

Maritime and Coastguard Agency

UK Technical Services Navigation 105 Commercial Road Southampton SO15 1EG

National Infrastructure Planning Temple Quay House 2 The Square Bristol, BS1 6PN www.gov.uk/mca 7 August 2024

Your ref: EN010137

Dear Sir/Madam

Application by Mona Offshore Wind Limited for an Order Granting Development Consent for the Mona Offshore Wind Farm.

Planning Act 2008 – Section 89 and The Infrastructure Planning (Examination Procedure) Rules 2010

Examination Timetable – Deadline 1 – Written Representation

The MCA's remit for Offshore Renewable Energy Installations (OREIs) is to ensure that the safety of navigation is preserved, and our Search and Rescue (SAR) capability is maintained, whilst progress is made towards government targets for renewable energy. The Navigation Risk Assessment (NRA), the shipping and navigation chapter of the Environmental Impact Report and draft DCO have been reviewed and we would like to comment as follows:

F6.7.1 Environmental Statement Volume 6, Annex 7.1 Navigation Risk Assessment (APP-098) and F2.7 Environmental Statement Volume 2, Chapter 7 Shipping and Navigation (APP-059).

Mona Offshore Wind Limited has undertaken a detailed Navigation Risk Assessment (NRA) in accordance with MCA guidance MGN (Marine Guidance Note) 654 and NRA risk assessment methodology. We are satisfied that appropriate traffic data has been collected in accordance with MGN654, which includes three 14-day marine vessel traffic surveys in December 2021, June/July 2022, and October/November 2023 supplemented by 12 months of AIS data from 2022. Key and appropriate stakeholders were identified, and the MCA is content that suitable consultation took place via two hazard identification workshops, dedicated meetings and bridge simulation sessions. A completed MGN654 Checklist has been provided as part of the NRA, and we are content the recommended NRA process has been followed.

1. Navigable sea room, collision and allision risks

Following extensive consultation from the applicant with key stakeholders which included a multi-day HAZID workshop and bridge simulation exercises to assess the affect the development may have on shipping, in particular ferry routes, some navigational safety risks were found to be unacceptable. This led to a decision by the applicant to reduce the northern boundary to increase the sea room between Mona and Morgan wind farms to 6NM. The



southern boundary was also amended to increase the distance to traffic exiting the Liverpool Bay Traffic Separation Scheme to 2NM. Additional bridge simulation exercises and a second HAZID workshop were then undertaken which resulted in the reduced perceived collision and allisions risk to an acceptable level with mitigations.

2. Shipping and Navigation Mitigation Measures

The list of applied (embedded) risk controls in Table 1.10 of the NRA and adopted additional risk controls in Table 1.43 of the NRA, are appropriate for reducing safety risks to As Low As Reasonably Practicable (ALARP).

It should be noted that the requirement for an Emergency Response Cooperation Plan (ERCoP), as referenced in Table 13-3 of the ES Chapter 13 Shipping and Navigation, will be secured in the DCO/DML under the condition for complying with MGN654. There will not be a specific condition for the completion of an ERCoP.

3. Layout Design

The turbine layout design must be compliant with MGN654 and it will require MCA and Trinity House approval prior to construction to minimise the risks to surface vessels, including rescue boats, and search and rescue aircraft operating within the site. MCA will seek to ensure all structures are aligned in straight rows and columns with a minimum of two lines of orientation. The layout commitments for two lines of orientation and a minimum 1400m spacing between structures (NRA paragraph 1.8.9.3) are recognised and welcomed for reducing risks to mariners and SAR aircraft.

4. Marking and Lighting.

MCA will seek to ensure the turbine numbering system follows a 'spreadsheet' principle and is consistent with other windfarms in the UK. All lighting and marking arrangements will need to be agreed with MCA and Trinity House. The MCA requires all aviation lighting to be visible 360° and compatible with night vision imaging systems, as detailed in CAP 764 and MGN654 Annex 5.

5. Emergency Response and Search and Rescue.

There is an expectation that the presence of wind farms will increase the likelihood of the requirement for emergency response, not just from navigational incidents but from other incidents such as medical evacuation or pollution. A SAR checklist based on the requirements in MGN654 Annex 5 will need to be completed in agreement with MCA before construction starts. This will include the requirement for an approved Emergency Response Co-operation Plan (ERCoP).

The NRA outlines the most likely incidents which may result in a required emergency response though does not fully consider the additional demand likely caused by the presence of personnel offshore, as has been experienced from some other windfarms of comparable size. Since the operations and maintenance strategy is not yet clear or the type of vessels utilised (e.g. crew transfer vessels or service operations vessels), it is difficult to determine what resource and capability will be on site and what the availability of this will be at this stage. There may be situations requiring a SAR response where project vessels are unavailable due to weather or crew rotation etc. It should be noted that the presence of a windfarm diminishes the SAR capability and even with an MGN654 compliant layout, there are still no guarantees of an effective SAR response and therefore consideration should be given as to how the windfarm will mitigate this reduction.

During SAR discussions, particular consideration will need to be given to the implications of the site size and location. Attention should be paid to the level of radar surveillance, AIS and shore-based VHF radio coverage and give due consideration for appropriate mitigation such as radar, AIS receivers and in-field, Marine Band VHF radio communications aerial(s) (VHF voice with Digital Selective Calling (DSC)) that can cover the entire wind farm site and surrounding areas. It would have been helpful for the NRA to consider radio reception interference caused by larger turbines; however we would expect radio surveys to be conducted pre-construction and post-construction to confirm and compare levels of coverage. It will also be expected that Mona Offshore Wind Limited will provide the AIS and VHF capability to the MCA with direct access to HM Coastguard systems.

