



THE PLANNING ACT 2008

THE INFRASTRUCTURE PLANNING (EXAMINATION PROCEDURE) RULES
2010

Sea Link Energy Cable

Appendix D6 to the Natural England Deadline 6 Submission

Natural England's Additional Comments on Marine Physical Environment

For:

The construction and operation of the Sea Link Energy Cable.

Planning Inspectorate Reference EN020026

13th April 2026

Appendix D6 Sea Link Deadline 6 Marine Physical Environment

In formulating our advice, the following documents have been considered:

Sea Link Deadline 5 Submission Documents:

- [REP5-020] 6.2.4.1 (F) Environmental Statement Part 4 Marine Chapter 1 Physical Environment (Tracked)
- [REP5-037] 6.6 (G) Habitats Regulations Assessment Report (Tracked)
- [REP5-039] 6.11 (D) Environmental Statement Marine Conservation Zone Assessment (Tracked)
- [REP5-067] 7.5.2 (C) Outline Offshore Construction Environmental Management Plan (Tracked)
- [REP5-079] 7.5.12 (C) Outline Offshore Invasive Non-Native Species Management Plan (Tracked)
- [REP5-116] 9.84 (C) Register of Environmental Actions and Commitments (REAC) (Tracked)
- [REP5-118] 9.92 (B) Outline Cable Specification and Installation Plan (Tracked)
- [REP5-131] 9.119 Applicant's Comments on Late Responses to ExA First Written Questions
- [REP5-132] 9.121 Applicant's Comments on Other Submissions Received at Deadline 4
- [REP5-133] 9.121.1 Applicant's Comments on Other Submissions Received at Deadline 4 - Appendix A
- [REP5-135] 9.123 Applicant's Responses to Second Written Question
- [REP5-136] 9.123.1 Applicant's Responses to Second Written Questions – Appendices
- [REP5-139] 9.126 Areas of Safeguarded Water Depth - Consideration of Additional Installation Requirements

Please note that some of the marine processes points included in this Appendix are also relevant to issues raised in Tab J 'Kent Landfall' of our R&I log. Where this is the case we have provided both references.

Detailed comments

Table 1: Natural England's Advice On: Marine Physical Environment

Document reviewed: [REP5-020] 6.2.4.1 (F) Environmental Statement Part 4 Marine Chapter 1 Physical Environment (Tracked)					
NE Ref	Section	Key Concern and/or Update	Natural England's Advice to Resolve Issue	RAG	R&I log point/topic (e.g. B3, PVA)
1	1.7.64-1.7.65 & MPE02	Natural England welcomes the Applicant's recognition of the potential for the River Stour low water channel to migrate north towards the Sea Link buried cable alignment during the lifetime of the Proposed Project. However, we remain concerned that the current target Depth of Lowering (DOL) of 1.5m may not be sufficient to avoid being impacted by the migration of the low flow river channel and the requirement for remedial intervention and subsequent additional environmental impacts.	We advise that further detailed analysis is needed to increase understanding of firstly the current and future river mouth/channel elevation level relative to cable route and secondly the likely depth of the buried cable. Additional mitigation measures also need to be explored such as a deeper burial depth and/or moving the cable route further North.		Point 2 of Tab D of our R&I Log
2	1.7.132	Natural England notes that the sediment chemistry results have been provided for the original pre-sweeping section of the Offshore Scheme (KP96.32-KP113.883]. However, we note in [REP5-118] Cable Specification and Installation Plan (CSIP), that pre-sweeping may now also be required at KP38.7-KP44.4 and there are no sediment chemistry analysis results for this section of the Offshore Scheme.	We advise that the Applicant should provide sediment chemistry analysis results for the proposed additional section of pre-sweeping (i.e. KP38.7-KP44.4).		N/A
3	1.8.4/MPE02	Natural England notes that the target depth of lowering (DOL) for the Kent landfall is 1.5m to allow for the potential future	Please see our advice to Point 1 above.		Point 2 of tab D of our R&I Log

