MI Observations on the draft South Coast Designated Maritime Area Plan for Offshore Renewable Energy and associated SEA Environmental Report & Natura Impact Statement DAFM

[redacted] 5th June 2024

Draft South Coast Designated Maritime Area Plan for Offshore Renewable Energy

The Draft South Coast Designated Maritime Area Plan (SC-DMAP) for Offshore Renewable Energy (ORE) demonstrates a comprehensive approach to addressing the priorities of **Fisheries and Aquaculture.** The plan outlines several key policy objectives and strategies aimed at ensuring successful coexistence between offshore wind farm developments and the fishing and seafood sectors. This focus on continuous engagement and adaptive management underscores the plan's commitment to promoting coexistence and mitigating potential conflicts between offshore wind developments and the fisheries and aquaculture sectors.

Structured Engagement: The plan emphasises maintaining a record of engagement with Irish-registered fishers and the wider seafood sector, ensuring continuous consultation throughout the project lifecycle. This is aimed at optimising infrastructure design and layout to maximise opportunities for coexistence and minimising potential adverse impacts. This is detailed in the "Policy Objective No. 3" section, which focuses on structured engagement with the seafood sector throughout the project lifecycle to optimise infrastructure design and layout (Page 48).

Fisheries Management and Mitigation Strategy (FMMS): Developers are required to prepare an FMMS in consultation with local fishing interests. This strategy should identify management and mitigation measures for each commercial fishery affected by the development. The FMMS is to be updated throughout the project's lifetime as necessary, ensuring ongoing relevance and effectiveness. The requirement for an FMMS is outlined in "Policy Objective No. 4," which mandates the preparation and continuous updating of the FMMS in consultation with local fishing interests (Page 49).

Aquaculture Management and Mitigation Strategy (AMMS): Similar to the FMMS, an AMMS must be prepared to address potential impacts on aquaculture activities. This strategy also follows a preference hierarchy of avoiding, minimising, and mitigating adverse effect. The preparation of an AMMS is required under "Policy Objective No. 5," aimed at addressing potential impacts on aquaculture activities (Page 50).

Fisheries Liaison Officer (FLO): Developers must maintain a FLO to facilitate direct, effective, and constructive consultation with fishers and the seafood sector. This role is crucial for ensuring ongoing dialogue and addressing concerns throughout the different phases of offshore wind project. The mandate for maintaining a FLO is detailed under "Policy Objective No. 6," which specifies the role's importance in facilitating effective consultation with fishers and the seafood sector (Page 50).

Seafood/ORE Working Group: Established by the government, this group facilitates discussion on the interaction between the seafood and ORE industries, promoting best practices and liaison with other marine sectors. This ongoing collaboration aims to maximise opportunities for coexistence and ensure continuous improvement and adaptation of strategies based on stakeholder feedback. The establishment and function of the Seafood/ORE Working Group are described in "Policy Objective No. 7," which aims to facilitate discussions and promote best practices between the seafood and ORE industries (Page 51).

Cable Management Plan (CMP): As part of the FMMS, a CMP must explore and identify appropriate site-specific and substrate-specific cable protection measures. This plan aims to mitigate risks associated with cable exposure and snagging by fishing activities, prioritising cable burial and other compatible protection measures. The CMP requirement is part of the FMMS and is discussed under "Policy Objective No. 4," which details the need for exploring site-specific and substrate-specific cable protection measures (Page 49).

Baseline and Monitoring Surveys: The plan includes provisions for conducting surveys to map fish presence, conduct observer trips, and gather fishing activity data. These surveys, determined through scoping potential effects and stakeholder engagement, ensure that the environmental impact assessments (EIAs) are robust and that data gaps are addressed. Provisions for conducting baseline and monitoring surveys are included under "Policy Objective No. 8," which discusses the importance of gathering data to inform environmental impact assessments and address data gaps (Page 52).

Recognition of Economic and Cultural Significance: The SC-DMAP acknowledges the critical role of seafood production, fishing, and aquaculture in the economic and cultural fabric of coastal communities. The plan's preparation involved comprehensive engagement with these communities, ensuring that their economic, social, and cultural values are integrated into the planning process. The document acknowledges the economic and cultural significance of the seafood sector in coastal communities in the "Introduction" and "Policy Context" sections, emphasising comprehensive engagement with these communities (Pages 12-15 and 45-47).

Natura Impact Statement (NIS) report

The **Natura Impact Statement (NIS)** report for the SC-DMAP is detailed and comprehensive in many respects, and based on the provided report appears to fulfil the typical criteria for such assessments to a significant extent. The report is structured to comply with Article 6(3) of the EU Habitats Directive, as required. It incorporates various environmental topics such as biodiversity, flora, fauna, and other ecological factors. The methodologies for screening and assessment are clearly outlined, including the criteria for determining likely significant effects (LSE) and the subsequent need for detailed assessment. The NIS identifies the potential significant impacts on European sites and proposes measures to avoid, reduce, or mitigate these impact. The document mentions consultations with statutory consultees and the involvement of various environmental and governmental bodies, indicating a broad stakeholder engagement process.

