Net Zero Teesside Project

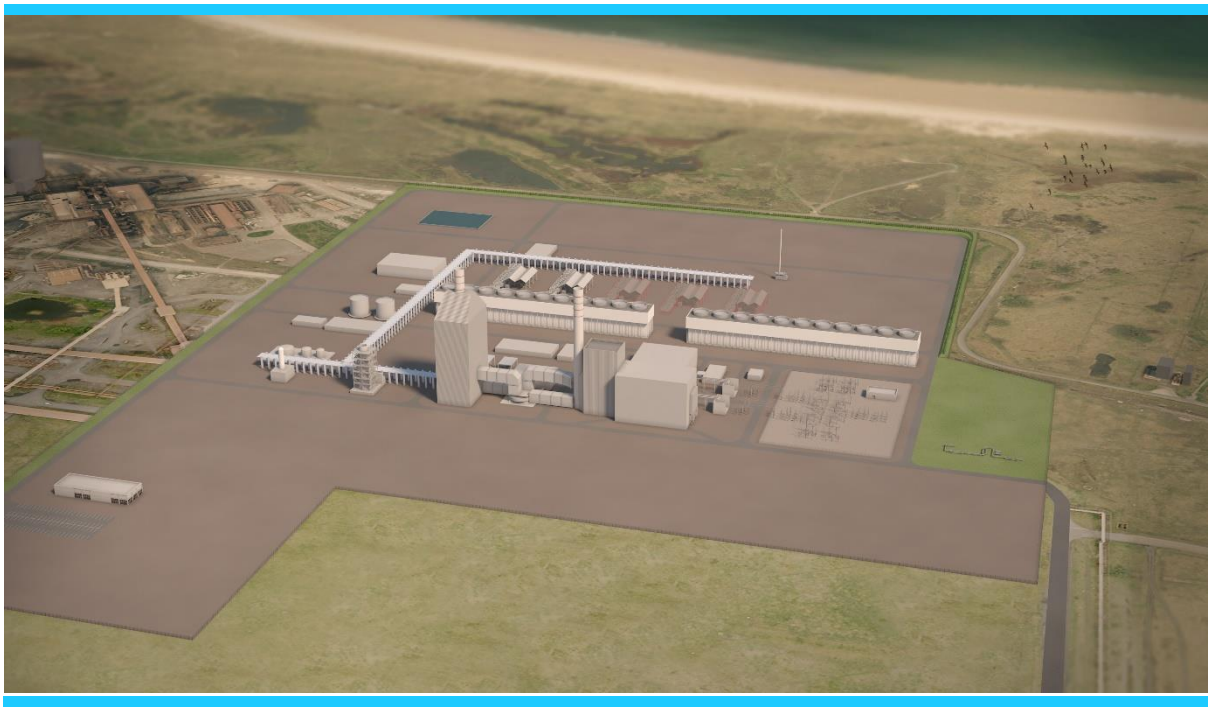
Planning Inspectorate Reference: EN010103

Land at and in the vicinity of the former Redcar Steel Works site, Redcar and in Stockton-on-Tees, Teesside

The Net Zero Teesside Order

Document Reference: 9.35 – Applicants' Comments on Deadline 7 Submissions

Planning Act 2008



Applicants: Net Zero Teesside Power Limited (NZT Power Ltd) & Net Zero North Sea Storage Limited (NZNS Storage Ltd)

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GLOSSARY

Abbreviation	Description
AOD	Above ordnance datum
AS-	Additional Submissions
BAT	Best Available Techniques
BEIS	The Department for Business, Energy and Industrial Strategy
CCGT	Combined Cycle Gas Turbine
CCUS	Carbon Capture, Utilisation and Storage
CEMP	Construction and Environmental Management Plan
CTMP	Construction Traffic Management Plan
CO_2	Carbon dioxide
CPO	Compulsory Purchase Order
dB	Decibels
DCO	Development Consent Order
dDCO	Draft Development Consent Order
EIA	Environmental Impact Assessment
EPC	Engineering, Procurement and Construction
ES	Environmental Statement
ETS	Emissions Trading Scheme
ExA	Examining Authority
FEED	Front end engineering and design
FRA	Flood Risk Assessment
Ha	Hectares
HDD	Horizontal Directional Drilling
HIA	Hydrogeological Impact Appraisal
HoT	Heads of Terms
kV	Kilovolts
MHWS	Mean High Water Springs
MLWS	Mean Low Water Springs
Mt	Million tonnes

NATS	National Air Traffic Services
NSIP	Nationally Significant Infrastructure Project
NWL	Northumbria Water Lagoon
NZT	The Net Zero Teesside Project
NZT Power	Net Zero Teesside Power Limited
NZNS Storage	Net Zero North Sea Storage Limited
PA 2008	Planning Act 2008
PCC	Power Capture and Compressor Site
PDA-	Procedural Deadline A
PINS	Planning Inspectorate
RCBC	Redcar and Cleveland Borough Council
RR	Relevant Representation
SBC	Stockton Borough Council
SEL	Sound Exposure Level
SPA	Special Protection Areas
SoCG	Statement of Common Ground
SoS	Secretary of State
STDC	South Tees Development Corporation
SuDS	Sustainable urban drainage systems
UXO	Unexploded Ordnance
WFD	Water Framework Directive

CONTENTS

1.0 INTRODUCTION

1.1 Overview

1.1.1 This document, 'Applicant's Comments on Deadline 6 Submissions' (Document Ref. 9.32) has been prepared on behalf of Net Zero Teesside Power Limited and Net Zero North Sea Storage Limited (the 'Applicants'). It relates to the application (the 'Application') for a Development Consent Order (a 'DCO'), that has been submitted to the Secretary of State (the 'SoS') for Business, Energy and Industrial Strategy ('BEIS'), under Section 37 of 'The Planning Act 2008' (the 'PA 2008') for the Net Zero Teesside Project (the 'Proposed Development').

1.1.2 The Application was submitted to the SoS on 19 July 2021 and was accepted for Examination on 16 August 2021. A change request made by the Applicants in respect of the Application was accepted into the Examination by the Examining Authority (the 'ExA') on 6 May 2022. A further change request was submitted to the ExA at Deadline 6 on 23 August 2022.

1.2 Description of the Proposed Development

1.2.1 The Proposed Development will work by capturing CO_2 from a new the gas-fired power station in addition to a cluster of local industries on Teesside and transporting it via a CO_2 transport pipeline to the Endurance saline aquifer under the North Sea. The Proposed Development will initially capture and transport up to 4Mt of CO_2 per annum, although the CO_2 transport pipeline has the capacity to accommodate up to 10Mt of CO_2 per annum thereby allowing for future expansion.

