AQUIND Limited

AQUIND INTERCONNECTOR

Statement of Common Ground Between AQUIND Limited and Natural England/Joint Nature Conservation Committee

Agreed Draft

The Planning Act 2008

Document Ref: 7.5.12

PINS Ref.: EN020022

AQUIND Limited

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PINS REF.: EN020022

DOCUMENT: STATEMENT OF COMMON GROUND

DATE: NOVEMBER 2020

DOCUMENT

Document	Statement of Common Ground
Revision	002
Document Owner	Natural Power Consultants Ltd
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Date	15/11/2020
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Date	15/11/2020

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TABLES

1. INTRODUCTION

1.1. PURPOSE OF THIDOCUMENT

1.1.1.1. This Statement of Common Ground ('SoCG') has been prepared with Natural England ('NE') and the Joint Nature Conservation Committee ('JNCC') to show where agreement has been reached with AQUIND Limited ('the Applicant') during the pre and post Development Consent Order ('DCO') application consultation and in the course of the DCO Examination.

1.1.1.2. This SoCG has been prepared by the Applicant and NE, and JNCC in respect of the marine aspects if the Proposed Development, collectively referred to in this SoCG as 'the parties'.

1.1.1.3. The purpose and possible content of SoCGs is set out in paragraphs 58-65 of the Department for Communities and Local Government's guidance entitled "Planning Act 2008: examination of applications for development consent" (26 March 2015). Paragraph 58 of that guidance explains the basic function of SoCGs:

> *"A statement of common ground is a written statement prepared jointly by the applicant and another party or parties, setting out any matters on which they agree. As well as identifying matters which are not in real dispute, it is also useful if a statement identifies those areas where agreement has not been reached. The statement should include references to show where those matters are dealt with in the written representations or other documentary evidence."*

1.1.1.4. This SoCG comprises a record of agreement which has been structured to reflect topics of interest to NE and JNCC on the AQUIND Interconnector DCO Application ('the Application'). Topic specific matters agreed, not agreed and actions to resolve matter between NE and the Applicant and between JNCC and the Applicant are included.

1.1.1.5. The position with respect to each topic of interest is presented in a tabular form.

1.1.1.6. Throughout this document points of agreement and disagreement between the parties are clearly indicated. Points that are not agreed will be the subject of ongoing discussion wherever possible to resolve, or refine, the extent of disagreement between the parties.

1.1.1.7. This revision of the SoCG is mutually agreed as further feedback from NE and JNCC in November 2020 has been incorporated. As such, this revision of the SoCG reflects all parties current understanding of matters at this time and pending further engagement if required.

1.2. THE DEVELOPMENT

1.2.1.1. This SoCG relates to an application made by the Applicant to the Planning Inspectorate ('PINS') under the Planning Act 2008 ("Act"). The application was made on 14 November 2019.

1.2.1.2. The draft DCO is referred to as the AQUIND Interconnector DCO. The DCO, if granted, would authorise the Applicant to construct, operate and maintain infrastructure and associated development (the 'Proposed Development') including:

- High Voltage Direct Current ('HVDC') marine cables;
- HVDC underground cables;
- Converter station;
- High Voltage Alternate Current ('HVAC') cables; and
- Fibre optic data transmission cables and associated infrastructure.

1.2.1.3. This SoCG is only relevant to the marine aspects of the Proposed Development which comprise of activities including the installation of marine cables that run from Mean High Water Springs ('MHWS') to the UK/France European Economic Zone ('EEZ') Boundary Line.

2. CONSULTATION

2.1.1.1. The parties have been engaged in consultation since the inception of the Development.

2.1.1.2. A summary of key meetings and correspondence between the parties can be found in Tables 2.1 and 2.2:

Table 2.1: Consultation with NE

Date	Form of Contact	Summary
February 2018	Scoping Opinion Request to the Marine Management Organisation ('MMO')	Scoping Opinion received from MMO in June 2018
July 2018	Emails	Discussion on Horizontal Directional Drilling ('HDD') methods within Langstone Harbour & Habitat Regulations Assessment ('HRA') discussions
October 2018	Telephone calls & emails	Marine Protected Areas and seeking JNCC advice for sites beyond 12 nautical miles ('nmi'). Also contact Environment Agency in relation to potential impacts within 1 nmi.
October 2018	Scoping Opinion Request to the Planning Inspectorate ('PINS')	Scoping Opinion received from PINS in December 2018
13 February 2019	Teleconference	Approach to deposit of dredged material, HRA discussions and pre-screening.
March 2019	Section 42 Consultation	Consultation on the Preliminary Environmental Information Report ('PEIR') by the Applicant.
02 April 2019	Email	Rationale for marine mammal HRA pre-screening provide to NE.
03 April 2019	Email	Dredge and Disposal Summary note provided to NE.
29 April 2019	Email	PEIR response from NE.
03 May 2019	Email	Marine mammal HRA Pre-Screening response from NE.
07 May 2019	Teleconference	Discussions on approach to Dredge and Disposal.

Date	Form of Contact	Summary
24 June 2019	Email	PEIR Briefing Note with Applicant's responses to PEIR comments provided to NE.
27 June 2019	Teleconference	Discussion on PEIR comments/briefing note.
28 June 2019	Email	Query relating to zone of influence for HRA in combination assessment relating to marine ornithology.
03 July 2019	Email	Updated briefing note outlining discussion points on PEIR as per teleconference held on 27 June 2019
01 July 2019	Email	Draft deemed Marine Licence ('DML') shared with NE for review.
17 July 2019	Email	NE comments on draft DML
19 July 2019	Email	NE response to updated briefing note.
25 July 2019	Meeting/Teleconference	Discussions on draft DML.
03 September 2019	Email	Draft HRA issued to NE for review.
13 September 2019	Email	Draft MCZ assessment issued to NE for review.
17 September 2019	Email	Draft plume dispersion modelling report issued to NE for review.
20 September 2019 **30 September 2019**	Email and Teleconference	Feedback and discussions on draft HRA.
08 October 2019	Email	Review and feedback on draft Marine Conservation Zone ('MCZ') assessment.
09 October 2019	Email	Review and feedback on plume dispersion modelling.
19 February 2020	s. 56 consultation	Relevant Representation ('RR') received from NE (Ref: RR-181)
25 March 2020	Email	Applicant response to NE RR and draft SOCG shared with NE.
26 March 2020	Teleconference	Discussions on s.56 feedback and draft SoCG.
22 April 2020	Email	Updated draft SoCG shared with NE for second review, along with minutes of teleconference (26 March 2020).

Date	Form of Contact	Summary
12 June 2020	Email	Feedback from NE on the draft SoCG.
24 June 2020	Email	The Applicant provides a Cable Protection Technical Note to the NE (and MMO) to address cable protection queries.
17 August 2020	Email	Feedback from NE on the Cable Protection Technical Note.
23 September 2020	Email	Updated draft SoCG shared with NE for review.
13 November 2020	Email	Feedback received from NE on SoCG submitted at Deadline 1.

Table 2.2: Consultation with JNCC

Date	Form of Contact	Summary
February 2018	Scoping Opinion Request to the MMO	Scoping Opinion received from MMO in June 2018
October 2018	Scoping Opinion Request to the PINS	Scoping Opinion received from PINS in December 2018.
03 April 2019	Email	Dredge and Disposal Summary note provided to JNCC.
07 May 2019	Teleconference	Discussions on approach to dredge and disposal.
01 July 2019	Email	Draft DML shared with JNCC for review.
24 July 2019	Email/s	Feedback from JNCC on draft DML.
13 August 2019	Email	PEIR Briefing Note with Applicant's responses to JNCC PEIR comments.
03 September 2019	Email	Draft HRA issued to JNCC for review.
13 September 2019	Email	Draft MCZ assessment issued to JNCC for review.
28 September 2019 **11 October 2019**	Emails	Feedback on draft HRA from JNCC.
09 October 2019 and 11 October 2019	Emails	Review and feedback on draft MCZ assessment
19 February 2020	s. 56 consultation	RR received from JNCC (Ref: RR-026).
25 March 2020	Email	Applicant responses to RR and draft SoCG shared with JNCC.
26 March 2020	Teleconference	Discussions on RR and draft SoCG.
27 March – 06 April 2020	Emails	Communications on outstanding queries from JNCC RR.
22 April 2020	Email	Updated draft SoCG shared with JNCC for second review, along with minutes of teleconference (26 March 2020).
23 April 2020	Email	JNCC provide feedback on the draft SoCG and minutes and state that they have no further comments.

Date	Form of Contact	Summary
23 September 2020	Email	Updated draft SoCG shared with JNCC for review and proposed as final for matters within JNCC remit.
06 November 2020	Email	Feedback from JNCC on SoCG submitted at Deadline 1.

2.2. SUMMARY OF TOPICS COVERED BY THE SOCG

2.2.1.1. The following topics discussed between the parties are commented on further in this SoCG.

- Environmental Impact Assessment ('EIA');
- Habitats Regulations Assessment ('HRA');
- Marine Conservation Zones ('MCZs');
- Physical Processes including dredge and disposal activities;
- Marine Water and Sediment Quality;
- Intertidal and Benthic Habitats;
- Fish and Shellfish;
- Marine Mammals and Basking Sharks;
- Marine Ornithology;
- Marine Construction Environmental Management Plan; and
- Deemed Marine Licence ('DML').

2.2.1.2. For the avoidance of doubt, matters not covered in this SoCG have not been discussed between the parties and they have not been raised by NE or JNCC in their capacity as the Statutory Nature Conservation Bodies ('SNCBs') for projects in English waters out to 12 nmi (NE), and beyond 12 nmi out to the UK/France EEZ Boundary Line (JNCC). While JNCC reserve the right to review its advice should new information be forthcoming, based on the information provided to date JNCC has no further comment to make on matters within their remit. NE are not aware of any further discussions required, however, NE reserve the right to raise further issues should new evidence of information come to light that highlights further issues.

3. MATTERS WHICH ARE AGREED

3.1. INTRODUCTION

3.1.1.1. This section of the SoCG describes the 'matters agreed' between the parties.

3.1.1.2. The following subsections provide the details of the matters where agreement has been reached between the parties for each technical discipline.

3.1.1.3. Each table identifies those matters relevant to individual topics that have been agreed and by whom.

3.1.1.4. The Proposed Development has the potential to impact on the following areas which are relevant to NE and JNCC;

- physical processes. Chapter 6 (Physical Processes) of the Environmental Statement '(ES') (Ref: APP-121);
- marine water and sediment quality. Chapter 7 (Marine Water and Sediment Quality) of the ES (Ref: APP-122);
- intertidal and benthic habitats. Chapter 8 (Intertidal and Benthic Habitats) of the ES (Ref: APP-123);
- fish and shellfish. Chapter 9 (Fish and Shellfish) of the ES (Ref: APP-124);
- marine mammals and basking sharks. Chapter 10 (Marine Mammals and Basking Sharks) of the ES (Ref: APP-125); and
- marine ornithology. Chapter 11 (Marine Ornithology) of the ES (Ref: APP-126).

3.1.1.5. Tables 3.1 to 3.9 outline the areas of common ground that have been reached in relation to the approach to assessments and the findings of the chapters above as well as the;

- HRA Report (Ref: APP- 491); and
- MCZ Assessment (Ref: APP- 381).

3.2. BASIS OF AGREEMENTS

3.2.1.1. A teleconference was held on 13 February 2019 to introduce the approach to dredge and disposal activities to NE.

3.2.1.2. Another teleconference was held on 7 May 2019 with NE, JNCC, Cefas and the MMO to further discuss dredge and disposal activities as well as the proposed approach to sediment plume modelling.

3.2.1.3. A summary note outlining the approach to dredge and disposal activities was provided prior to the teleconference, as well as a technical note outlining the approach to sediment plume modelling. Minutes from these meetings can be found in Appendix 1 and 2 respectively.

3.2.1.4. In addition, subsequent to these meetings, NE requested sight of the plume dispersion modelling technical report prior to submission of the Application. A draft of the report was provided on 17 September 2019. NE also provided feedback on this report by email on 9 October 2019 prior to submission of the Application in November 2019 (see Appendix 3).

3.2.1.5. Following the receipt of NE's and JNCC's responses to the consultation on the PEIR, briefing notes were provided detailing the Applicant's response to the comments raised. These notes were issued as draft to NE and JNCC on 24 June 2019 and 2 August 2019 respectively.

3.2.1.6. A teleconference was then held with NE to discuss these responses in more detail and the briefing note was updated to reflect those discussions. NE and JNCC confirmed they were content with the responses provided by the Applicant in the briefing notes (see Appendices 4 and 5) by email on 19 July 2019 and 13 August 2019 respectively.

3.2.1.7. The teleconference held on 13 February 2019 with NE also discussed the initial approach to the HRA (Appendix 1).

3.2.1.8. A draft version of the HRA report was issued to NE and JNCC on 3 September 2019 to allow both parties to provide relevant feedback on the draft prior to submission of the Application. Feedback was received from NE and JNCC by email on 20 September 2019 and 28 September 2019 respectively. A teleconference was held with NE on 30 September 2019 to discuss their feedback in more detail prior to submission of the Application in November 2019. Feedback on the HRA was presented in Appendix 4 of the HRA Report (Ref: APP- 504).

3.2.1.9. A draft version of the MCZ Assessment was issued to NE and JNCC on 13 September 2019. Feedback was received by email from NE and JNCC on 8 October 2019 and 9 October 2019 respectively. Feedback on the MCZ Assessment was presented as Annex A of Appendix 8.5 of the ES (Ref: APP - 381).

3.2.1.10. A draft of the DML was issued to NE and JNCC on 1 July 2019 to enable both parties to review and provide any relevant feedback prior to the submission of the Application. Feedback was received from NE on 17 July 2019, with JNCC confirming that they had no specific feedback to provide on the DML on 24 July 2019.

3.2.1.11. A meeting was held with NE on 25 July 2019 to discuss their feedback on the DML in more detail.

3.2.1.12. The Relevant Representations (RRs) on the application from NE (Appendix 6) and JNCC (Appendix 7) were received on 19 February 2020.

3.2.1.13. Further engagement was undertaken with NE and JNCC through a teleconference held on 26 March 2020 to discuss the draft SoCG, response to the RRs and Examination process.

3.2.1.14. Subsequent emails were also exchanged with JNCC to close out a query relating to cumulative assessment within Chapter 11 Marine Ornithology of the ES (see Appendix 8). In addition, a Cable Protection Technical Note was produced and

shared with NE to address queries on the assessment and controls for deployment of cable protection during construction and operation of the Proposed Development (see Appendices 9 and 10).

3.2.1.15. The agreements made during the consultations above as well as in response to both RRs received and iterative reviews of the draft SoCG have all been used to populate the tables below and inform the drafting of this SoCG.

Table 3.1: Matters Agreed: Physical Processes

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.1.1	Existing Environment	The information provided within the ES adequately characterises the baseline in terms of Physical Processes (Ref: APP-121, Section 6.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7).	All parties are agreed.
NE/JNCC 3.1.2	Assessment Methodology	The list of potential physical process impacts assessed in the ES is appropriate (Ref: APP-121, Section 6.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7).	All parties are agreed.
NE/JNCC 3.1.3		The installation methods to be assessed are clearly set out in the ES (Refs: APP-118; APP-356; APP-121, Section 6.6.3).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7).	All parties are agreed.
NE/JNCC 3.1.4		The methodology used for the EIA provide an appropriate approach to assessing potential impacts of the Proposed Development (Ref: APP-121, Section 6.4). This includes: • Assessment which is based on expert judgement using knowledge of other sites and available project specific contextual information (e.g. particle size and core data); • The sediment plume modelling undertaken to characterise the extent, duration and concentrations of the plumes as a result of disposal activities (Ref: APP-368); and	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7).	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		• The approach to cumulative effects assessment which is based upon PINS Advice Note Seventeen.			
		The worst-case scenarios for impacts presented in the ES, are appropriate for the Proposed Development and clear rationale is provided as to why this is considered the worst-case (Ref: APP-121, Section 6.6.3, Table 6.15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.1.5	Assessment Conclusions	The assessment of impacts for construction, operation and decommissioning presented in the ES is appropriate and effects on Physical Processes as a result of the Proposed Development are considered to be not significant (Ref: APP-121, Section 6.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.1.6		The cumulative effects assessment is appropriate and cumulative effects on Physical Processes as a result of the Proposed Development are considered to be not significant (Refs: APP-121, Section 6.7; APP-370; APP-144 and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.1.7		Assessment of transboundary effects is considered to be appropriate for Physical Processes as a result of the Proposed Development and are considered to be not significant (Refs: APP-121, Section 6.7.3; APP-144).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.1.8	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		captured within the DML (Refs: APP-121, Section 6.8, APP-489; APP-019, Schedule 15).		February 2020 (Appendix 7; Paragraph 3.1).	
Dredge and Disposal Activities					
NE/JNCC 3.1.9	Methods	The approach used to define the disposal area (presented in ES Appendix 6.3.6.5) along the Marine Cable Corridor is appropriate (Ref: APP-371).	Agreed in teleconference held on 7 May 2019 (Appendix 2).	Agreed in teleconference held on 7 May 2019 (Appendix 2).	All parties are agreed.
NE/JNCC 3.1.10	Sediment plume modelling	The approach to plume dispersal modelling provided in the ES is appropriate and clearly demonstrates the spatial and temporal extent of the potential sediment plumes generated from disposal activities (Ref: APP-368).	Agreed in teleconference held on 7 May 2019 (Appendix 2) and in feedback provided by email dated 9 October 2019.	Agreed in teleconference held on 7 May 2019 (Appendix 2).	All parties are agreed.
Cable Protection during Construction and Operation (NE Matters)					
NE/JNCC 3.1.11	Cable Protection Part 2 (1)	The maximum footprint of 0.7 km^2 includes the cable protection required for construction for both cable pairs (including the Atlantic cable crossing and HDD exit pits) as well as the additional cable burial protection contingency that would be used during operation for maintenance and repair of both cable pairs. Further information has been shared with NE in the Cable Protection Technical Note (Appendix 9). The assessment of cable protection for deployment during construction and operation is considered appropriate and the controls secured through the DML are considered adequate.	Agreed as per Appendix 10. NE are content to support a longer term licence of 15 years, during operation for laying of additional cable protection in areas outside Marine Protected Areas ('MPAs').	N/A	NE and the Applicant are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
NE/JNCC 3.1.12	Schedule 1 Project description (Point 2 works 6 and 7)	It is considered that the full extent of effects associated with the full amount of cable protection and activities has been assessed within the ES, and the assessed effects of cable protection activities can be adequately controlled through area / footprint and profile above the seabed, without the need for volume to also be stated (which is considered to give rise to unintended and unnecessary restrictions).	NE are content with the reasoning of not wanting to provide units of volume. As a minimum however, details must be provided of the unit area. (as per Appendix 10).	N/A	NE and the Applicant are agreed.

Table 3.2: Matters Agreed: Marine Water and Sediment Quality

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.2.1	Existing Environment	The information provided within the ES adequately characterises the baseline in terms of Marine Water and Sediment Quality (Ref: APP-122).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.2	Assessment Methodology	The worst case scenarios for impacts presented in the ES, are appropriate for the Proposed Development and clear rationale is provided as to why this is considered the worst-case (Refs: APP-122, Section 7.6.1; APP-356).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.3		The list of potential impacts on Marine Water and Sediment Quality presented in the ES is appropriate (Refs: APP-122, Section 7.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.4		The installation methods to be assessed are clearly set out in the ES (Refs: APP-118; APP-356; APP-122, Section 7.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.5		The methodology used for the EIA represent an appropriate approach to assessing potential impacts of the Proposed Development on Marine Water and Sediment Quality (Ref: APP-122, Section 7.4). This includes: • An assessment based on expert judgement using knowledge of other sites and available project specific contextual information (e.g. particle size, sediment samples, sediment plume modelling and core data); and	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

		• The approach to cumulative effects assessment which is based upon PINS Advice Note Seventeen.			
NE/JNCC 3.2.6	Assessment Conclusions	The assessment of impacts for construction, operation (maintenance and repair) and decommissioning presented in the ES is appropriate and effects on Marine Water and Sediment Quality as a result of the Proposed Development are considered to be not significant (Ref: APP-122, Section 7.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.7		The cumulative effects assessment undertaken is appropriate and cumulative effects on Marine Water and Sediment Quality as a result of the Proposed Development are considered to be not significant (Ref: APP-122, Section 7.7; APP-375; APP-144 and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.8		Assessment of transboundary effects is considered to be appropriate and such effects on Marine Water and Sediment Quality as a result of the Proposed Development are considered to be not significant (Ref: APP-122, Section 7.7.3; APP-144).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.2.9	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately captured within the DML (Ref: APP-122, Section 7.8; APP-489; APP-019, Schedule 15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Table 3.3: Matters Agreed: Intertidal and Benthic Habitats

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.3.1	Existing Environment	Sufficient survey data (extent/duration) has been collected to inform the baseline and undertake the assessment (Ref: APP-377; APP-379). In addition to the survey data collected to inform the EIA, it is proposed that further investigation within the Marine Cable Corridor is undertaken during pre-installation survey works to determine the location, extent and composition of any biogenic or geogenic reef. This will inform any requirements to micro site cables around areas of reef habitat (Ref: APP-123, Section 8.8; APP-019, Schedule 15, Part 2, Condition 3(1)(a)(ii) and 4(1)(c)(viii))	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.2		The sources of information within the ES adequately characterises the baseline in terms of Intertidal and Benthic Habitats (Ref: APP-123, Section 8.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.3	Assessment Methodology	The use of the Chartered Institute of Ecology and Environmental Management ('CIEEM') guidelines to inform the assessment methodology is appropriate (Ref: APP-123, Section 8.4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.4		The list of potential impacts presented in the ES is appropriate (Ref: APP-123, Section 8.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.5		The worst case scenarios for impacts presented in the ES, are appropriate for the Proposed Development and clear rationale has been provided	Agreed in Relevant Representation dated 19 February	Agreed in Relevant Representation dated 19 February	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		as to why this is considered the worst-case (Ref: APP-123, Section 8.6.2, Table 8.6).	2020 (Appendix 6; Section 4.1).	2020 (Appendix 7; Paragraph 3.1).	
NE/JNCC 3.3.6		The installation methods to be assessed are clearly set out in the ES (Refs: APP-118; APP-356; APP-123, Section 8.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.7		The methodology used for the EIA represent an appropriate approach to assessing potential impacts of the Proposed Development on Intertidal and Benthic Habitats (Ref: APP-123, Section 8.4). This includes: • An assessment based on expert judgement using knowledge of other sites and available project specific survey data, modelling data and contextual information; and • An approach to the cumulative effects assessment which is based upon PINS Advice Note Seventeen.	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.8	Assessment Conclusions	The assessment of impacts for construction, operation (maintenance and repair) and decommissioning presented in the ES is appropriate and effects on Intertidal and Benthic Habitats as a result of the Proposed Development are considered to be not significant (Ref: APP-123, Section 8.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.9		The cumulative effects assessment undertaken is appropriate and cumulative effects on Intertidal and Benthic Habitats as a result of the Proposed Development are considered to be not significant (Refs: APP-123, Section 8.7; APP-380; APP-144; and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.3.10		Assessment of transboundary effects is considered to be appropriate and such effects on Intertidal and Benthic Habitats as a result of the Proposed	Agreed in Relevant Representation dated 19 February	Agreed in Relevant Representation dated 19 February	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		Development are considered to be not significant (Refs: APP-123, Section 8.7.3; APP-144).	2020 (Appendix 6; Section 4.1).	2020 (Appendix 7; Paragraph 3.1).	
NE/JNCC 3.3.11	Part 2 Conditions 3 and 4 Micro-siting	It is considered that there is adequate provision within the DML to identify and agree any micro-siting to avoid reef habitat. In accordance with Schedule 15, Part 2, Condition 3 (1)(ii) the pre-construction surveys must include surveys in relation to biogenic and geogenic reef habitat, and the details of those surveys are to be approved by the MMO prior to them being carried out (see Condition 3(2)). Condition 4 (1)(c)(viii) requires details of required micro-siting around reef habitats to be included in the cable burial and installation plan, which is to be submitted to and approved by the MMO before works to install the marine cable commence.	NE notes the referred to conditions and accepts that these address the issue raised. Agreed.	Agreed	All parties are agreed.
NE/JNCC 3.3.12	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately captured within the DML (Refs: APP-123, Section 8.8; APP-489; APP-019, Schedule 15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Table 3.4: Matters Agreed: Fish and Shellfish

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.4.1	Existing Environment	The information provided within the ES adequately characterises the Fish and Shellfish baseline (Ref: APP-124, Section 9.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Not within JNCC's remit.	NE and Applicant in agreement.
NE/JNCC 3.4.2	Assessment Methodology	The worst case scenarios for impacts presented in the ES, are appropriate for the Proposed Development and clear rationale is provided as to why this is considered the worst-case (Ref: APP-124, Section 9.6.3, Table 9.9).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.3		The use of the CIEEM guidelines to inform the assessment methodology is appropriate (Ref: APP-124, Section 9.4).	Agreed in PEIR response (see Appendix 5; Item 24) and in Relevant Representation (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.4		The list of potential impacts presented in the ES is appropriate (Ref: APP-124, Sections 9.3.6 and 9.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.5		The installation methods to be assessed are clearly set out in the ES (Refs: APP:118 APP-124, Section 9.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.6		The methodology used represents an appropriate approach to assessing potential impacts of the	Agreed in Relevant Representation dated 19 February 2020		NE and Applicant in agreement.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		Proposed Development on Fish and Shellfish Ref: APP-124, Section 9.4). This includes: • An assessment based on expert judgement using knowledge of other sites and available project specific survey data, modelling data and contextual information; and • An approach to the cumulative effects assessment that is based upon PINS Advice Note Seventeen.	(Appendix 6; Section 4.1).		
NE/JNCC 3.4.7	Assessment Conclusions	The assessment of impacts for construction, operation and decommissioning presented in the ES is appropriate and effects on Fish and Shellfish as a result of the Proposed Development are considered to be not significant (Ref: APP-124, Section 9.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.8		The cumulative effects assessment undertaken is appropriate and effects on Fish and Shellfish as a result of the Proposed Development are considered to be not significant (Refs: APP-124, Section 9.7; APP-383; APP-124 and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.9		Assessment of transboundary effects is considered to be appropriate and such effects on Fish and Shellfish as a result of the Proposed Development are considered to be not significant (Refs: APP-124, Section 9.7.5; APP-124).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.
NE/JNCC 3.4.10	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately captured within the DML (Refs: APP-124, Section 9.8; APP-489; APP-019, Schedule 15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement.

Table 3.5: Matters Agreed: Marine Mammals and Basking Sharks

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.5.1	Existing Environment	The information provided within the ES adequately characterises the baseline for assessment of the Proposed Development (Ref: APP-125, Section 10.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.2	Assessment Methodology	The worst case scenarios for impacts presented in the ES, are appropriate for the Proposed Development and clear rationale is provided as to why this is considered the worst-case (Ref: APP-125, Section 10.6.3).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.3		The use of the CIEEM guidelines to inform the assessment methodology is appropriate Ref: APP-125, Section 10.4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.4		The list of potential impacts presented in the ES is appropriate (Ref: APP-125, Section 10.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.5		The installation methods to be assessed are clearly set out in the ES (Refs: APP-118; APP-356; APP-125, Section 10.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.6		The methodology used represents an appropriate approach to assessing potential impacts of the Proposed Development on Marine Mammals and Basking Sharks (Ref: APP-125; Section 10.4). This includes:	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		• An assessment based on expert judgement using knowledge from other sites and project specific contextual information; and • An approach to cumulative effects assessment based upon PINS Advice Note Seventeen.			
NE/JNCC 3.5.7		Sufficient evidence within the PEIR and ES has been provided regarding why potential impacts such as vessel noise, collision risk with vessels, noise from construction works and EMF (during operation) have been scoped out of the assessment (Ref: APP-125; Paragraph 10.3.3.2).	Agreed in PEIR consultations (see Appendix 5; Item 30) and in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.8		A European Protected Species ('EPS') Risk Assessment will be undertaken to determine if an EPS licence will be required for elements of construction works. As a minimum, a voluntary notification for geophysical works will be completed and submitted to the MMO.	Agreed in PEIR consultations (see Appendix 5; Item 31).	Agreed. See Appendix 4; Item 14.	All parties are agreed.
NE/JNCC 3.5.9		A separate marine licence will be sought for UXO detonation activities. Further assessment and an updated cumulative assessment will be provided in the separate marine licence application when further details on the number of UXO present along the cable route are known (Ref: APP-125, Paragraphs 10.3.1.1 and 10.3.2.1).	Agreed. See Appendix 1; Item 6 and Appendix 5; Item 29.	Agreed. See Appendix 4; Item 14.	All parties are agreed.
NE/JNCC 3.5.10	Assessment Conclusions	The assessment of impacts for construction, operation (maintenance and repair) and decommissioning presented in the ES is appropriate and effects on Marine Mammals and Basking Sharks as a result of the Proposed Development are considered to be not significant (Ref: APP-125, Section 10.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
NE/JNCC 3.5.11		The cumulative effects assessment undertaken is appropriate and such effects on Marine Mammals and Basking Sharks as a result of the Proposed Development are considered to be not significant (Refs: APP-125, Section 10.7; APP-385; APP-124 and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.12		Assessment of transboundary effects is considered to be appropriate and such effects on Marine Mammals and Basking Sharks as a result of the Proposed Development are considered to be not significant (Refs: APP-125, Section 10.7.3; APP-144).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.5.13	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately captured within the DML (Refs: APP-125, Section 10.8; APP-489; APP-019, Schedule 15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Table 3.6: Matters Agreed: Marine Ornithology

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
EIA					
NE/JNCC 3.6.1	Existing Environment	The information provided within the ES adequately characterises the Marine Ornithology baseline for the Proposed Development (Ref: APP-126, Section 11.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.2	Assessment Methodology	The worst-case scenario set out in the ES is appropriate for the Proposed Development and clear rationale is provided as to why this is considered the worst-case (Ref: APP-126, Section 11.6.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.3		The use of the CIEEM guidelines to inform the assessment methodology is appropriate (Ref: APP-126, Section 11.4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.4		The list of potential impacts presented in the ES is appropriate (Ref: APP-126, Section 11.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.5		The methodology used represents an appropriate approach to assessing potential impacts of the Proposed Development on Marine Ornithology (Ref: APP-126, Section 11.4). This includes: • An assessment based on expert judgement using knowledge from other sites and project specific contextual information; and • An approach to cumulative effects assessment based upon PINS Advice Note Seventeen.	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
NE/JNCC 3.6.6		The methodology used to identify important ornithological features ('IOFs') and to assess possible impacts on these features is appropriate (Ref: APP-126, Section 11.4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.7	Assessment Conclusions	The assessment of impacts for construction, operation (maintenance and repair) and decommissioning presented in the ES is appropriate and effects on Marine Ornithology as a result of the Proposed Development are considered to be not significant (Ref: APP-126, Section 11.6).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.8		The cumulative effects assessment undertaken is appropriate and cumulative effects on Marine Ornithology as a result of the Proposed Development are considered to be not significant (Refs: APP-126, Section 11.7; APP-387; APP-144and APP-486).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1 and Appendix 8).	All parties are agreed.
NE/JNCC 3.6.9		Assessment of transboundary effects is considered to be appropriate and such effects on Marine Mammals and Basking Sharks as a result of the Proposed Development are considered to be not significant (Refs: APP-126, Section 11.7.3; APP-144).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.
NE/JNCC 3.6.10	Mitigation	It is agreed that given the effects of the Proposed Development, the mitigation measures proposed are considered appropriate and are adequately captured within the DML (Refs: APP-126, Section 11.8; APP-489; APP-019, Schedule 15).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.1).	All parties are agreed.