SEA (Strategic Environmental Assessment) report

The **SEA (Strategic Environmental Assessment)** report on the SC-DMAP for Offshore Renewable Energy (ORE) covers a wide range of areas to evaluate the environmental impact of the proposed developments. The SEA report complies with Directive 2001/42/EC (the SEA Directive) and relevant national regulations, ensuring that it meets the necessary legal requirements for strategic environmental assessments. The SEA report for the SC-DMAP is comprehensive and well-structured, addressing key environmental and social factors and adhering to legal requirements. It includes detailed methodologies, consideration of alternatives, and stakeholder engagement. Overall, the SEA report is robust and provides a solid foundation for informed decision-making, though there is possible room for improvement in specific fisheries and aquaculture areas:

Economic and Social Impacts:

The report lacks a thorough assessment of the potential economic and social impacts of the SC-DMAP. While the primary focus is on environmental impacts, understanding the economic and social ramifications is crucial for a holistic evaluation. These include the impact on local fisheries, tourism, and potential job creation or loss in the affected regions. The report identifies data gaps, particularly regarding the activities of smaller fishing vessels and Marine Protected Areas (MPAs) that are yet to be designated. These highlight the need for more comprehensive data collection to inform decision-making.

Climate Change Adaptation and Mitigation:

Although the report mentions Ireland's climate commitments, it does not delve deeply into how the SC-DMAP aligns with broader climate change adaptation and mitigation strategies beyond renewable energy targets such as the resilience of planned infrastructure to climate change effects like sea-level rise and increased storm intensity, and potential changes to fisheries and aquaculture activities in response to climate change.

Marine Spatial Planning:

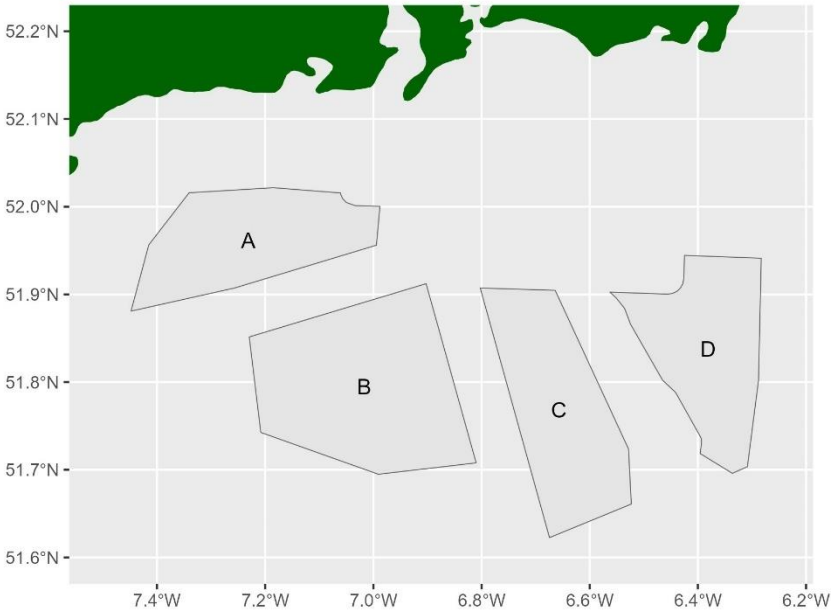
There is a limited discussion on how the SC-DMAP fits into the larger framework of marine spatial planning. The report does not fully address the integration with other maritime activities and plans, including shipping, marine conservation areas, fisheries and aquaculture.

Overlap between proposed DMAP polygons and fishing activity, spawning and nursery grounds

Summary

- The northern part of the main scallop grounds in the Celtic Sea overlaps with some of the proposed ORE development areas.
- Fisheries for scallops have the highest amount of activity inside the development areas, followed by fisheries using beam trawls and bottom trawls.
- If vessels are excluded from these areas or part of these areas, the scallop fishery is likely to be most strongly impacted because there is limited scope for displacement.
- The development areas overlap with the spawning and nursery grounds of some species of commercial interest. The Marine Institute recommends that a detailed assessment of essential fish habitat and a risk assessment in relation to ORE developments is carried out for this area.

ORE development areas



The proposed ORE development areas. For the purposes of identifying individual areas, they are labelled A to D (from west to east).

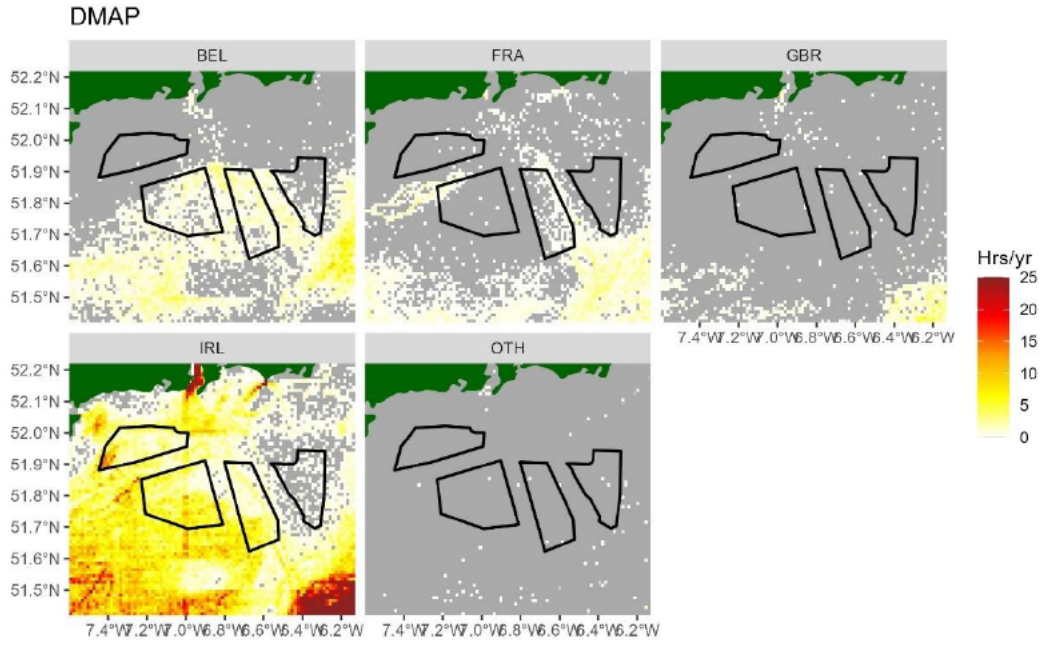
Fishing activity by vessels over 12m in length