1.2.2 The Proposed Development comprises the following elements:

- **Work Number ('Work No.') 1** – a Combined Cycle Gas Turbine electricity generating station with an electrical output of up to 860 megawatts and post-combustion carbon capture plant (the **'Low Carbon Electricity Generating Station'**);
- **Work No. 2** – a natural gas supply connection and Above Ground Installations ('AGIs') (the **'Gas Connection Corridor'**);
- **Work No. 3** – an electricity grid connection (the **'Electrical Connection'**);
- **Work No. 4** – water supply connections (the **'Water Supply Connection Corridor'**);
- **Work No. 5** – waste water disposal connections (the **'Water Discharge Connection Corridor'**);
- **Work No. 6** – a CO_2 gathering network (including connections under the tidal River Tees) to collect and transport the captured CO_2 from industrial emitters (the industrial emitters using the gathering network will be responsible for consenting their own carbon capture plant and connections to the gathering network) (the **'CO_2 Gathering Network Corridor'**);

- **Work No. 7** – a high-pressure CO_2 compressor station to receive and compress the captured CO_2 from the Low Carbon Electricity Generating Station and the CO_2 Gathering Network before it is transported offshore (the **'HP Compressor Station'**);
- **Work No. 8** – a dense phase CO_2 export pipeline for the onward transport of the captured and compressed CO_2 to the Endurance saline aquifer under the North Sea (the **'CO_2 Export Pipeline'**);
- **Work No. 9** – temporary construction and laydown areas, including contractor compounds, construction staff welfare and vehicle parking for use during the construction phase of the Proposed Development (the **'Laydown Areas'**); and
- **Work No. 10** – access and highway improvement works (the **'Access and Highway Works'**).

1.2.3 The electricity generating station, its post-combustion carbon capture plant and the CO_2 compressor station will be located on part of the South Tees Development Corporation (STDC) Teesworks area (on part of the former Redcar Steel Works Site). The CO_2 export pipeline will also start in this location before heading offshore. The generating station connections and the CO_2 gathering network will require corridors of land within the administrative areas of both Redcar and Cleveland and Stockton-on-Tees Borough Councils, including crossings beneath the River Tees.

1.3 The Purpose and Structure of this document

1.3.1 The purpose of this document is to summarise the Applicants' comments on the submissions made by Interested Parties at Deadline 7 (1 September 2022). The document is structured to provide comments on the following Interested Parties' Deadline 7 submissions:

- Section 2 – Environment Agency
- Section 3 – Marine Management Organisation
- Section 4 – North Tees Limited
- Section 5 – NPL Waste Management Limited
- Section 6 – Orsted Hornsea Project Four Limited
- Section 7 – South Tees Development Corporation

2.0 ENVIRONMENT AGENCY ("EA")

2.1.1 The Deadline 7 submission by the EA [REP7-012] include comments on the Applicants' Deadline 6 submissions.

2.2 Applicants' Response

2.2.1 Response to comments on Deadline 6 Submission - 2.1 - Draft DCO (Comparison with (D5) August 2022) - August 2022 [REP6-003] & Deadline 6 Submission - 2.1 - Draft DCO (Comparison with (D5) August 2022) - August 2022 [REP6-003]: the Applicants note the Environment Agency's comments.

2.2.2 Response to comments on Deadline 6 Submission - 9.28 - Applicants' Responses to Deadline 5 Submissions August 2022 [REP6-122]: the Applicants confirm that R13(2) has been re-worded as requested by the EA. The DCO submitted at Deadline 8 states:

2) The scheme submitted and approved under sub-paragraph (1) must be consistent with the principles set out in chapter 10 of the environmental statement and any construction environmental management plan submitted under requirement 16(1) and include—

(a) a preliminary risk assessment (including a desk top study) and risk assessment —

(i) is supported by a site investigation scheme;

(ii) identifies the extent of any contamination.

2.2.3 Response to comments on Deadline 6 Submission - 9.28 - Applicants' Responses to Deadline 5 Submissions August 2022 [REP6-122]: the Applicants confirm that R23(1) has been re-worded as requested by the EA. The DCO submitted at Deadline 8 states:

23. (1)—No part of the authorised development comprised within Work Nos. 1 or 7 may commence, save for the permitted preliminary works, until a written piling and penetrative foundation design method statement, informed by a risk assessment and which is consistent with the piling mitigation measures in paragraph 10.8 of Chapter 10 of the environmental statement and the principles set out in chapter 11 of the environmental statement and any construction environmental management plan (including the details of any approved groundwater monitoring plan) submitted under requirement 16(1) for that part, has been submitted to and, after consultation with the Environment Agency, Natural England, Sembcorp and STDC, approved by the relevant planning authority.

2.2.4 Response to comments on Deadline 6 Submission - 9.30 - ISH 4 Action 9 Contaminated Land Timeline August 2022 [REP6-124]: the Applicants note the Environment Agency's comments in relation to the ground investigation report, including the need for a controlled waters assessment in addition to the Hydrogeological Impact Assessment. The Applicants also note the Environment Agency's comments on the need for a validation ground investigation (as shown on Figure 1). The Applicants have updated Figure 1 to incorporate the Environment

Agency's comments, attached to this document as Appendix 1. The Applicants confirm that no intrusive construction works are planned at the north and south entrances to the Sembcorp No. 2 tunnel and no dewatering is therefore proposed. The Applicants also note the Environment Agency's comments on the likely location of ground investigation works within the connection corridors.

2.2.5 Response to comments on Deadline 6 Submission - 6.3.23 - ES Vol II Figure 9-2 Groundwater Features and Attributes August 2022 [REP6-068]: the Applicants note the Environment Agency's comments on Figure 9-2, although noting that the Figure only shows groundwater in bedrock and does not indicate that made ground and superficial deposits are WFD Groundwater bodies. The Applicants also note the Environment Agency's clarification of the status of the Tees Mercia Mudstone, Redcar Mudstone and Tees Sherwood Sandstone Groundwater Bodies.

2.2.6 Further response to comments on Deadline 5 Submission - 9.24 - Written Summary of ISH4 August 2022 (D5) [REP5-027] made by the EA [REP6-133]. In relation to the second bullet point on the reuse of the slag materials. The Applicants' position is that there is no intention to reuse slag materials outside of the remedial works by Teesworks. Consequently, the additional testing outlined in paragraph 2.1.2 in ISH 4 Action 9 Contaminated Land Timeline [REP6-124] is no longer required to support the Proposed Development. The Applicants note the EA's position and will therefore undertake the required testing before the reuse of any slag materials, if the position in relation to the reuse of slag materials changes.