Table 3.7: Matters Agreed: Habitat Regulations Assessment

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
HRA					
NE/JNCC 3.7.1	Existing environment	The information used to inform the environmental baseline is appropriate (Ref: APP-491, Section 4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	JNCC agreed with screening out of the Wight-Barfleur Reef SAC and Bassurelle Sandbank SAC due to lack of connectivity. See Table 2 of Appendix 3 of the HRA Report (document reference 6.8.3.4).	All parties are agreed.
NE/JNCC 3.7.2	Pre-screening	The methods used to identify potential connectivity between the Proposed Development and designated sites are appropriate (Refs: APP-491, Section 6.2; APP-502).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		All parties are agreed.
NE/JNCC 3.7.3		The conclusions of the site-based pre-screening assessments for designated sites are appropriate (Refs: APP-491, Section 6.2; APP-501;APP-502)	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		All parties are agreed.
NE/JNCC 3.7.4	Determination of Likely Significant Effect ('LSE')	The conclusions of the assessment for LSE are considered to be appropriate (Ref: APP-491, Section 7 and 9; APP-501).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	N/A – none of the sites assessed fall within JNCC jurisdiction.	NE and Applicant in agreement
NE/JNCC 3.7.5	In combination	The projects listed and the approach used to assess for in-combination effects is appropriate (Refs: APP-491, Section 8.2; APP-500;APP-503).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement
NE/JNCC 3.7.6		The conclusions of the in-combination assessment are appropriate (Refs: APP-491, Sections 8.2 and 9; APP-501;APP-503).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
NE/JNCC 3.7.7	Mitigation	The approach to the consideration of mitigation in the HRA is appropriate (Ref: APP-491, Section 10.2.5).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement
NE/JNCC 3.7.8	Appropriate Assessment	The conclusion of the assessment of potential adverse effect on site integrity of designated sites is appropriate (Ref: APP-491, Section 10; APP-501;). The assessment concludes that no adverse effect on site integrity will result for any designated sites from the Proposed Development either alone or in combination with other plans and projects on the following sites: • Chichester and Langstone Harbour SPA (for tern *sp*. and red breasted merganser features); • Portsmouth SPA (red breasted merganser feature); • Solent Maritime SAC; • South Wight Maritime SAC; • Solent and Isle of Wight Lagoons SAC; • Wight-Barfleur Reef SAC • Studland to Portland SAC; • River Itchen SAC; • River Avon SAC;	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).		NE and Applicant in agreement

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		• Solent and Dorset Coast SPA; • Solent and Southampton Water SPA and Ramsar site; • Pagham Harbour SPA and Ramsar site; • Alderney West Coast and Burhou Islands Ramsar site; and • Plymouth Sound and Estuaries SAC			
NE/JNCC 3.7.9	Langstone Harbour Site of Special Scientific Interest ('SSSI')	Chapter 11 of the ES also includes consideration of red breasted merganser as a notified feature of the Langstone Harbour SSSI which was identified as having connectivity with the Proposed Development. Langstone Harbour SSSI fits within the footprint of the Chichester and Langstone Harbour SPA and red breasted merganser was taken through as a qualifying feature of the SPA (underpinned by the SSSI). It was concluded that there would be no significant effects on this feature resulting from the Proposed Development alone or with other relevant projects or plans.	NE agree that they are satisfied with the assessments undertaken and the conclusions made.		NE and the Applicant are agreed.

Table 3.8: Matters Agreed: Marine Conservation Zone Assessment

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
MCZ Assessment					
NE/JNCC 3.8.1	Existing environment	The information used to inform the environmental baseline for the assessment is appropriate. (Ref: APP-381, Paragraph 1.1.13)	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.2).	All parties are agreed.
NE/JNCC 3.8.2	Screening – Assessment of connectivity	The MCZs included for consideration within the assessment are appropriate (Ref: APP-381, Section 2.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.2).	All parties are agreed.
NE/JNCC 3.8.3		The approach to only assess indirect effects as no MCZs overlap the cable corridor is considered to be appropriate (Ref: APP-381, Section 2.2).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.2).	All parties are agreed.
NE/JNCC 3.8.4		The approach to screen out potential significant effects from deposition due to negligible and transient deposits predicted outside of the Marine Cable Corridor is appropriate (Ref: APP-381, Sections 2.3 and 2.4).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.2).	All parties are agreed.
NE/JNCC 3.8.5	Screening – Potential for significant effects	The potential effects as a result of the Proposed Development included in the assessment are appropriate (Ref: APP-381, Section 3).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 6; Section 4.1).	Agreed in Relevant Representation dated 19 February 2020 (Appendix 7; Paragraph 3.2).	All parties are agreed.
NE/JNCC 3.8.6		The conclusion of the MCZ assessment is that the Proposed Development will not result in any significant effects on the following MCZs:	Agreed in Relevant Representation dated 19 February 2020	Agreed for Offshore Overfalls and Offshore Brighton MCZs in Relevant Representation	All parties are agreed.

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
		• Offshore Overalls; • Utopia; • Bembridge; • Selsey Bill and the Hounds; • Offshore Brighton. This includes any supporting ecological or geomorphological processes on which the conservation of any protected feature of an MCZ is (wholly or in part) dependent (Ref: APP-381, Section 4).	(Appendix 6; Section 4.1).	dated 19 February 2020 (Appendix 7; Paragraph 3.2).	

Table 3.9: Matters Agreed: Draft Development Consent Order and Deemed Marine Licence

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
DCO and DML					
NE/JNCC 3.9.1	Definitions	1. A definition of Statutory Nature Conservation Body is included in the definitions for the DML contained at Part 1 of Schedule 15. The Applicant has reviewed the main DCO definitions, however as that term is only used in the DML it is not necessary to include that definition in the definitions provided at Article 2 to the DCO.	1. No definition is provided for 'SNCB's. NE awaits the applicant's updated position.	N/A	NE and the Applicant are agreed.

4. MATTERS UNDER DISCUSSION

4.1.1.1. This section of the SoCG describes the 'matters under discussion' in detail between the parties.

4.1.1.2. Table 4.1 provides the details of matters still under discussion between the parties for the different topics.

Table 4.1: Matters Under Discussion: Draft DCO including DML

Ref	Description of Matter	AQUIND's Position	NE's Position	JNCC's Position	Final Position
Development Consent Order (DCO)					
NE/JNCC 4.1.1	Arbitration	The Applicant will undertake further engagement with the MMO on this matter during Examination.	NE supports the MMO position on arbitration. Please see the written representations on Hornsea 3, Vanguard and Thanet Extension PINS applications. NE note that in the Tilbury 2 determination the SoS agreed to the changes recommended by the ExA to remove the DML from such provisions. NE notes the updated position and the submission of an appeals procedure. This approach was proposed for Vanguard and the MMO did not accept the proposal. NE supports the MMO position with regard to appeals. Natural England refers to the recent Vanguard OWF NSIP determination by the SoS where both the arbitration and appeals process, similar to the Applicant's proposals, were removed by the SoS.	N/A	
Deemed Marine Licence					
NE/JNCC 4.1.2	Part 3	The Applicant will undertake further engagement with the MMO on this matter during Examination.	NE supports the MMO position regarding appeals. NE has no comments to raise at this point with regard to the draft proposed text. NE notes that the Vanguard OWF NSIP project determination by the SoS on 1 July removed similar appeals protocols.	N/A	

5. SIGNATURES

Signed on behalf of Natural England:

Printed name:

Position:

Date:

Signed on behalf of Joint Nature Conservation Committee:

Printed name:

Position:

Date:

Signed on behalf of AQUIND Ltd:

Printed name:

Position:

Date

APPENDIX 1

MEETING MINUTES 13 FEBRUARY 2019

Natural Power Meeting Minutes			
To	AQUIND Ltd; WSP; HSF; NE	Date	13/02/2019
From	Natural Power	Ref.	1190401

Meeting Minutes

Meeting held via teleconference
Date: 13/02/2019; **Time:** 09:30 – 11:45 hrs
Attendees: [redacted]: Natural England [NE]); [redacted] NE); [redacted]:NE); [redacted]: Natural Power [NP]); [redacted]: NP); [redacted]: NP); [redacted]: NP); [redacted]: NP); [redacted]: NP); [redacted]: WSP)

1. [redacted] provided an update on the AQUIND Interconnector (the Proposed Development) and key milestones.

DEPOSIT OF DREDGED MATERIAL

2. [redacted] explained approach to seabed preparation incl. dredging and disposal of dredged material. [redacted] stated that current NE advice in relation to recent offshore wind NSIPs is for disposal of material to occur in areas of similar sediment types e.g. similar grain size. [redacted] has been/is working on Hornsea 3/Thanet Extension and advises that the more refined the disposal areas can be the better. Thanet assessed the whole cable corridor as a disposal site and this made it very difficult for NE to provide advice. [redacted] advised that [redacted] look at the documentation and licence conditions for these projects which may help in refining disposal locations as far as possible.
3. [redacted] explained that a constraints mapping exercise is ongoing to identify areas for disposal within the marine cable corridor. [redacted] (and WSP) will seek NE's advice on the outputs of the exercise and the approach take to identify disposal location/s. It would also be useful if NE could advise on which designated sites they would like to see modelling outputs for. Current turnaround time for NE consulting on documentation is 15 working days. It is best to provide notice to NE that documentation will be forthcoming for their review to allow allocation of internal resource.

DCO PROCESS

4. [redacted] stated that after submission of the application, NE do not attend NSIP hearings any longer and only engage in the examination process via written representation.
5. [redacted] requested that anything that can streamline the pre- and post-application process would be appreciated. [redacted] advised that it is currently intended that outline Statements of Common Ground (SoCG) would be drafted prior to submission of the application for updating and finalising during examination.
6. The group discussed how UXO clearance will be dealt with in the application. [redacted] and [redacted] advised that UXO clearance activities will be covered separately under a standalone marine licence. This is due to the timescales of the application and the consequent lack of information to robustly inform any assessments of this activity prior to the DCO application. NE advised that although this is not ideal, they understand this rationale and approach and [redacted], who has worked on a number of UXO clearance works within the Channel, does not think that this would be a showstopper.

APPROACH TO HABITAT REGULATIONS ASSESSMENT (HRA)

7. [redacted] explained that [redacted] do not consider that full evidence plans will be required for HRA due to the nature and scale of this project. However, [redacted] will look to consult closely with NE and other relevant consultees (Environment Agency [EA], Joint Nature Conservation Committee [JNCC]) over the coming months to seek agreements in relation to the HRA.
8. NE advised that they are responsible for advice on Natura and MCZ sites within the 12 nautical mile (nm) limit. JNCC are responsible for advice on Natura and MCZ sites beyond 12 nm limit (out to the EEZ boundary line) and where a site straddles the 12 nm limit, NE and JNCC work together. NE advised that EA should be consulted in relation to migratory fish.
9. NE stated that they would be happy to review draft HRA and MCZ assessment documentation. They currently have a turnaround of 15 working days which can be reduced in some cases.

HRA ADVICE PACKAGES AND METHOD OF ASSESSMENT

10. [redacted] advised that we are in the process of producing a list of references including advice packages that will be used for each site to be assessed.

NP to provide a list of references and conservation advice packages to be used for each site to NE to seek advice and agreement.

11. [redacted] walked the group through the use of the online interactive NE advice packages including the use of the advice on operations to inform HRA.

12. It was agreed that in undertaking the assessment of Likely Significant Effect (LSE), [redacted] should not only screen in the 'pink' medium/high risk pressures but also look through the low risk pressures and include those that are relevant. If low risk pressures are screened out, then evidence should be provided for this with clear rationale.

13. It was also agreed that qualifying features and habitats that are Sensitive (S) or have Insufficient Evidence (IE) need to be considered. If a site has a feature that is Not Sensitive (NS) to any of the medium/high risk pressures then it was agreed that this did not require assessment.

14. [redacted] explained that the Supplementary Advice within the advice packages is to be used to inform any Appropriate Assessment (AA) and is not required where no LSE is concluded. NE agreed with this.

HRA AND IN-COMBINATION AASSESSMENT

15. The HRA will be informed by the in-combination assessment undertaken for the EIA. [redacted] are currently considering using three tiers to identify projects/plans for the assessment however this is to be confirmed.

[redacted] advised that offshore wind schemes use six tiers, and although NE recognize that the potential impacts of a cabling projects are likely to be less than a wind farm, [redacted] need to demonstrate why reducing the number of tiers is appropriate.

16. [redacted] explained that current understanding is that in-combination assessment will not be undertaken for sites that have no connectivity to the Proposed Development - these sites will be pre-screened out. In-combination assessment is not required at LSE stage where LSE has been concluded for the Proposed Development alone and those sites are taken forward to AA (where further assessment will be undertaken). In-combination assessment will be undertaken at LSE stage where no LSE has been concluded for the Proposed Development alone, but the potential for in-combination impacts from other projects/plans may lead to LSE. NE agreed.

MITIGATION AND HRA CASE LAW

17. The group had a discussion on where embedded mitigation becomes 'additional mitigation' which could not be considered in LSE. AF advised that there is some DEFRA guidance due to be published on this, she will find out more on this.

AF to advise on when this DEFRA guidance will be available.

18. It is clear that mitigation cannot be considered at the LSE stage to inform a conclusion and instead those sites and impacts should be carried forward to [redacted]. NE advised that if in doubt, screen the mitigation in and carry it forward - the [redacted] does not have to be too onerous. As an example, if a timing restriction has been placed on works due to intertidal birds, NE would likely view this as mitigation and would it be screened in and pushed forward to [redacted]. The [redacted] could simply state however that as mitigation measures are in place, no adverse effects on site integrity are expected.

19. It was agreed between NE and [redacted] that this matter would be kept under review and NP would continue to consult with NE to ensure that mitigation measures and how they are dealt with in the HRA are agreed upon.

TRANSBOUNDARY IMPACTS

20. [redacted] advised that NE do not provide advice on non-UK sites.

[redacted] to provide links to PINS website where NE has responded to examiners questions on transboundary impacts and information relating to French and Alderney authority advice on Thanet Ext. [*Post meeting note: action closed as [redacted] already emailed information*].

MARINE MAMMALS

21. The group viewed a short document previously prepared by [redacted]. [redacted] explained to NE that she proposed to assess the potential for connectivity between the Proposed Development and UK SACs for which marine mammals are a primary reason for site selection on the basis of whether the Proposed Development fell within the likely foraging range of seals/population range of cetaceans using these SACs. NE agreed with this in principle, however NE would appreciate further information on how population range is being defined.

22. [redacted] has considered the following sites;

- Grey seal – Pembrokeshire Marine (approx. 550 km from the Proposed Development)
- Harbour seal – The Wash and North Norfolk Coast (approx. 450 km from the Proposed Development)
- Bottlenose dolphin – Cardigan Bay (approx. 600 km from the Proposed Development)
- Harbour porpoise – Southern North Sea (approx. 400 km from the Proposed Development)

[redacted] proposed that none of these UK marine mammal SACs are deemed to be close enough to the Proposed Development for there to be potential for connectivity. NE agreed in principle however, they would appreciate a short document explaining how this conclusion has been reached and the evidence base employed.

[redacted] (NE marine mammal specialist) to provide a copy of the Southern North Sea advice package, if/when it is available (currently only the draft is available).

[redacted] to review the information in relation to the Southern North Sea SAC and Cardigan Bay SAC and produce document to send to [redacted] via [redacted] for consultation.

MARINE ORNITHOLOGY

23. The group viewed an Excel spreadsheet previously prepared by EN. EN explained the rationale behind the pre-screening exercise she has undertaken for marine birds i.e. use of max foraging range (does not include intertidal or terrestrial birds which will be covered by WSP through close liaison with IE). It was agreed that the sites and species highlighted blue in **Table 1** would be taken forward for assessing LSE.
24. [redacted] presented the pressures that would be assessed from the advice on operations for these sites – see **Table 2**. NE advised that assessment should also should include Insufficient Evidence (IE) pressures and should also look at pressures in Water Column in Supporting Habitat for completeness.
25. [redacted] presented the NE conservation advice packages available for the four SPAs taken forward for LSE assessment:
    - Natural England Conservation Advice: Chichester and Langstone Harbours SPA
    - Natural England Conservation Advice: Portsmouth Harbour SPA
    - Natural England Conservation Advice Package: Solent and Southampton Water SPA
    - Natural England Conservation Advice Package: Pagham Harbour SPA

    The advice package that will be used for the pSPA is the Natural England Solent and Dorset Coast pSPA Departmental Brief. NE agreed that these documents were appropriate for the HRA for marine ornithology. NE also advised that conservation advice available for tern species within the existing SPAs could be used to inform assessment of the pSPA.

Table 1: Marine ornithology pre-screening

Designated Site	Distance from Proposed Development (km)	Species	Max Foraging Range (km)	Proposed Development with Max Foraging Range?
Solent and Dorset Coast pSPA	0	Little tern	11	Yes
		Common tern	30	Yes
		Sandwich tern	54	Yes
Chichester and Langstone Harbours	0.1	Little tern	11	Yes
		Common tern	30	Yes
		Sandwich tern	54	Yes
		Red-breasted merganser	NA (W)	Yes
Portsmouth Harbour	4.9	Red-breasted merganser	NA (W)	Yes
Solent and Southampton Water	6.6	Little tern	11	Yes
		Sandwich tern	54	Yes
		Common tern	30	Yes
		Roseate tern	30	Yes
		Mediterranean gull	20	Yes
Pagham Harbour	9.5	Little tern	11	Yes
		Common tern	30	Yes
Poole Harbour	63.0	Common tern	30	No
		Sandwich tern	54	No
		Mediterranean gull	20	No
Dungeness, Romney Marsh and Rye Bay	76.6	Little tern	11	No
		Sandwich tern	54	No
		Common tern	30	No
		Mediterranean gull	20	No

Table 2: Marine ornithology LSE assessment (pressures)

Species	Operations	Medium-High Risk Pressure (S)	Low Risk Pressure (S)
Little tern Common tern Sandwich tern Roseate tern	Power cable: laying, burial and protection Power cable: operation and maintenance	Changes in suspended solids (water clarity)	Above water noise Collision above water with static or moving objects Collision below water with static of moving objects Introduction or spread of invasive non-indigenous species
Red-breasted merganser	Power cable: laying, burial and protection Power cable: operation and maintenance	Changes in suspended solids (water clarity)	Above water noise Collision above water with static or moving objects Collision below water with static of moving objects Introduction of light Litter Underwater noise changes Visual disturbance
Mediterranean gull	Power cable: laying, burial and protection Power cable: operation and maintenance	NA	Above water noise Collision above water with static or moving objects Collision below water with static of moving objects Introduction or spread of invasive non-indigenous species Litter Visual disturbance

MIGRATORY FISH

26. [redacted] proposed three sites for pre-screening;

- River Itchen
- River Avon
- Plymouth Sound and Estuaries

[redacted] proposed that the Plymouth Sound and Estuaries is too far away (c. 229 km) for there to be connectivity to the Proposed Development. NE agreed.

27. [redacted] and [redacted] discussed the potential connectivity of the rivers Avon and Itchen and also how the plume modelling outputs will be required for certainty. It was agreed that [redacted] should consult with the EA to seek their advice on both sites as they are more knowledgeable of the inshore areas and potential migratory routes. RM suggested that offshore, there is likely limited interaction for fish using the Itchen or the Avon and he will investigate offshore migratory routes in this area further. The approach might be best to include both sites at LSE stage and then conclude no LSE.

28. [redacted] asked whether [redacted] had considered seatrout. [redacted] responded that seatrout are not included in the HRA as they are not features of any sites but they have been considered as part of the EIA process.

BENTHIC HABITATS

29. [redacted] proposed three sites for pre-screening;

- Solent Maritime
- South Wight Maritime
- Solent and Isle of Wight Lagoons

[redacted] proposed that Solent and Isle of Wight Lagoons site is unlikely to have connectivity due to isolation of lagoons from main water body, plus distance from site . NE agreed. The remaining two sites will be carried forward to LSE assessment.

30. Pre-screening still continuing as assessment is heavily reliant on the plume modelling and also needs to consider the excavation works at the HDD exit/entry location which is, in the worst-case *c.* 250 m from the Solent Maritime SAC.

MCZ ASSESSMENT

31 [redacted] proposed that MCZs and pMCZs within c. 10 km of the Proposed Development should be included in assessment;

- Offshore Overfalls MCZ (1 km)
- Utopia MCZ (1 km)
- Offshore Brighton MCZ (9 km)
- Pagham Harbour MCZ (10 km)
- Kingmere MCZ (11 km)
- Bembridge pMCZ (4 km)
- Selsey Bill and the Hounds pMCZ (4 km)

32. [redacted] and [redacted] agreed that this was a sensible approach for pre-screening. [redacted] also advised that the dropped MCZs (Norris to Ryde and Fareham Creek) do not need to be included in the assessment. Later this year in June, an announcement is expected as to which of the pMCZs will be fully designated.
33. RM enquired whether Native Oysters have been given consideration and both [redacted] and [redacted] acknowledged that they have been considered as NERC species within the EIA.
34. In relation to MCZ feature sensitivity, it was agreed between NE and [redacted] that no direct impacts are considered (as there is no overlap between the Proposed Development and MCZs) and indirect impacts would relate to increased SSC. No sensitivity is predicted for sedimentary features however AF advised that it would be prudent to look at sensitivity of sedimentary features of the two closest MCZs (i.e. Offshore Overfalls and Utopia) as part of the screening process.

AOB

35. Flotation pits. [redacted] explained that the PEIR makes reference to the potential use of flotation pits during construction of the Proposed Development. While it is looking less likely that flotation pits will be included in the DCO application, [redacted] are interested in NE's views on this and their experience of working on Rampion. AF advised that Rampion flotation pits was a challenging application and she is surprised that we were considering using this method given that the area is mainly sediment. NE consider this as a large-scale damaging activity that should be avoided where possible. [redacted] advised that if WSP were to include this method within the construction, her preference would be to include the assessment within DCO application rather than as a separate standalone marine licence, so it has scrutiny through the DCO process along with the wider project. [redacted] advised that WSP still has this under review and is investigating this further.

APPENDIX 2

MEETING MINUTES 07 MAY 2019

Natural Power Meeting Minutes			
To	MMO, NE, JNCC, NP and Partrac	Date	07/05/2019
From	Natural Power	Ref.	1197264

Meeting Minutes

Meeting held at: Teleconference
Date: 07/05/2019
Time: 09:30 – 11:00 hrs
Attendees:
[redacted] (MMO)
[redacted] (MMO)
[redacted] (Cefas)
[redacted] (Cefas)
[redacted] (NE)
[redacted] (NE)
[redacted] (JNCC)
[redacted] (JNCC
[redacted] (Natural Power)
[redacted] (Natural Power)
[redacted] (Partrac)
[redacted] (Partrac)

1. Natural Power (NP) identified that two consultation documents relating to dredge and disposal works for the AQUIND Interconnector have already been distributed to consultees.
   - A seabed preparation and deposit of dredged material summary note; and
   - A disposal modelling technical note.
2. Natural Power provided an overview of the summary note and opened up the call for queries from consultees. It is acknowledged that JNCC did not have as much time to digest the consultation documentation as other consultees and NP are grateful for their input.

Seabed Preparation and Deposit of Dredged Material Summary Note

3. Cefas identified that beneficial re-use of dredged material for beach replenishment or for use as backfill may need to be considered as part of the site characterisation report. OSPAR regulations advise that characterization is required for beneficial re-use and beneficial re-use needs to be registered. Beneficial re-use of material also needs some form of abbreviated site characterisation as part of the main disposal site characterisation document.

Cefas to provide advice on for example, the HDD works at between KP1 and KP1.6, whether the excavated material created at this location and to be used as backfill, would this be considered as beneficial re-use subject to further characterization or considered simply as re-use of a material for construction purposes.

4. When asked whether NP had liaised with NE or the Environment Agency (EA) on beach replenishment, NP advised that they had not. Beach replenishment still needs to be confirmed with WSP Engineering who are designing the scheme. However, the feasibility of potential use of dredged material for beneficial use such as beach recharge is unlikely to be determined until post consent. It is envisaged that if this does occur, dredged material from anywhere along the Marine Cable Corridor may be used for this purpose.
5. Cefas advised that they were generally happy with the approach taken for constraints mapping and how the disposal area has been defined. They welcome the production of post-consent method statement to further refine the dredge and disposal works and would recommend that this includes production of post-disposal works report which would compare the disposal works actually undertaken with the works that are outlined in the method statement. In Cefas's advice, they will also provide a link to the latest OSPAR guidance on site characterisation and another link to the Hornsea 3 Offshore Wind Farm characterisation report.
6. The MMO advised that in terms of seabed preparation, the first three activities listed within the summary note (namely, pre-lay grapnel run, boulder removal and use of MFE) would all be considered as part of cable laying activities (not disposal activities) which is licensable within 12 nautical miles and would not require a marine licence beyond 12 nautical miles. The use of a Trailing Suction Hopper Dredger and disposal activities would be licensable activities and therefore would also be licensable within 12 nautical miles.
7. A discussion was held between Cefas and MMO in relation to sampling of dredged material for contaminants along the Marine Cable Corridor. Cefas advised that they are content with the level of sampling undertaken to date and that the

final reporting should highlight the name of the laboratory used for analysis up front to close out any queries being raised as to whether the analysis was undertaken correctly or not. Cefas advised that they do not feel that any further sampling is required at areas where dredging is to occur as the PSD data collected will show within the characterisation report that these areas possess coarse/sandy material that is not consistent with accumulation of contaminants. This only applies however if the surface samples collected are deemed representative of the material to be dredged. The dredge depth (i.e. depth of sediment removal) has not been specifically stated, however in table 2 of the summary note, sandwave heights are quoted up to 15m. Typically surface samples are acceptable to characterise up to 1 m of dredge depth, with core samples required for deeper dredges. The applicant should confirm the dredging depth and present justification that the samples are representative of the horizontal and vertical area.

8. The MMO queried whether the existing benthic samples taken are representative of the depths that the trenches will be given that some of the sandwaves within Table 2 of the summary note are listed as up to 15 m high.
9. NE advised that they were generally content with the approach taken to define the disposal area along the Marine Cable Corridor. NE welcome the commitment to production of a post-consent method statement for dredge and disposal. NE also highlighted that in the assessments it is important to ensure that the worst-case scenarios are captured adequately in relation to designated sites and not only to assessing robustly the potential impacts for disposal but also dredging activity itself.
10. NE main advice is that they request that
    - deposition of dredged material occurs as close to the area of dredging as practicable; and
    - ideally deposition should be upstream of extraction to enable quickest recovery; and
    - deposition of dredged material occurs on seabed that possess a similar grain particle size composition.
11. JNCC echoed the main advice from NE stated in item 10 of this meeting note. JNCC also queried how deep the trenches will be dug through the sandwaves and advised that if a fall pipe is to be used on the TSHD, then the dredging activity may take a long time. JNCC also advised that they recommend the use of a fall pipe for disposal activities and that they also prefer the use of backfill techniques rather than rock protection where practicable.

NP advised that they will query this with WSP engineers as to what depth they expect to reach within the sandwave areas and look to providing further clarification within the application documentation on these methods. The Cable Burial Risk Assessment (CBRA) is still ongoing but it is anticipated that the outputs from this reporting will highlight the approach to be taken in relation to seabed preparation and burial within these bedforms. The data collected from the vibrocores should also inform whether the sediment composition is uniform throughout the bedforms or whether it changes.