Vessel monitoring systems are GPS trackers that provide the geographic position of fishing vessels of 12m and longer at interval of 2 hours or less. These data can be linked to Irish logbook data and the EU vessel register to determine the likely gear type used as well as the target species. Whether a vessel is fishing, steaming or inactive is inferred from the speed of the vessel.

Raw VMS points (for the period 2018-22; vessels over 12m only). Each point corresponds to a VMS record of a vessel that was deemed to be fishing. Note that the fishing activity is not always correctly identified (a vessel may be steaming at speeds normally associated with fishing). Also note that a VMS transmission is 'triggered' when vessels cross the 7°W west line, leading to a higher density of points along this line than elsewhere.

The table below gives the estimated fishing hours of vessels carrying VMS (>12m only) inside each development area by gear type (total fishing hours over the period 2018-22). There is significant dredge activity (targeting scallops) in areas B and C, which overlap with the northern part of the scallops grounds. There is also some bottom trawl (A,B,C) and beam trawl (B,C) activity.

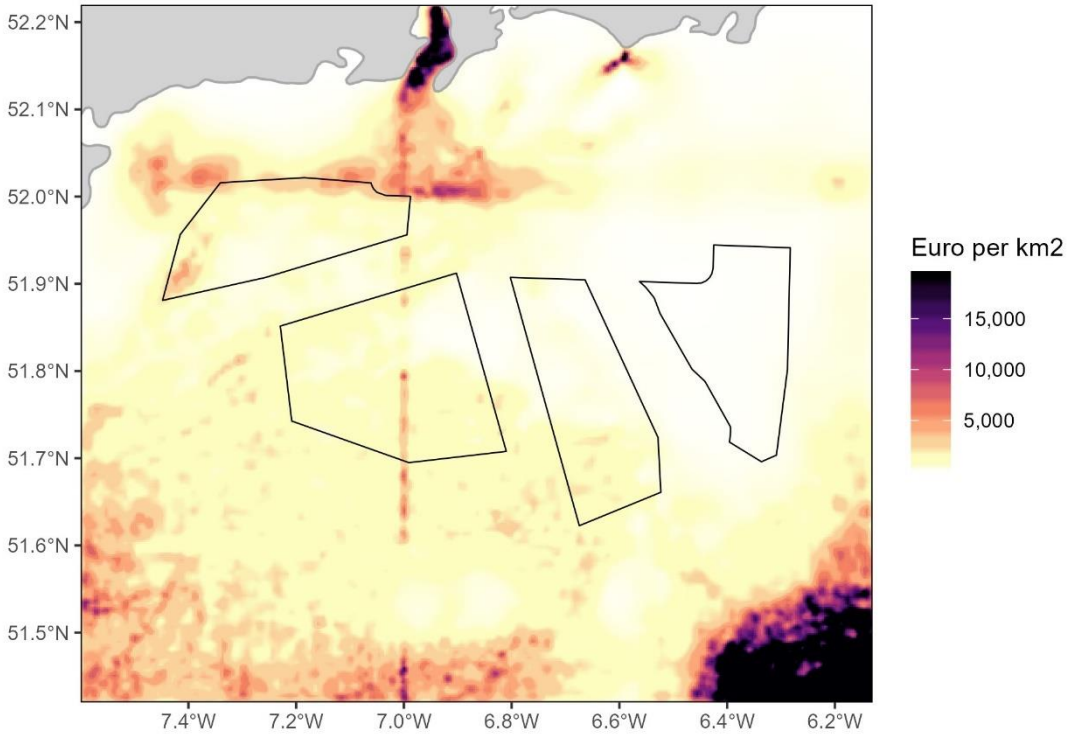
Gear type	Area A	Area B	Area C	Area D	Total
Dredge	490	5,999	2,078	0	8,567
Pots	190	7	2	1	200
Nets	194	225	80	2	501
Bottom trawls	2,102	532	1,253	175	4,062
Pelagic trawls	81	6	0	0	87
Seines	659	107	7	2	775
Beam trawls	797	3,634	2,155	298	6,884
Other	19	6	7	6	38
Total	4,532	10,516	5,582	484	21,114



Fishing activity by country (85% Irish; 13% Belgian; 2% French)

The table below shows the estimated fishing hours inside the development areas by vessel nationality (total over the period 2018-22). The fishing activity in the proposed ORE areas is dominated by Irish vessels with a small amount of Belgian (mainly beam trawl) activity and French (mainly bottom trawl) activity.

