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16 December 2024

Grahame Gould
National Infrastructure Planning
Temple Quay House
2 The Square
Bristol, BS1 6PN Recipient address

Dear Mr. Gould,

Re: Five Estuaries Offshore Wind Farm – Request for Further Information Under Rule 17 of the Infrastructure Planning (Examination Procedure) Rules 2010 (as amended)

Thank you for your letter dated 13 December, requesting an update regarding Harwich Haven Authority's (HHA) views on the Five Estuaries Offshore Wind Farm project in relation to the specific questions outlined in ExQ2 [PD-014], Reference NS.2.01.

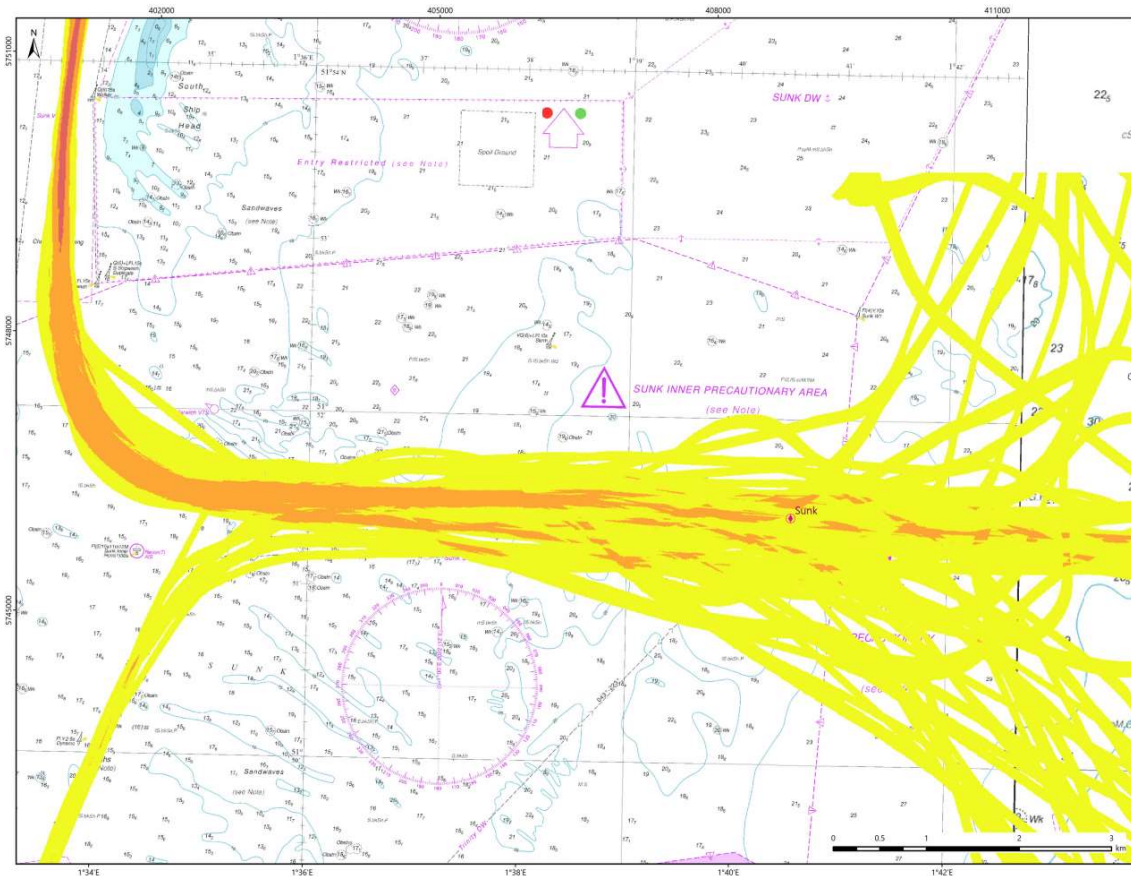
We apologise for the delay in responding to the question posed regarding the potential adverse effects of the proposed offshore wind farm on the safe navigation and operation of vessels in the Sunk area, within HHA's harbour limits, the approaches to those limits, adjacent waters, and the pilot boarding and landing stations within the Sunk area.

After reviewing the application and conducting further internal assessments, we can provide the following update:

1. Safe Navigation and Passage for Ships in the Sunk Area

The first image below shows the track of vessels with a draught greater than 16.0 metres over the last year (Sept 23 – Sept 24). These vessel arrivals are complex and are very much constrained by their draught in the Sunk area and when heading into HHA waters.