3.0 MARINE MANAGEMENT ORGANISATION ("MMO")

3.1.1 The Deadline 7 submission by the MMO [REP7-013] include comments on the Applicants' Deadline 6 submissions.

3.2 Applicants' Response

3.2.1 The Applicants note the MMO's response on the inclusion of UXO clearance in the DMLs. Discussions on this matter are continuing between the MMO, NE and the Applicants. The Applicants welcome the confirmation from the MMO that it has no issue in principle with the inclusion of UXO clearance in the DMLs.

3.2.2 The Applicants address each of the drafting points raised by the MMO in the table below. The Applicants have undertaken a full review of the DMLs as part of addressing the MMO's comments and made some additional drafting amendments. For ease of reference, the Applicants have included in the third column below details of the new paragraph reference where any change has been made in the updated DMLs to address the MMO's comment.

MMO COMMENT	APPLICANTS RESPONSE	PROVISION IN UPDATED DMLS
Part 1 (1) – The definition of Trinity House should include "means the Corporation of Trinity House of Deptford Strond" after "corporation of Trinity House", and corporation should have a capital "C".	Updated.	Part 1, paragraph 1(1)
Part 1 (4)(a)-(h) – The MMO suggest references to relevant organisations would better feature in alphabetical order.	Updated.	Part 1, paragraph 1(4)(a) – (h)
Part 1 (4)(e) – The MMO note that the telephone number for the Maritime and Coastguard Agency differs from other recent Deemed Marine Licences (DML) and suggest that this is double checked.	Telephone number updated.	Part 1, paragraph 1(4)(e)
Part 2 3(b)(iii) – The current format does not make it clear whether the works taking place for Work No 5B allow disposal of up to 500m3 of dredge arisings at each site or if this is cumulatively across both disposal sites. It is recommended clarification is provided within the wording.	Disposal of up to 500m3 is intended to mean 500m3 in total across both of the disposal sites. Drafting updated to clarify this.	Part 1, paragraph 2(2), and Part 2, paragraph 20
Part 2 4 – The MMO request clarification as to why the phrase "any further development listed in Schedule 1 in connection with	The reference to "English inshore region" has been deleted in order that the works are clearly constrained to the location of the	Part 1, paragraph 2(2)

Work Nos. 5A, 5B and 8 within the English inshore region" is required, as this would suggest that the details of paragraph 3 are not complete and exhaustive. If additional works were included in Schedule 1 this could potentially cause difficulties for enforcement	Work Nos coordinates in Table 1 of the DMLs. The further development must have been "…*within the scope of the work assessed by the environmental statement and the provisions of this licence".* The purpose of this provision is not to introduce unknown "additional works". It is to ensure that any associated development (as assessed in the ES) "in connection with" Work Nos 5A, 5B and 8" is authorised. This is analogous to the "further development" wording at the end of Schedule 1. There is precedent for such wording to be included in DMLs (e.g. The Hornsea Three Offshore Wind Farm Order 2020, Schedule 11, Part 1, paragraph 3).	
Part 3 – The MMO recommend that Condition 27 would be more appropriate featured in Part 2 para 3(b).	The Applicants disagree with this amendment. Part 2 paragraph 3(b) lists the licensed activities that are authorised pursuant to carrying out Work No. 5B. Condition 27 (now paragraph 31) serves a different purpose. It is intended to cap the environmental effects associated with Work No. 5B in accordance with those identified in the "worst case" assessment that was used for assessing the impact of Work No. 5B on the water environment under paragraph 9.3.28 of chapter 9 of the ES. Accordingly this condition has been retained but the drafting has been updated to clarify its purpose.	Part 2, paragraph 31
Part 3 9(1) – The MMO note that there is still a lack of consistency with the term "undertaker" and "relevant undertaker" within the DML. This is also noted in the following paragraphs; Part 3 9(3)(a) & (b); Part 3 9(5); 9(11); 9(12); 9(13); 15(a); 19; 22(1); 22(2); and 26(1)&(2).	The term "relevant undertaker" should apply throughout the DMLs. Updates have been made where the term "undertaker" is retained.	Various
Part 3 9(3)(c) –The term "transport manager" was deleted from 9(1)(a)(ii), following the MMO's request in paragraph 4.13 of our Relevant Representation (RR-037). It is recommended that this phrasing is either included within the	Reference to "transport manager" has been deleted. A copy of the licence must now be made available "…on board each vessel or at the office *of any person with responsibility for such* vessel from which the	Part 2, paragraph 11(3)(c)

definitions under Part 1 of the DML's or is removed from the sentence.	removal or deposit of dredge arising are to be made"	
Part 3 9 (6) – Reference to the MMO Coastal Office should be "Local Enforcement Office" as per paragraph 9(4) of the DML.	Updated.	Part 2, paragraph 11(6)
Part 3 9(9) – The MMO suggest that on the penultimate line to insert "of issue" after "days".	Amendments made after reference to "five days" to specify that the relevant period for sending a copy of a notice to the MMO is within five days "*of the date of such notice".*	Part 2, paragraph 11(7)
Part 3 9(11) – The MMO recommend inserting "of Seafish" after Service on the penultimate line	Updated, and in paragraph that follows.	Part 2, paragraph 11(11) and 11(12)
Part 3 9(12) – The MMO request a copy of this notification is also provided to the MMO, MCA, Trinity House and UKHO within five days.	Updated.	Part 2, paragraph 11(12)
Part 3 10(1) – "The relevant undertaker must submit a sediment sampling plan to the MMO request at least" - this phrase is unclear. It is suggested that the phrase "to the MMO" be inserted after the word "request"	Various updates made to this condition including to clarify that the plan must be submitted to the MMO.	Part 2, paragraph 12
Part 3 10(2) – For clarity, the MMO suggest "undertaken against" should be replaced with "undertaken in accordance with".	Various updates made to this condition including to provide this clarification.	Part 2, paragraph 12
Part 3 10(2) – The MMO consider the word "sediment" should be inserted before "sampling" in the first line.	Updated.	Part 2, paragraph 12(1)
Part 3 10(3) – The MMO consider the provision lacks clarity "until written approval is provided", as it does not specify what is being referred to in this condition.	Various updates made to this condition including to provide this clarification.	Part 2, paragraph 12(4)
Part 3 11(2) – The MMO recommend that this is either included within this sub-paragraph or its own "Unless otherwise agreed in writing by the MMO the CEMP should be implemented as approved"	This provision has been included as a new sub-paragraph.	Part 2, paragraph 13(4)
Part 3 13 – The MMO would like the following provision included, which would require the undertaker to provide details as the result of any changes to the information required by	Updated.	Part 2, paragraph 15(3)