Nationality	Area A	Area B	Area C	Area D	Total
BEL	2	1,167	1,425	240	2,834
ESP	0	2	7	4	13
FRA	12	113	226	19	370
GBR	8	8	14	2	32
IRL	4,510	9,227	3,910	220	17,867



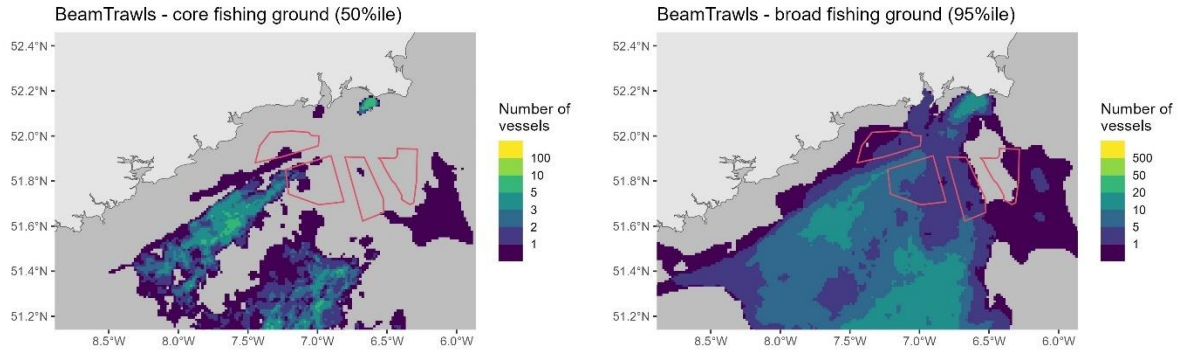
Value of the fisheries (Euro per km2 per year). In total around €1M worth of fish is taken from these polygons.

The table below shows the approximate annual value of the landings taken from each of the polygons. About half of this is due to scallops landings.

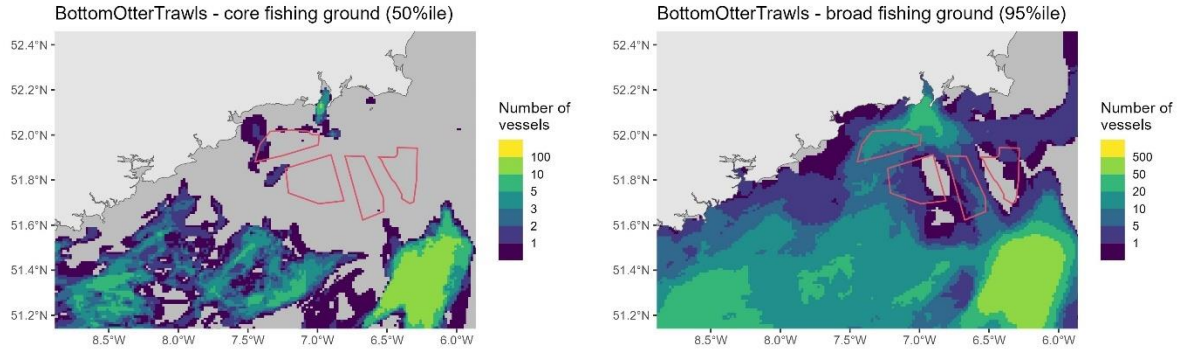
Area A	Area B	Area C	Area D	Total
€368,000	€511,000	€251,000	€25,000	€1,156,000

Number of vessels active in the development areas

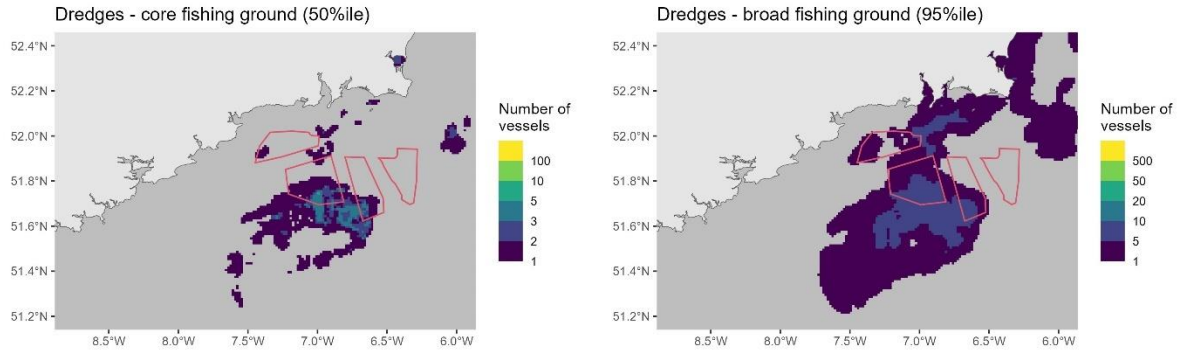
The maps below show how many Irish vessels over 12m are active in the waters around Ireland during the period 2018-22. In order to quantify this, the fishing effort for each individual Irish vessel was mapped and the core fishing area of each vessel was identified as the area where the top 50% of fishing effort took place. A broader fishing area was also identified; this was defined as the area where the top 95% of fishing effort took place. These areas were summed across all vessels to create maps of the number of vessels active at each location for each gear type over the period 2018-22 (vessels >12m only). If a vessel used more than one gear, its contribution to the total number of vessels was calculated in proportion to the fishing effort used for each gear by that vessel. For example, a fishing area of a vessel that splits its time equally to two gears would count as half a vessel for each gear.