		lowering of intertidal bed levels. However, we remain concerned that this depth of burial may not be sufficient to protect the cable from exposure due to migration of the River Stour low water channel northwards towards the cable route during the lifetime of the Project.			
4	1.8.4/MPE06	Natural England notes and welcomes the Applicant's commitment (MPE06) to monitor beach profile and erosion rates at both Suffolk and Kent landfall sites. However, the wording is unclear because it suggests that monitoring will only occur at the location where rock bags are planned to be placed.' We advise that, particularly for the Kent landfall, that this monitoring should cover the full extent of the intertidal/seabed affected by cable installation activities.	We advise that the Applicant should provide more specific details on the proposed monitoring and the wording made clearer. For example, whether it will include the full extent of the intertidal affected by cable installation. Such details of commitments should be captured within a named plan/document.		Point 28 in Tab D and Points RI_J2, and RI_J10 of our R&I Log
5	1.8.4/MPE09	Natural England notes and welcomes the Applicant's commitment (MPE09) to monitor the River Stour channel in Pegwell Bay. This commitment includes annual monitoring for the first 5 years, with a review of monitoring frequency after 5 years. While we welcome this commitment, there are no details regarding the scope or nature of the monitoring. Similarly, the aim of the monitoring and thresholds of change triggering intervention have also not been detailed.	Natural England welcomes the monitoring proposed for the River Stour low water channel in Pegwell Bay. However, we advise that the proposed monitoring should be captured in an In Principle Monitoring Plan (IPMP) and further details provided and captured regarding its scope, aims, threshold of change, triggers for intervention etc.		Point 2 of Tab D of our R&I Log
6	1.8.4/MPE10	Natural England notes and welcomes the Applicant's commitment (MPE10) to reinstate the intertidal mudflats at the Kent landfall, through natural and, if needed,	We welcome the commitment to reinstate the intertidal mudflats at the Kent landfall following removal of the cofferdams at the HDD entry/exit points. However, we advise		Point 11 of Tab D and Points RI_J10 and

		mechanical backfill, following removal of the cofferdams at the Horizontal Directional Drilling (HDD) entry/exit points. However, we note that this measure does not include monitoring to verify that impacts to the intertidal do not persist.	that monitoring should be carried out to verify that impacts to the intertidal do not persist. This should also consider requirements for intervention should the monitoring reveal impacts to the intertidal that persist. Such commitments should be captured within a named plan/document.		RI_J31 of Tab J of our R&I Log
7	1.8.4/W37	Natural England notes and welcomes the Applicant's commitment (W37) to prepare a hoverport condition monitoring plan post consent to monitor the condition of the hoverport during construction. Whilst we note the intention is to include measures for identifying and managing any potential contamination risk and will be prepared in consultation with the EA, NE, KWT and TDC for approval by TDC, we are concerned that containment will involve maintaining integrity of hoverport through the use of cement to stop leeching which is impactful in its own right.	Natural England advises that further investigation of containment options are required as part of the consent to ensure that this is feasible without increasing environmental impacts.		Point 34 of Tab D and Point RI_J31 of Tab J of our R&I Log
8	Table 1.19 & 1.9.22-1.9.45	Natural England welcomes the detailed breakdown of Maximum Design Scenario (MDS) for construction-related impacts to inshore seabed morphology and designated coastal feature receptors at the Kent landfall. However, we note landfall construction will involve a number of phases, as follows: Q1-Q3 2027 <ul style="list-style-type: none"> Phase 1A: Establish temporary access route between the former hoverport and the HDD exit pits (located in the intertidal zone) 	We advise that the MDS for landfall construction activities needs to be clarified, in particular with regards to the different phases. All landfall construction activities that may lead to seabed/intertidal disturbance need to be identified, considered, and assessed.		Points 20 & 31 of Tab D and RI_J8, RI_J11, RI_J16 and RI_J27 of Tab J of our R&I Log