Disposal Modelling Technical Note

12. Partrac provide an overview of the approach taken to modelling for disposal activities.
13. It was highlighted that the model locations shown on Figure 1 illustrate what Partrac consider to be the most realistic worst-case approach to disposal activities for the indicative maximum dredge volume, calculated by Partrac in liaison with WSP engineers. The multiple modelling locations reflect the distribution of the maximum dredge volume in areas closer to shore (worst case), close to dredging areas as considered practicable without creating depositions of material that would also reduce the navigable depths of water by 5%.
14. The group recognized the flexibility required for disposal given the mobile nature of bedforms and this approach is only proposed for assessment purposes of the potential impacts of any sediment plume on receptors and not as a definitive condition within a licence. It is anticipated that the deemed marine licence would identify a maximum dredge volume within the disposal area and any further refinements on disposal activities and volumes (as long as worst-case scenario has adequately covered everything) would be secured through licence conditions and the post consent dredge and disposal method statement.
15. Clarification was requested from Partrac on whether the maximum deposition of material at any modelling location, at any time during the model run, for each scenario would be illustrated in the modelling report and Partrac confirmed that this was the case. Partrac also clarified that each scenario would use the hydraulic characteristics (i.e. settling velocity and critical erosion threshold) associated with the median grain size of the three grain size classes proposed within the technical note.
16. NE and JNCC stated that they were content with the designated sites proposed within Figure 1 of the technical note as those sites that will have modelling data outputs presented within the final modelling report.
17. NE requested the distances between the modelling locations and the closest designated site.
    NP to provide distances to designated sites to NE and JNCC.
18. The group agreed that the general consensus to the approach to modelling proposed within the technical note is fit for purpose and Partrac will run the modelling subject to updated information from WSP engineering in relation to refined dredge volumes and agreement of these minutes by all meeting attendees.
19. Timescales for providing formal written advice were agreed as following;
    - The MMO will receive advice from Cefas beginning of next week (w/c 13th May) and will provide their advice as soon as possible thereafter.
    - NE will liaise with Richard Morgan and advise on timescales as soon as possible.

- JNCC will provide advice some time prior to COP on the 14th May.

NP advised that Partrac are planning to begin the modelling w/c 20th May as this is a time critical component to the current submission deadline of the DCO application. Therefore, any advice received earlier to the timescales noted above would be gratefully received.

APPENDIX 3

NE FEEDBACK ON SEDIMENT PLUME MOELLING

Sarah Lister

From: Morgan, Richard <Richard.Morgan@naturalengland.org.uk>
Sent: 09 October 2019 10:08
To: Sarah Lister; Ross Hodson
Cc: Fawcett, Alex; Ziauddin, Zara
Subject: RE: AQUIND draft HRA Report_Email 1 of 3

Categories: Do not Delete

Dear Sarah,

As previously agreed, we've taken a look at the draft modelling appendix - specifically with regard to the plume dispersion modelling presented in Section 4. I also sought input from Nick Williams - one of our senior specialists with experience in this area. In short, we're content with the modelling approach taken and the resultant outputs with respect to predicted sedimentation and SSC levels, spatial extent and duration. We don't have any further specific comments to add at this stage.

We note that the outputs of this plume dispersion modelling have been used to inform the draft HRA and MCZ assessment reports, so please refer to our respective letters of 20th September and 9th October 2019 for Natural England's advice on the assessment of potential impacts.

Please let me know if you have any further queries.

Kind regards,

Richard

Dr Richard Morgan
Marine Lead Adviser
Hampshire Coast & Isle of Wight Team

Natural England
Sterling House
Dix's Field
Exeter EX1 1QA
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www.naturalengland.org.uk

From: Sarah Lister [mailto:sarahl@naturalpower.com]
Sent: 17 September 2019 08:56
To: Morgan, Richard <Richard.Morgan@naturalengland.org.uk>; Ross Hodson <rossho@naturalpower.com>
Cc: Ziauddin, Zara <Zara.Ziauddin@naturalengland.org.uk>
Subject: RE: AQUIND draft HRA Report_Email 1 of 3
Importance: High

APPENDIX 4

JNCC BRIEFING NOTE

Natural Power Memorandum			
To	JNCC	Date	August 2019
From	Natural Power	Ref.	1199521

Brefing Note for Ongoing Consultation: Responses to PEIR Feedback

The following table provides a summary of key items contained within feedback on PEIR, gratefully received from the Joint Nature Conservation Committee (JNCC).

This briefing note is structured in order to provide information to reviewers as to how the applicant proposes to address the comments received as part of the s.42 consultation process.

Item	Topic	*Comment*	Applicant's Response
1	**Intertidal and Benthic Ecology**	JNCC is of the opinion that insufficient survey evidence was presented in the application to allow the best provision of accurate and meaningful advice. While we recognise that it is unlikely that survey-based data can be expanded upon for this application, we provide the following to help BEIS and the operator understand what we consider necessary in an application. It is good practice to include high resolution acoustic data, video and / or still images in the context of the proposed activity. • Survey sample 22 was collected outside the marine cable corridor, therefore it is unclear whether there is the potential for Annex I stony reefs to be present within the marine cable corridor. The habitat identified within the marine cable corridor was offshore circalittoral coarse sediment with numerous to occasional boulders which follows the composition of a classified Annex I stony reef. The JNCC would advise that if any Annex I stony reefs are present during the cable installation that these are avoided and we would recommend micro-routing to ensure a 500m clearance of this feature. • JNCC would advise the use of dynamic positioning for the vessel during the cable installation to minimise potential impacts on the seabed, specifically the Annex I reef.	The comments are acknowledged, and it is proposed that further investigation of Annex I stony reef within the Marine Cable Corridor can be undertaken during pre-installation survey works. Should Annex 1 habitat be identified within the Marine Cable Corridor then micro siting to avoid this habitat will be undertaken where possible.
2	**Marine Mammals**	The current application only uses injury thresholds proposed by Southall et al, 2007 in Section 10.3.2.21. More recent injury thresholds for marine mammals were published in 2016 (NOAA, 2018), superseding	The revised assessment presented within the ES chapter will only use the NOAA (2018) thresholds for auditory injury.

Item	Topic	*Comment*	Applicant's Response
		the Southall thresholds, which have been used later in the report. The new thresholds/hearing functions represent the most comprehensive and up to date scientific knowledge available to use in assessments of the risk of auditory injury to marine mammals and should be used in future noise assessments.	
3	**Physical Processes/ Intertidal and Benthic Ecology**	JNCC believe it would be beneficial to include a summary of the total seabed footprint impact area as part of Table 6.17 to provide a complete overview of the actual total impact of the operation. It would also be useful to include the impact area of thermal effects on the surrounding seabed.	Table 6.17 provided the realistic worst-case parameters known at the time for each potential impact identified during the different phases of the project. These worst-case parameters will be reviewed to reflect the very latest design and data. When JNCC requests a total impact area, is that total impact through trenching or through dredging, or impact through placement of non-burial protection individually or all together? We consider the first two activities to be construction activities, while the latter is operational; further clarity on your request would be appreciated. While we do not consider that thermal effects from cables will result in significant environmental effects, for completeness the impact of thermal emissions will be considered within Chapter 8 and the Habitat Regulations Assessment (HRA) Report.
4	**Physical Processes**	JNCC note that there is currently a lack of detail on the impact of the deposition of dredged material. While plume modelling is being carried out and will be reported in the ES, the potential impact from the initial dredging, deposition, re-dredging and final deposition as infill for the worst case, which could be up to 1.7 million cubic metres, needs to be addressed in the ES.	Plume dispersion modelling has been undertaken and will be reported on within a technical report that will be presented as an appendix to Chapter 6 within the ES. Whilst the plume dispersion modelling only examines the plume created by the initial

Item	Topic	*Comment*	Applicant's Response
			maximum disposal volumes of 1.75 million cubic meters, it is considered that subsequent dredge and final deposition for infill activities (should they be required) will be for substantially less volumes than the initial disposal operations, and the time between events will be sufficiently long enough to allow for some natural infill to take place. The Applicant has committed to producing a detailed construction method statement and dredge and disposal strategy document in consultation with the MMO and NE prior to works commencing. A post-disposal report to compare the activities proposed with those that were actually undertaken during construction, will also be produced if dredge and deposit activities are required and can also include information regarding the use of material for backfill as part of the construction process (however we do consider such activities to be a form of disposal but part of construction activities).
5	**Intertidal and Benthic Ecology**	Whilst JNCC appreciates that subtidal sands and gravels are identified across the majority of the benthic survey area, this is a UK BAP priority habitat and therefore the impact to this habitat should be reduced as much as practically possible.	Acknowledged. The final cable route will be micro-routed to avoid areas of sensitive habitat including where possible UK BAP Priority Habitat. It is anticipated that the results of the pre-installation survey will inform where potential exists to micro-site away from sensitive habitats, where possible.
6	**Intertidal and Benthic Ecology**	JNCC does not believe that the proposed operations are likely to cause a significant impact upon the marine environment. However, we note	Acknowledged. See responses for Items 1 and 5 also.

Item	Topic	*Comment*	Applicant's Response
		that many protected habitats are highly sensitive to cable operations and we would therefore always expect the operator to mitigate as much damage as possible to the habitats. Here we include our most up-to-date understanding about the habitat found within the area of proposed operations and also any comments we have concerning possible methods to mitigate damage.	
7	**Intertidal and Benthic Ecology**	The proposed operations take place close to an Annex I Reef which is an Annex I habitat under the EU Habitats Directive. As such, their presence contributes to the national resource of that habitat. For more information, please see here: http://jncc.defra.gov.uk/page-1523.	Acknowledged. See response to Item 1.
8	**Intertidal and Benthic Ecology**	We encourage the operator to work to minimise the amount of stony reef impacted, and that mitigation is put in place to ensure this.	Acknowledged. See response to Item 1.
9	**Intertidal and Benthic Ecology**	The scoping report states that in the offshore area the High Voltage Direct Current (HVDC) cable route will pass close to the Offshore Overfalls and Offshore Brighton Marine Conservation Zones (MCZs), by 1.15km and 8.5km respectively: the former is partly in English inshore waters and the latter entirely offshore. The application should fully assess any potential impacts on these Marine Protected Areas (MPAs). Information on these MCZs is available via the following links: Offshore Overfalls MCZ - http://jncc.defra.gov.uk/page-6776 Offshore Brighton MCZ - http://jncc.defra.gov.uk/page-6775	Acknowledged. An MCZ assessment is being undertaken and will be submitted with the application. This assessment will consider the potential impacts of the Proposed Development on the Offshore Overfalls and Offshore Brighton MCZs amongst others.
10	**Intertidal and Benthic Ecology**	The operation potentially involves the introduction of hard substrate into a mainly sedimentary environment. Although the changes are not necessarily considered as having a significant impact in this instance, we still encourage the operator to continue working to minimise the amount of hard substrate material used. We note that the long-term effects of the introduction of substratum into naturally sandy or muddy sea beds is not fully understood at present and should be carefully considered by the regulators.	Acknowledged. It is the preference of the Applicant to bury cables, where it is possible, to sufficient depths in order to protect the cable; this will be the case along the majority of the cable route identified to date. Non-burial protection will be proposed in areas where the target burial depth is not achievable or at areas where alternatives do not exist such as the Atlantic Cable Crossing and the HDD exit/entry location. The potential impacts of

Item	Topic	*Comment*	Applicant's Response
			placement of non-burial protection will be assessed within the relevant chapters of the final ES.
11	**Intertidal and Benthic Ecology**	JNCC welcome detailed commentary on stabilisation operations to allow further understanding of their actual nature conservation impact. This would include: • Location of dump sites; • Size / grade of rock to be used; • Tonnage / volume to be used; • Contingency tonnage / volume to be used; • Method of delivery to the seabed; • Footprint of rock; • Assessment of the impact; • Expected fate of deposit after end of production, i.e. will it be left in situ or recovered. Where stabilisation material cannot be avoided, we recommend using a more targeted placement method e.g. fallpipe vessel rather than using vessel-side discharge methods.	The ES will present as much detail as is possible based on the information known at the time. It is important to bear in mind that this level of detail and location of non-burial protection will need to be confirmed prior construction due to the changing nature of the seabed and will be informed by pre-construction surveys. The ES can present typical values for size/grade of rock and tonnage/volume of rock to be used in specific areas such as the cable crossing and the HDD exit/entry location however, this information would be need to be reviewed after the results of pre-installation surveys are known and reported on through the Cable Burial and Installation Plan (and/or Cable Protection Plan).
12	**Application**	Whilst JNCC appreciates that not all of the detailed project design is finalised at the time of ES submission, JNCC reiterates that best practice would not be to submit applications where stabilisation / protection material requirements are incrementally increased. The worst-case scenario should be assessed in the application to enable a meaningful assessment of the whole environmental impact of the project to be undertaken.	Appendix 3.2 presents the worst-case design parameters for non-burial protection. These parameters also include a contingency (which is being consulted upon with the MMO) over and above the realistic worst-case scenario for amount of non-burial protection to account for any additional works that might be required during construction or during operational maintenance and repair works. Therefore, it is considered that the assessments have covered the worst-case scenario which will cover

Item	Topic	*Comment*	Applicant's Response
			additional requirements and avoid incremental increases.
13	**Application**	It is understood that activities evolve over time, and that subsequent stages are often contingent on the outcome of the earlier activities. However, every effort should be made to predict the likely outcome and carry out an assessment on that basis so that all the elements have been assessed and presented in an ES.	Acknowledged.
14	**Marine Mammals**	We understand that this consultation at the moment involves a preliminary scoping report. However, we wish to reiterate, if it is found at a later date that avoiding UXO entirely is not achievable and UXO operations are to be carried out during the course of the project we would ask that the following would need to be included in a detailed assessment: • Consideration of the types of UXO likely to be present, the number of detonations likely in a single day, and the season over which these operations are due to occur; • An informed estimate of potential injury zones and marine mammal numbers within those zones (per species); • Details of marine mammal monitoring methods e.g. visual detection, PAM, designated person; • Details of the deployment of acoustic deterrent devices; • Details of monitoring procedures e.g. mitigation vessel, mitigation zone, pre-detonation monitoring, timings and delay procedures; • Explosive charge sequencing and post detonation searches; • A communication protocol and a reporting protocol.	Paragraph 3.1.5.3 of Chapter 3 of the PEIR identifies the requirement for UXO surveys and investigation. Permission for undertaking these activities will be sought through a separate marine licence with the MMO. The impact assessments that support the application for a marine licence will be based on the latest survey data and will include detailed assessment of the items listed by JNCC as well as being accompanied by an EPS Risk Assessment.

APPENDIX 5

NE BRIEFING NOTE

Natural Power Memorandum			
To	Natural England	Date	July 2019
From	Natural Power	Ref.	1199524

Briefing Note for Ongoing Consultation: Responses to PEIR feedback

The following table provides a summary of key items contained within feedback on PEIR, gratefully received from Natural England (NE).

This briefing note is structured in order to provide information to reviewers as to how the applicant proposes to address the comments received as part of the s.42 consultation process. The final column of the table provides record of the outcomes of a teleconference held on 27/06/2019 at 10.30 a.m. which focused on the PEIR comments and how they will be addressed.
Attendees at the teleconference included Richard Morgan, Alex Fawcett and Zara Ziauddin from Natural England, and Ross Hodson, Sarah Lister and Emma Toogood from Natural Power.

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
1	**Physical Processes**	We note that the rationale and conclusions of the worst-case design envelope (section 6.6.2) and subsequent impact assessment (section 6.6.3) are descriptive, relying on studies and evidence from other projects. These sections would benefit from the use of more specific analysis relevant to this project and study area. Where other studies are referred to, a description of how and why they are analogous in terms of features such as sediment type, water depth and current speeds would be useful.	The worst-case design parameters presented are specific to the Project and have been provided by the engineering team who has designed the Project. It is acknowledged that certain elements of the assessment are descriptive as it is considered that sufficient evidence already exists from other projects similar in scale and nature to this Project. It should be noted; all descriptive or empirical assessment is considered within the context of the project specific analysis conducted to inform our understanding of baseline conditions. Where evidence is gathered from previous studies, further discussion/analysis regarding the similarities in the local and regional hydrodynamic and sedimentary regime to provide evidence as to the relevance of these data/analysis to the project will be provided. This will be included within the final Environmental Statement (ES) .	Natural England would like further context to the conclusions made and if evidence from other projects has been used then the similarities in project features should be made clear. The approach is agreed but further information is required to be present in the final ES.
2	**Physical Processes**	Table 6.17 (page 6-100) – Worst Case Design Parameters: Natural England requests an understanding of how the figures have been derived for the dredged material. In addition to this, the area of seabed that will be impacted by dredging and disposal should be defined in terms of seabed footprint and not just the volume.	Further consultation via a teleconference (07/05/2019) has been undertaken with Natural England in relation to agreeing an approach to dredge and disposal works (see final meeting minutes in Annex 1 at the end of this note). It is acknowledged that defining the area of seabed impacted by the act of dredging and deposit of dredged material is required alongside consideration of the volume of material to be dredged (and disposed) within these areas and this will be reported within the worst-case design parameters. Furthermore, the method used to determine the predicted volumes of material to be dredged will be reported, either within the ES chapter itself or within the Seabed Characterisation Report that will accompany the chapter.	Natural England are content with this approach.
3	**Physical Processes**	Table 6.17 (page 6-100) – Worst Case Design Parameters: Natural England recommends that for clarity, it would be of benefit to list the Worst Case Scenario (WCS) by impact rather than the activity. For example, several potential impacts are listed as causing increases to nearbed Suspended Sediment Concentration (SSC) but it remains unclear as to which is the worst case for nearbed SSC. Some of the potential impacts may result in higher concentrations of SSC over a small area and others a lower SSC concentration over larger areas.	Further information and clarity relating to worst-case design parameters will be provided within the ES chapter.	Natural England requires further clarity as to what impacts/pressures are relevant to which receptor/s. The PEIR contains a lot of information to assimilate so it would be useful if the Worst Case Scenario was made clear and why it is considered the WCS.
4	**Physical Processes**	Clarity is required on why potential SSC impacts are not included	Further information and clarity relating to worst-case design	The PEIR contains a lot of information to assimilate so it would be

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
		under dredging and disposal in Table 6.17 (page 6-100). In addition, Natural England notes that the use of Mass Flow Excavation (MFE) for sandwave clearance is not mentioned in Table 6.17, and requests clarification if this represents the WCS.	parameters will be provided within the ES chapter.	useful if the Worst Case Scenario was made clear and why it is considered the WCS. It was discussed that both methods of clearance may be used (MFE/Dredging). It needs to be clear which method is being used as WCS and explain why it is WCS.
5	**Physical Processes**	Paragraph 6.6.3.3: clarification is required on how the NEMO Link Interconnector study translates to this area in terms of water depth, sediment type and other relevant features. This study has yet to be validated by monitoring. Monitoring data from the Race Bank Offshore Wind Farm has indicated that whilst some recovery from sandwave clearance can be seen in a timescale of a few months, full recovery is likely to take years.	This will be considered further, and relevant detail provided in the final ES.	A discussion was had that the sand banks at Race Bank are features of a SAC and as such, were under more rigorous assessment due to the legislative requirements of the HRA (and what was deemed "full recovery" was set in a HRA context). Although the sandwaves being cleared in the Channel are not designated features Natural England advised that their ecological recovery does need to be considered and assessed. Natural Power advised that they can use the recovery information from other projects to contextualise and assess them impacts on recovery of the sandwaves for the AQUIND works, however the results of this assessment should be viewed proportionately. Natural England advised that they consider this further and provide further clarification.
6	**Physical Processes**	Paragraph 6.6.3.5: Natural England welcomes further information on potential disposal plumes and areas likely to be affected by deposition.	Plume dispersion modelling to assess the temporal and spatial extent of sediment plumes generated during dredge disposal operations, associated suspended sediment concentrations and thickness of deposits on the seabed is currently being undertaken. The results of the modelling will be presented within the ES.	Agreed. Natural England welcomes this information.
7	**Physical Processes**	Paragraph 6.6.3.6: flotation pits have a greater impact on near-field flow and this should be considered and assessed if this approach is intended to be used.	The use of flotation pits for construction/installation of the cables is no longer proposed and will not be included in the ES project description.	Natural England asked whether this is removed from the Project Description and whether these works will be undertaken and consented through a separate marine licence. Although Natural Power could not confirm that flotation pits would never be an option, they explained that the project engineers have been engaging with potential contractors regarding this method and it is now considered unlikely that this method would be required to build out the scheme.
8	**Physical Processes**	Paragraph 6.6.3.14: we note that the effects of MFE are assessed as the WCS for cable installation operations.	Further information and clarity relating to worst-case design parameters will be provided within the ES chapter.	Agreed. Further clarity on WCS will be provided within the ES.
9	**Physical Processes**	Paragraphs 6.6.3.15 – 6.6.3.19: whilst reference to other studies are useful, they should be put into context by stating where similarities in seabed are between the studies. In this case, consideration should be given to what the WCS increase would be for SSC (over a given area and for how long). This should be presented in the context of background SSC in the relevant area, which may or may not be analogous to other projects. Consideration should also be given to SSC increases and subsequent deposition from sandwave clearance.	Further information regarding suspended sediments mobilised during construction and or during the operational lifecycle of the cable will be provided within the final ES. Where information from other projects is utilised greater consideration of seabed conditions and the environmental setting will be provided to assess/provide evidence as to the relevance of the data to the current project.	Natural England would like further context to the conclusions made and if evidence from other projects has been used then the similarities in projects should be made clear. The approach is agreed but further information is required to be present in the final ES.
10	**Physical Processes**	Paragraph 6.6.3.24: further detail is required on any change in seabed height due to cable protection and this should be documented in the WCS. Evidence should be provided on the potential impact upon sediment transport processes, rather than defining the impacts as negligible within the scale of natural variability of the local seabed topography.	Further information and clarity relating to worst-case design parameters, and the resultant effects will be provided within the ES chapter.	Agreed. Further clarity on WCS will be provided within the ES.
11	**Physical Processes**	Paragraph 6.6.4.4: Natural England requests further information	The need to consider the decommissioning at the early stages of the	Natural England advised that this comment was more about

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
		with respect to whether cable protection will be removed upon decommissioning.	consenting process is acknowledged. Decommissioning activities will be determined by the relevant legislation and guidance available at the time of decommissioning. In addition, a decommissioning plan will be developed and agreed with The Crown Estate. It is anticipated that a separate Marine Licence application for decommissioning works may be required closer to the time, and the decommissioning plan would support this application and provide the level of detail that cannot be provided at this current time. At the time of decommissioning, the options for decommissioning the cable will be evaluated and could include consideration of leaving the marine cable in situ, removal of the entire marine cable or removal of sections of the marine cable. These options will be evaluated against the environmental implications, safe navigability of the area for other sea users and liability risks and will consider the most current and / or relevant decommissioning guidance that is available at the time.	whether we are considering the impacts of cable protection as permanent or not. Natural Power explained that the protection placed at the cable crossings, the HDD exit pit (long term) and when used for remedial non-burial will be assessed as if the protection is permanent and does not consider removal at decommissioning (as this is considered to the worst case).
12	**Physical Processes**	Paragraphs 6.10.1.1 and 6.10.1.2: Natural England welcomes furthermore detailed assessment.	Acknowledged.	Modelling will only be undertaken for plume dispersion modelling for disposal activities. Other activities such as cable installation, HDD pit excavation will not be modelled in terms of increased SSC. Natural Power explained that Partrac are comfortable that the information that they can present within the ES relating to assessment of other activities should be sufficient and is considered proportionate given the nature and scale of the Project.
13	**Marine Water and Sediment Quality**	Paragraph 7.6.1.2: Natural England agrees that the impacts of operation and maintenance activities will be smaller in scale than construction works, however, if they are of any concern then they should be flagged and assessed accordingly.	It should be noted that many maintenance activities do not require a deemed marine licence including: • the removal and replacement of defective cable sections • removal of sediment to undertake repairs • the removal / replacement of cable protection to access the cable However, where appropriate, further detail on operations and maintenance activities such as in-service inspection surveys and potential repairs will be provided within the project description. Any potential significant environmental effects will be assessed accordingly.	Natural England requested that these activities are detailed and assessed. Natural Power explained that although these activities are exempt, they are assessed as part of the application and further information to be included in the ES may include; • Number of repairs • Length of cable de-buried • Duration of a repair. Natural England agreed that this was an acceptable level of information for assessment.
14	**Marine Water and Sediment Quality**	Paragraph 7.6.3.6 states that marine water and sediments of the Channel (beyond 1nm) demonstrate high recoverability to the impact, and while the sediment plume may extend over a large area, its magnitude (in this instance considered to be the degree of change from baseline) is predicted to be low and the impact will be temporary. It is concluded therefore, that no significant effects will occur as a result of this impact. Natural England is likely to agree with this conclusion, however, it is recommended that this statement should be better evidenced.	Sediment plume modelling is currently being undertaken to investigate the spatial extent of the passive plume and area likely to be affected by deposition, as a result of depositing dredged material. The results of the modelling will be presented within the ES and the potential impacts assessed accordingly.	Agreed. Further information will be presented within the final ES.
15	**Marine Water and**	Paragraph 7.6.3.10: Natural England requires further clarification	Further information can be provided within the assessment as	Natural Power to provide more information on the relevance of

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
	Sediment Quality	with regards to the survey data for the cited cable routes IFA 2 and Rampion OWF; and how spatially close this survey data is, to demonstrate they are applicable for AQUIND.	justification to our approach.	these developments on our assessment of contaminated sediments. Natural England does not consider Rampion as close so would appreciate further information presented within the ES.
16	**Marine Water and Sediment Quality**	Paragraph 7.6.4.1 states that temporary and localised increases in SSC are anticipated to occur within the study area during cable repair. Natural England requests that further information is provided to quantify this temporary increase in SSC.	Further high-level detail on operations and maintenance activities such as potential repairs will be provided within the project description. An assumption has been made that an indicative worst-case failure rate of the marine cables (including internal and external failures) would be one repair every 10-12 years. However, it is important to note that most O and M activities including the removal / replacement of defective cable sections, removal of sediment to undertake repairs and the removal / replacement of cable protection to access the cable are exempt activities, and do not require a deemed marine licence. It is possible to provide indicative high-level worst-case parameters relating to potential lengths of cable to be recovered for repair over the lifetime of the project. This information can be compared to the potential impacts from temporary increase in SSC during installation and assessed. It is still likely that the assessment will conclude that the impacts of operation and maintenance activities will be smaller in scale than construction works.	Natural England advised that repair activities should be considered as additional impacts. Natural England advised that repair impacts are similar to cable installation, but these additional impacts from repair should be considered and presented.
17	**Intertidal and Benthic Ecology**	Natural England welcomes the application of Chartered Institute of Ecology and Environmental Management (CIEEM) guidelines to inform the assessment methodology. We have reviewed this methodology and agree with the approach taken to identify whether an effect is of ecological significance.	Acknowledged.	Agreed.
18	**Intertidal and Benthic Ecology**	We note that assessments for Intertidal and Benthic Ecology do not consider the following methods, as described in Chapter 3 – Description of the Proposed Development: · Use of flotation pits to enable installation vessels to approach closer to shore; · Grounding of installation vessels on the seabed at low tide; · Use of a Trailing Suction Hopper Dredger (TSHD) vessel to create the trench for pre-lay installation; and · Potential driving of four ducts into the seabed at Horizontal Direct Drilling (HDD) marine exit/entry at Eastney Landfall (approx. 1-1.6 km off the coast at Eastney). It is understood that a more detailed assessment of potential significant impacts on sensitive receptors will be undertaken and presented in the Environmental Statement (ES); and a Habitats Regulations Assessment (HRA) Report will also be provided as part of the final application. Given the proximity of some of these activities to the Solent Maritime Special Area of Conservation (SAC), we would highlight the importance of thoroughly assessing potential impacts on intertidal and benthic ecology. Particular focus should be placed on direct seabed disturbance (including HDD pit excavation, temporary cable protection and boulder removal/re-location) and temporary increases in SSC.	The use of flotation pits for construction/installation of the cables is no longer proposed and will not be included in the project description within the ES. Further information relating to the other methods proposed is currently under investigation and will be presented, along with their associated impacts and effects, within the ES if the methods remain part of the final design. A Habitats Regulations Assessment Report will be produced and will support the DCO application. This assessment and the EIA will evaluate the activities associated with the HDD works in detail. The excavated material taken from the HDD pit will be deposited further offshore (at approx. KP 21) and any temporary increase in SSC caused by the excavation of the pit/placement of rock (as well as from direct disturbance resulting from excavation) will be assessed using analogous empirical evidence to support the conclusions.	Natural Power advised that use of TSHD for trenching will not be proposed within the Project Description as there is too limited information available regarding this method that it can be assessed. Natural Power explained that the material at the HDD pit will be excavated, then grout bags will be used as temporary infill prior to cable pull. After cable pull, it is most likely that gravel/rock placement or mattressing will be used as permanent infill. Natural England advised that their preference is infill with soft sediments in order to maintain the substrate type if possible. However, they appreciate that the excavated material, disposed of at KP21 will unlikely be available for re-use.
19	**Intertidal and Benthic Ecology**	In response to Natural England's previous recommendation to consider effects arising from heat emission from the burial of the	Acknowledged.	Agreed. This information will be presented within the final ES/HRA.