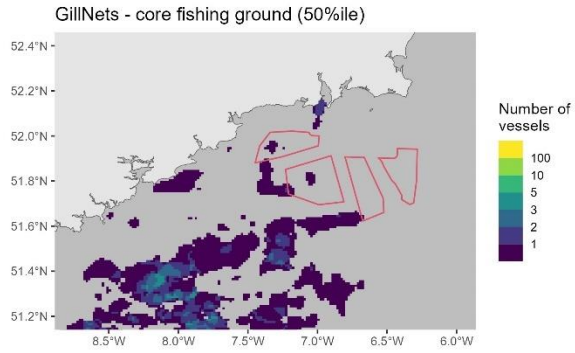
Beam trawls: some polygons overlap with core grounds a small number of vessels. There is some overlap with the wider fishing grounds of up to 10 vessels but the main Celtic Sea beam trawl activity is further south and west. Potential displacement from ORE areas is unlikely to have a severe impact.

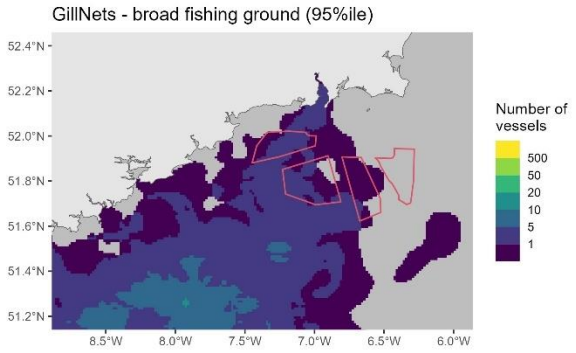


Otter trawls: almost no overlap with core grounds, some overlap with the wider fishing grounds of up to 20 vessels but the polygons do not overlap with the main otter trawl activity in the Celtic Sea. Potential displacement from ORE areas is unlikely to have a severe impact.

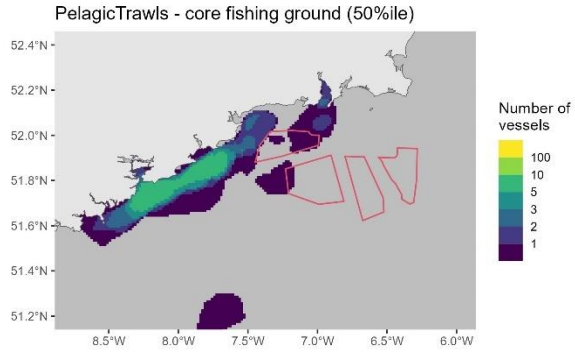


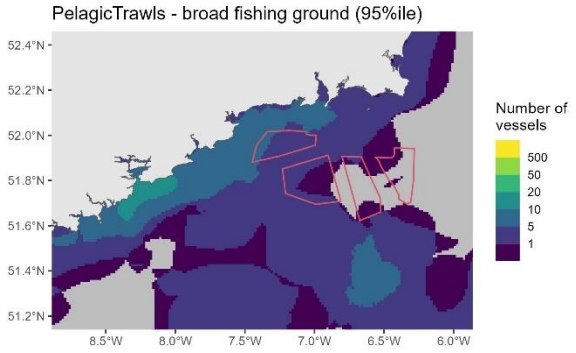
Dredges: the northern part of the main scallop grounds in the Celtic Sea overlaps with some of the polygons. A relatively small number of vessels are involved in this fishery but displacement from the ORE areas may have significant impact on these vessels. There is also considerable dredging activity by vessels under 12m (not included in these maps) but this is likely to be mostly close to shore.



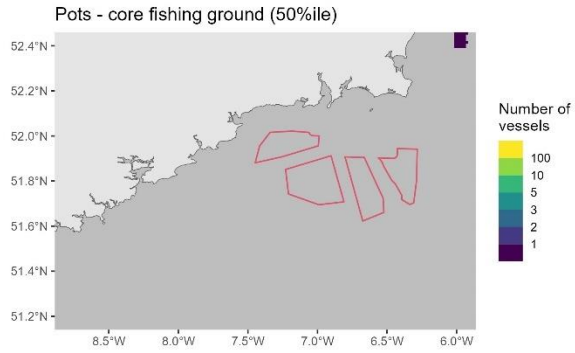


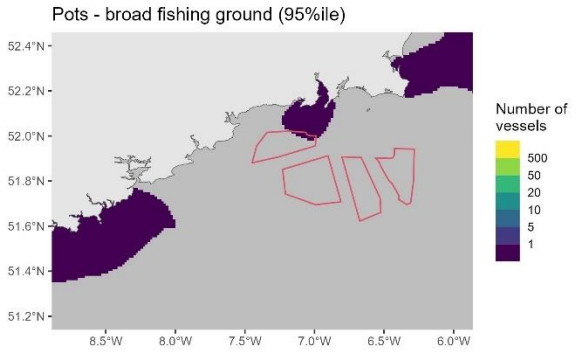
Gillnets: almost no overlap with core grounds and minor overlap with the broader fishing grounds of fewer than 5 vessels. Potential displacement from ORE areas is unlikely to have a severe impact.