Condition 13: - *"Any changes to the name or function of the specified agent, contractor or sub-contractor, as provided in accordance with sub-paragraph (1) must be notified to the MMO in writing no less than 24 hours before the agent, contract or sub-contractor carries out a licensed activity."*		
Part 3 14 – Please insert at the end of the condition the following "(including company number if applicable)".	Updated.	Part 2, paragraph 15
Part 3 14 – It is recommended that the inclusion of the following provision which would require the relevant undertaker to provide details as the result of any changes to the information required by Condition 14: - "Any changes to the details or functions of the specified vessel, as provided in accordance with sub-paragraph (1) must be notified to the MMO in writing no less than 24 hours before the agent, contract or sub-contractor carries out a licensed activity."	Updated but incorporated into the same condition as the update on a change to the name or function of a specified agent, contractor or sub-contractor.	Part 2, paragraph 15(3)
Part 3 15 – The MMO recommend making the current provision sub-paragraph (1) and the inserting a new sub-paragraph (2) stating "*Unless otherwise agreed in writing the written scheme of archaeological investigation should be implemented as approved.*"	Updated.	Part 2, paragraph 16(3)
Part 3 20 – The MMO suggest that it there would be a more logical flow to the conditions if Condition 20 was inserted after Condition 18.	Updated.	Part 2, paragraph 21
Part 3 22(1) line 2 – "District Marine Office" should be changed to "Local Enforcement Office".	Updated.	Part 2, paragraph 22(1)
Part 3 22(1) line 3 – The MMO recommend inserting "of becoming aware of an incident" after "48 hours", although suggest that this is amended to 24 hours in line with Condition 22(2).	Updated to include "of becoming aware of an incident" after "48 hours". The Applicants consider the 48 hour period reasonable and consistent with precedent in other DMLs. The Applicants are in any case obliged to inform the MMO "as soon as possible" under this condition.	Part 2, paragraph 22(1)

Part 3 22(2) – The MMO consider that the provision is incomplete as there is currently no obligation on the undertaker to recover dropped objects, only misplaced or lost rock material at 22(1). It is recommended that this condition is developed to be in line with the requirements in other DCOs, or at the very least to be consistent with Condition 22(1). By way of example this is the provision in Sizewell C Condition 29: - *"29.—(1) The undertaker must report all dropped objects to the MMO using the dropped object procedure form as soon as reasonably practicable and in any event within 24 hours of becoming aware of an incident. (2) On receipt of the Dropped Object Procedure Form, the MMO may require, acting reasonably, the undertaker to carry out relevant surveys. The undertaker must carry out surveys in accordance with the MMO's reasonable requirements and must report the results of such surveys to the MMO. (3) On receipt of such survey results, the MMO may, acting reasonably, require the undertaker to remove specific obstructions from the seabed. The undertaker must carry out removals of specific obstructions from the seabed in accordance with the MMO's reasonable requirements and at its own expense."*	Limb 1) of SZC condition is already incorporated (subject to the timeframe above). Limbs 2) and 3) have been added. The condition that follows (previously condition 23) requiring submission of a dropped object incident form has now been incorporated into this condition.	Part 2, paragraph 22
Part 3 23 – The MMO note that there is no current timeframe for submission to the MMO of the UXO Clearance methodology, i - line with recent DCO's (East Anglia North One), the MMO recommend that this is submitted six months prior to the date on which it is intended for UXO clearance activities to begin.	Updated.	Part 2, paragraph 23(2)
Part 3 23 – The MMO recommend that the UXO clearance methodology and marine mammal mitigation	Updated.	Part 2, paragraph 23(2)

protocol are submitted as two separate documents		
Part 3 23 – Within the UXO condition the MMO require a close out report to be submitted and suggest the following wording is used: *Subject to sub-paragraph (6), a UXO clearance close out report must be submitted to the MMO and the relevant statutory nature conservation body within three months following the end of the UXO clearance activity and must include the following for each detonation undertaken— (a) co-ordinates, depth, current speed, charge utilised and the date and time of each detonation; and (b) whether any mitigation was deployed, including feedback on practicalities of deployment of equipment and efficacy of the mitigation where reasonably practicable, or justification if this information is not available*	Updated.	Part 2, paragraph 23(6)
Part 3 23 – The MMO request the following wording is included after the close out report wording: *Should there be more than one UXO clearance activity, the report required under subparagraph (5) will be provided at intervals agreed with the MMO.*	Updated.	Part 2, paragraph 23(7)

4.0 NORTH TEES LIMITED ("NTG")

4.1.1 The Deadline 7 submission by the NTG [REP7-014] includes a response to CA.1.8 from the ExA's first written questions.

4.2 Applicants' Response

4.2.1 The Applicants have reviewed the plans submitted by NTG and have the following comments. The Applicants continue to engage with NTG on a voluntary agreement to secure the easement for the CO2 Gathering Network pipeline (Work No. 6) and associated access for construction and operation.

4.2.2 Drawings 001-002: The Applicants are aware of the landmarks highlighted by NTG within the pipeline corridor route. Utilising information gathered during site surveys to date the Applicants and their FEED contractor are developing a proposed pipeline route within the constraints created by the existing assets, structural apparatus, and access.

4.2.3 Drawings 003-004: The Applicants have no comment at this time.

4.2.4 Drawings 005-008: The indicative proposed CO2 pipeline overlaid onto the NTG is based on pre-FEED level engineering. This was provided to NTG as part of the ongoing commercial discussions to provide an indicative routing that could be applicable to the proposed 1m pipeline easement. As outlined in the Applicants Deadline 8 submission – Justification of Corridor Widths (Document Ref. 9.37), this is an indicative routing that is subject to further detailed engineering and stakeholder engagement. Therefore, it is subject to change.

The Applicants would also clarify that the DCO Boundary indicated on these drawings has subsequently been reduced by the Applicants at Deadline 6. This change aligned the Order Limits with the NTL Land Boundary for the majority of the pipeline corridor, therefore removing NTLL freehold plots from the Order Limits. NTLL freehold plots remain within the Order Limits at the western end of the pipeline corridor, specifically:

Plot 119 – New rights required for construction of Work No. 6 and ongoing access during operation and decommissioning. As indicated on drawing 005, the existing pipeline corridor (illustrated by the Pipezone Area) encroaches onto NTLL freehold.