Legend

Vessel swept path analysis
 Automatic Identification System (AIS) data
 365 days: 01/09/2023 to 31/08/2024
 Data collected by Harwich Haven Authority

Count of vessels with draught >16m

- 1 - 5
- 6 - 20
- 21 - 39

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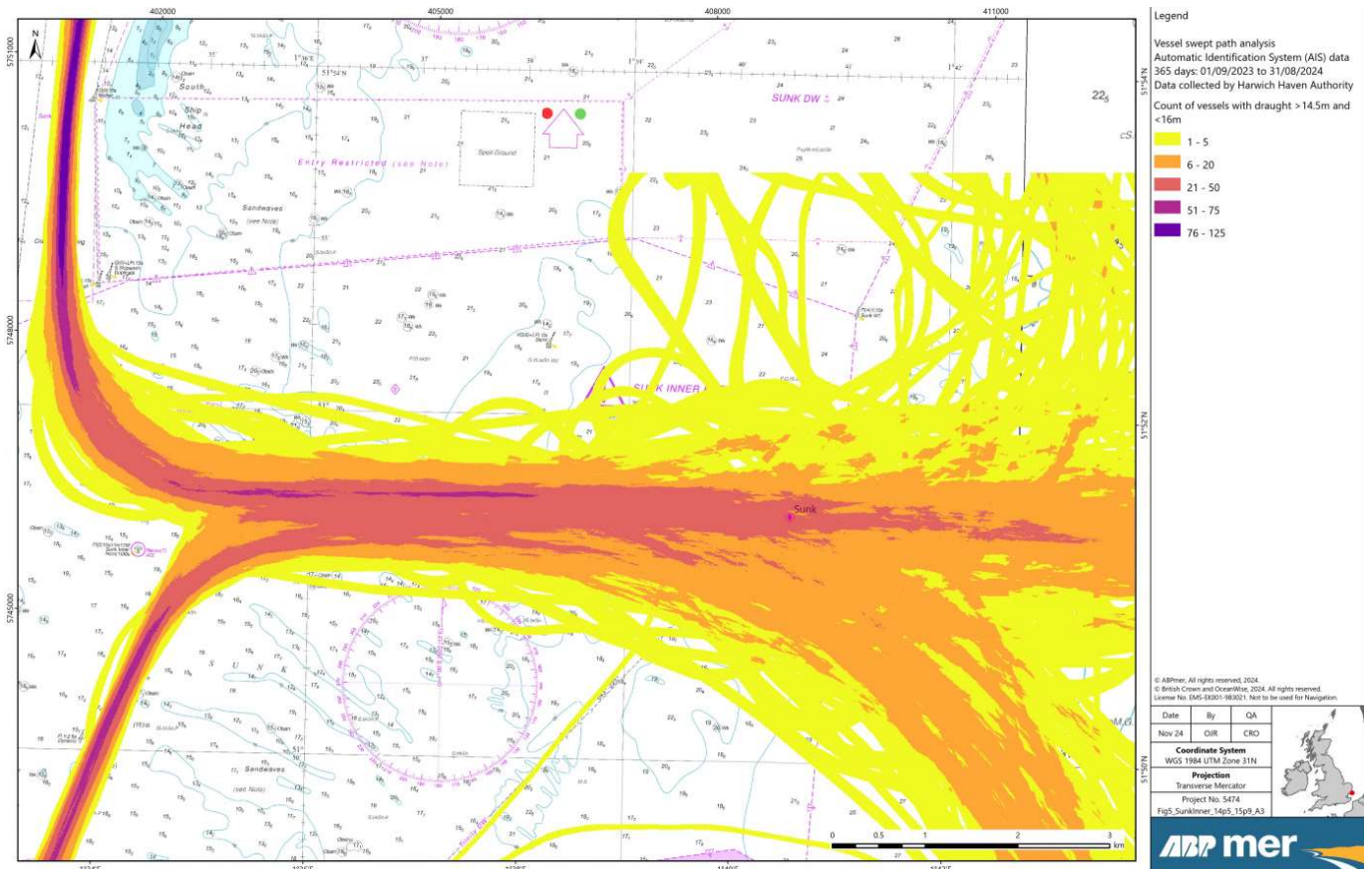
| Date | By | QA |
|--------|-----|-----|
| Nov 24 | QIR | CRO |

Coordinate System
 WGS 1984 UTM Zone 31N

Projection
 Transverse Mercator

Project No. 5474
 Fig5_SunkInner_16_grt_A3





2. Safe Navigation and Passage for Ships within Harwich Haven Authority’s Harbour Limits

Before any works can commence within the harbour limits, a works licence will be required. The current cable route has no adverse effects on safe navigation and passage of ships in HHA Statutory Harbour Authority waters. Pre and post surveys will be required to ensure charts can be appropriately updated.