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
		cable, Natural England welcomes the inclusion of this assessment in the ES and the accompanying information for the Habitats Regulations Assessment Report.		
20	**Intertidal and Benthic Ecology**	Natural England notes that the proposed marine cable corridor route falls through the designated sites; Solent Maritime SAC and Solent Dorset Coast potential Special Protection Area (pSPA), as set out in the Red Line Boundary (RLB) Overview document (Section 10 – Eastney (landfall)). We understand that cable installation within the Solent Maritime SAC will be undertaken using Horizontal Direct Drilling (HDD) and welcome this approach as a means of minimising environmental impacts upon this site.	Acknowledged.	Agreed.
21	**Intertidal and Benthic Ecology**	Table 8.7 (page 8-50) outlines the worst-case design parameters relevant to benthic ecology during the construction (and decommissioning) and operational stages. In order to further inform the assessment of potential impacts, Natural England requests additional information with respect to the following: · Direct seabed disturbance: we note that there will be direct impacts from the removal and re-location of boulders. It is currently unclear whether this aspect of construction has been included in the worst-case disturbance scenario within the marine cable corridor. · Deposition of sediment (smothering): more information is required as to the likely depth of deposition over the affected areas within the marine cable corridor. This information could be presented in the form of different scenarios. · Habitat loss: it would be helpful to refine these figures by habitat type impacted where possible. We note that Table 8.7 does not include the worst-case scenario for habitat loss during construction. Clarification should also be provided as to whether non-burial cable protection will be removed upon decommissioning; and if so, whether this will be permitted under a Deemed Marine Licence (DML). Maintenance (O&M) activity: any maintenance works that are to be permitted as part of a DML should be clearly defined; including the estimated length of cable, frequency of works and anticipated impacts.	Boulder clearance is included in the worst-case disturbance scenario identified within Table 8.7 (as part of direct seabed disturbance). Sediment plume modelling for the deposit of dredged material is currently being undertaken to investigate the extent and sediment concentrations of the passive plume and area likely to be affected by deposition. The results of the modelling will be presented within the ES and the potential impacts assessed accordingly. The % of each habitat type affected from habitat loss is reported within the text in paragraphs 8.6.4.4 to 8.6.4.17. This can be presented in table format if this is clearer? The impact of habitat loss during construction was provided in Table 8.7 with the worst case considering temporary loss due to impact of direct seabed disturbance as the result of temporary mattressing/protection required for the HDD exit, and the footprints of the jack-up legs and trestles. Habitat loss as a result of cable protection measures is considered as operational impacts in Table 8.7. We are unable to advise if cable protection will be removed at this stage (this will be determined much closer to the decommissioning stage) and a separate marine licence will be sought to cover any possible licensable activities at a later date. It is possible to provide indicative high-level detail on operations and maintenance activities such as in-service inspection surveys and potential repairs will be provided within the project description. However, as commented previously (item 13), the majority of maintenance activities are exempt from requiring a marine licence. An assumption has been made that an indicative worst-case failure rate of the marine cables (including internal and external failures) would be one repair every 10-12 years. Further worst-case parameters can be provided for assessment relating to potential lengths of cable to be recovered for repair over the lifetime of the project and the requirement for additional non-burial protection.	Natural England welcomed any attempt at making the information clearer within the final ES.
22	**Intertidal and Benthic Ecology**	Additionally, we note that the potential impacts of habitat loss from construction (and decommissioning) has not been included in Table 8.8 – Summary of effects (page 8-67). Natural England therefore recommends that that this aspect is clarified in the ES and Habitats Regulations Assessment Report.	The impact of habitat loss was included in the construction phase and was considered to included direct seabed disturbance from the temporary mattressing/protection required for the HDD exit and the footprints of the jack-up legs and trestles. This can be separated out in the table if this is helpful.	Agreed. Natural England welcomed any attempt at making the information clearer within the final ES.

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
			Habitat loss during operation, included in Table 8.8, includes the loss of seabed due to cable protection placed during installation and cable crossing protection, and also includes some contingency for cable protection that may be required for repair and maintenance.	
23	**Intertidal and Benthic Ecology**	Natural England advises that for the following figures: 3.3 (UK Landfall), 3.6 (UK Mobile Sediment) and 3.5 (Indicative Seabed Preparation), it would be beneficial to display nationally and international designated conservation sites for ease of reference.	Acknowledged.	Agreed. Changes to the figures will be actioned and presented within the ES.
24	**Fish and Shellfish**	Natural England welcomes the application of Chartered Institute of Ecology and Environmental Management (CIEEM) guidelines to inform the assessment methodology. We have reviewed this methodology and agree with the approach taken to identify and assess potential impacts upon Valued Ecological Receptors (VERs).	Acknowledged.	Agreed.
25	**Fish and Shellfish**	We note that assessments for fish and shellfish do not consider the following methods, as described in Chapter 3 – Description of the Proposed Development: · Use of flotation pits to enable installation vessels to approach closer to shore; · Grounding of installation vessels on the seabed at low tide; · Use of a Trailing Suction Hopper Dredger (TSHD) vessel to create the trench for pre-lay installation; and Potential driving of four ducts into the seabed at HDD marine exit/entry at Eastney Landfall (approx. 1-1.6 km off the coast at Eastney). It is understood that a more detailed assessment of potential significant impacts on sensitive receptors will be undertaken and presented in the ES; and a Habitats Regulations Assessment (HRA) Report will also be provided as part of the final application. Given the proximity of some of these methods to the shoreline, we would highlight the importance of assessing potential noise/vibration and suspended sediment impacts upon fish species which are known to migrate along the coast (i.e. Atlantic salmon and sea trout).	The use of flotation pits for construction/installation of the cables is no longer proposed and will not be included within the project description for the final ES. Further information relating to the other methods proposed is currently under investigation and will be presented within the ES if the methods remain part of the design. A Habitats Regulations Assessment Report will be produced and will support the DCO application. This assessment and the EIA will evaluate the activities associated with the HDD works in more detail. The excavated material taken from the HDD pit will be deposited further offshore (at approx. KP 21) and any temporary increase in SSC caused by the excavation of the pit/placement of rock will be assessed using analogous empirical evidence to support the conclusions. Consideration of the noise effects on sensitive receptors due to landfall work including driving of ducts, will be considered as part of the EIA and HRA process.	Agreed.
26	**Fish and Shellfish**	Similarly, we note that the impact to SAC and Marine Conservation Zone (MCZ) features from increased SSC is not included within the PEIR document due to a lack of suitable resolution in the model outputs in these nearshore areas. The assessment of these features will be undertaken in line with further refinement in the deposit locations of dredged material (paragraph 9.6.3.32). We recommend that the applicant liaises with the Environment Agency to determine the importance of these nearshore areas to migratory species which are designated features of the River Avon SAC and River Itchen SAC. Additionally, the assessment of potential SSC impacts upon the short-snouted seahorse should be informed by data for the Bembridge proposed Marine Conservation Zone (pMCZ) and Selsey Bill and the Hounds pMCZ. These data are available via Defra's published consultation on sites proposed for designation in the third tranche of Marine Conservation Zones.	Further consultation via a teleconference (07/05/2019) has been undertaken with Natural England and Environment Agency (EA) in relation to agreeing an approach to dredge and disposal works (see final meeting minutes in Annex 1 of this note and Annex 2 for consultation response from the EA). No disposal activities are proposed within the nearshore areas between KP 0 and KP 21. Sediment plume modelling is currently being undertaken to investigate the extent and sediment concentrations of the passive plume and area likely to be affected by deposition from disposal activities. The results of the modelling will be presented within the ES and the potential impacts assessed accordingly. The Environment Agency was consulted back in October/November 2018 (as shown in Table 9.2 of the PEIR) and the information received from the EA has provided information relating to the SACs. We have also received consultation feedback from the EA in relation to the PEIR. In addition, an MCZ assessment is currently being undertaken and this will be presented within the ES as an appendix.	NE recognised that there remains a lack of data on migratory routes along the coast and that is why Natural England generally defer to EA. He advised that it is important to, as far as is possible, demonstrate that location and temporary nature of construction does not impact on these fish in trying to get to the SACs. Draft HRA will be sent to EA also to ensure that EA are kept in the loop. Natural England welcomed this.

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
27	**Fish and Shellfish**	We note that an assessment of the potential effects of the Proposed Development on MCZs has not been included in the PEIR, but will be undertaken and presented as part of the final ES. We have reviewed the MCZs that have been screened in to the fish and shellfish assessment (table 9.6, page 9-27) and are satisfied that the correct sites have been identified. However, it should be noted that Poole Rocks is also a proposed Marine Conservation Zone for nesting black bream, which should be included in this assessment.	Acknowledged. The MCZ assessment will include consideration of Poole Rocks MCZ, including the 2019 update to the site to include Black Bream as a protected feature [1].	Agreed.
28	**Fish and Shellfish**	The assessment identifies a potential impact upon native oyster resulting from temporary habitat disturbance/loss, but concludes that this impact is not significant. This conclusion is based on the reasoning that the impacted area represents a small proportion of the available habitat so, although oysters may be affected, the numbers are likely to be low (paragraph 9.6.3.13). Similarly, the assessment acknowledges that oysters may be subject to a temporary increase in suspended sediments and smothering during construction, but such areas are likely to be highly localised and return to within comparable background concentrations within a short time frame (days). As such, this impact is not considered to be significant (paragraph 9.6.3.35). It should be noted that the Solent's native oyster population is severely depleted; and efforts are being made by the Blue Marine Foundation to restore this species. Given that the native oyster is identified as having a high sensitivity to disturbance, smothering and increases in SSC, we recommend that should oysters be present in the Solent section of the Marine Cable Corridor, measures should be taken to mitigate potential impacts. One option of mitigation is to apply the Southern IFCA's Oyster Translocation Protocol prior to construction commencing. Therefore, we recommend that the applicant liaises with the Southern IFCA to ascertain the potential presence of oysters and explore the feasibility of applying this protocol.	The comments relating to native oysters are acknowledged and further engagement with Southern IFCA will be undertaken to ascertain the potential presence of oysters within the area of impact of the Marine Cable Corridor. Sediment plume modelling is also currently being undertaken to investigate the extent / sediment concentration of the passive plume and area likely to be affected by deposition from disposal activities, while empirical assessment methods will be used to describe potential indirect impacts that might occur from increased SSC levels from trenching and HDD activities. The results of these assessment methods will be presented within the ES, along with any mitigation measures that are considered necessary.	Natural Power advised that they have recently contacted the Southern IFCA via email regarding gathering further information on native oysters. Southern IFCA has responded and we continue to liaise with them to gather sufficient information on oysters. Please see attached email. RE_ Aquind Interconnector Proje
29	**Marine Mammals**	Natural England understands that a separate marine licence will be sought for any required unexploded ordnance detonations. However, consideration should be given in the cumulative effects assessment to the potential cumulative impact of UXO detonations, in-combination with both other work being undertaken for AQUIND and other plans and projects in the vicinity of the project.	Acknowledged. The potential requirement for UXO detonations will be mentioned within the cumulative effects assessment. However, it is important to bear in mind that information resulting from future UXO surveys will not be available and therefore the number of UXO targets requiring safe removal or detonation will not be known. Therefore, detailed consideration will not be possible. In addition, there is not expected to be a potential temporal overlap between UXO detonations and other work being undertaken for AQUIND as the UXO works (survey and removals/detonations) would precede all other preparation and construction works by a number of months. The UXO investigation/detonation works will be applied for through a separate marine licence (potentially during examination of the DCO application) and a detailed impact assessment including cumulative effects assessment will be undertaken to support the application.	Given that the UXO surveys will not be undertaken for some time yet, Natural Power will not the data available to undertake a detailed assessment. It was agreed that some high-level consideration of UXO detonations will be included within the cumulative assessment for marine mammals to cover this off within the final ES (but it is likely that a meaningful assessment will not be possible due to the uncertainty in number, location, nature, detonation requirements etc. of potential UXOs).
30	**Marine Mammals**	Paragraph 10.6.1.10: Natural England is satisfied with the use of 5km as the range to be considered in the assessment of impacts to	At present, the requirement for the use of airguns is not proposed.	Natural England confirmed that they agree with the approach to method and current scope of assessment and that sufficient

[1] http://www.legislation.gov.uk/ukmo/2019/31/pdfs/ukmo_20190031_en.pdf

Item	Topic	*Comment*	Applicant's Response	Teleconference Outcome
		marine mammals from all geophysical surveys. However, if it is anticipated that airguns may be used at any point, this range should be extended to 10km.		evidence was provided regarding why impacts such as vessel noise, collision with vessels, and noise from construction works and vessel noise, collision of vessels and EMF (during operation) has been scoped out. Currently, the only impact assessed is noise from geophysical equipment and Natural Power is reviewing the works associated with the HDD given that there may be some noisy equipment used which may need to be included in assessment.
31	**Marine Mammals**	Paragraph 10.7.1.2: Natural England welcomes the commitment from AQUIND to undertake a European Protected Species (EPS) licence Risk Assessment to determine if a licence is required. At the very least, a voluntary notification of geophysical works should be completed and submitted to the Marine Management Organisation (MMO) and the data submitted to the Marine Noise Registry.	Acknowledged.	Agreed.
32	**Marine Mammals**	Paragraph 10.9.1.6: Natural England will provide relevant advice regarding impacts of the HDD works on marine mammals when more information on those works becomes available.	The EIA will evaluate and assess the activities associated with the HDD works in detail (both onshore and offshore in relation to noise). Further up to date information will be presented within the project description.	Agreed.
33	**Marine Ornithology**	We note that this chapter provides preliminary information on potential impacts upon ornithological receptors seawards of mean low water springs (MLWS). Please refer to our comments under Section 2.7 (Onshore Ecology) for advice relating to terrestrial and intertidal ornithological receptors.	Acknowledged. The comments relating to terrestrial and intertidal ornithological receptors will be dealt with by our project partners WSP.	Natural England advised that they passed the marine ornithology chapter over to Alex Banks (Ornithologist at NE) who considered the works to be low risk and the main potential impacts will relate to intertidal birds.
34	**Marine Ornithology**	Section 11.4 (Methods of Assessment) outlines the methodology used to identify important ornithological features (IOFs) and characterise the type, magnitude and significance of potential impacts upon these features. We have reviewed this methodology and are content with the approach taken. Consistent with other PEIR chapters, Natural England welcomes the application of CIEEM guidelines to inform this assessment.	Acknowledged.	Agreed.
35	**Marine Ornithology**	Natural England has reviewed the baseline environment for the marine ornithology assessment (section 11.5) and recommends the inclusion of data from the Seabird Mapping and Sensitivity Tool (SeaMaST) which is available online at: https://data.gov.uk/dataset/96fce7bb-6561-4084-97cb-6ba92d982903/seabird-mapping-sensitivity-tool. This dataset provides evidence on the use of sea areas by all seabirds and inshore waterbirds in English territorial waters. While the principal aim of this tool is to map the sensitivity of birds to offshore wind developments, the analysis of displacement risks remains relevant to this development.	This additional dataset will be added to the list of data sources and relevant information will be incorporated into the baseline for the final ES. Displacement risks presented in SeaMaST (Bradbury *et al.* 2014) are already accounted for in the assessment.	Agreed.
36	**Marine Ornithology**	We note that consideration has been given to how the baseline environment may change over the operational period of the proposed development; together with cumulative effects arising from other plans/projects. In the case of the latter, it is assumed that outcomes of the cumulative effects assessment will be updated as required for the final ES.	Yes, the cumulative effects assessment for all topics will be reviewed and updated for the final ES.	Agreed.

Annex 1: Meeting Minutes from Teleconference on Dredge and Disposal Works

Natural Power Meeting Minutes			
To	MMO, NE, JNCC, NP and Partrac	Date	07/05/2019
From	Natural Power	Ref.	1197264

Meeting Minutes

Meeting held at: Teleconference
Date: 07/05/2019
Time: 09:30 – 11:00 hrs
Attendees:
Mark Qureshi (MMO)
Abbey Pennington (MMO)
Andrew Griffiths (Cefas)
Katie Musgrave (Cefas)
Zara Ziaddun (NE)
Alex Fawcett (NE)
Nick Moore (JNCC)
Hannah Lawson (JNCC
Sarah Lister (Natural Power)
Ross Hodson (Natural Power)
Jack Poleykett (Partrac)
Matt Wright (Partrac)

1. Natural Power (NP) identified that two consultation documents relating to dredge and disposal works for the AQUIND Interconnector have already been distributed to consultees.
   - A seabed preparation and deposit of dredged material summary note; and
   - A disposal modelling technical note.
2. Natural Power provided an overview of the summary note and opened up the call for queries from consultees. It is acknowledged that JNCC did not have as much time to digest the consultation documentation as other consultees and NP are grateful for their input.

Seabed Preparation and Deposit of Dredged Material Summary Note

3. Cefas identified that beneficial re-use of dredged material for beach replenishment or for use as backfill may need to be considered as part of the site characterisation report. OSPAR regulations advise that characterization is required for beneficial re-use and beneficial re-use needs to be registered. Beneficial re-use of material also needs some form of abbreviated site characterisation as part of the main disposal site characterisation document.

Cefas to provide advice on for example, the HDD works at between KP1 and KP1.6, whether the excavated material created at this location and to be used as backfill, would this be considered as beneficial re-use subject to further characterization or considered simply as re-use of a material for construction purposes.

4. When asked whether NP had liaised with NE or the Environment Agency (EA) on beach replenishment, NP advised that they had not. Beach replenishment still needs to be confirmed with WSP Engineering who are designing the scheme. However, the feasibility of potential use of dredged material for beneficial use such as beach recharge is unlikely to be determined until post consent. It is envisaged that if this does occur, dredged material from anywhere along the Marine Cable Corridor may be used for this purpose.
5. Cefas advised that they were generally happy with the approach taken for constraints mapping and how the disposal area has been defined. They welcome the production of post-consent method statement to further refine the dredge and disposal works and would recommend that this includes production of post-disposal works report which would compare the disposal works actually undertaken with the works that are outlined in the method statement. In Cefas's advice, they will also provide a link to the latest OSPAR guidance on site characterisation and another link to the Hornsea 3 Offshore Wind Farm characterisation report.
6. The MMO advised that in terms of seabed preparation, the first three activities listed within the summary note (namely, pre-lay grapnel run, boulder removal and use of MFE) would all be considered as part of cable laying activities (not disposal activities) which is licensable within 12 nautical miles and would not require a marine licence beyond 12 nautical miles. The use of a Trailing Suction Hopper Dredger and disposal activities would be licensable activities and therefore would also be licensable within 12 nautical miles.
7. A discussion was held between Cefas and MMO in relation to sampling of dredged material for contaminants along the Marine Cable Corridor. Cefas advised that they are content with the level of sampling undertaken to date and that the

final reporting should highlight the name of the laboratory used for analysis up front to close out any queries being raised as to whether the analysis was undertaken correctly or not. Cefas advised that they do not feel that any further sampling is required at areas where dredging is to occur as the PSD data collected will show within the characterisation report that these areas possess coarse/sandy material that is not consistent with accumulation of contaminants. This only applies however if the surface samples collected are deemed representative of the material to be dredged. The dredge depth (i.e. depth of sediment removal) has not been specifically stated, however in table 2 of the summary note, sandwave heights are quoted up to 15m. Typically surface samples are acceptable to characterise up to 1 m of dredge depth, with core samples required for deeper dredges. The applicant should confirm the dredging depth and present justification that the samples are representative of the horizontal and vertical area.

8. The MMO queried whether the existing benthic samples taken are representative of the depths that the trenches will be given that some of the sandwaves within Table 2 of the summary note are listed as up to 15 m high.
9. NE advised that they were generally content with the approach taken to define the disposal area along the Marine Cable Corridor. NE welcome the commitment to production of a post-consent method statement for dredge and disposal. NE also highlighted that in the assessments it is important to ensure that the worst-case scenarios are captured adequately in relation to designated sites and not only to assessing robustly the potential impacts for disposal but also dredging activity itself.
10. NE main advice is that they request that
    - deposition of dredged material occurs as close to the area of dredging as practicable; and
    - ideally deposition should be upstream of extraction to enable quickest recovery; and
    - deposition of dredged material occurs on seabed that possess a similar grain particle size composition.
11. JNCC echoed the main advice from NE stated in item 10 of this meeting note. JNCC also queried how deep the trenches will be dug through the sandwaves and advised that if a fall pipe is to be used on the TSHD, then the dredging activity may take a long time. JNCC also advised that they recommend the use of a fall pipe for disposal activities and that they also prefer the use of backfill techniques rather than rock protection where practicable.

NP advised that they will query this with WSP engineers as to what depth they expect to reach within the sandwave areas and look to providing further clarification within the application documentation on these methods. The Cable Burial Risk Assessment (CBRA) is still ongoing but it is anticipated that the outputs from this reporting will highlight the approach to be taken in relation to seabed preparation and burial within these bedforms. The data collected from the vibrocores should also inform whether the sediment composition is uniform throughout the bedforms or whether it changes.

Disposal Modelling Technical Note

12. Partrac provide an overview of the approach taken to modelling for disposal activities.
13. It was highlighted that the model locations shown on Figure 1 illustrate what Partrac consider to be the most realistic worst-case approach to disposal activities for the indicative maximum dredge volume, calculated by Partrac in liaison with WSP engineers. The multiple modelling locations reflect the distribution of the maximum dredge volume in areas closer to shore (worst case), close to dredging areas as considered practicable without creating depositions of material that would also reduce the navigable depths of water by 5%.
14. The group recognized the flexibility required for disposal given the mobile nature of bedforms and this approach is only proposed for assessment purposes of the potential impacts of any sediment plume on receptors and not as a definitive condition within a licence. It is anticipated that the deemed marine licence would identify a maximum dredge volume within the disposal area and any further refinements on disposal activities and volumes (as long as worst-case scenario has adequately covered everything) would be secured through licence conditions and the post consent dredge and disposal method statement.
15. Clarification was requested from Partrac on whether the maximum deposition of material at any modelling location, at any time during the model run, for each scenario would be illustrated in the modelling report and Partrac confirmed that this was the case. Partrac also clarified that each scenario would use the hydraulic characteristics (i.e. settling velocity and critical erosion threshold) associated with the median grain size of the three grain size classes proposed within the technical note.
16. NE and JNCC stated that they were content with the designated sites proposed within Figure 1 of the technical note as those sites that will have modelling data outputs presented within the final modelling report.
17. NE requested the distances between the modelling locations and the closest designated site.
    NP to provide distances to designated sites to NE and JNCC.
18. The group agreed that the general consensus to the approach to modelling proposed within the technical note is fit for purpose and Partrac will run the modelling subject to updated information from WSP engineering in relation to refined dredge volumes and agreement of these minutes by all meeting attendees.
19. Timescales for providing formal written advice were agreed as following;
    - The MMO will receive advice from Cefas beginning of next week (w/c 13th May) and will provide their advice as soon as possible thereafter.
    - NE will liaise with Richard Morgan and advise on timescales as soon as possible.

- JNCC will provide advice some time prior to COP on the 14th May.

NP advised that Partrac are planning to begin the modelling w/c 20th May as this is a time critical component to the current submission deadline of the DCO application. Therefore, any advice received earlier to the timescales noted above would be gratefully received.

Annex 2: Consultation on migratory fish with Environment Agency

From: Pearson, Rob J [mailto:rob.pearson@environment-agency.gov.uk]
Sent: 23 November 2018 11:51
To: Giles Alcock <gilesa@naturalpower.com>
Cc: SSD Enquiries <SSDEnquiries@environment-agency.gov.uk>
Subject: RE: Migratory Fish - Isle of Wight Area

Hello Giles,

Thank you for your enquiry regarding migratory fish in the Isle of Wight area.

In terms of our Fish survey data, our TraC fish surveys are really the only relevant data we hold in regard to fish occurrence in the marine sector. The Southern IFCA also conduct some netting operations to investigate fish populations in the marine environment, which could be a further line of enquiry.

We have anecdotal evidence and reports of sea trout and salmon being caught as occasional by-catch by fisherman on both the north and south coasts of the Isle of Wight and within the Solent but there are no licenced fisheries for these species in our area. We understand that both salmon and sea trout migrate around both the north and South Coast of the Isle of Wight, as well as the Hampshire/Solent coastline. The Test and Itchen are the two rivers with highest protection and considered most important for migratory salmonids in our area. However we also encounter significant numbers of sea trout in particular in the New Forest Rivers, and East Hampshire rivers. For example this year we encountered high numbers of adult sea trout in electrofishing surveys on the Wallington River, indicating therefore there is an important migratory route through Portsmouth Harbour and that it is providing valuable estuarine habitat for smolts for part of the year.

We have fish counter data for both the Test and the Itchen in Hampshire which tell us what time of year we get the majority of fish transitioning from the marine/estuarine habitats up into our rivers, unfortunately we have no such data for the Isle of Wight Rivers, but would infer that it would be similar to the mainland sites. Unfortunately our fish population surveys are also less frequent for the Isle of Wight Rivers, however I have observed Sea Trout this summer in the Lukely Brook in the Medina catchment, and have watched numbers of Sea Trout at Budbridge weir on the Eastern Yar the last two winters.

The data on migration timings we have is important as it guides what protection we might dictate in regards to certain development or other activities that could disrupt migrating fish, for example one that fairly commonly comes up is percussive piling. When we have an application for an activity like this we tend to condition it with something like the following to protect migratory fish around the Solent/IOW coast:

'The Medina river and its estuary provides valuable habitat and passage for migratory salmonids, particularly Sea Trout. Piling works can disrupt the migration of smolts returning to sea, or adult fish returning to the river to spawn. Vibro-piling has been shown to cause least disturbance and is suitable for use at this location year round. However if percussive piling techniques were to be used, this would not be permitted between 15th March to 15th May to protect smolt migration, and 1st June to 31st October to protect adult migration. '

1

Therefore when assessing an application we would look for activities that could be a risk to migrating fish, and condition them outside of the date ranges included above. Due to the SAC status of some of our migratory fish populations we are required to take a precautionary approach in assessing impacts, including on potential migration routes. If no significant effect can be achieved an appropriate assessment will need to be conducted.

Further considerations for the Environmental Statement might cover any predicted effects on Eel migration. Eels are sensitive to electric fields - I believe there was some work in the Baltics looking at the effect of electrical cables on the migration of Eels, which showed it caused a temporary change in their movements but they were able to regain their migratory route, so I believe the outcome was that it was not a significant effect.

Also off the coast of the Isle of Wight there are a number of Marine Conservation Zones which protect significant fish species including Sea Horses.

A further source of information that could be worth checking out is the Navitas Bay Enquiry, which should be in the public domain. The Environmental Statement for the project was not necessarily deemed appropriate but it does contain some information sources that should be useful.

It might be that we can review the Environmental Statement prior to submission to the Planning Inspectorate if required, through this would likely be considered chargeable work.

Kind regards,

Rob

From: SSD Enquiries
Sent: 01 November 2018 15:05
To: Sykes, Tim <tim.sykes@environment-agency.gov.uk>
Subject: 181101 SSD105019 Action by 14 Nov 2018 - Migratory Fish - Isle of Wight Area

Hi Tim,

Please see the below customer request regarding EA studies on migratory fish or known migration routes in the vicinity of the Aquind project – please investigate further.

If you require further clarification, please get in touch.

Many thanks

Nick

Customers & Engagement Team| Environmental Planning and Engagement | Solent and South Downs Area |
Environment Agency | Romsey District Office, Canal Walk, Romsey, SO51 7LP

SSDEnquiries@environment-agency.gov.uk
National Contact Call Centre 03708 506506

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From: Giles Alcock [mailto:gilesa@naturalpower.com]
Sent: 24 October 2018 12:02
To: Enquiries, Unit <enquiries@environment-agency.gov.uk>
Cc: Jane Lancaster <janel@naturalpower.com>
Subject: Migratory Fish - Isle of Wight Area

Hi

Please redirect my inquiry to the fisheries team who deals with fish related requests on the south coast of the UK around the Solent.

I work for Natural Power Consultants and we are tasked with writing the Environmental Statement (ES) for the Aquind HVDC Interconnector project which has a proposed landfall of Eastney.

As part of the ES I am writing the Fish and Shellfish Chapter which includes migratory fish. I have referenced the EA's TraC fish surveys but if you feel there are other EA studies I should include then please let me know.

In addition I'd be grateful for any information you may have on sensitive areas for migratory fish or known migration routes in the vicinity of the Aquind project.

The Project is currently at the scoping stage with more information available here: http://aquind.co.uk/

I look forward to hearing from you

Kind regards

Giles

Giles Alcock
Senior Environmental Consultant – Marine Ecology
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renewable energy consultants

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APPENDIX 6

NE S.56 RELEVANT REPRESENTATION

THE PLANNING ACT 2008

THE INFRASTRUCTURE PLANNING (EXAMINATION PROCEDURE) RULES 2010

AQUIND Interconnector

Relevant Representations of Natural England

For:

The construction and operation of a 2000 MW subsea and underground High Voltage Direct Current (HVDC) bi-directional electric power transmission link between the south coast of England and Normandy in France.

