compensation.



Updates to Compensation Documents

The Applicant has submitted version three of compensation documents 8.24, 8.25 and 8.26. In the updated versions the suggested wording for Schedule 17 has been removed and has been submitted as a separate document (Extract of Schedule 17 to the draft DCO: Compensation to protect the coherence of the Natura 2000 Network, ExA.AS-1.D13.V2). In response to the Secretary of State's request 6(i), document 8.25 has also been updated to clarify that a single marine debris retrieval or single infrastructure removal campaign would be sufficient to deliver the required compensation.

Timing of delivery of compensation measures

Some interested parties have also stated that compensation should be determined on the basis of the worst case envelope and not the final installed project. Whilst the Secretary of State will no doubt wish to be satisfied that compensation to offset the worst case impacts could be delivered if required, provided that the Secretary of State is satisfied that the compensation measures ensure that the overall coherence of Natura 2000 is protected, the Secretary of State has a discretion to determine the nature and form of compensation measures to be delivered.

In the case of the HHW SAC for example, if the Secretary of State concludes that AEoI will only arise as a result of cable protection, and there is a question as to whether cable protection will or will not be deployed, it would be entirely reasonable and within the Secretary of State's discretion to determine that compensation would not be 'necessary' to ensure the overall coherence of Natura 2000 in the event that cable protection is not deployed, and also that compensation delivered after cable protection is deployed can still ensure that the overall coherence of Natura 2000 is protected. This is an entirely lawful and reasonable approach, especially in the context of ensuring the delivery of affordable decarbonisation to meet the Government's targets for 40GW of offshore wind by 2030 and net zero by 2050. As previously noted, a requirement to deliver compensation in advance of understanding the scale of the impact (if indeed needed at all) would unnecessarily (and potentially significantly) increase the costs of the project's delivery and therefore ultimately the cost of energy for consumers. Given the specific circumstances which apply to Norfolk Vanguard, this would not necessarily set any wider precedent as some interested parties have suggested.

Natural England has, in fact, accepted this is an appropriate approach in certain circumstances and EC Guidance also supports this approach by recognising that there will be certain circumstances where it will not be possible to implement compensation before the impact occurs.

Potential impacts of the onshore project substation at Necton

In the Response, the Applicant provided details of a masterplan approach, which could be secured through the DCO. The masterplan shows the co-location of infrastructure, zoning of the onshore project substation footprints and how the indicative landscaping proposals have been designed to work together across both projects and with existing landscape features. This is supported through the written principles of the masterplan which set out the approach for ensuring that the design and development of the onshore project substations is considered holistically for both Norfolk Vanguard and Norfolk Boreas. In addition, the same masterplan approach has been proposed for Norfolk Boreas, with a reciprocal DCO requirement so that this can also be secured for Norfolk Boreas. The Secretary of State can therefore be satisfied that the Norfolk Vanguard and Norfolk Boreas projects would be co-ordinated to address design issues and that cumulative landscape and visual impacts at the onshore project substation near Necton are minimised.



Further comments from Interested Parties

In the letter of 11 October 2021, the Secretary of State requested comments from Interested Parties on the submissions made by the Applicant. Once the Secretary of State has considered the submissions that have been made to him he will decide whether any further consultation is to take place. In respect of the Norfolk Boreas project, the Secretary of State, by letter dated 22 September 2021, indicated an intention not to conduct any further consultation following the submissions of Interested Parties on 21 October 2021. However, on 21 October 2021, Norfolk Boreas Limited did submit comments on representations from Interested Parties submitted on 20 August 2021, including those which were not related to the matters being consulted on as part of the Norfolk Boreas project. In anticipation that similar submissions from Interested Parties may be made on the Norfolk Vanguard re-determination on 19 November 2021 and in the event that the Secretary of State concludes that no further consultation is required, the Applicant has included that response in this submission (as Appendix 1 to the Applicant's Response to the Request for Additional Information, ExA.PDR.D13.V1), and the points of principle made by Norfolk Boreas Limited apply equally to the Norfolk Vanguard project.

In their latest representations to the Norfolk Boreas project submitted on 21 October 2021, some interested parties have also suggested that the Secretary of State should consider issuing a split decision, to grant the offshore development and to refuse the onshore development pending progress being made with the Offshore Transmission Network Review (OTNR). However, a split decision would result in a significant delay which could potentially affect the viability of the projects. The offshore element of the project could not be progressed without consent having first been secured to construct and operate the related onshore transmission system, and it is inconceivable that a separate consent for the onshore works could be achieved within the timescales required for delivery of the project and in accordance with Contract for Difference obligations. It would also be at odds with the approach set out in the Overarching National Policy Statement for Energy (EN-1) (paragraph 4.9) on linking applications for new generating stations and related infrastructure, and the need for the SoS to be satisfied that there are no obvious reasons why the necessary approvals for the other element are likely to be refused (paragraph 4.9.3). The principle of issuing a split decision was not raised in response to the Secretary of State's letter of 29 April 2021 asking for comments on the process for re-determination of the Norfolk Vanguard project, and indeed, has not been raised at all to date. In any event, the Applicant's response in relation to the OTNR (submitted on 2 August 2021) has explained in detail how early opportunities that could be delivered within the existing timelines and parameters for the Norfolk Vanguard project, as well as the existing regulatory framework, have been explored and proposed, and that a co-ordinated approach to the delivery of both Norfolk Vanguard and Norfolk Boreas has already been taken. Accordingly, a split decision is neither appropriate nor necessary.

Overall

Overall therefore, the Applicant has provided full and detailed responses to each of the Secretary of State's requests for further information. However, the level of detail provided by the Applicant on compensatory measures should not be interpreted in any way as an acceptance by the Applicant that Norfolk Vanguard would give rise to any AEoI of any of the European sites concerned. As indicated above the Applicant's firm position (supported by the Secretary of State in his original decision letter of 1 July 2020 on Norfolk Vanguard and by the PVAs) is that the project would not give rise to any AEoI because of the minimal impacts of Norfolk Vanguard on those European sites. To require any form of compensatory measures would be wholly disproportionate to the level of impacts concerned.



We trust the enclosed documents deal fully with your request for further information. If however, any further clarification is required, please do not hesitate to contact us.

Yours faithfully



Jake Laws

For and on behalf of

Norfolk Vanguard Limited



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