Plot 128 – New rights required for construction of Work No. 6 and ongoing access during operation and decommissioning. This plot consists of the existing access track for the south side of the pipeline corridor.

Plot 128a – Temporary possession rights required for construction of Work No. 6.

4.2.5 Drawings 009: The Applicants have no comment at this time.

4.2.6 Drawings 010-011: The Order Land indicated on drawings 010 and 011 is aligned to the Rev 3.0 of the Land Plans [AS-146]. The Applicants would clarify that the Order Land and rights sought has been reduced by the Applicants at Deadline 6 [REP6-014] and subsequently accepted for examination by the ExA [PD-017].

4.2.7 The Applicants note NTG's comments on the width and extent of rights sought under the dDCO. The Applicants refer the ExA to their Deadline 8 submission – Justification of Corridor Widths (Document Ref. 9.37). In addition, the Applicants would note that the "pipezone area" referred to by NTG is limited to the existing pipeline assets and is not inclusive of the establish access routes existing assets owners rely on for operating and maintaining their apparatus. The extent of rights sought by the Applicants includes new rights for access routes in order to secure the ongoing access rights required to construct, operate and decommission Work No. 6.

5.0 NPL WASTE MANAGEMENT LIMITED ("NPL")

5.1.1 The Deadline 7 submission by the NPL [REP7-015] includes comments on the Applicants' Deadline 6 submissions.

5.2 Applicants' Response

5.2.1 The Applicants have contacted NPL and its representatives regarding the outstanding fees as the Applicants had only recently been made aware of these. The Applicants have given an instruction to make payment of those fees reasonably incurred immediately in line with the undertaking provided to NPL. The Applicants have sought clarification from NPL's representatives regarding one invoice.

5.2.2 The Applicants continue to await a response on the Heads of Terms from NPL and were pleased to read in their submission one is prepared to be issued following settlement of the fees.

6.0 ORSTED HORNSEA PROJECT FOUR LIMITED ("ORSTED")

6.1.1 The Deadline 7 submission by the Orsted [REP7-016] includes comments on the Applicants' Deadline 6 submissions.

6.2 Applicants' Response to Legal Opinion by Richard Harwood KC

6.2.1 At Deadline 7 the Applicants provided an initial response to the Opinion of Richard Harwood KC ("the Opinion") appended to Orsted's response to Second Written Question DCO.2.18 [REP7-009]. It was explained that a full response would be provided at Deadline 8 (see paragraph 13.2.9).

6.2.2 The Applicants overarching position remains that the Opinion does not serve to advance Orsted's arguments in respect of the adequacy of the DCO Environmental statement ("DCO ES") or the asserted need for protective provisions to be included in the NZT DCO. Its position on those matters remains as set out in the following documents:

6.2.3 Applicants' Written Summary of Oral Submission for Issue Specific Hearing 1 (ISH1) [REP1-035], pages 9 – 13, Appendix 6 (Applicants Response to Action 2 (in consideration of the overlap with Hornsea 4)) and Appendix 7 (Applicants Response to Action 4 (options for the SoS on Hornsea 4));

6.2.4 Applicants Comments on Deadline 1 Submissions [REP2-060] Section 6, particularly sub-section 6.3;

6.2.5 Applicants response to Orsted Hornsea Project Four Ltd's Deadline 3 Submission [REP4-030]. This includes an assessment of the impact of the offshore elements of the NEP Project on Hornsea Project Four at Appendix 1;

6.2.6 Position statement between the Applicants and Orsted, [REP5-022];

6.2.7 The Applicants Written Summary of Oral Submission for Issue Specific Hearing 3 (ISH3) [REP5-025], electronic pages 11 – 16 and 21 to 23;

6.2.8 Applicants Response to Second Written Questions COM.2.2, DCO.2.14 – DCO.2.19 [REP6-121], pages 28 – 29, 52 - 56;

6.2.9 Applicants Responses to Deadline 5 Submissions [REP6-122], particularly section 8.4 (The Proposed Development and the Endurance Store);

6.2.10 Applicants Comments on Deadline 6 Submissions [REP7-009], pages 23 - 25;

6.2.11 The Applicants address the matters raised in the Opinion where necessary below. As an introductory observation, however, it is notable that the Opinion does not adequately acknowledge or grapple with the substance and detail of the Applicant's case as set out in the documents listed above, particularly in relation to the absence of any need for protective provisions for the benefit of Orsted in the NZT DCO. The Opinion addresses this matter briefly through a series of assertions in paragraphs 40 to 43, without reference or response to the Applicant's extensive and careful explanation as to why no such provision is needed.

Paragraphs 1 – 9 (Introduction and background):

6.2.12 The Applicants have no comments.

Paragraphs 10 – 22 (The Environmental Statement: the project to be assessed):

6.2.13 These paragraphs discuss the concept of the EIA "project". The conclusion is at paragraph 22: that the EIA "project" is "*the NZT Teesside DCO scheme and the CO2 Endurance store and offshore infrastructure required for it to proceed*".

6.2.14 Subject to the points of clarification in the paragraphs below, the Applicant's position is that the scope of the EIA "project" is not in dispute. It has never been the Applicant's case that the EIA "project" is limited to the DCO elements (the "proposed development"). Indeed, as specifically acknowledged at paragraph 12 of the Opinion, paragraph 4.1.5 of the ES, Volume 1 states: *"it is recognised that the onshore and offshore works together comprise the wider Project".* As set out in the Applicant's previous submissions, the offshore works are to be consented separately and considered pursuant to the Offshore Oil and Gas Exploration, Production, Unloading and Storage (Environmental Impact Assessment) Regulations 2020.

6.2.15 The offshore elements of the "project" comprise the transportation of CO2 via a pipeline to that part of the Endurance Store required for the NEP project, and injection of the CO2 into that part of the Endurance Store. For further details of the offshore elements of the project and related consents, the Examining Authority is directed to the Applicants Written Summary of Oral Submission for Issue Specific Hearing 1 (ISH1) [REP1-035] (Item 5, Components of the Net Zero Teesside Project) pages 9 – 13.