Planning Inspectorate Reference: EN020022

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19 February 2020

NATURAL ENGLAND'S RELEVANT REPRESENTATIONS IN RESPECT OF AQUIND INTERCONNECTOR

Planning Inspectorate Reference: EN020022

1. **Legislative and policy framework**

1.1. Natural England is a non-departmental public body established under the Natural Environment and Rural Communities Act 2006 ("NERC Act"). Natural England is the statutory advisor to Government on nature conservation in England and promotes the conservation of England's wildlife and natural features.[1] Natural England's remit extends to the territorial sea adjacent to England, up to the 12 nautical mile limit from the coastline.[2]

1.2. Natural England is a statutory consultee:

1.2.1. in respect of environmental information submitted pursuant to the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 ('the EIA Regs');[3]

1.2.2. in respect of plans or projects that are subject to the requirements of the Conservation of Habitats and Species Regulations 2017 (the "Habitats Regulations") which are likely to have a significant effect on European protected sites – that is, sites designated as Special Areas of Conservation ("SACs") and Special Protection Areas ("SPAs") for the purposes of the EU Habitats and Birds Directives;[4]

1.2.3. in respect of proposals likely to damage any of the flora, fauna or geological or physiological features for which a Site of Special Scientific Interest ("SSSI") has been notified pursuant to the Wildlife and Countryside Act 1981 (the "1981 Act");[5] and

1.2.4. in respect of all applications for consent for Nationally Significant Infrastructure Projects which are likely to affect land in England.[6]

1.3. Pursuant to The Conservation of Offshore Marine Habitats and Species Regulations 2017 (the "2017 Regulations"). Under Regulation 28(4) (a) of the 2017 Regulations, where the assessment relates to a European offshore marine site, the competent authority must consult the JNCC (Joint Nature Conservation Committee). Where the assessment relates to a European site (including a European marine site), then the competent authority must consult Natural England, in accordance with regulation 28(4) (b) of the 2017 Regulations.

1.4. It is also the Government's policy to consult Natural England in respect of sites listed for the purposes of the Convention on Wetlands of International Importance especially as Waterfowl

[1] NERC Act ss. 1(2), (2) and 4

[2] NERC Act, s.1(3)

[3] Regs. 3(1), 10(6), 9(1), 11(1), 20(3)(g), 22(3)(f), 24(5)(f) of the EIA Regs

[4] Regulation 61 of the Habitats Regulations

[5] Section 281 of the 1981 Act

[6] Planning Act s.42; Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009, reg. 3 and sch. 1.

Habitat signed at Ramsar on 2nd January 1971 ("Ramsar sites") as if they were European protected sites.[7]

1.5. In determining this application, the Secretary of State will be acting as the competent authority for the purposes of the Habitats Regulations and the 2017 Regulations. The Secretary of State is also a section 28G authority with specific duties under the 1981 Wildlife and Countryside Act in respect of SSSI.

Executive Summary of Natural England's Advice

The following comments are key points in Natural England's advice and further details on them can be found in the Relevant Representation below and/or will be provided in the Written Representation.

Further information is requested to ensure that the Solent Waders and Brent Goose sites are returned to appropriate condition and available for use by the birds prior to the start of the overwintering period. Low Use and candidate sites should also be considered.

Mitigation for noise and visual disturbance to SPA and supporting habitat should be agreed.

Cumulative impacts of the Onshore HVDC Route Construction/Cable Installation in Portsmouth 19/01368/FUL Flood and Coastal Erosion Management Scheme Phase 4B should be assessed.

Further information is requested to inform the mitigation and compensation measures in relation to loss of lowland meadow habitat at Denmead and King's Pond SINC to include a long term management strategy.

Natural England has concerns that the development proposal has not set out how it will address all residual biodiversity losses. The scale and extent of the development proposal will lead to a loss of lowland meadow, broadleaf trees and woodland, species-rich hedgerow, loss of semi-improved and calcareous grassland and potential impacts to protected species.

The Landscape and Biodiversity Strategy should be prepared to include measures for mitigating impacts to protected species and habitats and to include biodiversity compensation measures for any residual biodiversity losses that cannot be fully mitigated on site. If this cannot be secured within the land ownership boundary, consideration could be given to setting up a fund to secure wider ecological enhancements through projects in each district area.

Given impacts to landscape character and setting of South Downs National Park, further consideration should be given to opportunities for landscape enhancements within the South Downs National Park to compensate for these adverse effects.

Natural England supports the MMO's position on arbitration. Please see the written representations submitted on the Hornsea 3, Vanguard and Thanet Ext project PINS applications. Futher information is requested in the DCO and DML.

[7] National Planning Policy Framework (July 2018), para 176; PINS Advice Note 10: Habitats Regulation Assessment for nationally significant infrastructure projects, p.3.

2. Relevant Representations

2.1. Natural England's advice in these relevant representations is based on information submitted by AQUIND Limited in support of its application for a Development Consent Order ('DCO') in relation to AQUIND Interconnector ('the project'). The project refers to the construction and operation of a 2000 MW subsea and underground High Voltage Direct Current (HVDC) bi-directional electric power transmission link between the south coast of England and Normandy in France. The interconnector makes landfall at Eastney, Portsmouth, and the grid connection at the existing National Grid substation at Lovedean, Hampshire.

2.2. Natural England has been working closely with AQUIND Limited to provide advice and guidance on the AQUIND Interconnector since 2018. Natural England has also been working with the Marine Management Organisation (MMO) and the Joint Nature Conservation Committee (JNCC) to provide coordinated advice in relation to each of our remits. Natural England has also held discussions with the developer to develop statements of common ground as part of the examination process and to try and resolve outstanding issues.

2.3. These relevant representations contain a summary of what Natural England considers the main nature conservation, landscape and related issues[8] to be in relation to the DCO application as well as the Deemed Marine Licence (DML) contained therein, and indicate the principal submissions that it wishes to make at this point. Natural England will develop these points further as appropriate during the examination process. It may have further or additional points to make, particularly if further information about the project becomes available.

2.4. Section 3 of these representations identifies the natural features potentially affected by this application. Section 4 and 5 summarises Natural England's overall view of the application and the main issues which it considers need to be addressed by the Secretary of State.

2.5. Section 4 and 5 of these representations sets out all the significant issues which remain outstanding, and which Natural England advises should be addressed by AQUIND Limited and the Examining Authority as part of the examination process in order to ensure that the project can properly be consented. These are primarily issues on which further information would be required in order to allow the Examining Authority to undertake its task or where further work is required to determine the effects of the project and to develop and agree mitigation proposals.

2.6. Natural England will continue discussions with AQUIND Limited to seek to resolve these concerns and agree outstanding matters in a statement of common ground. Failing satisfactory agreement, Natural England advises that the matters set out in sections 3 to 5 will require consideration by the Examining Authority as part of the examination process.

2.7. The Examining Authority may wish to ensure that the matters set out in these relevant representations are addressed as part of the Examining Authority's first set of questions to ensure the provision of information early in the examination process.

[8] PINS NSIP Advice Note 11 Annex C sets out Natural England's role in infrastructure planning. https://infrastructure.planninginspectorate.gov.uk/wp-content/uploads/2015/10/PINS-Advice-Note-11_AnnexC_20150928.pdf

2.8. Further information to support Natural England's Relevant Representation, where more detailed explanation of issues has been considered relevant may be found in the Appendices:

- Appendix 1: Natural England's draft paper on Cable protection

3. **The natural features potentially affected by this application**

3.1. The project redline boundary extends from the UK/France Exclusive Economic Zone (EEZ) boundary line to the landfall location at Eastney Portsmouth, continuing onshore to the National Grid substation at Lovedean, Hampshire.

3.2. The designated sites and interest features included within Tables 2.1 and 2.2 are those which may be affected by the proposed project. Links have been provided to the citation or conservation objectives of designated sites. We have provided links, rather than hard copies, as these are large and live documents which are updated on a regular basis to incorporate the most up to date evidence. In order to avoid potentially out of date or inaccurate documents being referred to during the examination we recommend that these links are utilised. If the examiner would also like hard copies please let us know at the earliest opportunity.

Table 2.1: European Sites that may be affected by the proposed project

Site Name	Citation	Features for which outstanding concerns remain
Chichester and Langstone Harbours SPA	Chichester and Langstone Harbours SPA – UK9011011	Bar-tailed godwit (*Limosa lapponica*) – Non-breeding; Curlew (*Numenius arquata*) – Non-breeding; Dark-bellied brent goose (*Branta bernicla*) – Non-breeding; Dunlin (*Calidris enelo*) – Non-breeding; Grey plover (*Pluvialis squatarola*) – Non-breeding; Pintail (*Anas acuta*) – Non-breeding; Red-breasted merganser (*Mergus serrator*) – Non-breeding; Redshank (*Tringa enelop*) – Non-breeding; Ringed plover (*Charadrius hiaticula*) – Non-breeding; Sanderling (*Calidris alba*) – Non-breeding; Shelduck (*Tadorna tadorna*) – Non-breeding; Shoveler (*Spatula clypeata*) – Non-breeding; Teal (*Anas crecca*) – Non-breeding; Turnstone (*Arenaria interpres*) – Non-breeding; Wigeon (*Mareca enelope*) – Non-breeding; Waterbird assemblage – Non-breeding.
Portsmouth Harbour SPA	Portsmouth Harbour SPA – UK9011051	Black-tailed godwit (*Limosa limosa islandica*), Non-breeding; Dark-bellied brent goose (*Branta bernicla bernicla)*, Non-breeding; Dunlin (*Calidris enelo enelo*), Non-breeding; Red-breasted merganser (*Mergus serrator*), Non-breeding

Table 2.2: National Sites that may be affected by the proposed project

Site Name	Citation	Features for which outstanding concerns remain
Langstone Harbour SSSI	Langstone Harbour SSSI – 1001182	Aggreagtions of non-breeding birds – Bar-tailed godwit (*Limosa lapponica*); Aggreagtions of non-breeding birds – Curlew (*Numenius arquata*); Aggreagtions of non-breeding birds – Dark-bellied brent goose (*Branta bernicla*); Aggreagtions of non-breeding birds – Dunlin (*Calidris enelo*); Aggreagtions of non-breeding birds – Grey plover (*Pluvialis squatarola*); Aggreagtions of non-breeding birds – Pintail (*Anas acuta*); Aggreagtions of non-breeding birds – Red-breasted merganser (*Mergus serrator*); Aggreagtions of non-breeding birds – Redshank (*Tringa enelop*); Aggreagtions of non-breeding birds – Ringed plover (*Charadrius hiaticula*); Aggreagtions of non-breeding birds – Sanderling (*Calidris alba*); Aggreagtions of non-breeding birds – Shelduck (*Tadorna tadorna*); Aggreagtions of non-breeding birds – Shoveler (*Spatula clypeata*); Aggreagtions of non-breeding birds – Teal (*Anas crecca*); Aggreagtions of non-breeding birds – Turnstone (*Arenaria interpres*); Aggreagtions of non-breeding birds – Wigeon (*Mareca enelope*).

3.3. An application for a wildlife licence may be required if the application will have impacts on European or nationally protected species. We advise the applicant to apply for a licence at the earliest opportunity for the following species:

- Badger (*Meles meles*)

3.4. The following areas of non-designated but valuable and sensitive habitat are affected:

- Denmead Meadows
- Kings Pond Meadow Sites of Importance for Nature Conservation (SINC)
- Milton Common SINC

- Unimproved neutral grassland
- Semi-improved neutral and calcareous grassland
- Lowland meadow (at Denmead Meadows)
- Broadleaf trees and woodland
- Species-rich hedgerow

4. **The overall position of Natural England**

4.1. Natural England's headline points are that on the basis of the information submitted:

4.1.1. Natural England is satisfied that potential impacts on the following components (of relevance to Natural England's statutory remit) have been adequately characterised and assessed:

Chapter 6 – Physical Processes
Chapter 7 – Marine Water and Sediment Quality
Chapter 8 – Intertidal and Benthic Ecology
Chapter 9 – Fish and Shellfish
Chapter 10 – Marine Mammals and Basking Sharks
Chapter 11 – Marine Ornithology
Chapter 17 – Soils and Agricultural Land Use
Chapter 23 – Air quality
Environmental Statement – Volume 3 – Appendix 8.5 Marine Conservation Zone Assessment

4.1.2. Natural England is satisfied that it can be excluded beyond reasonable scientific doubt that the project would not have an adverse effect on the integrity of the following European Sites:

SACs / SPAs / Ramsar sites

Solent Maritime SAC
South Wight Maritime SAC
Solent and Isle of Wight Lagoons SAC
Wight-Barfleur Reef SAC
Studland to Portland SAC
River Itchen SAC
River Avon SAC
Solent and Dorset Coast pSPA (now Solent and Dorset Coast Special Protection Area)
Solent and Southampton Water SPA/Ramsar site
Pagham Harbour SPA/Ramsar site
Alderney West Coast and Burhou Islands Ramsar site
Plymouth Sound and Estuaries SAC

4.1.3. Natural England is satisfied that there is no significant risk of the project hindering the conservation objectives of the following Marine Conservation Zones:

Offshore Overfalls
Utopia
Bembridge
Selsey Bill and the Hounds
Offshore Brighton

4.1.4. Natural England considers that the project could have impacts to the conservation of the wildlife and beauty of the South Downs National Park.

4.1.5. Natural England welcomes the commitment to a Landscape and Biodiveristy Strategy. We advise that the details are progressed in agreement with the district ecological and landscape officers to ensure a positive effect on the natural environment and to meet the

principles set out in paragraph 170 of the National Planning Policy Framework. Natural England notes that this commitment is reflected in proposed Requirement 7 of the draft DCO. Natural England therefore advises that this requirement should be secured by a suitably worded requirement in the DCO, if the project is approved.

4.1.6. Natural England advises that, if approved, the project must be subject to all necessary and appropriate requirements which ensure that unacceptable environmental impacts either do not occur or are sufficiently mitigated.

4.2. Natural England's advice is that there are a number of matters which have not been resolved satisfactorily as part of the pre-application process that must be addressed by AQUIND Limited and the Examining Authority as part of the examination and consenting process before development consent can be granted. Some of these matters, (as set out below 4.3 – 5.1) below are so significant that it would be inappropriate to permit the project to proceed unless they were adequately addressed. However, Natural England's advice is that all these matters are capable of being overcome.

4.3. Unresolved Matters

4.3.4. Further information required to determine impact on designated sites

Solent Waders and Brent Goose Strategy

The route of the terrestrial onshore cable runs adjacent to designated sites and through sites identified as supporting habitat in the Solent Waders and Brent Goose Strategy (SWBGS).

The terrestrial Solent wader and brent goose sites are located on land that falls outside of the Solent SPAs boundaries (as listed in table 2.1). However, as this land is frequently used by SPA species (including qualifying features and assemblage species), it supports the functionality and integrity of the designated sites for these features. This land will contribute to the achievement of the SPAs' conservation objectives and is therefore protected in this context.

This land supports the ecological network by providing alternative roosting and foraging sites. The sites are classified in relation to the importance of the site within the ecological network and how these non-designated sites support the wider designated Solent SPA network. Sites are classified as Core Areas, Primary Support Areas, Secondary Support Areas, Low Use sites and Candidate sites. The preferred approach is for development to be located outside the network of sites.

Appendix 16.14 (Environmental Statement – Volume 3 – Appendix 16.14 Winter Working Restriction for Features of Chichester & Langstone Harbours SPA) sets out the winter working restrictions in relation to the Chichester and Langstone Harbours SPA and SWBGS sites. In order to determine the impact on designated sites, further information is requested in relation to the following principles that are referenced in Appendix 16.14.

PRINCIPLE 1

Natural England welcomes the proposal to exclude construction works within the core, primary or secondary sites that overlap with the Proposed Developments Order Limits from 01 October to 31 March. It is noted that within P11, the gravel car park, boat yard linking roadway is a core site and an exception to the applicant's proposal. Provided a plan of this exclusion area is agreed with Natural

England prior to this phase of development and this is secured within the construction method statement, Natural England is content with this proposed exception.

Further information is required to ensure that the sites are returned to appropriate condition and available for use by the birds prior to the start of the overwintering period. Natural England recommends that the habitat at the site is recreated to the same, or enhanced, ecological function in advance of 01 October. Natural England request details of the habitat type to be recreated and confirmation that it will be reinstated by 01 October.

We advise that this approach is secured by condition with any planning permission.

PRINCIPLE 2

It is noted that no buffer zones are applied to SWBGS sites to limit works away from their boundaries. We recommend that further consideration is given to noise and visual disturbance from the proposed construction works on adjacent or nearby SWBGS sites during the overwintering period. We recommend the measures suggested for Principle 7 and 8 are secured in these cases.

It is also noted that those sites categorised as 'low use' are also not part of the working restrictions. All Low Use sites have the potential to be used by waders or brent geese and have records of use. These sites support the existing network and provide alternative options within the network for use by SPA birds.

Natural England therefore recommends that Candidate sites and Low Use sites are also included in the working restriction. It is not clear from the documentation if any of these sites are affected by the development works. Clarity on this is requested and if any sites are affected Natural England requests further consideration of offsetting and mitigation options for the additional loss of these sites during the construction period.

PRINCIPLE 7 and 8

Principle 7 currently applies to areas of Chichester and Langstone Harbour SPA identified as supporting this species. We advise that this restriction is amended to consider the nearest point of the SPA or any SPA supporting habitat during the over-wintering period.

The following condition is recommended:

Wherever possible, percussive piling or works with heavy machinery (i.e. plant resulting in a noise level in excess of 69dbAmax – measured at the sensitive receptor) should be avoided during the bird overwintering period (i.e. October to March inclusive).

Note: The sensitive receptor is the nearest point of the SPA or any SPA supporting habitat (e.g. high tide roosting site).

If such a condition is problematic to the applicant than Natural England will consider any implications of the proposals on the SPA bird interests on a case by case basis through our Discretionary Advice Service.

We advise that further consideration is given to the visual disturbance of SPA birds during the overwinter period. Consideration should be given to the use of visual screening of the construction works where necessary.

4.3.5. Non-designated sites – Denmead Meadows and King's Pond

The route of the terrestrial onshore cable runs through sensitive lowland meadow habitats at Denmead. Natural England welcomes that the lowland meadow habitats at Denmead Meadow and King's Pond SINC have been recognised as of national importance in the assessment. It is Natural England's preference that these sensitive and important habitats are avoided in the first instance. Our earlier consultation responses raised our preference for the road route at Denmead Meadows.

Natural England welcomes the proposal to directional drill under part of Denmead Meadows and we note the technical constraints have limited the extent that this is possible.

However, Natural England is concerned that the location of the construction compound, jointing bay and section of cable to be trenched across these meadows will result in damage to this priority habitat and a residual loss of biodiversity. Further information is requested to inform the mitigation measures and compensation measures, as necessary.

During consultation at the pre-application stage, we advised that a comprehensive botanical survey of these fields is undertaken to include a detailed vegetation survey with population counts of green-winged orchids. However, we have concerns about the reliance on DAFOR values for many of the meadows and in particular Priority Habitat Meadow 3 worst affected. It is unclear why detailed botanical surveys were not undertaken of all of the affected fields and no population counts were completed.

Natural England has concerns about the scale of the impact of the proposals on Priority Meadow 3 in relation to the construction compound. We also have concerns about the impact of the jointing bay and trenched section. It is our initial view that whilst poor management of some of the King's Pond area fields (heavy horse grazing) has led to signatures of improvement that capacity for restoration to MG5 remains.

Therefore, Natural England strongly recommends that additional information is requested in order to further inform a comprehensive mitigation, management and monitoring strategy to ensure that all residual impacts have been addressed.

Further details are requested as follows:

- A timeline of the schedule of works to take place on Meadow 3 (compound) including the pre translocation seed collection, removal of the turves and sub soil, preparation of the compound and proposed reinstatement of the turves and meadow following completion of construction works. The length of time that the turves are stored will influence the likely success of this strategy. We strongly recommend that the time and working footprint are minimised as far as possible.
- Location and methods for the storage and maintenance of the turves during this process. The storage of the turves may lead to further damage of sensitive habitat
- We advise that the detailed method statement is agreed and secured and an ecological clerk of works is present during this work.
- Further information on proposed long term management of the fields to ensure the success of the translocation. Case studies have shown that the likely success of this approach is linked to how the habitat is managed after translocation. We therefore advise that a long term management strategy for the wider Denmead meadows and King's Pond SINC is secured to ensure there is no residual loss.

4.3.6. Other non-designated sites, priority habitats, protected species and biodiversity

In the Department for Environment, Food and Rural Affairs (Defra) 25 Year Environment Plan, the Government has committed to making sure the existing requirements for net gain for biodiversity in national planning policy are strengthened and the current trend of biodiversity loss is halted. Net biodiversity gain ensures that all residual losses from a development are accounted for and addressed. Each scheme will then provide additional biodiversity gain over and above the residual loss. Natural England has concerns that the development proposal has not set out how it will address all residual losses.

The scale and extent of the development proposal will lead to a loss of lowland meadow (as discussed above), broadleaf trees and woodland, species-rich hedgerow, loss of semi-improved and calcareous grassland. In all cases, impacts should be avoided in the first instance through minimising the footprint of the works.

Whilst it is noted that replacement trees, hedgerows and grasslands will be replanted, further consideration is required to address the risk of this approach and time to reach maturity to ensure no residual loss. For sections of species-rich hedgerows, Natural England advises that consideration is given to coppicing hedgerows such that the hedgerow can be removed intact and replaced after the work has been completed.

Natural England welcomes the committement to a Landscape and Biodiversity Strategy. This Strategy can be progressed in agreement with district ecologists to ensure residual losses are addressed by protecting and improving the local ecology. We advise that further consideration is given to strengthening ecological networks and wildlife corridors. The Landscape and Biodiversity Strategy should include measures for mitigating impacts on protected species and habitats and include biodiversity compensation measures for any residual biodiversity losses that cannot be fully mitigated on site. If this cannot be secured within the land ownership boundary, consideration could be given to setting up a fund to secure wider ecological enhancements through projects in each district area.

Natural England advises that the Landscape and Biodiversity Strategy includes detailed mitigation measures and enhancement strategies for bats, reptiles, badgers and hedgehogs for agreement with the district ecologists.

The biodiversity metric designed by Defra (the Defra metric) has been used as the basis for the assessment of biodiversity impact for a number of major developments. The Defra metric provides a methodology under which the biodiversity value of sites can be calculated transparently and consistently. A number of measures are applied to ensure any habitat lost as a result of development is adequately compensated for, for example multipliers based on distance, risk and time to reach maturity.

We recommend that industry good practice principles for biodiversity net gain published by Chartered Institute of Ecology and Environmental Management (CIEEM), Institute of Environmental Management and Assessment (IEMA) and Construction Industry Research and Information Association (CIRIA) are used.

Protected Species

Natural England has published Standing Advice on protected species. Please note Standing Advice is a material consideration in the determination of applications in the same way as any individual response received from Natural England following consultation. If you have any specific questions not covered by our Standing Advice, or have difficulty in applying it to this application please contact us at consultations@naturalengland.org.uk.

Ancient Woodland, ancient and veteran trees

You should consider any impacts on ancient woodland and ancient and veteran trees in line with paragraph 175 of the National Planning Polciy Framework (NPPF). Natural England maintains the Ancient Woodland Inventory which can help identify ancient woodland. Natural England and the Forestry Commission have produced standing advice for planning authorities in relation to ancient woodland and ancient and veteran trees.

It is noted that a buffer of 15 metres will be retained between the ancient woodland and the proposed development. Standing advice refers to a minimum of 15 metres and it is Natural England preference that the buffer extents to at least 50 metres to ensure there will be no detrimental impact to this valuable habitat.

4.3.7. Landscape and visual effects

The proposed development is for a site within or close to a nationally designated landscape namely South Downs National Park. Natural England advises that the planning authority uses national and local policies, together with local landscape expertise and information to determine the proposal. The policy and statutory framework to guide your decision and the role of local advice are explained below.

Your decision should be guided by paragraph 172 of the National Planning Policy Framework which gives the highest status of protection for the 'landscape and scenic beauty' of Areas Of Oustanding Natural Beauty (AONB) and National Parks. For major development proposals, paragraph 172 sets out criteria to determine whether the development should exceptionally be permitted within the designated landscape.

Natural England advise that significant weight is given to the advice of the landscape advisor/planner for the National Park, as they will be best placed to provide you with detailed advice about this development proposal. Their knowledge of the site and its wider landscape setting, together with the aims and objectives of the park's management plan, will be a valuable contribution to the planning decision. Natural England strongly recommends that the Landscape Strategy for the convertor station is agreed with landscape officers at South Downs National Park. We advise that any landscape planting should be monitored and managed with replacement planting, as necessary, to ensure that the predicted medium to long term landscape improvements are realised.

It is noted that there is significant effects on the landscape character and setting of South Downs National Park. It is also noted that people using Monach's Way will be subject to adverse effects as a result of the development. Given these impacts, we advise that further consideration is given to opportunities for landscape enhancements within the South Downs National Park to compensate for these adverse effects. Projects to enhance the landscape by increase planting of trees of hedgerows would also deliver biodiversity gains, especially schemes to increase connectivity between ancient woodland areas and within ecological corridors. It is appreciated that this may fall outside of land ownership areas, however, enhancements could be secured via a landscape and biodiversity enhancement fund.

Alongside national policy you should also apply landscape policies set out in your development plan, or appropriate saved policies. Where available, a local Landscape Character Assessment can also be a

helpful guide to the landscape's sensitivity to this type of development and its capacity to accommodate the proposed development.

The statutory purposes of the National Park are to conserve and enhance the natural beauty, wildlife and cultural heritage of the park; and to promote opportunities for the understanding and enjoyment of the special qualities of the park by the public. You should assess the application carefully as to whether the proposed development would have a significant impact on or harm those statutory purposes. Relevant to this is the duty on public bodies to 'have regard' for those statutory purposes in carrying out their functions (section 11 A(2) of the National Parks and Access to the Countryside Act 1949 (as amended)). The Planning Practice Guidance confirms that this duty also applies to proposals outside the designated area but impacting on its natural beauty.

4.3.8. Soil and Land Quality

From the documents accompanying the consultation, Natural England considers this application falls outside the scope of the Development Management Procedure Order (as amended) consultation arrangements, as the proposed development would not appear to lead to the loss of over 20 ha 'best and most versatile' agricultural land (paragraph 170 and 171 of the National Planning Policy Framework).

For this reason Natural England does not propose to make any detailed comments in relation to agricultural land quality and soils, although more general guidance is available in Defra *Construction Code of Practice for the Sustainable Use of Soils on Construction Sites*, and we recommend that this is followed. If, however, you consider the proposal has significant implications for further loss of 'best and most versatile' agricultural land, we would be pleased to discuss the matter further.

4.3.9. Cumulative effects

The proposed timing of the works Onshore HVDC Route Construction/Cable Installation in Portsmouth are likely to coincide with 19/01368/FUL Flood and Coastal Erosion Management Scheme - North Portsea Island Phase 4B Coastline Between Milton Common And Kendalls Wharf Eastern Road Portsmouth. Further information is requested on the cumulative construction effects of both these schemes on the designated sites and supporting habitats.

Detailed working restrictions and mitigation measures have been agreed as part of the 19/01368/FUL scheme at Milton Common, including additional land secured as mitigation in relation to impacts to SPA supporting habitat. Further assessment is therefore required of the significance of the effects on sensitive habitats and species in the EIA and HRA.

A planning application has also recently been submitted for development at Fraser Range Fort Cumberland, Southsea (19/00420/FUL), we advise that any cumulative effects of these schemes are considered in the EIA and HRA assessment

4.3.10. Decommissioning

Limited information has been provided about the impacts at the decommissioning stage, although it is stated that many of the onshore cables will be left in situ. It is advised that this is considered further. If further planting and offsetting is required at this stage, we advise that this is undertaken at the earliest opportunity to allow the replacement habitats and species to establish and reach maturity.

4.3.11. Construction Environmental Management Plan

Natural England advises a Construction Environmental Management Plan (CEMP) should be submitted to and approved in writing by the district ecologist/biodiversity officer that identifies the steps and procedures that will be implemented to avoid or mitigate constructional impacts on species and habitats. The CEMP should address the following impacts

- Storage of construction materials/chemicals and equipment
- Dust suppression
- Chemical and/or fuel run-off from construction into nearby watercourse(s)
- Waste disposal
- Noise/visual/vibrational impacts
- Visual screening (for SPA birds)
- Lighting on sensitive receptors

4.3.12. Other

SSSI

Please note that if your authority is minded to grant planning permission contrary to the advice in this letter, you are required under Section 28I (6) of the Wildlife and Countryside Act 1981 (as amended) to notify Natural England of the permission, the terms on which it is proposed to grant it and how, if at all, your authority has taken account of Natural England's advice. You must also allow a further period of 21 days before the operation can commence.

Solent and Dorset Coast Special Protection Area

Please note the Solent and Dorset Coast Special Protection Area is now a fully designated site.

5. Comments on the draft Development Consent Order (DCO) and Deemed Marine Licence (DML)

To assist consideration of the issues rised within the comments below they have been colour coded. Please see the key below which explains the meaning of the colour coding.

Red Natural England considers that the following issues are high risk and must be changed for us to agree.

Amber Natural England considers that if these issues are not addressed or resolved by the end of examination then they would become a high risk as set out above:

5.1. Comments on DCO and DML

Issue number	Condition number	Comment
DCO		
1	Part 1 1 (1)	No definition is provided for Statutory Nature Conservation Body.
2	Part 1 1 (1)	The definition of maintain appears appropriate, however, please also be aware NE do not consider cable protection to be part of operations and maintenance, or appropriate to be included for deployment over the lifetime of a project. Please see attached Natural England's draft paper on Cable protection as Annex 1.
3	Part 7 45	This article relates to arbitration. Natural England supports the MMO position on arbitration. Please see the written representations submitted on the Hornsea 3, Vanguard and Thanet Ext project PINS applications. Natural England would note that in the Tilbury 2 determination the Secretary of State agreed to the changes recommended by the ExA to remove the Deemed Marine Licence from such provisions.
Schedule 1 Project description		
4	Point 2 works 6 and 7	Cable protection is one of the most significant environmental impacts. The full extent of impact assessed and permitted should be given within the project description in both units of volume and area.
Schedule 2 Requirements		
5	Requirement 7 &15	The relevant statutory nature conservation body is not listed as a consultee on the landscaping scheme or the Construction Environmental Monitoring Plan. As detailed in section 3.3.3 above Natural England considers the content of this plan to be important mitigation for sensitive ecological recptors and that the advice of the Statutory Nature Conservation Body should be sought prior to the discharge of this requirement.
Schedule 15 Deemed Marine Licence		
6	Part 2 1	Cable protection is detailed here as covering a maximum of 0.7km^2. However, nowhere in the ES project description is an explanation provided or detail confirming exactly how much cable protection is assumed to be the worst case scenario or how this figure was reached. Can the applicant confirm if the area provided is for both cables or total? Does this figure include the cable protection required for cable crossings?
7	Part 2 Conditions 3&4	The pre-construction conditions do not include a requirement to provide details of micro-siting around biogenic or geogenic reef features identified as part of the pre-construction monitoring condition 3. A requirement to have all micro-siting approved by MMO in consultation with Natural England should be included under condition 4.