		<ul style="list-style-type: none"> Phase 1B: HDD exit pit cofferdam construction and working area Phase 2: HDD drilling and duct installation <p>Q2-Q3 2029</p> <ul style="list-style-type: none"> Phase 3: Marine cable pull-in Phase 4: Marine cable burial Phase 5: Removal of access <p>It is stated that most of these phases will occur sequentially, but certain activities may occur in parallel or temporally overlap. The MDS for each of these phases remains unclear. It is also unclear where the overlap lies.</p> <p>There also appears to be a number of landfall construction activities which have not been included in the MDS, for example:</p> <ul style="list-style-type: none"> use of rollers for duct pull-in (for pulled duct installation) e.g. MDS 10m width x 1km length, gravity base or piled bases construction access route from the hoverport across the intertidal, including potential use of ground protection mats advance pre-construction activities e.g. archaeological trial trenching, geotechnical investigation etc. 			
9	Table 1.19/Page 86 & Section 1.9.4	Natural England notes that the MDS for sandwave lowering/pre-sweeping in Table 1.19 does not include the additional section of the offshore scheme i.e. KP38.7-KP44.4, as detailed in the updated CSIP [REP5-118]. In [REP5-118], and as per	We advise that the MDS pre-sweeping sediment removal parameters need to be clarified, based on the latest information. The MDS sediment removal parameters should also be presented per trench and for all		Point 32 of Tab D of Our R&I Log

		deemed Marine Licence (dML) Part 2, Condition 1, the total pre-sweeping volume of sediment to be removed is 325,000m ³ , whereas in the Environmental Statement (ES) Chapter 1 Marine Physical Environment (MPE), this MDS is 250,000m ³ . Therefore, there is disagreement between the ES chapter and CSIP.	trenches, i.e. overall total. The assessment should then be updated accordingly.		
10	Table 1.19/Page 86	<p>In Table 1.19 of MPE Chapter [REP5-020] the MDS pre-sweeping sediment disposal volume is 250,000m³, based only on pre-sweeping of KP96.32 to KP113.883. However, we note in the updated CSIP [REP5-118] that there is an additional section of pre-sweeping at KP38.7 to KP44.4 which has not been considered in [REP5-020].</p> <p>It is also unclear if the MDS volume presented is per trench, or the overall volume across all trenches.</p> <p>In Table 1.19 [REP5-020], we note that the pre-sweeping sediment disposal volume assumes that <i>'up to 3 m of sand may require to be pre-swept above the non-mobile reference level. Due to the high energy environment and expectation that the mobile bedforms would migrate at each storm event, a realistic assumption of 2 m sand removal is made along the interval designated for pre-sweeping (KP96.32 to KP113.883).'</i> This suggests that the MDS height of sandwave removal may be up to</p>	<p>We advise clarification is needed on the following:</p> <ul style="list-style-type: none"> • MDS pre-sweeping sediment disposal volume needs to be clarified • MDS sediment disposal volume should be provided per trench and the overall total for all trenches, for the MDS width, length, and height • MDS height of sandwave removal (i.e. is this 2m or 3m?) 		Point 32 of Tab D of our R&I Log

		3m, but that 2m has been used to calculate the MDS volume of sediment to be removed/disposed. This is unclear.			
11	Table 1.19, Page 86	Natural England notes that sand removed through sandwave levelling (pre-sweeping) would be deposited within the Order Limits within the area of pre-sweeping in such a way that the local currents would not backfill the pre-sweep area prior to cable installation and protection. The mechanism to infill the rock trench and allow the seabed to revert to natural bedforms is by natural backfill and sediment circulation / deposition.	Our advice is that material removed through pre-sweeping should remain within the same sedimentary system and be 'intelligently' placed so that excavated material quickly infills the excavated depression. This will ensure restoration of natural processes and form as soon as possible – this is particularly important on/near designated sites and in the vicinity of sandbanks.		Point 16 of Tab D of our R&I Log
12	1.9.28-1.9.31	Natural England notes and welcomes the Applicant's assessment of scour potential around the cofferdams at the Kent landfall. We also note that the Applicant anticipates that any scour around the cofferdams would be localised, most likely around the cofferdam corners. Furthermore, the Applicant proposes to monitor seabed levels during these works. The Applicant also states that wave stirring combined with tidal currents will encourage recovery of the seabed without further intervention. This is welcome. However, it is not stated where this commitment has been captured.	we advise that monitoring should be secured as a commitment in a named plan/document preferably the In Principle Monitoring Plan (IPMP) and evidence be presented to demonstrate that the impacts due to the presence of cofferdams at the Kent landfall are as predicted (i.e. localised, very limited in extent, short-lived, and fully recoverable). Should monitoring demonstrate that impacts are greater than predicted then the need for remediation should be secured and delivered.		Point 11 of Tab D and RI_J31 of Tab J of our R&I Log
13	1.9.29	Natural England notes that it is predicted that seabed sediments mobilised due to scouring around the cofferdams (in Pegwell Bay) would be transported only short distances, typically up to around 100 m. We are concerned that this could lead to deposition of sediments on the	We advise estimation of the potential extent and thickness of sediment deposition at/near the saltmarsh edge due to the interaction of seabed/intertidal sediments with the cofferdams during the construction phase. Although, we note that the Applicant aims to provide updated suspended sediment		Point 2020 of Tab D and Points RI_J8, and RI_J29 of Tab J of our R&I Log.