3. Safe Navigation and Passage for Ships within the Approaches to the Harwich Haven Authority’s Harbour Limits

As per above answer to question 1.

4. Safe Navigation and Passage for Ships within Waters Adjacent to the Harwich Haven Authority’s Harbour Limits

As per above answer to question 1.

5. Safe and Continued Operation of Pilot Boarding and Landing Stations within the Sunk Area

Boarding Pilots in the Sunk area is a complex and potentially high-risk operation that



requires meticulous planning and coordination. This region is heavily used by the HHA and the Port of London Authority (PLA), both of which deliver critical maritime operations for the UK. Given the significance of the Sunk area for international trade, particularly for the world's largest container ships, ensuring the safety and efficiency of Pilot boarding here is crucial.

Key Factors Making Pilot Boarding in the Sunk Area Complex:

Challenging Environmental Conditions: The Sunk area is subject to relatively unpredictable and often harsh conditions, including strong tidal currents, high winds, and low visibility. Navigating these challenges demands high levels of experience and skill from Pilots, as well as specialised equipment. The conditions can also change rapidly, making it essential for Pilots to continuously monitor the situation and adapt their approach.

High Traffic Density: This area is one of the busiest maritime zones in the world, with a constant flow of large vessels, including massive container ships that need precise manoeuvring. Coordinating Pilot boarding operations alongside ongoing shipping traffic is a delicate process requiring real-time communication between various stakeholders, such as the HHA, PLA, and vessel operators.

Pilot Boarding Craft: The actual process of transferring Pilots onto ships in the Sunk area is conducted using specialised Plot Launch. These boats need to safely approach and board large ships, sometimes in rough seas or under tidal constraint time pressure, which demands high skill levels. The risk of injury, equipment failure, or a collision is ever-present.

Navigation Risks and Hazards: The Sunk area itself is near shallow waters, sandbanks, and other underwater obstacles. Navigating these tricky areas without proper support can be dangerous. The exact position and movement of large vessels, particularly the world's largest container ships, are often difficult to predict. This makes the coordination of safe Pilot boarding and disembarking operations critical.

24/7 Monitoring and Coordination: The sheer volume of shipping traffic passing through the Sunk area means that pilotage services must be available 24/7, requiring constant monitoring. They must track every vessel in real time, ensuring Pilots are safely boarded, safely disembarked, and that each vessel is on the correct course for traffic, tidal and weather conditions, to enable safe onward passage.