8	Part 3	NE supports the MMO position with regard to appeals.

NATURAL ENGLAND
19th February 2020

APPENDIX 7

JNCC S.56 RELEVANT REPRESENTATION

Inverdee House, Baxter Street,
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THE PLANNING ACT 2008

THE INFRASTRUCTURE PLANNING (EXAMINATION PROCEDURE) RULES 2010

AQUIND Interconnector

Relevant Representations of Joint Nature Conservation Committee (JNCC)

For:

The construction and operation of a 2000 MW subsea and underground High Voltage Direct Current (HVDC) bi-directional electric power transmission link between the south coast of England and Normandy in France.

Planning Inspectorate Reference: EN020022

JNCC Reference: 7047

19 February 2020

JNCC's Relevant Representation in respect of AQUIND Interconnector

Planning Inspectorate Reference: EN020022

1. Introduction:

1.1. JNCC are a non-departmental public body established under the Environment Protection Act 1990 and reconstituted by the Natural Environment and Rural Communities Act 2006 ("NERC Act"). JNCC advise the UK Government and devolved administrations on UK-wide and international nature conservation. JNCC's remit within the UK marine environment is for the offshore marine environment from the limit of territorial waters out to the boundary of the exclusive economic zone.

1.2. Whilst the laying of interconnector cables in offshore waters do not require a marine licence, associated operations, such as cable protection, do require a marine licence, for which JNCC are a statutory consultee. In addition, JNCC are often consulted by operators as best practice, to ensure the potential impacts to offshore marine habitats and species are minimised.

1.3. JNCC have been consulted throughout all stages of the AQUIND Interconnector at the request of the operator.

2. Relevant Representations:

2.1. JNCC's advice in these relevant representations is based on information submitted by AQUIND Limited in support of its application for a Development Consent Order in relation to the AQUIND Interconnector. The project refers to the construction and operation of a 2000MW subsea and underground High Voltage Direct Current (HVDC) bidirectional electric power transmission link between the south coast of England and Normandy in France. The interconnector makes landfall at Eastney, Portsmouth, and the grid connection at the existing National Grid substation at Lovedean, Hampshire.

2.2. JNCC have been working closely with AQUIND Ltd to provide advice and guidance on the AQUIND Interconnector since 2018. JNCC have also been working with the Marine Management Organisation (MMO) and Natural England to provide co-ordinated advice in relation to each of the organisations' remits.

2.3. JNCC's response is based on the information contained in the Environmental Statement (PINS Ref: EN020022, Document: 6.1; 14 NOVEMBER 2019) and associated appendices.

2.4. At this stage, JNCC have no further comments and are satisfied that all matters of concern, within our remit, have been addressed. A summary of JNCC's position is included below in Section 3.

2.5. JNCC welcome continued engagement with AQUIND Ltd. throughout the application process to ensure that any nature conservation issues within the offshore marine environment which may arise are addressed.

3. JNCC's Position

3.1. JNCC are satisfied that potential impacts on the following components (within JNCC's remit) have been adequately characterised and assessed:

Chapter 6- Physical Processes;

Chapter 7- Marine Water and Sediment Quality;
Chapter 8- Intertidal and Benthic Ecology;
Chapter 10- Marine Mammals and Basking Sharks;
Chapter 11- Marine Ornithology;
Chapter 29- Cumulative Impacts;
and all associated appendices and figures.

3.2. JNCC are satisfied that there is no significant risk of the project hindering the conservation objectives of the following Marine Conservation Zones (MCZs):

Offshore Overfalls MCZ;
Offshore Brighton MCZ.

3.3. JNCC's advice is that there are no major or minor matters outstanding and all matters within JNCC's remit have been resolved satisfactorily as part of the pre-application process and/or within the Environmental Statement.

3.4. JNCC have one minor comment on the application documents that would be helpful to address in future applications:

3.4.1. Figures. It would be useful for future figures to include the territorial boundary to allow easy assessment of whether operations are within or outwith territorial waters.

3.4.2. Cumulative assessment within Chapter 11. JNCC note that just because the impact of other projects may only cause temporary and/or localised disturbance independently, it does not rule out cumulative impacts of these projects in-combination to bird species. Particularly for bird species that are sensitive to anthropogenic disturbance and loss of foraging habitat. The cumulative/ in-combination impact should be discussed in this context.

Please contact me with any questions regarding the above comments.

Yours sincerely,

[redacted]

Hannah Lawson

Offshore Industries Adviser

Email: Hannah.lawson@jncc.gov.uk

Telephone: 01224 26657

APPENDIX 8

COMMUNICATIONS WITH JNCC ON CUMULATIVE QUERIES

Sarah Lister

From: Thomas Fey <Thomas.Fey@jncc.gov.uk>
Sent: 06 April 2020 12:30
To: Sarah Lister
Subject: RE: Further Ornithological information

Morning Sarah,

Thank you for your response below. I can confirm that the first item can be fully closed. It's good to know we worked it out on the phone call and then made sure afterwards. In future work, the specifics of how in-combination assessments have been made could potentially be slightly more rounded out in the documents, but as you say this is a comment to bear in mind for the future.

Regarding comment 2, thank you for clearly signposting to further areas within the documents and making it clear there was a process in place for decisions. We can't really argue with not wanting to have yet more pages, that's certainly a legitimate aim, however over a length of route such as this one we think a high level series of maps (perhaps 4-5) might do well in showing the total combined operations with respect to an in-combination assessment. Again, we believe this is something to review in future work and we do not expect this from this piece of work.

I'm well at home thanks, I hope you are too!

Kind regards,
Thomas

Thomas Fey
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☎ Tel: 01224 266572 ✉ Email: Thomas.Fey@jncc.gov.uk

jncc.defra.gov.uk

25 years delivering innovative solutions to realise the value of nature.

JNCC have been monitoring the outbreak of COVID-19 closely and developed a response plan. As a result, the vast majority of our staff are working from home and adhering to the government's advice on social distancing and travel restrictions. Whilst we are taking these actions we are available for business as usual. We will respond to enquiries as promptly as possible. However, there may be some delays due to the current constraints and we ask for your understanding and patience.

From: Sarah Lister <sarahl@naturalpower.com>
Sent: 02 April 2020 16:57
To: Thomas Fey <Thomas.Fey@jncc.gov.uk>
Cc: Ross Hodson <rossho@naturalpower.com>; Rosie Neal <rosien@naturalpower.com>; Julie Miller <juliem@naturalpower.com>
Subject: RE: Further Ornithological information
Importance: High

Hi Thomas,

Thanks for your time attending the teleconference the other day and for providing the additional clarification below. Much appreciated. I hope to send the minutes and revised SOCG out this month sometime.

1. On your first point below, Julie has responded as follows;

As per the clarifications provided on the call (26th March 2020), it can be confirmed that all of the developments agreed upon for inclusion in the cumulative assessment were assessed in-combination and cumulatively across the whole list, and not simply in a pairwise fashion. The list of projects considered was agreed by the MMO (See Environmental Statement Volume 3, Appendix 11.2 Marine Ornithology Cumulative Assessment Matrix).
For the cumulative assessment, Natural Power followed Planning Inspectorate Guidance note 17 (https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/) which recommends the format and layout of the assessment. In Table 1 of Environmental Statement Volume 3, Appendix 11.2, 'Cumulative Assessment Matrix' , each development is assessed cumulatively, in-combination with all others, and not simply in a pairwise consideration with the proposed Aquind development. Given the assessment outcomes, no development progressed to stage 3 or 4 of the process.

2. And with regards the ZOIs query, a summary table of ZOIs was provided in Chapter 29, Table 29.5 and then a set of figures was provided to illustrate the locations of the projects that were shown in the long list cumulative matrices. You didn't miss anything (well done for that!). As we assessed over 120 projects, we had to produce five individual figures to illustrate them all (Figures 29.1-29.5). At this time, the decision was made to not include the mapping of ZOIs for topics on these figures as it would make the figures very busy and hard to read, and if we simply zoomed out far enough and had one map showing all the projects and the ZOI for a topic, this again is not ideal (look at Figure 8.1 of the HRA (document reference 6.8) to see how busy that is!), and if we provided a set of maps for each topic ZOI then this would amount to an additional 45 maps. So we had to make a call and with regard to the PINS Advice Note 17 which revealed that it was not an absolute requirement of the assessment. Being a long linear marine project that needed to include French projects, we didn't want to make the ES any more document heavy than it already is! I hope you can understand our predicament!

As such, is this something that you feel is necessary to be actioned by us or, as with the query on assessment below, is it something that remains simply as a comment and to bear in mind for future?

I would appreciate if you could let me know whether we have closed out the first item for you (and if not, why?), and your thoughts on the second item and I am happy to discuss this further if you wish.

In the meantime, I hope that you are staying well.

Kind regards, Sarah

Sarah Lister
Senior Project Manager
naturalpower.com
renewable energy consultants

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email: sarahl@naturalpower.com

From: Thomas Fey <Thomas.Fey@jncc.gov.uk>
Sent: 27 March 2020 17:18
To: Sarah Lister <sarahl@naturalpower.com>
Subject: Further Ornithological information

Hi Sarah,

As per our conversations in the meeting yesterday I followed up with our ornithologists regarding our comment.

As I suspected and spoke of in the conference call, our interpretation of the previous documents was that the assessment of interacting projects was carried out in a pair-wise comparison i.e. that each operation was individually assessed for in combination effects with the Aquind project but that an overall assessment with all interacting projects was not carried out. It is now my understanding when we went over this yesterday that, in fact, a full in-combination assessment was carried out which included all interacting activities and not just those on a pair-wise basis.

We have also taken a look at the Planning Inspectorate Cumulative Effects Assessment (August 2019) Advice Note and noted specifically 3.2.3 where the point is made in this manner:
"*Care should be taken in this regard, it is important not to exclude consideration of effects deemed individually not significant from the CEA, since the cumulative effect of a number of non-significant effects could in itself be significant*."

Although we do not usually interact with this Planning Inspectorate advice note we feel that this part of Stage 2 reflects our interpretation of cumulative effects assessments.

We also noted the recommendation in section 3.1 to create a ZOI summary table (which I believe aligns with Appendix 11.2 of the ES) but also that these ZOI should be mapped. This information in a figure or a series of figures would be really useful within the ES (apologies if this was presented and we missed it!) and in future work.

So moving forward it would be good to get confirmation of the manner of the cumulative assessment (pair-wise or not) but our comments remain only as comments and not as objections.

Kind regards,
Thomas

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JNCC have been monitoring the outbreak of COVID-19 closely and developed a response plan. As a result, the vast majority of our staff are working from home and adhering to the government's advice on social distancing and travel restrictions. Whilst we are taking these actions we are available for business as usual. We will respond to enquiries as promptly as possible. However, there may be some delays due to the current constraints and we ask for your understanding and patience.

APPENDIX 9

AQUIND CABLE PROTECTION TECHNICAL NOTE

AQUIND Limited

AQUIND INTERCONNECTOR

Cable Protection Technical Note

Document Ref.: 1223652

PINS Ref.: EN020022

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Cable Protection Technical Note

PINS REF.: EN020022

DOCUMENT: CABLE PROTECTION TECHNICAL NOTE

DATE: JUNE 2020

DOCUMENT HISTORY

Document Ref.	1223652
Revision	B
Document Owner	Natural Power Consultants Ltd.
Prepared by	Herbert Smith Freehills/Natural Power Consultants Ltd.
Date	29 May 2020
Approved by	Martyn Jarvis/Ross Hodson
Date	12 June 2020

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1. INTRODUCTION

1.1.1. This technical note has been produced in response to discussions between AQUIND Ltd. ('the Applicant') and Natural England ('NE') and the Marine Management Organisation ('MMO') held on the 24 and 26 March 2020 regarding the deployment of cable protection during construction and operation (including maintenance and repairs) of the AQUIND Interconnector (the 'Proposed Development').

1.1.2. This note is supplemental to the documentation submitted on the 14 November 2019 to the Planning Inspectorate ('PINS') that forms the application for Development Consent Order ('DCO') ('the Application') and should be read in conjunction with the Application documentation[1]. Further signposting to relevant application documents will be provided within this note.

1.1.3. This note will be shared with NE and the MMO in order to progress discussions on extended licensing and control measures for cable protection deployment for the Proposed Development during operation. It is acknowledged that both NE and MMO have submitted Relevant Representations (RRs) on the Application already and that NE has already shared '*Appendix 1 - draft paper on Cable Protection'* with PINS and the Applicant as part of the section 56 process, which constitutes NE's current position with regards to extended licencing and control of cable protection.

[1] Available online at: https://infrastructure.planninginspectorate.gov.uk/projects/south-east/aquind-interconnector/?ipcsection=docs (last accessed 22/04/2020)

2. BACKGROUND

2.1. MARINE LICENCING

2.1.1. The following paragraphs provides the Applicant's understanding of the MMO and NE's view on the marine licencing requirements for cable protection in relation to the Proposed Development based on discussions to date with both.

2.1.2. In July 2018, the MMO advised that under Section 81 (5) of the Marine and Coastal Access Act 2009 (MCAA), the offshore cables forming part of the Proposed Development are exempt submarine cables. Section 81(1) MCAA confirms that the laying and maintaining of an offshore stretch of an exempt submarine cable does not require a marine licence. The laying of such a submarine cable within 12 nmi (i.e. the inshore stretch) does however require a marine licence in accordance with Section 66 MCAA.

2.1.3. Section 81 (2)(a) of MCAA confirms that where Section 81(1) has effect in relation to part (but not the whole) of an exempt submarine cable, as is the case in respect of the submarine cables forming part of the Proposed Development, the appropriate licensing authority must grant any application made to it for a marine licence for the carrying on of a licensable marine activity in the course of laying any inshore stretch of cable.

2.1.4. In the advice received from the MMO (see Appendix 1), activities that would be considered as cable laying activities include;

- Clearance dredging and side casting; and
- The use of rock and mattressing to fill gulleys and reduce freespans.

Accordingly, both of these activities (when carried out in relation to cable laying) require a marine licence within 12 nmi but *do not* require a marine licence if undertaken beyond 12 nmi.

2.1.5. Section 81(1) and (2)(b) of MCAA also provides that a marine licence is not required for the maintenance of any part of an exempt submarine cable. The MMO's view[2] is that maintenance activities would include;

- the removal and replacement of defective cable sections,
- removal of sediment to undertake repairs,
- the removal/replacement of cable protection to access the cable.

2.1.6. Accordingly, none of the maintenance activities associated with the submarine cables forming part of the Proposed Development require any form of marine licence.

2.1.7. However, it is the MMO's view that the laying of cable protection in connection with a submarine cable is not an activity comprised in the laying or maintenance of a submarine cable, and therefore Section 81of MCAA does not apply to the deposition of any mattressing

[2] MMO Subsea Cables Desk Note (January 2018). Available online at: https://www.escaeu.org/news/?newsid=71 (last accessed 08/04/2020)

or rock protection required. Therefore the MMO consider a marine licence is required for the laying of cable protection at all times, both within and beyond the 12 nmi limit.

2.1.8. The Marine Licensing Exempted Activities Order 2011 (as amended) states that a marine licence is not required to carry out emergency inspection or repair work to a submarine cable. Cable operators do not need approval from the MMO to undertake an emergency inspection or repair but are required to notify the MMO within 24 hours of the commencement of the emergency works. This exemption *does not* apply to the deposit of any associated cable protection in relation to the emergency works.

2.1.9. Based on the MMO's previous advice in relation to the above legislative requirements regarding what activities are licensable and the MMO's views on what does and what does not fall within the scope of maintenance activities, the deposition of rock or mattressing onto the seabed which acts as cable protection within the UK Marine Area requires a marine licence where:

- the cable protection is placed during construction of the Proposed Development (which is therefore typically included in the marine licence for the construction of the Proposed Development); and
- the cable protection is placed during the operational phase of the Proposed Development in connection with maintenance or repair activities.

2.1.10. Previous advice from the MMO (Appendix 1) also states that placement of rock or mattressing on the seabed as part cable laying activities to fill gullys and reduce freespans would require a marine licence if located within 12 nmi but would not require a marine licence beyond 12 nmi.

2.1.11. **It would be useful if the MMO could advise as to whether the Applicant's understanding of the MMO's understanding of the legislative requirements is correct, and provide further rationale for any areas of disagreement?**

2.2. CONSULTATION

2.2.1. Discussions relating to the legislative requirements for marine licensing for the Proposed Development began in July 2018 and a meeting was held between the Applicant and the MMO in September 2018. At that meeting, discussions commenced on the potential for an extended licencing for cable protection to be implemented, to cover additional cable protection placed in connection with maintenance and/or repair works during operation (see Item 5(b) of Appendix 2).

2.2.2. The MMO and the Applicant discussed the practicalities of repeated marine licence applications for the laying of cable protection in connection with maintenance and repair works. In order to address the challenges of repeated applications, the MMO highlighted an approach whereby, if a reasonable contingency of cable protection was included in the deemed marine licence, and if the use of this contingency during the operational period was adequately assessed within the Environmental Statement (ES), then it would be possible to

incorporate a mechanism within the marine licence to allow cable protection placement during operation.

2.2.3. At the time, the discussions involved additional cable protection being able to be laid for a 15-year period during operation. This approach had previously been implemented for the Viking Link Interconnector marine licence (Activities 1.6 and 2.4 of Marine Licence L/2018/00075/1) where licence conditions were incorporated into the marine licence to control for this (Licence Conditions 5.2.35 to 5.2.42).

2.2.4. Accordingly, it was agreed during the September 2018 meeting that this approach would be beneficial for all parties, and the Applicant undertook the additional work necessary to include such a contingency within the design parameters and for those additional cable protection parameters to be included within the Application and relevant assessments, including the environmental impact assessment, Habitat Regulations Assessment ('HRA') and Marine Conservation Zone ('MCZ') Assessment undertaken for marine topics. Further signposting of these assessments is provided within the Section 3 of this document.

2.2.5. Further discussion on this matter was then held during a meeting on 09 January 2019 where the MMO agreed that a percentage cable protection contingency could be included for maintenance and repair however further discussion would be required to discuss this percentage (see Appendix 3, Item 9).

2.2.6. The Applicant was at this time in the course of finalising the Preliminary Environmental Information report ('PEIR') which was consulted on in February 2019. A 10% contingency (i.e. 10% of the length of the UK Marine Cable Corridor) was calculated by AQUIND's engineering team to be an appropriate and realistic worst case contingency. This contingency was then included in the design parameters and assessments for cable protection which were undertaken and presented within the PEIR and consulted on as part of the consultation undertaken in accordance with Section 42 of Planning Act 2008.

2.2.7. Feedback on the PEIR from the MMO and NE did not raise any queries or concerns with regard to the way in which cable protection in connection with maintenance and repair had been included or assessed or the resultant preliminary view on the effects. However, ongoing email communications from the MMO requested further clarity and rationale on how the 10% contingency amount had been calculated.

2.2.8. In July 2019, the draft Deemed Marine Licence ('DML') was shared with the MMO and NE for review prior to submission of the Application. Feedback from the MMO highlighted that the mechanisms required for control of cable protection through the DML still needed further discussion, and that the 15-year period was satisfactory and was linked to what was considered to be the reasonable validity of the ES baseline. Feedback from NE on the draft DML however highlighted a need for further discussion, especially as the MMO and NE were not aligned in their advice on the laying of cable protection during the operational period. NE advised that a workshop was to be held with the MMO on 24 September 2019 to discuss this topic, in particular in order to draft guidance.

2.2.9. Given that the Applicant's submission date for the Application was October 2019, further information was provided by email to the MMO in relation to the rationale for a 10% contingency (see Appendix 4). The MMO response advised that they could not provide any feedback until the workshop with NE had been held.

2.2.10. Accordingly, the additional 10% contingency for cable protection in connection with maintenance and repair activities was included within the design parameters for the Proposed Development and was assessed within all relevant assessments submitted with the Application.

2.2.11. On 01 October 2019, the MMO emailed their preliminary position on this matter as follows;

"*Following the workshop, we are finalising our position with NE regarding cable protection.*

I'm not sure at this stage when our position will be finalised and a communication issued. However, I can confirm that the MMO definition of maintenance does not include the laying of new cable protection in new locations. Cable maintenance for interconnector cables itself is not a licensable activity and this includes maintaining cable protection that was placed at the time of construction but this has to be within the footprint of that which was laid during construction.

Any new/ additional cable protection to be laid during the operations lifetime of a cable will be conditioned in the DML such that the Undertaker (Licence Holder) will need to submit an updated cable burial risk assessment and cable burial method statement no less than 6 weeks prior to proposed activity. The activity will only be permissible for 10 years following completion of construction. Surveys will need to be reviewed every 5 years to ensure they are robust and up to date. Please note this is a change to our previous position regarding timescales. This represents less surveying requirements however you'll need to apply for a variation more often."

2.2.12. As this advice was different to previous advice but was not a final position, in order to meet project deadlines, the Applicant submitted the application under the basis of the previous 15-year period advice. In so doing, it was considered that the assessments undertaken to inform the application, and finalised on the basis of previous agreements had, in any case, assessed a worst case cable protection footprint that was considered appropriate for the Proposed Development from engineering and ecological perspectives, regardless of this change of position from consultees.

2.2.13. Further advice received from the MMO later in October (see Appendix 5) stated that the rationale for the 10% contingency was satisfactory. As such, the inclusion of a 10% contingency for maintenance and repair was agreed in principle with the MMO however, it was considered that further discussions on the mechanisms for control within the DML and the timescales of the extended licence were the key items outstanding, and that these matters could be resolved during Examination.

2.2.14. Further meetings held with NE and the MMO in March 2020 has led to the preparation of this Cable Protection Technical Note to summarise the Applicant's position and understanding,

as well as to provide further clarity to consultees with the objective of agreeing the control mechanisms for the DML moving forward.

3. CABLE PROTECTION PARAMETERS AND ASSESSMENT

3.1. CABLE PROTECTION PARAMETERS

3.1.1. The RRs from the MMO and NE have requested further clarification on the cable protection parameters assessed within the ES for the Proposed Development during construction and operational phases.

3.1.2. In addition, on page 3 of the '*Appendix 1 - draft paper on Cable Protection'* provided by NE, there is a requirement that information is presented separately for the phases. Accordingly, this information for the Proposed Development is presented as follows;

- The amount of cable protection to be laid during the construction phase[3] of the Proposed Development includes;
  + 330,000 m^2 for rock placement (2 x rock berms (one for each cable pair) x 11 km x 15 m) where cables are not able to be buried and cable protection is required;
  + 37,800 m^2 for rock placement to be used for the Atlantic Cable Crossing;
  + 900 m^2 for rock placement to be used to fill the HDD pits.
  Therefore, during construction, a total maximum footprint is 368,700 m^2.

- The amount of cable protection to protect assets requiring maintenance and repair during the first 15 years of operation[4] is 330,000 m^2. The rationale for this includes (as described in Appendix 4 and the maximum footprint provided in Appendix 3.2 of the ES);
  + 88,200 m^2 for rock placement (2,940 m x 2 rock berms x 15 m as worst case) where cables become shallow buried or exposed (due to a mobile seabed) and require remedial cable protection for maintenance works;
  + 240,300 m^2 for rock placement (8,010 m x 2 rock berms x 15 m as worst case) where cables require repair due to internal faults (resulting from manufacture, materials or defects resulting from installation) or external faults (resulting from fishing or shipping interactions) and where worst case assumes that the repaired cable/s cannot be re-buried and requires cable protection;
  Therefore, during operation, a total maximum footprint is *c.*330,000 m^2.

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[3] The construction phase is the period between when the Applicant notifies the MMO prior to commencement of licensed activities (document reference 3.1: DCO, Schedule 15, Part 2, Condition 2(6)) and when the Applicant notifies the MMO on completion of construction of licensed activities (DCO, Schedule 15, Part 2, Condition 2(10)).

[4] This is slightly different wording than the wording required in NE's '*Appendix 1: Draft Paper On Cable Protection'* which is as follows;

'The amount of cable protection required for maintenance of that laid in construction over the lifetime of the project.'

We have changed this wording as NE's wording suggests that we need to identify the amount of cable protection required for maintaining existing cable protection that was laid on the seabed during construction which would already have been covered in the construction design parameters. Replacing existing cable protection is considered exempt from licensing as it is something done in the course of maintenance (as stated in paragraph 2.1.5 of this document).

- Therefore, the total amount of cable protection that has been assessed within the ES and which is to be left in situ at the time of decommissioning (or the total of the above bullet points) is equal to **698,700 m² (i.e. rounded up to 0.7 km²).**

3.1.3. These design parameters for cable protection for the Proposed Development are presented in a different format in Table 3 of Appendix 3.2 of Chapter 3 of the ES (Description of the Proposed Development) (document reference 6.3.3.2) and presented again below for ease of reference. As the table title states, this table provides the parameters for ***both pairs of cables***. To explain further, the information in this table (and above) relates to both trenches (two bundled cable pairs). In addition, the cable protection lengths presented in the table are those considered appropriate for calculating the area/footprint of cable protection as this is the parameter that has been assessed within the ES. The cable protection length presented within the draft DCO (Schedule 15, Part 2 Condition 1) represents the length of cable protection that is anticipated along the Marine Cable Corridor, not the summed total of all cable protection lengths that have been used to calculate the footprint or area.

Table 1 – Non-Burial Protection Measures along the Marine Cable Corridor Worst-Case Design Parameters for Two Bundled Cable Pairs

Activity	Duration / Timing	Disturbance / Footprint	Equipment
Non-burial Protection		Non-burial protection along approx. 11 km (10%) of the Marine Cable Route using one or a combination of the following cable protection measures. An allowance has also been added to include an additional 10% (11 km) non-burial contingency if further non-burial protection is required during maintenance/repair activities during the first 15 years of operation. Worst Case Scenario (WCS) is therefore 11 km + 11 km = 22 km **Concrete/frond mattressing** – Width of protection = 6 m per cable pair Height of protection = 0.3 m WCS therefore 2 x 11 km x 6 m Indicative maximum footprint of mattressing for construction-phase remedial protection= 132,000 m² **Rock Placement** - Width of protection = 15 m per cable Height of protection = 1.5 m WCS therefore 2 x 11 km x 15 m Indicative maximum footprint of construction phase remedial protection =330,000 m²	Mattress installation vessel Rock placement vessel

Activity	Duration / Timing	Disturbance / Footprint	Equipment
		These parameters do not include protection used as HDD exit pits or for the cable crossing design.	
Atlantic Crossing Protection (pre-lay berm) (Post-lay)	Within 2 – 12 months of cable installation, with crossing construction undertaken before and after cable installation	One pre-lay rock berm, which will be covered by the post lay berm eventually, approximately 100 m long and 30 m wide. Total footprint (total for two cable pairs) = 3000 m^2 Height of rock berm = 1.5 m Installation of two post-lay rock berms. Each berm up to approximately 30 m wide and 600 m long. Height of berm above seabed (or pre-lay berm) up to 1.5 m Total maximum footprint (pre-lay and post-lay berm) = Approx. 37,800 m^2	
Horizontal Directional Drilling Exit/Entry Point Protection Measures	After HDD and installation of end caps, until cable installation. Non-burial protection could be in place for up to 12 months. It would be removed as part of the cable pull / installation process.	Rock or mattress protection may be installed at HDD exit/entry points. These may be as 4 discrete locations or as a single berm covering all 4 exit points. Height of temporary protection= up to 0.5 m – will be located in existing pit to ensure navigable depth is maintained. Length of protection= up to 15 m Width of protection = up to 60 m Total footprint of protection = Approx. 900 m^2 Prior to cable pull, protection is more likely to be rock bags than rock berms, but after cable pull the rock bags would be recovered and replaced with a permanent rockfill within the pit. This would be 60 x 15 x 3 m = 2700 m^3.	

3.1.4. The information within the first row within Table 3 provides the parameters for Non-Burial Protection (i.e. Cable Protection) during construction and operation but does not provide the total maximum footprint of cable protection for both construction and operational phases which is assessed within the ES topic chapters (see Section 3.2 of this document) and which is now provided for clarity above in paragraph 3.1.2.

3.1.5. Table 3 states that non-burial protection for both cable pairs is anticipated along approximately 11 km of the UK Marine Cable Corridor for construction activities. This information is based on the Cable Burial Risk Assessment and geophysical and geotechnical surveys undertaken for the Proposed Development. Rock placement is considered to be the worst case as this has the greatest maximum footprint (i.e. 330,000 m^2). This parameter is

the maximum footprint for rock placement to be used during construction where cables are not able to be buried and cable protection is required.

3.1.6. This same row also describes that a worst-case allowance has also been included for an additional 11 km of cable protection to be used during maintenance and repair activities. Although not made explicit within Table 3 (but is now clarified in paragraph 3.1.2), using a similar calculation, rock placement has been considered as worst case and therefore the maximum footprint during operation would be 330,000 m^2.