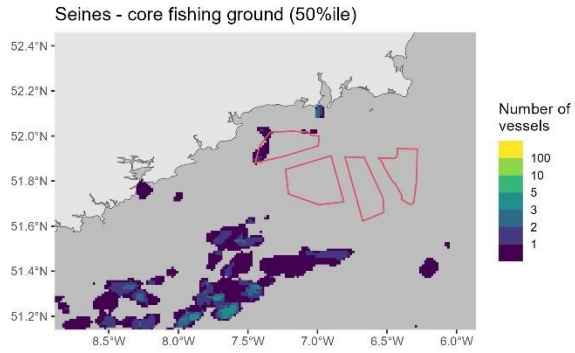


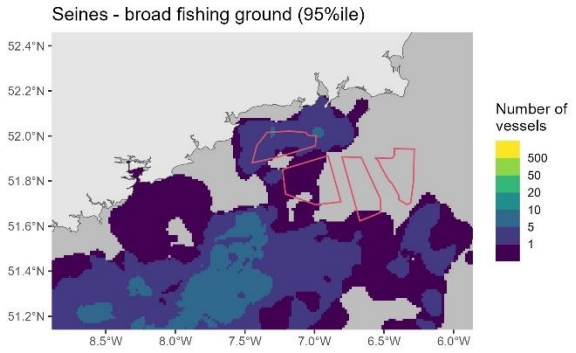
Pelagic trawls: small overlap with the core fishing grounds of one vessel. Potential displacement from ORE areas is unlikely to have a severe impact.





Pots: no overlap with vessels >12m but possibly with smaller vessels not shown here.





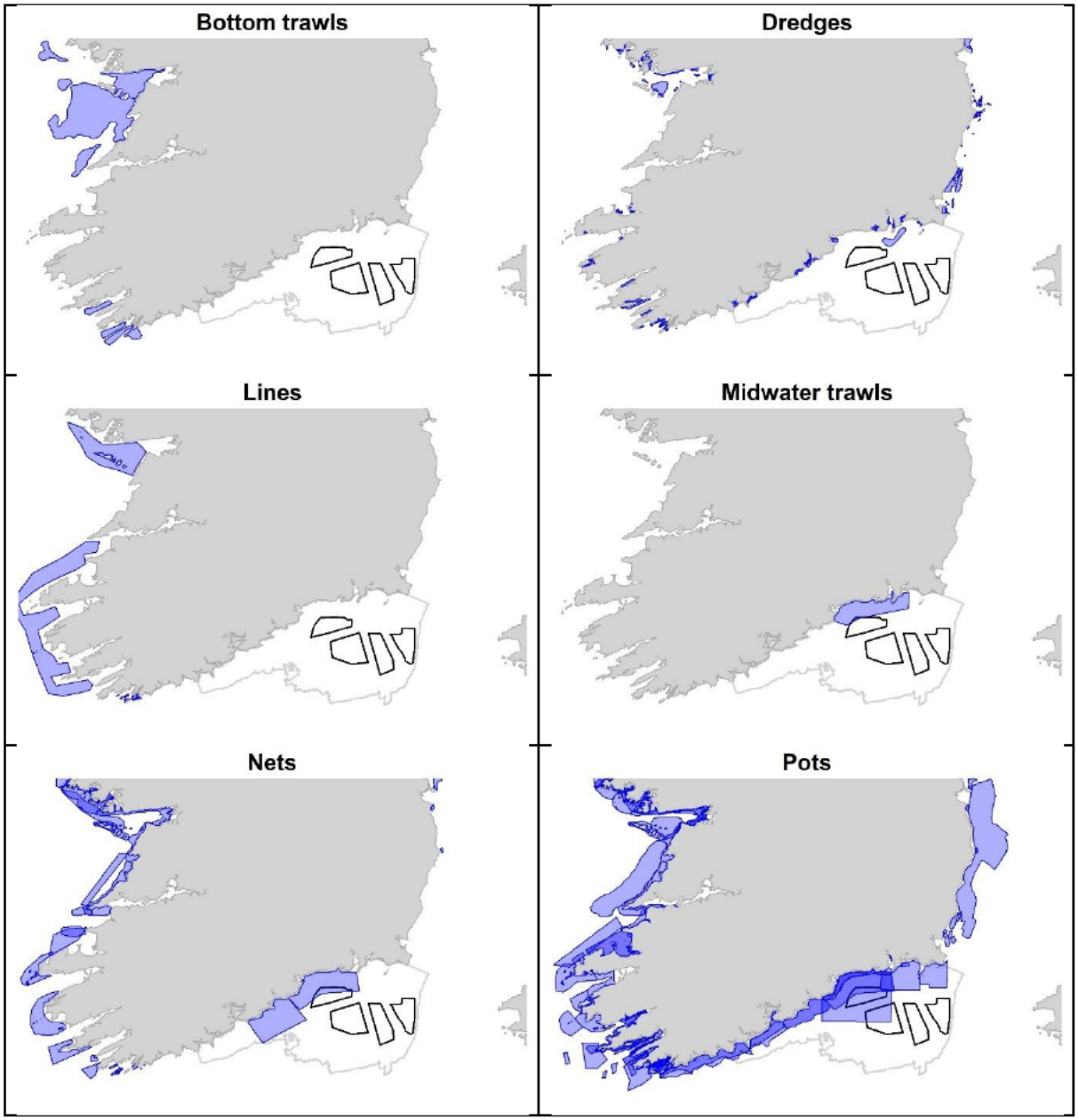
Seines: almost no overlap. Potential displacement from ORE areas is unlikely to have a severe impact.