		saltmarsh, given that the minimum distance between the seaward edge of the saltmarsh and the HDD exit pits is 105m.	modelling [APP-195] for ISH3 which may help to resolve this issue.		
14	1.9.92	Natural England notes that it is suggested that the geomorphology of the intertidal and subtidal areas of Pegwell Bay are expected to remain relatively stable over time with no notable change. We would advise that this does not agree with the conclusions of [PDA-038] which states that <i>“Appropriate consideration will also need to be given to the potential effects of climate change which is expected to lead to mean sea level rise and potentially increased rates of erosion and shoreline retreat.”</i>	We would advise that, as highlighted in [PDA-038], there is uncertainty regarding the future stability of the saltmarsh, intertidal and subtidal areas of Pegwell Bay with regards to climate change effects. For example, the morphological and shoreline response to: sea level rise, increased storminess, increased nearshore wave energy, coastal squeeze etc. Therefore, we would advise that this needs to be clarified.		Point 20 in Tab D and Point RI_J8 R&I Log.
15	1.9.96	Natural England notes from the proposed embedded design measure that there will be no infrastructure at the surface in the intertidal and coastal zones over the operational lifetime of the project. Meaning that there will be no interaction of the Proposed Development with coastal/ intertidal physical processes during the operational phase. While this is welcomed, it is unclear where this commitment has been secured.	We advise that the Applicant should signpost to the relevant plan/document where this commitment can be found. It is also unclear whether this embedded measure includes cable protection. This should be clarified.		Point 17 of Tab D of our R&I Log.
16	1.9.98	Natural England notes and welcomes Commitment MPE09 (in 7.5.2 Outline Offshore Construction Environmental Management Plan (CEMP) and 7.5.3.2 CEMP Appendix B Commitments (REAC)) to monitor River Stour low water channel northerly migration towards the Sea Link buried cables. However, we advise that this misses a step with regards to first	We advise that prior to implementing the monitoring of the River Stour low water channel, further evidence should be gathered regarding the present-day low water channel depth/level relative to the surrounding seabed level and proposed cable alignment and marine limit of deviation. This will help inform the detailed assessment of cable burial depth		Point 2 of Tab D of our R&I Log.

		establishing baseline conditions to inform understanding and the impact assessment.	and minimise the risk of cable exposure during the operational phase.		
17	1.9.103-1.9.107	<p>Natural England notes the Applicant have provided Stage 2 Site Assessment on Goodwin Sands MPA and reference to the report for the High Court of Justice (2019) (Thomson v Marine Management Organisation & Others, 2019 EWHC 2368).</p> <p>We also welcome the Applicant's further clarification on the position of cable crossings relative to Cross Ledge Sandbank and Goodwin Sands MCZ. However, these do not address our concerns regarding the potential for morphological and sedimentary change due to the placement of cable protection measures within/near Cross Ledge sandbank or adjacent to Goodwin Sands MCZ.</p> <p>As we have indicated previously, currently the evidence presented is not sufficient to support the conclusions. Therefore, we remain concerned that the presence of cable protection measures directly adjacent to the MCZ and at/near Cross Ledge could result in interruption of seabed sediment transport and lead to changes to the morphology of the sandbanks, and/or their sediment composition, through the operational phase of the project.</p>	<p>Natural England advises that the Applicant should consider undertaking monitoring, and using available evidence, to help increase understanding and potentially resolve concerns with the following:</p> <ul style="list-style-type: none"> • Geomorphology (including bedform characterisation, migration direction and rate) • Metocean conditions, sediment transport processes, and effects of climate change. • Morphodynamics prior to installation, during operation • Scour potential due to presence of cable protection. 		Point 1 of Tab D of our R&I Log.