3.1.7. The second row of Table 3 identifies the amount of rock protection to be used for Atlantic Cable Crossing. This identifies a maximum footprint of 37,800 m^2.

3.1.8. The third row of Table 3 identifies the amount of rock protection that will be used to fill the Horizontal Direction Drilling ('HDD') pits. This identifies a maximum footprint is 900 m^2.

3.1.9. Therefore, the amounts of cable protection presented and assessed within the ES and which is to be left in situ at the time of decommissioning (or the total of the above) is equal to **698,700 m^2 (i.e. rounded up to 0.7 km^2).**

3.2. ASSESSMENT OF CABLE PROTECTION

3.2.1. Accordingly, the relevant assessments undertaken within the ES have assessed the potential impacts associated with the placement of 0.7 km^2 of cable protection. This is described within the following areas within the ES;

- Chapter 6 Physical Process (Ref: APP-121, Section 6.6.3, Table 6.15);
- Chapter 8 Intertidal and Benthic Habitats (Ref: APP-123, Section 8.6.2, Table 8.6);
- Chapter 9 Fish and Shellfish (Ref: APP-124, Section 9.6.3, Table 9.9);
- Chapter 11 Marine Ornithology (Ref: APP-126, Section 11.6.6, Table 11.10);
- Chapter 12 Commercial Fisheries (Ref: APP-127, Section 12.6.3, Table 12.7);
- Chapter 13 Shipping, Navigation and Other Marine Users (Ref: APP-128, Section 13.6.2);
- Chapter 14 Marine Archaeology (Ref: APP-129 Section 14.6.3); and
- Habitat Regulations Assessment (Ref: APP-491).

3.2.2. The Outline Marine Construction Environmental Management Plan ('CEMP') has provides that a study will be undertaken to identify the most appropriate rock material for cable protection requirements.

3.2.3. Therefore, in response to the MMO's comment (Paragraph 7.30) within their RR;

"*Schedule 15 Deemed marine licence Part 1 – Additional cable protection during operations can be included in the DML but the distinction between this and cable protection during laying needs to be clear. They both need to be assessed in the ES.*"

It is our position that this information has been made clear and that signposting has been provided to clarify that cable protection to be used during construction and that to be used

during operations. Both have been assessed, with no significant effects having been identified as a consequence of the maximum footprint or profile of cable protection resulting from the construction, or ongoing protection of assets during operation.

3.2.4. In addition, both MMO and NE have requested that both units of volume and area are provided within the Design Parameters within the DML[5]. As both maximum footprint or area and height of cable protection are the parameters that are relevant to the impacts being assessed within topics (e.g. permanent habitat loss impacting benthic receptors, potential alteration to physical processes including the development of scour or reduction of navigable depth to shipping), it is not clear what benefit the addition of volume units provides. Indeed, the inclusion of volume units for cable protection may lead to unnecessary variations required for the DML simply to change volumes.

3.2.5. An example of this can be explained if assessing the potential impacts of rock placement for scour protection. In this case, the footprint of scour and the area required for rock placement is clear and should be assessed, however the volume of rock required to fill the scour footprint can change according to the 'depth' of the scour, and any increase in volume to fill depth will not impact the footprint of seabed. Including volume could unintentionally and unnecessarily limit the amount of cable protection that could be laid to an amount less than that which has been assessed as appropriate.

3.2.6. Control measures for area or footprint, rather than volume, have previously been conditioned by the MMO within the marine licence for Greater Gabbard (L/2020/00067/1) for deployment of cable protection and scour protection to their export cables (Condition 5.2.8). Similarly, for cable protection for the Proposed Development, it is the Applicant's position that the area and height of cable protection above the seabed are the relevant parameters for the purposes of assessment, and that the inclusion of volume units, for the reason stated above, could lead to unintended limits being placed on the Proposed Development, ultimately requiring variations of the licence to permit what has already been assessed and in turn permitted.

3.2.7. It is for this reason the Applicant has not, and does not intend to, include volume units in addition to length and area parameters for cable protection.

[5] See paragraph 7.31 of MMO RR and Section 5.1, Issue 4 of the NE RR.

4. APPROACH TO CABLE PROTECTION CONTROLS

4.1. INTRODUCTION

4.1.1. Section 2 of this document outlines our current understanding of the licensing requirements for the laying of cable protection and Section 3 provides clarification on the assessment of the maximum footprint of cable protection, and its profile / height above the seabed, for the Proposed Development during construction and operation.

4.1.2. This Section 4 sets out the scope of the controls relating to the laying of cable protection in connection with construction activities, and in relation to maintenance and repair activities of the Proposed Development during the operational period. In addition, this section identifies the comments received from the MMO and NE relating to those controls and seeks agreement as to the approach to be taken, or otherwise requests an explanation of the necessity for any amendments to what has been provided in the DML contained in the draft AQUIND Interconnector DCO (Application Document Reference: 3.1).

4.2. CONTROLS FOR CABLE PROTECTION

4.2.1. It is proposed that cable protection measures can be controlled through the DML and controlling documentation conditioned within the DML as follows;

- Schedule 15, Part 2, Condition 4(1)(c) requires a Cable Burial and Installation Plan to be submitted to and approved by the MMO prior to construction, which must include details of;
  - (iii) controls to prevent cable protection laid during construction reducing navigable depth to intolerable levels to ensure existing and future safe navigation; and
  - (iv) proposals for monitoring cables and cable protection during the operation of the Proposed Development which includes a risk based approach to the management of unburied or shallow buried cables.
- Schedule 15, Part 2, Condition 10(3) requires that within 3 months of completion of construction, survey data is to be submitted to the MMO confirming final clearance depths over cables and cable protection.
- Schedule 15, Part 2, Condition 11 requires the production of a Cable Burial Management Plan and post installation survey results to be submitted to and approved by the MMO following completion of construction which must include;
  - As built plans showing location of marine cables and cable protection;
  - details of proposed frequency and extent of future cable burial surveys;
  - details and justification for the installation of any additional cable protection; and
  - proposals for monitoring cables and cable protection during operation which includes a risk based approach to the management of unburied or shallow buried cables.

Condition 11 (3)[6] also allows the document to be updated from time to time subject to the approval of the MMO. In addition, it is anticipated the plan will be capable of review as specified within it, for instance following cable burial surveys, installation of additional cable protection or periodically as required.

4.2.2. These requirements and controls would regulate the permitted licensed activities detailed in Schedule 15, Part 1 of the DML. The permissible design parameters for the Proposed Development discussed above, and which would not be able to be exceeded, are provided at Schedule 15, Part 2, Condition 1 of the DML.

4.2.3. In outlining the above, it is hoped that a clear response has been provided to the comment made by the MMO in paragraph 7.39 of the MMO RR, that reference to 'additional cable protection' within Condition 11 (1)(c) only relates to that being laid during operation in connection with the maintenance and repair activities, up to the maximum amount of cable protection permissible in accordance with the conditioned design parameters.

4.2.4. In Section 1 of NE's '*draft paper on Cable Protection'*, NE advises that a condition be applied to all DMLs with wording as (or similar) to the below;

(1) Not more than 4 months following completion of the construction phase of the authorised scheme, the undertaker must provide the MMO and the relevant statutory nature conservation bodies with a report setting out details of the cable protection used for the authorised scheme.

(2) The report must include the following information—

(a) location of the cable protection;

(b) volume and area of cable protection; and

(c) any other information relating to the cable protection as agreed between the MMO and the undertaker.

4.2.5. It is the Applicant's position that the wording of this proposed condition is similar to the wording that is already provided within Schedule 15, Part 2, Condition 11 'Cable Burial Management Plan' and therefore, the content of the 'report' being requested within the above proposed condition would in effect be contained within the Cable Burial Management Plan.

4.2.6. **Does the MMO and NE agree that Condition 11, in addition to the restrictions provided by the conditioned design parameters, is appropriate to control the laying of additional cable protection during operation in connection with maintenance and repair activities? If not, then please explain what alternative mechanism would be preferred and why such alternative mechanism is considered to be necessary in the circumstances?**

4.2.7. **If content with condition 11 in principle but not with specific wording, could the MMO and/or NE provide advice on what wording amendments they would wish to see within**

[6] Please note the numbering in the draft DML is incorrect and this is to be amended to Condition 11(2) in due course.

Condition 11 and explain why such amendments are considered to be necessary in the circumstances?

4.2.8. Paragraph 7.46 of the MMO RR proposes;

Schedule 15 Deemed marine licence Part 2 – Cable Protection Activities. The MMO would require that a condition be included to submit a post construction phase cable protection plan must be submitted to the MMO for approval a minimum of 6 weeks prior to the commencement of any cable protection works required during the operational phase.

4.2.9. It is unclear whether this is proposed as a requirement over and above the condition that is proposed by NE as discussed in paragraphs 4.2.4 and 4.2.5 of this document. Again, we consider that Schedule 15, Part 2, Condition 11 Cable Burial Management Plan provides the appropriate mechanism for the submission and approval by the MMO of information relating to the deployment of assessed cable protection post consent.

4.2.10. **Could the MMO advise on whether they anticipate a requirement for a Cable Protection Plan over and above what is already proposed in Condition 11 of the DML and if so, why one is considered to be necessary in the circumstances?**

4.3. MAINTENANCE CONTROLS

4.3.1. Paragraph 7.4 of the MMO RR requests that an outline Operations and Maintenance Plan is provided as part of the Application.

4.3.2. Given that the majority of maintenance works, under Section 81 of MCAA (as identified in paragraph 2.1.5 of this document and in Schedule 15, Part 2, Condition 13 of the DML) do not require a licence, this requirement is considered to be onerous, and previous discussions with NE have confirmed that this is not considered by them to be required.

4.3.3. It is the Applicant's position that Condition 13 adequately identifies and controls the scope of maintenance activities in connection with the Proposed Development, such that no further plans are necessary to be submitted and approved in connection with the maintenance of the Proposed Development during its operation.

4.3.4. **Please could the MMO advise that they are satisfied that an outline Operations and Maintenance Plan is not required? If not, can the MMO please advise why one is considered to be necessary in the circumstances?**

5. MMO COMMENTS AND NE DRAFT GUIDANCE ON CABLE PROTECTION

5.1. PERIOD WITHIN WHICH CABLE PROTECTION ACTIVITIES MAY BE UNDERTAKEN

5.1.1. In Section 3 of NE's '*Appendix 1 draft paper on Cable Protection'*, NE supports longer term licences during operation for laying of additional cable protection in areas outside Marine Protected Areas ('MPAs'). This is supported for a period of up to 10 years during operation. It has been communicated via email (see Appendix 5) that the MMO takes a similar position.

5.1.2. As outlined in Section 2.2 of this document, up until October 2019, it had been agreed that extended licencing for a 15 year period during operation for the Proposed Development was considered appropriate. As changes to this advice arrived close to submission of the Application, the worst case parameters to calculate amounts of additional cable protection that may be used during the operational period were based on a 15 year period rather than a 10 year period post construction.

5.1.3. Accordingly, the Application has assessed an amount of rock protection considered to be sufficient in connection with maintenance and repair activities over a 15 year period. The assessments have concluded that no significant effects are predicted to result from the laying of cable protection during the 15 year operational period. In addition, the Proposed Development is not located within any MPAs, and adverse effects on the integrity of MPAs resulting from any indirect impacts from the Proposed Development can be excluded beyond reasonable scientific doubt.

5.1.4. The comments from the MMO discussed in paragraph 3.2.3 of this document agree with our position, that the parameters and the ability to lay cable protection during the operational period should be permitted within the DML.

5.1.5. However, paragraph 7.45 of the MMO RR requests that a '*licence condition be included stipulating that cable protection maintenance activities must not extend for longer than 10 years from the date of completion of cable laying activities'.*

5.1.6. Further, paragraph 7.38 of the MMO RR states;

'The benthic assessment included in the ES will not remain valid for the lifetime of the project and it is recommended that new benthic surveys are undertaken prior to installation of rock protection for cable repairs to ensure that any required mitigation for protected habitats such as Sabellaria reef can be properly secured at the time. Benthic surveys should be carried out every 5 years and the method statement should be agreed with the MMO prior to construction.'

5.1.7. NE's '*Appendix 1 draft paper on Cable Protection'* supports the requirements requested by the MMO, stating that;

'*Data less than 5 years old will be required to support laying of additional cable protection along with descriptions of the seabed habitat and information regarding what cable protection has been laid to date. Justification will need to be made as to why cable protection is necessary considering risk and alternatives and every effort made to minimise amounts required to reduce environmental impact*.'

5.1.8. The Applicant acknowledges that the MMO and NE are wanting to ensure the validity of the assessments within the ES in supporting the laying of cable protection in the future, recognising that an ES will not be valid indefinitely and where the baseline changes such that the assessment is no longer valid, additional information and an additional or varied licence will be required to permit such activities.

5.1.9. The MMO (in Appendix 5) stated that the reasoning behind the 10 year approach is to recognise that environmental conditions change over time and that there may be a long period of time elapsed between baseline surveys informing the Application and when cable protection is laid during the operational period of a project. Whilst the Applicant understands the rationale e.g. ensuring that the EIA is still valid, it is not immediately clear why a 10 year period has been chosen, nor why the licence would expire at 10 years if it can be demonstrated that the EIA is still valid beyond this period.

5.1.10. It is the Applicant's position that if the baseline used for the purposes of the assessment of the Proposed Development can be shown to remain valid at a point post construction, and if any additional works remain within the parameters assessed within the ES, the effects assessed within the ES will remain valid such that there is not a need to limit the continuation of activities which have been assessed to be appropriate. In those circumstances, there does not seem to be a logical basis for the 10 year period, or indeed for any particular period of years to be identified as the cut-off date for when a new licence will be required to permit the continued laying of cable protection measures during the operational period.

5.1.11. In this case, it is the Applicant's position that it should be permissible to lay additional cable protection in connection with maintenance and repair activities where it can be evidenced (using appropriately up to date data) that the benthic baseline has not materially changed, on the basis that the impacts associated with that licensed activity have already been assessed. Therefore, provided the data show that there is no material change to the baseline benthic environment and that the effects associated with the proposed activity remain within the scope of the effects assessed in the environmental statement, there should not be a 10 year expiration on the ability to lay cable protection in connection with maintenance and repair activities.

5.1.12. It is recognised that for this approach to be appropriate, controls would need to be included requiring data of less than 5 years old to be available to confirm the baseline remains in conformity with that used for the purpose of assessment in the locations where the laying of additional cable protection is proposed, to support the laying of additional cable protection in that particular location. In this regard, the requirement for additional benthic investigation to be undertaken once the existing baseline data is greater than 5 years old is acknowledged,

and if subsequent benthic investigations confirm that the relevant part of baseline has not changed beyond what was already assessed it is unclear why there should be a 10 year expiration on the ability to lay cable protection giving rise to already assessed impacts determined to be acceptable, as evidenced by the DML being granted permitting those activities.

5.1.13. **Can the MMO and NE please advise on why the permission to deploy cable protection post construction would expire at 10 years and a new licence application would be needed if it is evidenced that the baseline had not changed during this time, where the maximum assessed worst case parameters had not been reached and the effects fall within the scope of those assessed in the ES?**

5.2. THE EXTENT OF REQUIRED FUTURE SURVEYS

5.2.1. The baseline survey submitted with the Application has already characterised the benthic habitats on the seabed along the whole of the UK Marine Cable Corridor. The assessments have considered how susceptible to change the identified habitats/biotopes are. Most benthic sedimentary habitats shouldn't change too much over time and are not sensitive to impacts from cable protection deployment.

5.2.2. It is considered that a requirement for discrete benthic surveys seems to be captured pragmatically within the Viking Link marine licence (Activities 1.6 and 2.4 of Marine Licence L/2018/00075/1), where survey requirements are on a case by case basis in relation to the works needing to be undertaken (which would be the case regardless of whether a benthic survey was undertaken at 5 year intervals anyway), rather than stipulating a frequency and extent for surveys irrespective of the works that will be required.

5.2.3. In this regard, condition 5.2.35 of the Viking Link licence states that;

'The cable protection maintenance activities must not extend for longer than 15 years from the date of completion of the cable laying activities.'

5.2.4. Condition 5.2.39 states that

'*A post construction phase cable protection plan must be submitted to the MMO for approval a minimum of 6 weeks prior to the commencement of any cable protection works required during the operational phase unless otherwise agreed by the MMO. The plan must include:*

(i) a cable protection method statement;

(ii) a desk based environmental assessment including but not limited to: features of historical interest and features of nature conservation interest;

(iii) locations and timings; and

(iv) details of notifications to other sea users

***The requirement to undertake any additional surveys to inform the environmental assessment must be agreed with the MMO**.*

Each instance of cable protection works must not commence until written approval for that instance of cable protection works is provided by the MMO.

5.2.5. Any laying of cable protection in connection with maintenance and repair works is to be located within the existing Marine Cable Corridor, where the habitats present have been characterised, and where pre-construction ground condition surveys will be undertaken to identify an physical changes to the seabed (amongst other things) and allow the Marine Cable Route to be finalised within the Marine Cable Corridor.

5.2.6. Accordingly, it is considered that the data required to inform revalidation of the benthic baseline would be sufficient if collected from the geophysical survey and either drop down video ('DDV')/Remotely Operated Vehicle ('ROV') for visual inspections during engineering surveys used to monitor the cables and investigate for maintenance/repair works.

5.2.7. Data collected from the geophysical survey and ROV would likely be more detailed for a specific repair/maintenance event than a general swathe bathymetry survey and any new emerging reef features, which are the sensitive features at greater risk, could be detected from geophysical data (and further characterised by DDV if required). It is noted that this type of data has been requested previously by the MMO in the marine licence issued to Greater Gabbard OWF after placing cable protection down along their export cable L/2020/00067/1.

5.2.8. In the meeting held on the 26 March 2020, the MMO stated that the benthic survey requirement at 5 years should encompass the whole of the UK Marine Cable Route. However, historically, when cable protection is dealt with through repeated applications for marine licences, it is disproportionate to require repeated post construction benthic surveys of the *whole* development area where the proposed works relate to a much smaller area. It is therefore, proposed that further surveys of the benthic baseline should only be required for the discrete areas where additional cable protection works are proposed to be undertaken. This focussed survey area should only cover the zone of influence of cable protection works, and the zone of influence of works could be agreed with the MMO through the Cable Burial Management Plan for example. Whether the baseline has changed or not beyond that zone of influence is not relevant to the works in question.

5.2.9. In this regard we note that within the Greater Gabbard marine licence, data is only requested by the MMO post installation from the area of cable works (L/2020/00067/1; Condition 5.2.4) rather than the whole development area of the wind farm.

5.2.10. It is the Applicant's position that a benthic survey of the whole Marine Cable Route is disproportionate and should not be required.

5.2.11. **In the context of the above information, can the MMO and/or NE please advise on their position and rationale regarding extent of surveys and survey methods required?**

5.3. CABLE PROTECTION PLAN REQUIREMENTS

5.3.1. Finally, there are two remaining comments from the MMO RR relating to additional condition requirements for cable protection.

5.3.2. Comment 7.44 states;

'*Schedule 15 Deemed marine licence Part 2 – Cable Protection Activities. The MMO would require that conditions be included to notify the relevant authorities (MMO and UKHO) and local mariners before commencement of the activities. Additionally, a condition should be included to notify the MMO following completion of these activities.*'

5.3.3. Comment 7.47 states;

'Schedule 15 Deemed marine licence Part 2 – Cable Protection Activities. The MMO would require that a condition be included so that unless otherwise agreed with the MMO, the licence holder must submit International Hydrographic Office (IHO1A) approved sonar or Multi Beam Echo Sounder survey data to the MMO and UKHO, confirming the final clearance depths over the protected cables.'

5.3.4. The Applicant considers that both conditions would relate to the cable protection activities during operation (post construction). It is our position that these controls would be included within the Cable Burial Management Plan that is already proposed in Condition 11.

5.3.5. **What is the MMO's position on incorporating these measures (as described in 5.3.2 and 5.3.3) within the control documentation proposed in Condition 11 (i.e. in the Plan that requires MMO approval and implementation and compliance thereafter)? If the MMO does not agree with an approach of including this detail in Condition 11, please can they explain why it is not considered that they can be included in the controlled documentation in Condition 11 that is approved by the MMO (in consultation with the statutory nature conservation body)?**

6. SUMMARY

6.1.1. This document has been produced by the Applicant to set out and clarify proposals relating to the laying of cable protection for the Proposed Development for consultation with the MMO and NE.

6.1.2. Section 1 provides a summary of the Applicant's understanding of the MMO and NE's view on the marine licencing requirements for cable protection in relation to the Proposed Development based on discussions to date with both.

6.1.3. Section 2 of this document provides a summary of the consultation undertaken to date on this matter and the marine licencing requirements for cable protection activities during construction and operation of the Proposed Development.

6.1.4. Section 3 of this document clarifies the current proposals for cable protection parameters and how they have been assessed for the Proposed Development in the ES.

6.1.5. Section 4 presents the current proposals for controls for cable protection within the DCO and seeks clarification from the MMO and NE on this matter in the context of their feedback provided within their respective RRs.

6.1.6. Section 5 of this document confirms agreement with the MMO of including laying cable protection during operation of the Proposed Development within the DCO. This section also presents contextual information to inform further discussion on the appropriate controls for laying of cable protection during operation. In addition, the Applicant's position with regards the length of the licensing period for cable protection and the requirement for additional surveys to revalidate the benthic baseline is presented in the context of the current requirements proposed by the MMO and NE within their RRs.

6.1.7. The Applicant would be grateful if the MMO and NE could respond to the specific questions that have been posed in this document in order to progress discussions towards agreement on permitting the laying of cable protection during operation and the appropriate mechanisms of control.

APPENDIX 1: MMO ADVICE JULY 2018

Sarah Lister

From: Qureshi, Mark (MMO) <Mark.Qureshi@marinemanagement.org.uk>
Sent: 12 July 2018 10:36
To: Sarah Lister
Cc: Pennington, Abbey (MMO); Ross Hodson; Ford, Jennifer (MMO)
Subject: RE: Aquind Marine Licence / deemed marine licence requirements eia/2018/00011

Follow Up Flag: Follow up
Flag Status: Completed

Categories: Do not Delete

Dear Sarah,

Regarding your email of 10 July, please find my response below to the matters you raised. (Also, regarding any meeting next month, just to let you know I'll be on leave from Monday 6 August for two weeks, returning on the 20th, but with limited availability towards the end of that week and the following week).

I would caveat that the advice below is based on the information provided in the Aquind Scoping Report (EIA/2018/00011) and other supporting information submitted. The MMO will confirm all licensable activities related to the project once a fully submitted marine licence application or Development Consent Order (DCO) application is received. Any marine licence application or DCO application must include details of all proposed activities within the UK Marine Area.

It remains the developer's responsibility to satisfy themselves as to whether a marine licence is required for an activity.

Exempt Submarine cables
Section 81 (5) of the Marine and Coastal Access Act 2009 (MCAA) states the following:

81 (5) "For the purposes of this section a submarine cable is "exempt" unless it is a cable constructed or used in connection with any of the following—
(a)the exploration of the UK sector of the continental shelf;
(b)the exploitation of the natural resources of that sector;
(c)the operations of artificial islands, installations and structures under the jurisdiction of the United Kingdom;
(d)the prevention, reduction or control of pollution from pipelines."

I can confirm that the MMO considers that the proposed Aquind Interconnector submarine cable, as described in the Aquind Scoping Report, may be considered as an exempt submarine cable, as defined in section 81 (5) of MCAA.

Laying of exempt Submarine cables (inshore and offshore)
Section 81 (1) & (2) of MCAA states:

81 Submarine cables on the continental shelf
(1)Nothing in this Part applies to anything done in the course of laying or maintaining an offshore stretch of exempt submarine cable.
(2)Where subsection (1) has effect in relation to part (but not the whole) of an exempt submarine cable—
(a)the appropriate licensing authority must grant any application made to it for a marine licence for the carrying on of a licensable marine activity in the course of laying any inshore stretch of the cable, and
(b)nothing in this Part applies to anything done in the course of maintaining any inshore stretch of the cable.

Section 81 (1) confirms that the laying of an exempt submarine cable beyond the 12 nautical mile limit (offshore), does not require a marine licence. If the Aquind Submarine cable is considered as an exempt cable (as defined in

Section 81 (5) of MCAA), a marine licence will not be required for the laying of the Aquind cable beyond the 12 nautical mile limit.

Section 81 (2) (a) confirms that a marine licence must be granted for the laying of an exempt cable within the 12 nautical mile limit (inshore).

Specific Cable laying activities (inshore and offshore)
The MMO considers that the following activities, as described in section 3.1.6 of the Aquind Scoping Report, may be considered as cable-laying activities if carried on in relation to the laying of an exempt cable (as defined in Section 81 (5) of MCAA):

- clearance dredging and side casting,
- the use of rock and mattressing to fill gulleys and reduce freespans.

As the act of laying an exempt cable beyond the 12 nautical mile limit (offshore) does not require a marine licence, I can confirm that these activities would not require a marine licence beyond the 12 nautical mile limit, when carried on in relation to the laying of an exempt cable (as defined in Section 81 (5) of MCAA). A marine licence is required for the above activities if carried on within the 12 nautical mile limit.

Maintenance activities
Section 81 (1) and (2)(b) of MCAA confirms that a marine licence is not required for maintaining an exempt cable either within or beyond the 12 nautical mile limit, i.e. inshore and offshore. If the Aquind Submarine cable is considered as an exempt cable (as defined in Section 81 (5) of MCAA), I can confirm that a marine licence would not be required for its' maintenance, either within or beyond the 12 nautical mile limit.

Maintenance activities can include:

- the removal and replacement of defective cable sections,
- removal of sediment to undertake repairs,
- the removal / replacement of cable protection to access the cable.

I would advise however that you should seek advice from the MMO on a proposed maintenance activity method, and submit a supporting detailed method statement, so that we can provide advice as to whether it is exempt from requiring a marine licence. It remains the developer's responsibility to satisfy themselves as to whether a marine licence is required for an activity.

Decommissioning
Section 81 of MCAA relates only to the laying and maintenance of an exempt cable, and I can therefore confirm that decommissioning of a cable, both within and beyond the 12 nautical mile limit, requires a marine licence.

NSIPs and marine licensable activities
I can confirm that the provisions set out in Part 4 (Marine Licensing) of MCAA still apply when considering whether an activity is a marine licensable activity, regardless as to whether it is considered under the Planning Act 2008 as a Nationally Significant Infrastructure Project (NSIP). Specifically, the provisions set out in sections 66 and 81 of MCAA will still apply if the Aquind project is determined by the relevant Secretary of State to be an NSIP. Any DCO application should include full details of all proposed activities in the UK Marine Area.

I can also confirm that a deemed marine licence functions exactly as a marine licence, and that the MMO is responsible for enforcing, post-consent monitoring, varying, suspending, and revoking any deemed marine licence as part of a DCO.

Further information regarding NSIPs and the MMO can be found here:
https://www.gov.uk/government/collections/marine-licensing-nationally-significant-infrastructure-projects

Finally, thank you for confirming that the EIA will consider impacts both within and beyond the 12 nautical mile limit.

Please don't hesitate to contact me if you'd like to discuss this email.

Regards

Mark

Mark Qureshi ❙ Marine Licensing Case Officer ❙ Her Majesty's Government – Marine Management Organisation.
Direct Line: 02082258952 ❙ mark.qureshi@marinemanagement.org.uk ❙ Lancaster House, Newcastle Business Park, Newcastle upon Tyne, NE4 7YH
Website | Twitter | Facebook | Linkedin | Blog |Instagram | Flickr | YouTube | Google+ | Pinterest

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From: Qureshi, Mark (MMO)
Sent: 11 July 2018 08:58
To: 'Sarah Lister' <sarahl@naturalpower.com>
Cc: Pennington, Abbey (MMO) <Abbey.Pennington@marinemanagement.org.uk>; Ross Hodson <rossho@naturalpower.com>; Ford, Jennifer (MMO) <Jennifer.Ford@marinemanagement.org.uk>
Subject: RE: Aquind Marine Licence / deemed marine licence requirements

Dear Sarah,

Thanks for your email, I'm looking forward to meeting Ross again, and working with yourselves.

I'll be drafting a response to the question raised in your email, and will be back in touch in due course.

Regards

Mark

Mark Qureshi ❙ Marine Licensing Case Officer ❙ Her Majesty's Government – Marine Management Organisation.
Direct Line: 02082258952 ❙ mark.qureshi@marinemanagement.org.uk ❙ Lancaster House, Newcastle Business Park, Newcastle upon Tyne, NE4 7YH
Website | Twitter | Facebook | Linkedin | Blog |Instagram | Flickr | YouTube | Google+ | Pinterest

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From: Sarah Lister [mailto:sarahl@naturalpower.com]
Sent: 10 July 2018 15:19
To: Qureshi, Mark (MMO) <Mark.Qureshi@marinemanagement.org.uk>; Ford, Jennifer (MMO) <Jennifer.Ford@marinemanagement.org.uk>
Cc: Pennington, Abbey (MMO) <Abbey.Pennington@marinemanagement.org.uk>; Ross Hodson <rossho@naturalpower.com>
Subject: Aquind Marine Licence / deemed marine licence requirements

Dear Mark

How are you? Hope you are keeping well. Just an update for you that we are expecting the NSIP decision at the beginning of next month and we are trying to schedule a meeting with PINS (if the decision is favourable for NSIP

APPENDIX 2: MEETING MINUTES SEPTEMBER 2018

Natural Power Meeting Minutes			
To	Aquind Ltd; WSP; MMO	Date	06/09/2018
From	Natural Power	Ref.	1178416

Meeting Minutes

Meeting held at: Marine Management Organisation (MMO) Offices, Newcastle
Date: 06/09/2018
Time: 14:00 – 16:00 hrs
Attendees:
[redacted] (MMO)
[redacted] (MMO)
[redacted] (MMO)
[redacted] (Natural Power)
[redacted] (Natural Power)
[redacted] WSP)
[redacted] (WSP)
[redacted])
[redacted] (WSP)

1. Introduction:

WSP provided an update on the project. WSP also explained the DCO process and high-level programme for the project up to the submission of the application (Q3 2019) and the broad timescales for key elements of the DCO process up to determination (Q4 2020).