Fishing activity by vessels under 12m in length

The previous sections deal with vessels of 12m and longer only; most smaller vessels are not routinely fitted with VMS transmitters.

The Marine institute compiled information on the fishing activity by inshore vessels to support the 2013 Natura 2000 assessment[1], which is shown below. This shows that the proposes ORE areas are not located in a major region of inshore fisheries. There only exception is that may be some overlap of areas A and B with vessels using pots (mainly targeting crabs).

Note that updated inshore activity areas are being developed as part of the Celtic Sea Sensitivity Study (not shown here).



Inshore: almost no overlap except for pots.

[1] https://atlas.marine.ie (THEMES > Fishing Activity > Inshore Fishing)

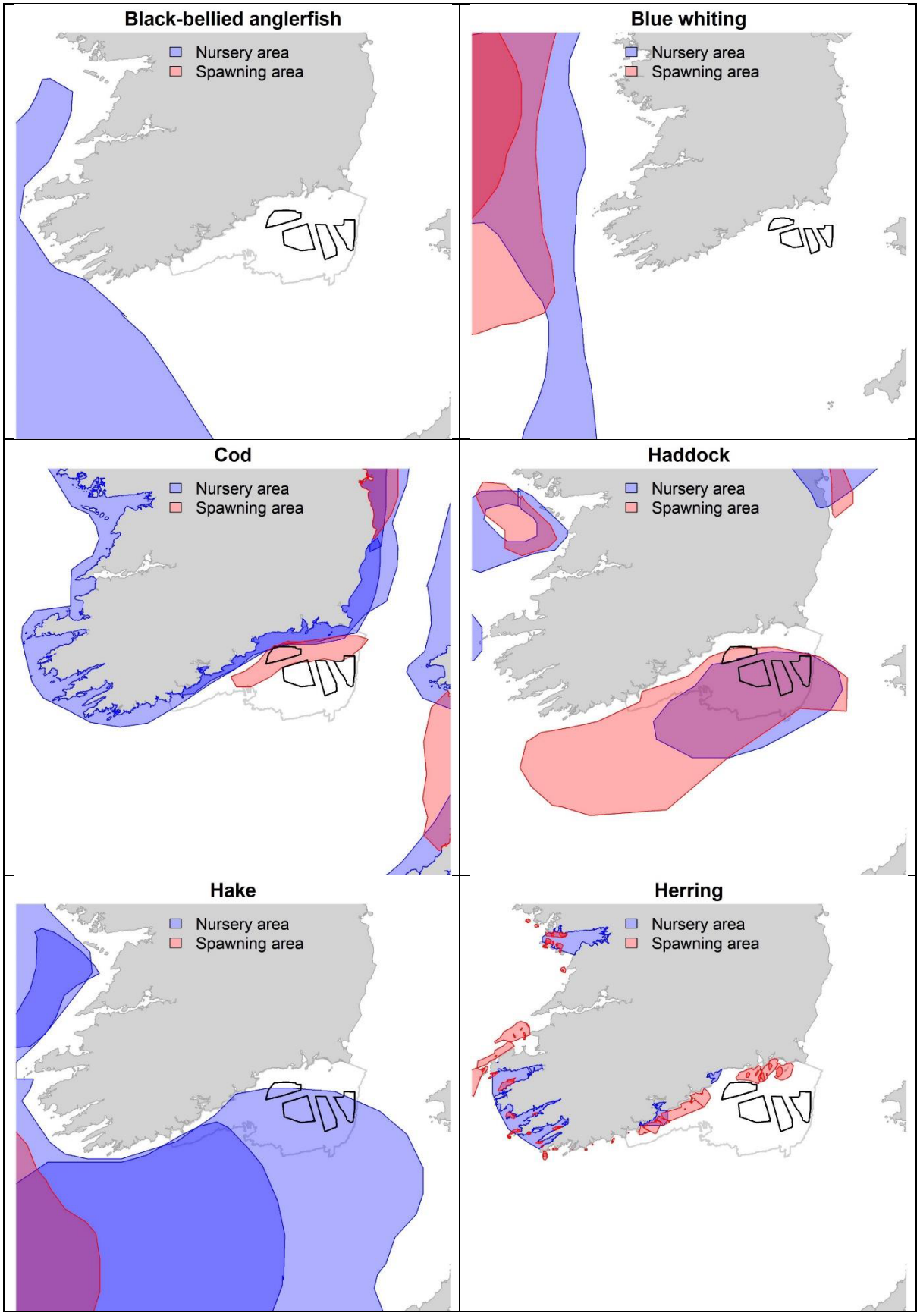
Spawning and nursery grounds

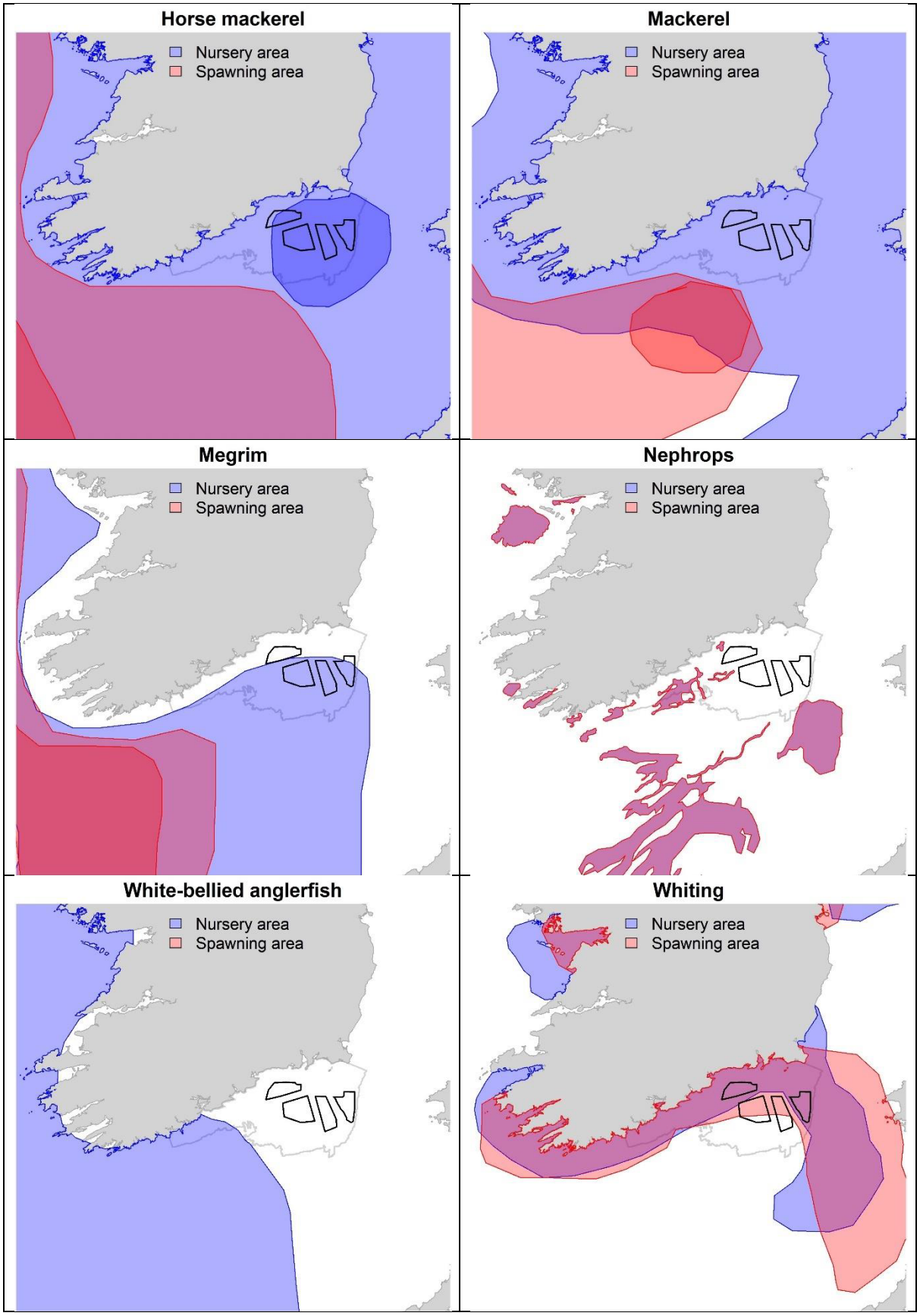
There are likely to be a number of commercially exploited or ecologically important species using this area for spawning or nursery activities. Essential fish habitat should be defined in space and time, were a particular area or habitat is important or required to complete a particular life-cycle stage or process. However, information on the relative importance of specific areas and their importance at a population level scale is normally lacking because this is often very difficult to quantify. Moreover, some species exhibit dynamic behaviours over space and time.