6.2.16 The carbon emitted and captured as part of the "proposed development" (i.e. the DCO elements of the "project") would also largely settle at the crest of the Endurance Store (outside of that part within the Overlap Zone) following transportation and injection. Storage *within* the Overlap Zone is anticipated to occur in subsequent stages of the NEP project, in line with the timescales/programme advised by BEIS for the implementation of the ECC plan under the cluster sequencing process. For further details, the Examining Authority is directed to the Applicants Responses to Deadline 5 Submissions [REP6-122], particularly section 8.4 (The Proposed Development and the Endurance Store).

6.2.17 Case law principles are cited at paragraphs 15 – 17 which relate to the "splitting of projects" to "circumvent" the EIA regime. So far as the examination and determination of this application is concerned, it is not clear what purpose is served by citing these authorities:

6.2.18 *R v SBC ex p RSPB [1991]* relates to the availability of permitted development rights (such rights not being available for "EIA development"). The circumstances are not analogous to the NZT DCO application. In any case, the Opinion cites paragraph 16 of the judgment: "*proposals should not be considered in isolation"* where they are *"an integral part of an inevitably more substantial development*". The Applicant's approach to assessment is entirely consistent with the law in this respect: it has

considered both the development that is the subject of the DCO application and the wider offshore works for the purposes of the ES. This is explained more fully in the documents cited above. The Examining Authority is also directed to ES Volume 1 Chapter 24 (Cumulative and Combined Effects, [APP-106]).

6.2.19 *R (Pearce) v Secretary of State for Business, Energy and Industrial Strategy [2013] states that where there is a "single project…it may be obvious that consideration of the environmental effects of the associated works cannot be deferred…and the EIA was required to assess the cumulative environmental effects of that overall project".* It bears repeating: the cumulative effects of the overall project (the onshore and offshore works) have been assessed in the DCO ES. There has been no deferral of that assessment.

Paragraphs 23 – 29 (The Environmental Statement: content of the ES):

6.2.20 At paragraph 23 of the Opinion it is asserted: *"The EIA therefore has to be of the whole project, including the Endurance offshore element as that is part of the 'project' or the 'proposed development"*. Please see the Applicants response above.

6.2.21 It is noted at paragraph 23 that the DCO ES does refer to an assessment of combined effects but it is then said that it is *"not apparent from paragraph 4.1.5 of the ES whether the environmental effects of the offshore elements are, in general, being adequately assessed."* No explanation is provided as to why it is "not apparent" whether the assessment is adequate. The absence of any such explanation is surprising, and it is reasonable to assume that if either Orsted or Mr Harwood had genuine and well-founded concerns about the adequacy of the assessment, they would have articulated them clearly by now. In the absence of any such explanation it is not possible for the Applicants to make further comment. The Applicants position is that this assessment is adequate, and no reasons have been given which would justify a different conclusion.

6.2.22 Paragraphs 24 – 29 consider whether there is a legal requirement for the DCO ES to assess the effects of the EIA "project" on Hornsea Project 4 ("HP4"). The Applicants position and the views expressed in the Opinion differ in terms of the requirements under the Infrastructure Planning (EIA) Regulations 2017 ("EIA Regulations"). For the avoidance of doubt, the Applicants position remains as set out at Appendix 6 of the Applicant's Written Summary of Oral Submission for Issue Specific Hearing 1 (ISH1) [REP1-035]. The Applicants make no further comments except to note that it is significant that the Opinion fails to address the Applicants comments on paragraph 5(e) of Schedule 4 of the EIA Regulations 2017. This only imposes a legal requirement to assess the "*cumulation of effects with <u>other existing and/or approved</u> projects*" (and therefore not HP4).

6.2.23 The Opinion then turns to the requirements under *NPS-EN1* with the conclusion at paragraph 29 that the Applicants "*…fails [sic] to address the legal duty which arises from the NPS and the [Planning] Act".*

6.2.24 This conclusion fails to acknowledge or respond to what the Applicants explained in Appendix 6 of the Applicants Written Summary of Oral Submission for Issue Specific Hearing 1 (ISH1) [REP1-035] but which is acknowledged as representing the Applicants position at paragraph 24 of the Opinion. In short, the Applicants recognised that paragraphs 5.10.1 and 5.10.5 of NPS-EN1 *do* require consideration of the impact of the project on other planned land uses and that, for this very reason, an assessment of the environmental effects of the "project" on HP4 was to be provided. That assessment was subsequently submitted at Deadline 4. See Appendix 1 of the Applicants response to Orsted Hornsea Project Four Ltd's Deadline 3 Submission [REP4-030].

6.2.25 More generally, the Applicants would comment that paragraphs 23 – 29 seem to be concerned with the legal context for the assessment of the impact on HP4 (whether under the EIA Regulations or NPS EN-1). Plainly though, the fundamental point is that an assessment of the impact on HP4 has been provided. The environmental effects of the "project", including in respect of the impact on HP4 as a consequence of the use of the Endurance Store in the Overlap Zone, are not unknown. They have not been deferred. Quite the opposite. That information is before the Examining Authority and Secretary of State and may be taken into account as part of the determination of the DCO application. To that end, the Applicants see little benefit in responding further as to whether such assessment is legally required under the EIA Regulations or *NPS EN1* (or both). In short, the issue is entirely academic.

Paragraphs 30 – 35 (The Applicant's assessment of impacts on Hornsea 4):

6.2.26 These paragraphs appear to take the concept of the EIA "project" a step further and assert that because part of that "project" (the Endurance Store) has a significant effect on HP4, there is "direct conflict" between the "project" as a whole and HP4, and that *for that reason alone* development consent cannot be granted for the DCO elements *unless that conflict is specifically mitigated via protective provisions in the NZT DCO.*

6.2.27 As a preliminary point, the assertion in paragraph 34 that the Applicants have changed their position regarding the viability and deliverability of the project is not correct. As set out in the response above to paragraphs 10 – 22, the Applicant's position has always been that the project includes the storage and injection of CO2 into part of the Endurance Store, and that the part of the store that is required for storage of CO2 from the "proposed development" (the DCO project) lies largely outside of the Overlap Zone. That being the case, the EIA "project" (the DCO project and the transportation and injection of CO2 from that project into the Endurance Store) is viable and deliverable without affecting HP4. It is the wider ECC Plan that would be rendered undeliverable and unviable if only the remaining 30% of the store's capacity was available (see e.g. [REP2-021] at page 135 paragraphs 10.4 and 10.5).

6.2.28 There is a related general need for caution regarding the references within the Opinion to the "*Endurance Store"* as a shorthand for the offshore elements of the project (see e.g. paragraphs 18, 19 and 21).