Paragraph 1.5.4.4 (and 4.4.3.1.1 of the CRNRA) confirms that SOLAS obligations require vessels to respond to persons or vessels in distress. It should be noted that vessels should only respond if they are safely able to do so and the presence of turbines may preclude the vessel's ability to safely respond to those in distress.

Paragraph 1.8.9.4 summarises helicopter response times and it should be noted that tasking times are likely quicker that the 30 minute approximation although it is longer between the hours of 2200 and 0800.

The NRA identifies 1300 charted wrecks in the cumulative study area which could pose a risk of releasing pollution over time and this may require an environmental response. Within the boundaries of a windfarm, emergency response becomes more complex and this must be considered in the Marine Pollution Contingency Plan.

6. Construction scenarios.

We would expect to see some form of linear progression of the construction programme avoiding disparate construction sites across the development area, and the consent needs to include the requirement for an agreed construction plan to be in place ahead of any works commencing.

7. Cable Routes.

Export cable routes, cable burial protection index and cable protection are issues that are yet to be fully developed. However due cognisance needs to address cable burial and protection, particularly close to shore where impacts on navigable water depth may become significant. Any consented cable protection works must ensure existing and future safe navigation is not compromised. If cable protection measures are required e.g., rock bags or concrete mattresses, the MCA would accept a maximum of 5% reduction in surrounding depth referenced to Chart Datum. This will be particularly relevant where depths are decreasing towards shore and potential impacts on navigable water increase, such as at the HDD location.

Should HVDC cables be installed, consideration must be given to the effect of electromagnetic deviation on ships' compasses. The MCA would be willing to accept a three-degree deviation for 95% of the cable route. For the remaining 5% of the cable route no more than five degrees will be attained. We would expect the applicant undertake a desk based compass deviation study based on the specifications of the cable lay proposed and assess the effect of EMF on ship's compasses. MCA may request for a deviation survey post cable installation which will confirm conformity with the consent condition. The applicant should then provide this data to UKHO via a hydrographic note (H102), as they may want a precautionary notation on the appropriate Admiralty Charts (actions at a later stage depending upon the desk-based study and post installation deviation survey).

8. Safety Zones.

The requirement and use of safety zones as detailed in the application is noted, and MCA will comment on the safety zone application once submitted. Safety zones during the construction, maintenance and decommissioning phases are supported. A detailed justification would be required for a 50m operational safety zone, with significant evidence from the construction phase in addition to the baseline NRA required supporting the case. Safety zones triggered by a Service Operation Vessel connecting to a wind turbine will not be supported.

Additional minor comments on F6.7.1 Environmental Statement Volume 6, Annex 7.1 Navigation Risk Assessment (APP-098):

Document	Section	Comment
F6.7.1 Environmental Statement Volume 6, Annex 7.1 Navigation Risk Assessment (APP-098)	1.4.7.3	The current guidance on navigation lighting and marking (MGN654), and Search and Rescue lighting (MGN654 Annex 5) was published in April 2021 and January 2024, respectively.
	1.8.2.4	The NPS EN-3 paragraph references need updating to the corresponding paragraphs in the current version published in November 2023.
	1.8.9.1	The ERCoP facilitates information sharing between the OWF and HMCG.
	1.9.3.6	Risks are defined as Broadly Acceptable, Tolerable (if ALARP), and Unacceptable or Intolerable.
	1.5.4.1	Coastguard Operations Centres (CGOC) have been replaced by Maritime Rescue Coordination Centres (MRCC).

9. Cumulative impacts

We welcome the further work by the project in regard to the Cumulative Regional Navigation Risk Assessment (CRNRA). MCA concerns raised in response to the PEIR dated 31 May 2023 regarding the cumulative impacts of the neighbouring Morecambe and Morgan windfarms have been addressed by the boundary changes as referred to in 1.10.1.7. We are content that these changes have resulted in the unacceptable safety risks identified in the section 42 response being reduced to 'Medium Risk – Tolerable if ALARP', as stated in 1.11.1.19.

There remains a concern that the in-combination effects of the Mona, Morgan, Morecambe and Mooir Vannin offshore wind farms will have significant impacts to ferry operations in the Irish Sea. Whilst this is more of a commercial issue MCA is an agency of the Department for Transport and we are concerned with the economic impacts on the nationally and internationally important ferry routes in the Irish Sea and whether these services will remain commercially viable with the necessary deviations.

C1 Draft Development Consent Order (F02) (PDA-003)

MCA contact details in Schedule 14 should be amended to:

Maritime and Coastguard Agency UK Technical Services Navigation Spring Place

105 Commercial Road Southampton SO15 1EG

Email: navigationsafety@mcga.gov.uk

Schedule 14, Part 2:

- Condition 13(12) we request the condition is more specific to buried cables and reworded as follows (as per our PEIR response):
 "In case of buried cables becoming exposed on or above the seabed, the undertaker must within three days..."
- Condition 18(a)(ii) allows for up to 125m turbine or platform micrositing which is a significant increase from the standard 50m. Such an increase has not been discussed and is a concern to MCA as there are potential impacts on SAR access and operations.

The comments detailed above are to highlight areas of concern, and items to be addressed by the applicant in consultation with the MCA and navigation stakeholders to ensure the risk to the safety of navigation and the impact on SAR capability remains low.

Yours faithfully,



Nick Salter Offshore Renewables Lead UK Technical Services Navigation



Peter Lowson
Offshore Energy Lead
HM Coastguard Governance, Policy,
Standards and International