2. Statement of Community Consultation:

The MMO now have the Statement of Community Consultation (SoCC) for informal consultation and have passed this onto the MMO coastal office in Portsmouth for their review. Initial feedback is that there are some current omissions in our stakeholder list. These include:

a) Southampton ABP Port and Search and Rescue (SARs)
b) Eastney Harbour
c) Selsey Harbour
d) Chichester and Bembridge Harbour
e) Ferry operators (DFDS)
f) Tanker operators (Exxon Marine)

The MMO also stated that they have a couple of local fisheries organisations that should be engaged. The MMO stated that they were content with locations and timings of public events and with the deposit locations of consultation material.

The MMO will provide a formal advice note on the SoCC with further detail this month.
The MMO to provide contact details for Martin Cooper and Newhaven Fish Society as soon as possible to feed into fisheries meetings invites.
Natural Power requested that the fisheries information is sent on soon as the fisheries meetings will be held week after next.

3. Changes to project since scoping:

Natural Power and Chris talked the MMO through the changes to the marine elements of the project since scoping, primarily;

a) Refinement of the marine cable corridor;
b) Use of dredging equipment to clear sandwaves and large ripples;
c) HDD works in Langstone Harbour

Natural Power outlined that the consultations with Natural England and the Harbour Master in Langstone Harbour about point c) and stressed that no HDD works will occur within the marine environment as the drilling will all be underneath the harbour area. Accordingly, Natural Power considers that the deemed Marine Licence (dML) will not include this activity (although the ES will give consideration of it) but that this will be covered in the main by the onshore assessments as the plant used and HDD exit and entry holes will be above Mean High Water Springs (MHWS). The MMO

agreed with this approach and confirmed that the proposed approach to HDD under Langstone Harbour is exempt from requiring a marine licence.

Sand wave clearance including using dredging techniques (e.g. trailer suction hopper dredger) and potential locations for dredging to occur was discussed. Natural Power also stated that plume modelling would be undertaken to assess the impact of this activity. The MMO confirmed that dredged material cast to the side of the dredged area was not considered to require a separate marine licence if kept within the redline boundary/cable corridor (as has been the case previously for other projects). The MMO will double check to see what the case would be for if dredged material is disposed of elsewhere within the cable corridor. Dredging and side-casting were considered as part of cable laying activities which would only require a license within the 12 nm territorial waters limit. As work progress on developing the description of this works and the modelling, further discussion will be had.

The MMO will advise on whether disposal of dredged material at another part of the marine cable corridor as opposed to side casting would still be considered a cable laying activity.

4. Key outcomes from scoping:

Natural Power then discussed the key outcomes of scoping with the MMO;

a) A **Water Framework Directive Assessment** will be undertaken as per requested by the MMO.
b) A **Contaminated Sediments Assessment** (using previously collected samples) will be undertaken as per requested by the MMO and in consultation with Cefas.
c) Natural Power asked for clarification on the last paragraph in Section 4.5.2 of their Scoping Opinion relating to noise and marine mammals. Is the advice requesting that we undertake a full assessment on this element (noise from seabed preparation, route clearance, cable laying and burial and vessel noise) or is it sufficient that we simply providing justification for not undertaking a full assessment? Natural Power stressed that the latter option seems a more proportionate approach.

The MMO will double check point c) above, and respond with clarification.

d) **UXO:** The EPS risk assessment for UXO survey works and any licence requirement for further investigative or works on UXO removal will be undertaken separately to the DCO application. The MMO understood and are content with this approach.
e) **EMF:** The group had a discussion on the potential of impacts from Electromagnetic Fields (EMF). The MMO explained that they have dealt with an application recently where an Inshore Fisheries and Conservation Agency (IFCA) have raised the issue of EMF. It is likely that this is for HVAC cables however, it is worth taking a look at this.

The MMO will forward on the reference to that application for our information, they will also forward on other guidance (Ospar report and MMO OWF Monitoring Recommendations Report) to assist us.

f) Natural Power queried the request from Cefas to scope in assessment of chemical contamination and accidental spills as Natural Power considers that this is better dealt with through pollution prevention protocols and environmental management plans. The MMO agreed with this approach.

5. Items for discussion:

Natural Power then discussed the following items;

a) **PINS**: Meeting tomorrow to seek advice on whether to re-scope wit PINS or not. The MMO thought that if re-scoping was undertaken, then their response to PINS would be unlikely to change significantly from the MMO's response provided in June 2018. The MMO asked to be informed of PINS' response to re-scoping discussions.
b) **Licensable Activities**: Natural Power went through the advice received from the MMO on licensable activities and non-licensable activities (received on 12/07/2018 via email) to confirm understanding. In relation to cable protection which requires a marine licence application within the 12 nm limit and beyond, the MMO stated that if we assessed the suitability of cable protection measures along the corridor and also could provide an indication of amount of use of protection for maintenance (i.e. propose a reasonable contingency for this), then it is possible to incorporate a mechanism via licence condition whereby a certain percentage of protection can be placed along the corridor when required for maintenance over a 15 year period after cable installation. If this can be achieved then it can reduce the requirement for applying for a marine licence for laying cable protection each time it might be needed for maintenance (or repair) activities.

The MMO will pass on draft licence condition for this (and other draft / standard licence conditions) to Natural Power.

c) **The newer topics within the 2017 EIA regulations.** The MMO agreed with the approach that the topics for population and human health, material assets and air quality, are more relevant for onshore chapters. Biodiversity can be dealt with in our biological assessments and the topic of disasters and accidents can be dealt with through signposting to the navigation risk assessment and shipping/navigation chapter.

d) **Cumulative Assessment:** Natural Power ran through the approach to cumulative assessment in accordance with PINS advice note. The MMO agreed with the proposed approach.

e) **Transboundary Assessment**: Natural Power ran through the approach to transboundary assessment in accordance with PINS advice note. The MMO agreed with the proposed approach.

f) **Decommissioning:** Natural Power ran through the approach to deal with decommissioning (i.e. high-level summary description in the ES, licence condition for "a decommissioning plan (to be agreed with TCE) to be submitted six months prior to commencement of decommissioning" and then separate decommissioning marine licence application prior to decommissioning). The MMO agreed with the proposed approach.

g) **Habitats Regulation Assessment (HRA):** Natural Power ran through the approach to deal with HRA. The approach will be to undertake consultation meetings with Natural England. The MMO stated that although they did not need to be included in all meetings they will need to be kept abreast of any mitigation/monitoring that falls out of this process. Natural Power agreed to keep the MMO informed of HRA developments and the approach to engagement with the MMO on HRA matters under review. They also have Defra group meetings each month where the MMO and Natural England can discuss matters.

h) **Deemed Marine Licence:** Natural Power and the MMO agreed that drafting the dML should begin soon. The MMO and Natural Power also agreed that a skeleton Statement of Common Ground should be worked up during the pre-application process where possible

The MMO will share standard conditions with Natural Power to begin this process.

i) **DCO fees and charges** - MMO fees increased in 01/09/2018 and therefore the fee estimates for the meeting and the SOCC consultation need to be re-accepted as they are slightly more expensive. Moving forward Natural Power asked for clarity on when the MMO will charge during the DCO process as it is currently not clear.

The MMO will review and revert back to Natural Power on this matter.

j) The MMO requested that Natural Power provide an indicative summary of the potential number of meetings that will be need with the MMO during the pre-application process as well as any potential remote advice required such that they can build up one fee estimate for Aquind to accept rather than producing a fee estimate for every single consultation item. They will only ever charge on time spent so the fee estimate is only an indication.

Natural Power to provide an estimate of consultation requirements with the MMO moving forward.

APPENDIX 3: MEETING MINUTES – JANUARY 2019

Natural Power Meeting Minutes			
To	AQUIND Ltd; WSP; HSF; MMO	Date	09/01/2019
From	Natural Power	Ref.	1187035

Meeting Minutes

Meeting held at: Marine Management Organisation (MMO) Offices, Newcastle
Date: 09/01/2019
Time: 14:00 – 16:00 hrs
Attendees:

[redacted] (JF: MMO)
[redacted] (MQ: MMO)
[redacted] (SL: Natural Power)
[redacted] (RH: Natural Power)
[redacted] (CL: WSP)
[redacted] MJ: HSF)
[redacted] KM: Cefas)

1. Natural Power (NP) provided an update on outcomes of PINS Scoping Opinion.
2. HSF provided an update on the status of the Statement of Community Consultation (SoCC). The MMO will be provided with the final SoCC once it is ready for publication, anticipated to be within the next couple of weeks.
3. Natural Power provided an update on preparation of the Preliminary Environmental Information Report (PEIR). HSF advised on what documentation would be published for the Section 42 consultation. There was a quick discussion in relation to timescales and DCO application submission dates.
4. MQ queried build out timescales. CL confirmed that in so far as it is possible the intention is for the development to be constructed during all seasons. In addition, CL confirmed an iterative approach to discharging conditions will be sought in the Deemed Marine Licence (discussed in more detail below.)

The MMO are to be provided with two memory sticks containing the PEIR consultation documentation. These can be sent directly to Mark Qureshi. One copy will be for the MMO and one for Cefas. The Section 42 Consultation letter/pack needs to be sent to the MMO generally to ensure it is properly documented on the marine case management system. A copy of this is to be sent to MQ and JF by e-mail in addition.

DREDGING AND DISPOSAL

5. Discussion on dredging and disposal activities in reference to the MMO's recent advice in scoping response.

   The MMO consider the use of mass flow excavation, plough displacement and water jetting methods of displacement as side -casting which is an exempt activity (s81 of Marine and Coastal Access Act 2009) falling under cable laying activities. Use of a trailing suction hopper dredger where the material is removed from the marine environment and is then deposited back on the seabed is based on the current information considered as disposal and will be a licensable activity (rather than exempt as part of laying an exempt cable). Suggestion that the deposited material may be used for construction (e.g. as backfill or infill), and therefore not be an act disposal was discussed. WSP/Natural Power to submit written request via MCMS for advice from Cefas on dredge/disposal matters ~~MMO to co- s de fu the a d d seuss w th Cefas o ce quest o s posed w t g.~~

6. It is likely that any areas of disposal will need to have a characterisation report presented within the ES as a separate chapter or technical appendix. The characterisation report would not be required to be as in-depth as for a regular disposal site and should be proportional to the nature and scale of the project. AQUIND would be seeking for a closed disposal site that was only for use of the Project.

WSP/Natural Power to produce a short document outlining the disposal options being considered and send through to the MMO for Cefas. Cefas to advise on what level of characterisation required.

MMO to provide guidance relating to disposal site characterisation and an example of a characterisation report for information to NP (e.g. for no port / harbor dredge and disposal applications.

7. NP summarised the current approach being taken to identifying areas within the Marine Cable Corridor for disposal. WSP and NP are undertaking a short constraints mapping exercise to identify areas suitable for disposal which have the least engineering or environmental constraints. These locations will then feed into the ongoing modelling to assess the potential impacts from the sediment plume to inform design and impact assessments. This will also feed in to the site characterisation process.

NP to issue the parameters and results of the constraints exercise to MMO (Cefas) and NE for feedback.

LICENSABLE ACTIVITIES

8. Discussion and run through of previous advice on what activities are exempt and what are considered as licensable activities. Previous advice still stands except that clearance and dredging of the sandwaves/large ripples are considered exempt but the disposal of the dredged material on the seabed is licensable.
9. MMO is in agreement with the approach of including an agreed % of ~~10%~~ rock placement contingency to cover potential requirement for rock placement within the Marine Cable Corridor during repair and maintenance activities. The Environmental Statement (ES) needs to be clear on the maintenance activities.

Commented [QM(1]: Sarah, I think we need further discussion on the actual % of rock placement, and how the figure is derived, eg surveys etc.

FLOTATION PITS

10. AQUIND is currently considering the use of flotation pits as a construction method within the nearshore area of the Proposed Development. WSP provided a brief description of typical flotation pits.
11. NP/WSP are considering the best way to approach this, whether it is possible to include this within the current DCO application timelines or whether this will be better dealt with through a standalone marine licence. The MMO would, in principle, be in agreement with the approach whereby the use of flotation pits was dealt with through a standalone marine licence if it is not included within the DCO application. The MMO expressed that they would be keen that if this was the case, their potential use is made transparent within any consultation with local communities, and sufficient time was provided for consideration of the application to be determined prior to the proposed works.
12. The group discussed the experiences of Rampion Offshore Wind Farm (where a standalone licence for floatation pits was submitted) and the MMO advised that NP/WSP look to their marine licence for flotation pits to see the level of assessment required. The requirement for consideration of the works as part of EIA, Habitats Regulation Assessment (in close proximity to Solent Maritime SAC) and Water Framework Directive was discussed.

It was agreed that NP/WSP would produce a scope of works document in relation to the use of flotation pits for the Proposed Development. The MMO can then provide advice on this document through the Defra Family Working Group on the scope of works and the method of assessment to be presented within the final ES.

NP to pass on Environment Agency contact details to MMO.

CONTAMINATED SEDIMENTS

13. NP queried the MMO reference within their scoping response to using the MMO dredging and disposal guidelines. NP are not sure that these are appropriate for this scheme but are more appropriate for dredging of harbours, channels etc. Discussion with the MMO that it might be more relevant to the laboratory that undertakes the sample analysis, ~~the lab needs to be val dated by Cefas although except ons have been made.~~ The MMO recommends that the chemical analysis conforms to the MMO dredge disposal laboratory guidelines.

NP to pass on the name of the laboratory who has undertaken the analysis thus far to Cefas. Cefas will also review the contaminated sediment survey report within the PEIR.

DEEMED MARINE LICENCE

14. The MMO agreed that HSF should provide the draft deemed marine licence (DML) and that they would rather receive a well worked up draft DML, as opposed to a draft which is more a template of standard conditions.
15. The MMO highlighted that the DML should capture all licensable activities up to Mean High Water Spring (MHWS) and acknowledged some works were exempt.
16. It was agreed that the HDD works being undertaken within Langstone Harbour would not need to be included within the DML. *Post meeting note: HSF review of the definition of "UK marine area"[1] confirms this includes the bed and subsoil of the sea, with the definition of "sea" including "the waters of every estuary, river or channel, so far as the tide flows at man high water spring tide", and further, the location where those works are proposed are within the South Inshore Marine Plan Area. Noting the above, confirmation is required from the MMO for why those HDD works in that location would not be licensable.*

~~16.~~ Post meeting note: MMO will require further information regarding actual location of the proposed HDD works, in relation to above or below mean high water springs. Depending on the location, the MMO considers that the use of HDD may be considered as exempt under Article 35 of the 2011 Marine Licensing (Exempted Activities) Order 2011 (as amended). This states that activities associated with the construction or operation of a bored tunnel that are carried out

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[1] See Section 42 of the Marine and Coastal Access Act 2009.

wholly under the seabed do not need a licence. The MMO advises that if the activity does fall under Article 35 advance written notification to the MMO of the activity would be required.

17. MMO ~~KPI for rev ew n~~greview of a draft of the DML is likely to ~~be 4 6~~be up to 6 weeks. HSF are to send drafts to all relevant consultees and MMO will liaise with Defra Family consultees before returning comments on the draft DML.

The MMO will review the PEIR with a view to providing advice on what mitigation/monitoring they would expect for this type of Project within their Section 42 consultation response.

NP will keep MMO informed about the progression of drafting the DML and when they are likely to seek MMO review of the DCO/DML.

DCO CONSULTATION FEES

18. The DCO fee structure is still under review within the MMO.

MMO to provide an update on the review next week.

MMO will provide an informal ball park estimate of time/costs of consultation for discrete pieces of work. This will allow NP to track the use of the formal fee estimate agreed with the MMO and AQUIND.

APPENDIX 4: PERCENTAGE CONTINGENCY RATIONALE

Sarah Lister

From: Sarah Lister
Sent: 09 September 2019 12:49
To: Qureshi, Mark; Pennington, Abbey
Cc: Walker, Daniel; Ross Hodson
Subject: AQUIND Rationale for Non Burial Contingency

Importance: High

Dear Mark,

In the PEIR, AQUIND had proposed an additional 10% non-burial contingency to our worst case scenario to try and prevent incremental increases of additional cable protection through separate licences over the operational period of the project. Through our consultations on the draft deemed Marine Licence, we have been advised that the MMO seek that this contingency would only cover the first 15 years of the operational period rather then the whole lifetime of the project (40 years). You have also requested the rationale behind the contingency. I took this back to the project design engineering team who have undertaken the necessary calculations and investigations below to explain the reasoning behind the contingency. As always, we advised that they assume a worst case scenario and we think that the approach below seems reasonable. Similar to the PEIR, each technical topic is including this contingency into their worst case parameters for assessment.

I would be grateful if you and your colleagues could review the rationale below and let me know if the MMO is content with this approach. If you do not agree with this approach then we would be grateful if you could let us know why and what better approach could be taken?

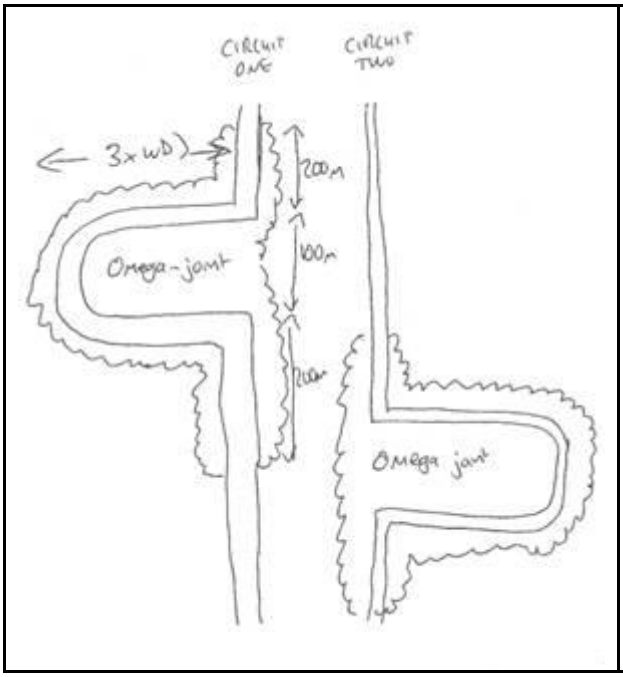
Many thanks and kind regards, Sarah

AQUIND Interconnector – Remedial Rock Placement, First 15 Years Life

It is assumed that a repair might be required once every 10-12 years (over the 40-year life span of the Proposed Development) then 4 repairs may be required. Whilst these might be spread evenly over the lifetime, i.e. every 10 years, they equally could all happen in the first 15 years, therefore a worst case of 4 faults in the first 15 years is assumed. These could be internal faults, resulting from cable manufacture, materials or defects resulting from installation, or external faults resulting from factors such as fishing gear and ships anchors.

Information collected by SSE, and presented by Tang *et al.* (2018)[1] suggests that joints are 3 times more likely to cause failure than cable through faulty installation. The length of the Proposed Development, existence of 4 cables within the two pairs, and the unknown number of joints at this stage suggest an allowance for at least one additional joint failure should be made.

If the repair occurs in deeper water (worst case) then typically, 3 x water depth (3 x 65m) of cable is required to be recovered plus some additional lengths to allow for slack management for repair works to be undertaken. This would amount to approx. 1,100 m of cable to typically be recovered and re-layed for each repair. Worst case assumes that this length would not be able to be reburied and would require non-burial protection.

	Omega joint assumed to be 3x water depth long i.e. 3x65 m in each leg, plus 100 m wide. Transition for cable from surface to re-trenched is assumed to be 200 m. Assume both pairs are damaged in worst case (eg anchor drag). Therefore one fault equates to: 200 m + (3 x 65 m) + 100 m + (3 x 65 m) + 200 m for each circuit, totalling 890 m per circuit. Four faults = 4 x 2 x 890 m = 7,120 m One additional joint fault assumed the replacement of one circuit = 890 m Total for repairs = 7,120 + 890 = 8,010 m

Whilst the Cable Burial Risk Assessment has assumed that cable burial will be below a designated stable seabed level, at this stage the stable seabed level estimate is based on measurements from a single survey. A more refined estimate will be achieved after the pre-installation survey. Therefore, for maintenance activities within areas where the cable is buried in seabed that is more mobile it is more likely that in-service inspections will identify areas as requiring remedial protection (i.e. sandwaves and large ripples are currently present for up to 4,200 m of the route). If it is assumed that approx. 10% of the cable within these areas may require remedial protection (420 m), assessed through each of the regular surveys. The survey frequency is not defined yet, but for this purpose is assumed to be after 6mo, 1yr, 2yr, 3yr, 5yr, 10yr and 15yr. Therefore 7 surveys, each identifying 420 m, results in a further 2,940 m of non-burial protection may be required if the cable cannot be reburied.

Accordingly, if the values for repair and maintenance are summed then this additional length of non-burial protection amounts to 10,950 m or approx. 10% of the total cable route (total length of cable route is *c.* 109 km). Accordingly, the worst-case scenario parameters presented include an additional 10% contingency for non-burial protection which is also assessed within the technical topic chapters.

[1] Tang, W, Brown, K, Flynn, D and Pellae, H. (2018). “Integrity Analysis Inspection and Lifecycle Prediction of Subsea Power Cables”, 2018 Prognostics and System Health Management Conference, Chongqing, China, 2018

[1] Wenshuo Tang, Hugues Pellae, David Flynn and Keith Brown. "Integrity Analysis Inspection and Lifecycle Prediction of Subsea Power Cables", Prognostics and System Health Management Conference , Chongqing, 2018

[1] Wenshuo Tang, Hugues Pellae, David Flynn and Keith Brown. "Integrity Analysis Inspection and Lifecycle Prediction of Subsea Power Cables", Prognostics and System Health Management Conference , Chongqing, 2018

APPENDIX 5: MMO RESPONSE TO PERCENTAGE CONTINGENCY RATIONALE

Sarah Lister

From: Qureshi, Mark <Mark.Qureshi@marinemanagement.org.uk>
Sent: 11 October 2019 08:30
To: Ross Hodson; Sarah Lister
Cc: Walker, Daniel; Pennington, Abbey
Subject: RE: AQUIND Rationale for Non Burial Contingency

Follow Up Flag: Follow up
Flag Status: Flagged

Hi Ross,

Thanks for your email and apologies for delay in my reply.

Regarding the cable burial contingency approach, it looks satisfactory. However, it would be helpful if you could separate out the 10% (and stated in metres) into the following categories:

- Amount of cable protection to be laid during construction of the project (construction period being defined as ending when developer notifies MMO of end of construction).
- Amount of cable protection required for maintenance of that laid during construction (maintenance being defined as replacing protection that was laid during construction) .
- Amount of additional/ new cable protection that may be required to protect assets that become exposed during operation of the cable.

Separating the amount into the 3 categories will provide a picture as to what will be required over and above initial construction. For Interconnector cables, maintenance isnt licensable, however it would be helpful to have the overall picture.

The reasoning behind the 10 year approach is to recognise that environmental conditions can change over time, and there will likely already be a good period of time elapsed from the date of any baseline surveys informing an application, to the point of consent. So reducing the licensing period gives MMO and SNCBs some assurance. The conditioned surveys would provide up to date data, and inform the need for further ground truthing if necessary.

As post construction surveys to assess the asset condition are already planned, hopefully these would be able to provide the environmental data required, and therefore not too onerous for the developer.

The above approach is likely to be taken for all cable-related projects, but will take into account project design differences between sectors.

I hope this provides more clarity, happy to discuss.

Regards

Mark

Mark Qureshi ❙ Marine Licensing Case Manager ❙ Her Majesty's Government – Marine Management Organisation.
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Website | Twitter | Facebook | Linkedin | Blog |Instagram | Flickr | YouTube | Google+ | Pinterest

From: Ross Hodson [mailto:rossho@naturalpower.com]
Sent: 02 October 2019 14:04
To: Qureshi, Mark <Mark.Qureshi@marinemanagement.org.uk>; Sarah Lister <sarahl@naturalpower.com>
Cc: Walker, Daniel <Daniel.Walker@marinemanagement.org.uk>; Pennington, Abbey <Abbey.Pennington@marinemanagement.org.uk>
Subject: RE: AQUIND Rationale for Non Burial Contingency

Hi Mark

The initial email was really to get some feedback on our rational for the cable burial contingency, as this was previously requested by the MMO at previous meetings? Therefore, please can you confirm whether what we provided below is satisfactory for explaining where the contingency volumes came from? I think this is distinct and separate to the to how best to licence cable protection post construction.

Regarding the approach to licensing post construction cable protection, given we will be submitting the DCO application in less than month I expect we will proceed on the basis that we have assessed and will be seeking permission for cable installation for up to 15 year post consent. This is in line with advice provided by the MMO over 12 months ago, and is consistent with MMOs approach for recent interconnector licences which have included this when granting consent. Once submitted, it will allow us to focus discussions about DML conditions including any concerns about post construction installation and the mechanics/ operationally of how certain conditions will work, what will be included in various documents (including cable burial management plans) etc.

A couple of initial thoughts though following your email which might be worth considering for future discussion:

- What is the rational for reducing from 15 to 10 years?
- What surveys are you referring to? And for what purpose would we be submitting these results to you i.e. what are you approving?

Regards

Ross

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Principal Environmental Consultant
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From: Qureshi, Mark <Mark.Qureshi@marinemanagement.org.uk>
Sent: 01 October 2019 14:43
To: Sarah Lister <sarahl@naturalpower.com>; Ross Hodson <rossho@naturalpower.com>
Cc: Walker, Daniel <Daniel.Walker@marinemanagement.org.uk>; Pennington, Abbey <Abbey.Pennington@marinemanagement.org.uk>
Subject: RE: AQUIND Rationale for Non Burial Contingency

Hi Sarah,

Thanks for your email. Following the workshop the we are finalising our position with NE regarding cable protection.

I'm not sure at this stage when our position will be finalised and a communication issued. However, I can confirm that the MMO definition of maintenance does not include the laying of new cable protection in new locations. Cable

APPENDIX 10

NE REPONSE TO CABLE PROTECTION TECHNICAL NOTE

Sarah Lister

From: Ziauddin, Zara <Zara.Ziauddin@naturalengland.org.uk>
Sent: 17 August 2020 18:03
To: Sarah Lister
Subject: AQUIND Technical Cable Protection Note - Natural England
Attachments: EN020022_304740_AQUIND Interconnector Appendix 1 Natural England's draft paper on Cable Protection.pdf

Dear Sarah

Please find below, setting out Natural England's comments in relation to AQUIND Cable Protection Technical Note (REPORT - 1223652 - 1 - B) – 1 Document Ref.: 1223652 note submitted on 24.06.2020 and further attached supporting documents:
Appendix 1 MMO Advice_July 2018
Appendix 2 Meeting Minutes_MMO Meeting 06_09_18
Appendix 3 AQUIND MMO Meeting 09_01_2019
Appendix 4 AQUIND Rationale for Non Burial Contingency
Appendix 5 MMO Response to Rationale for Cable Protection

AQUIND Limited Technical Cable Protection Note - Document Ref.: 1223652

ITEM	Natural England
3.2.4.	This item relates to the previous request that both units of volume and area are provided within the Design Parameters within the Deemed Marine Licence (DML). Natural England are content with the reasoning of not wanting to provide units of volume. As a minimum however, details must be provided of the unit area. As it would stand, the unit area would suffice but volume alone would not.
4.2.6.	Natural England agrees that as it is currently set out in the AQUIND Limited Technical Cable Protection Note, Schedule 15, Part 2, Condition 11, (in addition to the restrictions provided by the conditioned design parameters) is appropriate to control the laying of additional cable protection during operation in connection with maintenance and repair activities.
4.2.7.	Natural England is content with the wording as set out in Schedule 15, Part 2, Condition 11.
5.1.13.	This items relates to the period within which cable protection activities may be undertaken. Provided that all the appropriate controls are in place including the following (as set out in Appendix 1 draft paper on Cable Protection' – find attached);

'*Data less than 5 years old will be required to support laying of additional cable protection along with descriptions of the seabed habitat and information regarding what cable protection has been laid to date. Justification will need to be made as to why cable protection is necessary considering risk and alternatives and every effort made to minimise amounts required to reduce environmental impact*,'

Natural England are content to support a longer term licence for this particular cable, 15 years, during operation for laying of additional cable protection in areas outside Marine Protected Areas ('MPAs').

5.2.11. This item relates to the extent of required future surveys. Natural England are accepting of the approach to not encompass the entire UK Marine Cable Route for the benthic survey, ensuring all other appropriate measures are in place. Up to date geophysical surveys should be compared to the Environmental Statement (ES) and pre-construction surveys. If it is demonstrated that the habitats are the same then this is acceptable to validate the recent data. If the data or evidence from other sources show that there may have been a change in habitat, then ground truthing of the data via video or grabs may be necessary. Further data or ground truthing may be necessary for sensitive habitats identified in initial surveys.

If you have any further queries, please do not hesitate to contact me.

Please find attached - Appendix 1 draft paper on Cable Protection.

Kind regards
Zara Ziauddin

Solent Team

Office: 020 82256903
Mobile: [redacted]