6.2.29 The Endurance Store is, of course, a physical feature that exists. It cannot "proceed" or not. What may "proceed" or not is the development required to inject CO2 into the Endurance Store. As the Applicants have made clear: this can be achieved to an extent sufficient for NZT's purposes without affecting HP4.

6.2.30 The Applicant's position, as set out in paragraph 8.4.2 of the Applicants Responses to Deadline 5 Submissions [REP6-122], is that the area outside of the Overlap Zone where CO2 from the "proposed development" would be stored, represents approximately 30% of the technical storage of the Endurance Store as a whole (i.e. including the Overlap Zone). This is a critical point. The Applicants are not asserting that the project could proceed "but at 30% capacity". Indeed there is no change at all to the storage capacity for CO2 emitted and captured by the DCO elements of project. The Applicants were simply confirming that the residual area outside of the Overlap Zone, represented 30% of the technical storage area of the entire Endurance Store and is in principle sufficient for the purposes of storing emissions from the proposed development.

6.2.31 The capacity or otherwise of the Endurance Store within the Overlap Zone is a separate question, and one that will be answered as subsequent stages of the NEP project come forward, in line with the timescales/programme advised by BEIS for the implementation of the ECC plan under the cluster sequencing process. This is not a matter that needs to be resolved (or that it is appropriate to attempt to resolve) for the purposes of determining the DCO application.

6.2.32 Further and in any event, the need to assess the impact of the wider offshore project on HP4 (whether under the EIA Regulations or *NPS EN1*) as part of the DCO application, and for those environmental effects to be taken into account as part of the decision-making process, must be distinguished from the need for *all mitigation* (for the effects of the wider offshore project) to be secured in the DCO itself. There are inevitably circumstances where that is not appropriate, including where the impacts would not arise as a result of the development that would be authorised by the consent sought (i.e. the NZT DCO) or any provisions proposed to be included within that consent. As the Applicants have explained (and Orsted must accept) there is no physical/actual nexus between the development proposed to be authorised in the DCO and HP4, and no impact would arise as a result of the development proposed to be authorised which could lead to a potential need for mitigation. In this case the only impacts would arise as a result of development forming part of the wider offshore project which has not yet been authorised and which would only be authorised following a separate decision-making process, informed by EIA. That separate decision-making process is not only plainly capable of securing any mitigation shown to be necessary through the process of EIA and consideration of other environmental information (including that provided by third parties), it would also inevitably be better placed to determine what mitigation (if

any) is required because of the further development and appraisal of the offshore works and their likely impacts at that stage.

6.2.33 Thus there is no issue of 'salami-slicing' or any potential gap in the necessary mitigation as a result. We address the latter point further below, in response to what is said in the Opinion about the need for Protective Provisions. The effect of this is that there is no residual need to include protective provisions in the NZT DCO.

6.2.34 As a further protection, Requirement 31 of Schedule 2 of the DCO prohibits any of the authorised development from commencing (save for preliminary works) until the offshore consent (including the storage licence) have been granted. Any perceived risk of environmental effects of the DCO project occurring in advance of other parts of the project being consented therefore fails to properly consider the restrictions already proposed in the DCO.

Paragraphs 36 – 39: The Protective Provisions in the Hornsea Four DCO

6.2.35 This section of the Opinion provides Orsted's description of the protective provisions proposed by bp and Orsted respectively in the Hornsea Project Four DCO. Whilst the Applicants do not agree with the characterisation of the summary positions set out in these paragraphs, no response is required as they are not relevant to the matters before this examination, which are instead limited to the subsequent paragraphs of the Opinion (Orsted's submissions regarding the need for protective provisions in the NZT DCO). The Applicants have responded to these submissions below.

Paragraphs 40 – 43: Protective provisions in the NZT DCO

6.2.36 The Applicants provided initial responses to these submissions in their response to Orsted's response to DCO2.18 of the ExA's second written questions ([REP7-009], electronic pages 26 to 28). Those initial responses address the substance of the submissions made in these paragraphs to the Opinion, but the Applicants would also draw the ExA's attention to [REP1-035], Applicants summary of oral submissions for ISH1, Appendix 7 (ISH1 Action 4 – Options for the Secretary of State on the Hornsea 4 application, electronic page 172), and [REP2-060]: NZT Response to Ørsted D1 submissions, section 6 (electronic page 6). In those documents the Applicants considered the potential outcomes of the Hornsea Project Four DCO and their implications for the issues that fall to be considered in the NZT DCO examination (and subsequent decision) and explained why under any scenario there is no justification or need for any protective provisions for the benefit of Hornsea Project Four to be included in the NZT DCO.

6.2.37 The Applicants do not propose to repeat the same submissions in response here, not least because the Opinion does not directly engage with them to any significant extent, but have briefly summarised the key points below to assist the ExA's examination of the matter.

6.2.38 Given the respective timings, it is very likely that the Hornsea Project Four DCO will be determined in advance of the NZT DCO, with the Hornsea Project Four decision due on 22 February 2022, and no indication of any reason why that would be delayed, meaning the SoS will have the benefit of that decision when making the determination on the NZT DCO. The Applicants have previously explained the different scenarios which could apply in such circumstances ([REP1-035], electronic pages 172 to 174).

6.2.39 If, however, there were to be a material delay to the Hornsea Project Four DCO, such that the application for the NZT DCO fell to be determined first, the Applicants addressed this scenario in [REP2-060] (electronic page 13), noting the SoS would still have the benefit of the ExA's recommendation from Hornsea Project Four DCO and, to the extent he was not satisfied he had sufficient information, the ability to request further information from the Applicants and Orsted to assist with his decision-making at that point in time.

6.2.40 In any case, there is nothing proposed to be authorised under the NZT DCO which would physically interact with or present an impediment to the project proposed to be authorised under the Hornsea Project 4 DCO. Such interface is limited to the development of the Endurance Store which is subject to a separate consenting process, still to come ([REP1-035], electronic page 13 and Appendix 5, electronic page 162).

6.2.41 The application processes for those further offshore consents represent the appropriate forum within which Orsted can make such submissions and request protective measures where considered necessary or appropriate.