The Marine Institute identified the spawning and nursery grounds of some commercial species around Ireland which overlapped with the BSA[2]; these are presented in the figures below. However, it should be noted that with the exception of *Nephrops* and herring, which both require very specific sediment types, the boundaries of these grounds are subject to change over time and may be based on relatively sparse data. Additionally, the list of spawning grounds is incomplete (it does not include plaice, sole or any elasmobranchs, for example). The ORE areas (partially) overlap with the spawning areas of cod, haddock and whiting. There is also overlap with nursery grounds of haddock, hake, horse mackerel, mackerel, megrim and whiting.

The Marine Institute recommends that an update detailed assessment of essential fish habitat and a risk assessment in relation to ORE developments is carried out for this DMAP area. The Marine Institute recommends a risk- and precautionary-based approach when planning ORE activities. This might involve a prioritised listing the main species\receptors likely to be present (based on data and evidence where available otherwise based on local knowledge and expert opinion). The likely spawning time, spawning behaviour, preferred habitat etc. can be elucidated from the literature. All potential effects\pressures should be listed along with proposed mitigation measures.

[2] https://data.gov.ie/dataset/species-spawning-and-nursery-areas and ICES Advice 2009, book 5, Special Requests: Review of the Biologically Sensitive Area/Irish Box


Black-bellied anglerfish
Nursery area
Spawning area
Blue whiting
Nursery area
Spawning area
Cod
Nursery area
Spawning area
Haddock
Nursery area
Spawning area
Hake
Nursery area
Spawning area
Herring
Nursery area
Spawning area



The polygons overlap with the spawning or nursery areas of some species, but not herring, which are strongly dependent on specific bottom types.