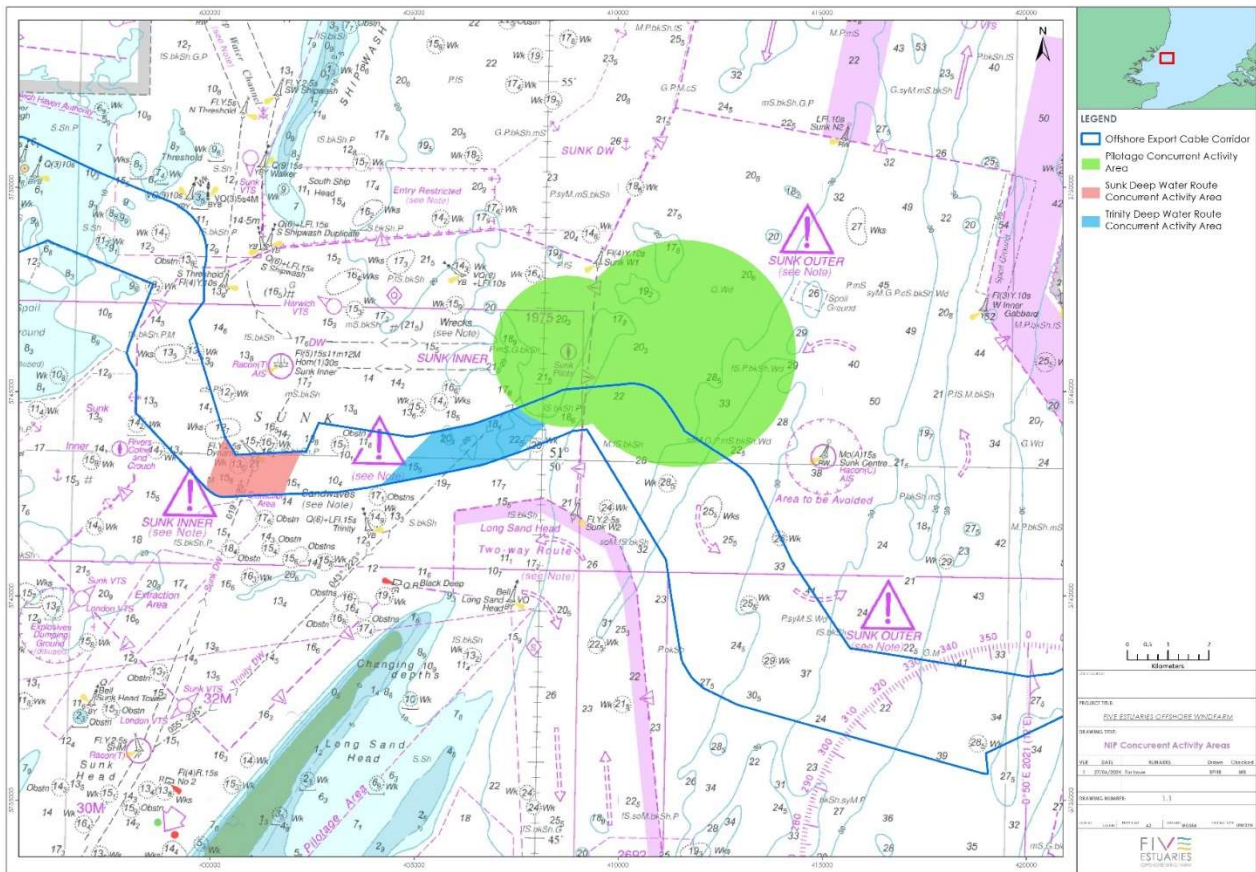
Given the combination of challenging environmental factors, high-traffic density, the size of the vessels, and other maritime operations in the Sunk area, pilot boarding and the provision of pilotage services are inherently complex and require round-the-clock coordination, highly skilled personnel, and advanced safety measures. The integration and deconfliction of other activities, like cable laying, are crucial to maintaining safe and efficient pilotage services. Only with careful planning, constant monitoring, and effective communication between authorities and stakeholders can these operations be safely



conducted, ensuring that the world's biggest container ships are safely navigated into key ports like those under the jurisdiction of Harwich Haven Authority.

For the potential adverse effects identified, we are working closely with the project developer to explore possible mitigation measures to minimise these impacts, including the potential incorporation of Protective Provisions in favour of Harwich Haven Authority. We would be happy to work with the developer to develop wording for such provisions. Key protective provisions for the area highlighted on the Five Estuaries chart section (below) should include:

- Requiring protective measures within the DCO to ensure that the cable route is at a suitable depth to ensure future deep draught vessels can navigate the Sunk area. The cable (and any covering material e.g. rock armour) must be at least 22 metres below Chart Datum to allow future vessels with a draught of 20 metres.
- Controlling development and project construction related marine operations to ensure that there are no concurrent Restricted Ability to Manoeuvre (RAM) operations occurring in the Sunk area. This must include the other DCO cable projects in this area; North Falls project and the National Grid Sea Link project.
- Exclusion zone(s) must not be put in place in the Sunk area or channel that would restrict 24/7/365 vessel access requirements or pilot boarding operations etc.
- Safety zone(s) must not impede vessel traffic movements within the Sunk area or normal operations such as pilot boarding.



It must be considered that should a serious incident occur, there may be a significant irreversible environmental harm. As the risk of the worst credible outcome is not precisely calculable in advance, the Precautionary Principle alongside the ALARP principle must be used when considering navigational risk assessment.

We trust this response addresses your request. Please do not hesitate to contact us should you require any further information.

Yours sincerely,

Will Barker

William Barker

Marine Director
Harwich Haven Authority