6.2.42 Orsted contend that this is not sufficient as those applications have not yet been made and so there is no current proposal to include such measures and it's entirely speculative whether such protection will be given. Whilst it is correct that those applications are still to be submitted, that is not a proper or adequate response to the underlying question of principle:

6.2.43

6.2.44 such applications will need to follow if the works which do interact with HP4 are to be authorised – the fact that they have not yet been made is therefore beside the point;

6.2.45 the consideration and (if appropriate) approval of those applications provides the appropriate vehicle for assessing whether further mitigation is required and if so securing such mitigation. If further mitigation is considered necessary by the decision-maker at that stage, it can be secured through that process. The Opinion does not (and could not) suggest otherwise. The possibility that further mitigation might not be considered necessary by the decision-maker at that stage, following a more informed assessment, cannot be a proper argument for insisting on it being secured now.

6.2.46 The Applicants have previously described the consenting process in Appendix 5 to [REP1-035], noting that all of the remaining consents involve the same decision-

maker, namely the North Sea Transition Authority ("NSTA"), with consent to be provided pursuant to the Offshore Oil and Gas Exploration, Production, Unloading and Storage (Environmental Impact Assessment) Regulations 2020, being dependent on the Offshore Petroleum Regulator for Environment and Decommissioning ("OPRED"), on behalf the Secretary of State, first agreeing to the grant of consent by the NSTA and with OPRED having taken into account the environmental information. Orsted will have the ability to make submissions into that consenting process and to put any information it sees fit before the NSTA and OPRED. For the purposes of determining the application for the NZT DCO both the ExA and the SoS should assume that both bodies will discharge their responsibilities under that process appropriately, having regard to all material considerations. It would not be realistic or appropriate for Orsted to invite the ExA or SoS to assess the NZT DCO application on the basis that the offshore consenting process is in some way not fit for purpose because is unable to assess and determine issues concerning the impact of proposed offshore infrastructure on other offshore projects (existing or proposed) in a fair, transparent and appropriate way. In any event, it is extremely likely that the Hornsea Project Four DCO will have already been determined long before decisions are made under the offshore consenting process, and so those decisions would fall to be made in that context.

6.2.47 In the very unlikely scenario where the Hornsea Project Four DCO has still not been determined in advance of the offshore consents being decided, then (as explained in [REP7-009], electronic page 28) OPRED and the NSTA would have the ability to request such further information as considered necessary to inform their decision. Moreover – and as was explained in the Applicants initial response to the Opinion - in these circumstances, the carbon storage licensee would in any event be unable to carry out its works in the Overlap Zone unless and until an agreement had been reached with Orsted as to the appropriate mitigation/compensation as a result of the continued existence of the interface agreement. The same applies in circumstances where the Hornsea Project Four DCO has been determined, with Orsted's preferred protective provisions included, meaning the interface agreement continues in full force and effect.

6.2.48 Put simply, there is no conceivable scenario where it would be necessary or appropriate to include protective measures for the benefit of Hornsea Project Four in the NZT DCO.

Paragraphs 44- 48: Conclusions

6.2.49 The Applicants do not consider any additional points are raised in these paragraphs that have not already been addressed above.

7.0 SOUTH TEES DEVELOPMENT CORPORATION ("STDC")

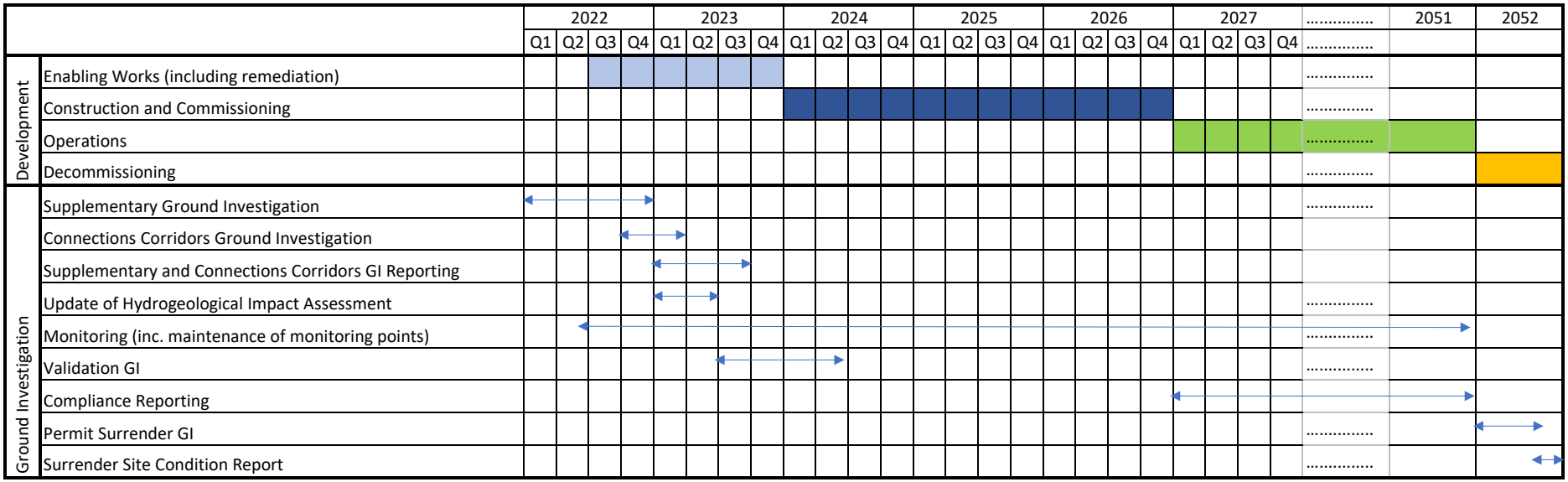
7.1.1 The Deadline 7 submission by the STDC [REP7-017] includes comments on responses to the ExA's second written questions.

7.2 Applicants' Response

7.2.1 CA.2.7: The Applicants would refer the ExA to the Applicants response for CA.2.7 (electronic page number 34) in Applicants' Response to the ExA's Second Written Questions [REP6-121].

7.2.2 CA.2.8: The Applicants would refer the ExA to paragraphs 3.1-3.4 (electronic page number 97) in the Applicants response to STDC's Written Representation in Applicants comments on Written Representations [REP3-012].

APPENDIX 1 TIMELINE FOR LAND CONTAMINATION


2022
2023
2024
2025
2026
2027
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2051
2052
Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 Q1 Q2 Q3 Q4 .....
Development
Enabling Works (including remediation)
Construction and Commissioning
Operations
Decommissioning
Ground Investigation
Supplementary Ground Investigation
Connections Corridors Ground Investigation
Supplementary and Connections Corridors GI Reporting
Update of Hydrogeological Impact Assessment
Monitoring (inc. maintenance of monitoring points)
Validation GI
Compliance Reporting
Permit Surrender GI
Surrender Site Condition Report