Table 2: Natural England's Advice On: Marine Physical Environment

Document reviewed: [REP5-118 9.92] (B) Outline Cable Specification and Installation Plan (Tracked)					
NE Ref	Section	Key Concern and/or Update	Natural England's Advice to Resolve Issue	RAG	R&I log point/topic (e.g. B3, PVA)
1	3.3.9	Natural England notes an additional area of pre-sweeping at KP38.7-KP44.4 has been included in the updated CSIP. This is in addition to the original provision for pre-sweeping at KP96.32-KP113.883. However, we also note that this additional section and increased MDS for pre-sweeping have not been updated in all relevant plans/documents.	We advise that all relevant plans/documents should be updated to include the additional pre-sweeping allowance and increased MDS. All relevant assessments should also be updated accordingly.		N/A
2	4.3.8	Natural England notes that backhoe dredging has been included to support with pre-installation trenching. However, this burial tool has not been included in the assessment for marine physical processes [REP5-020].	We advise that backhoe dredging should be included in the relevant plans/documents, along with the MDS.		N/A
3	5.1.4	Natural England notes that the 'high risk' areas requiring rock backfill along the offshore route are identified in the CSIP as KP 38 to KP 58, and KP 81.5 to KP 96.5. However, these do not quite	We advise that clarification is needed regarding the high-risk areas requiring rock backfill should be updated, as needed, across all relevant plans/documents, including the MDS. Further		N/A

		align with the offshore route rock backfill sections presented in, for example, [REP5-020] which are KP 35 to KP 58; KP 81.5 to KP 96.5. It is also unclear whether these sections of rock backfill will be continuous or not. Furthermore, in [REP5-020] rock backfill is included only for the operational phase of the Project, but this is not stated in the CSIP.	clarity is also required regarding the nature of the proposed backfill sections, if they are continuous or not, and whether the rock backfill allowance in the CSIP is for the operational phase only. This should also be clarified for the other types of external cable protection proposed in the CSIP.		
4	5.1.6	Natural England welcomes the Applicant's willingness to 'factor in' the removability of cable protection for the Proposed Project. However, it is not clear what this entails.	We advise that the Applicant should clarify what 'factor in' means with regards to removable cable protection to advise on the effectiveness of this mitigation measure.		N/A
5	Section 6	Natural England welcomes the addition of a section on 'Maintenance' in the updated CSIP. However, we note that the MDS for maintenance activities have not been included.	We advise that the MDS, and details of, maintenance activities should be included. If not, then we advise these must be included in a separate marine licence.		N/A

Table 3: Natural England's Advice On: Marine Physical Environment

Document reviewed: [REP5-039] 6.11 (D) Environmental Statement Marine Conservation Zone Assessment (Tracked)					
NE Ref	Section	Key Concern and/or Update	Natural England's Advice to Resolve Issue	RAG	R&I log point/topic (e.g. B3, PVA)

1	1.5.31- 1.5.34	<p>Natural England notes the inclusion of the reference to the report for the High Court of Justice (2019) (Thomson v Marine Management Organisation & Others, 2019 EWHC 2368). However, as indicated previously, currently there is insufficient evidence to support the conclusions regarding cable protection impacts on Goodwin Sands MCZ.</p> <p>We remain concerned that the presence of cable protection measures directly adjacent to the MCZ could result in interruption of seabed sediment transport and lead to changes to the morphology of the sandbanks, or their sediment composition, through the operational phase of the project.</p>	Please see our advice in Point 15 of Table 1 above.		Point 1 of Tab D of our R&I Log.
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