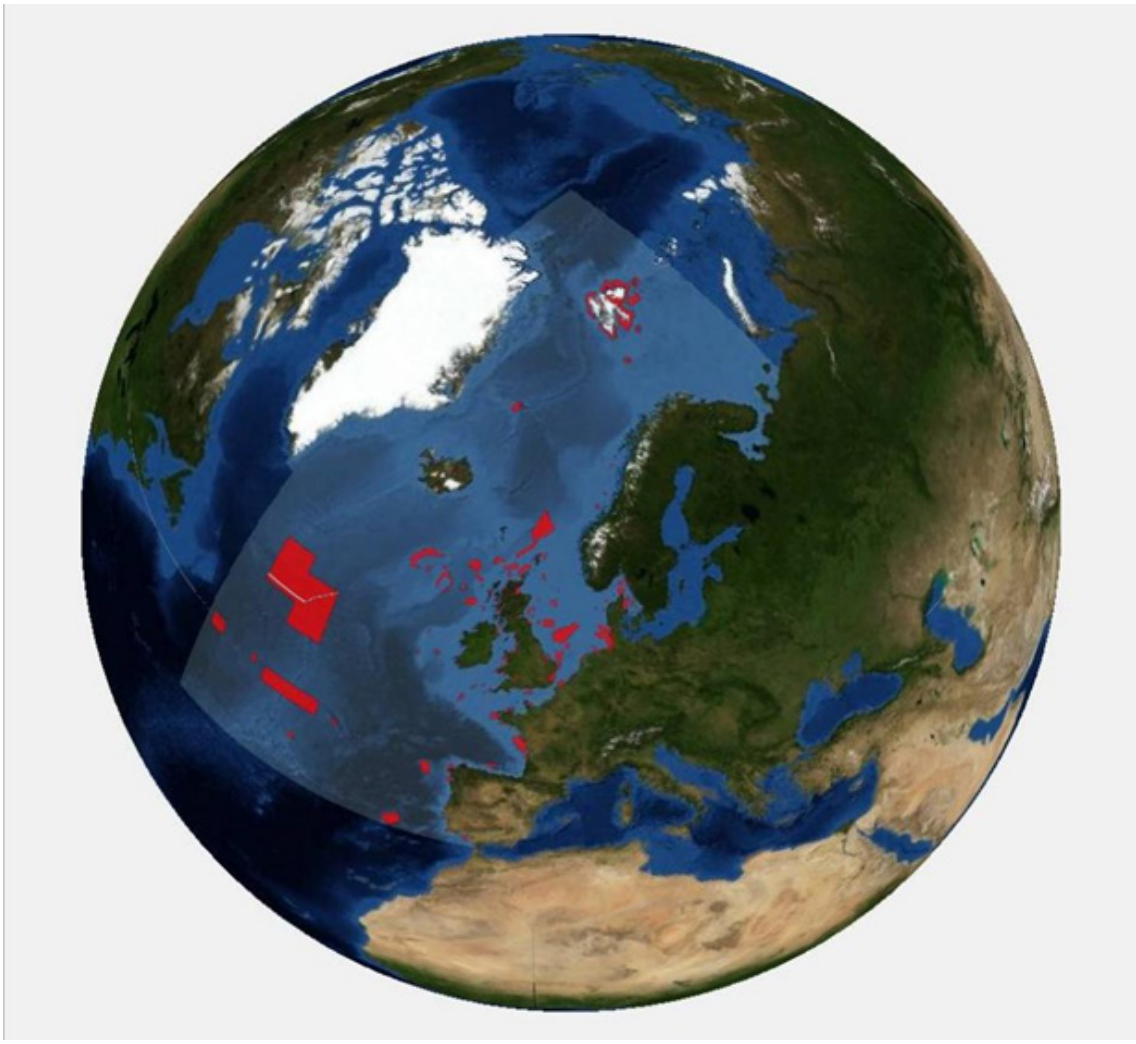
OSPAR COMMISSION

Protecting and conserving the North-East Atlantic and its resources

2018 Status Report on the OSPAR Network of Marine Protected Areas



Biodiversity and Ecosystems Series

2019

OSPAR Convention

The Convention for the Protection of the Marine Environment of the North-East Atlantic (the "OSPAR Convention") was opened for signature at the Ministerial Meeting of the former Oslo and Paris Commissions in Paris on 22 September 1992. The Convention entered into force on 25 March 1998. It has been ratified by Belgium, Denmark, Finland, France, Germany, Iceland, Ireland, Luxembourg, Netherlands, Norway, Portugal, Sweden, Switzerland and the United Kingdom and approved by the European Union and Spain.

Convention OSPAR

La Convention pour la protection du milieu marin de l'Atlantique du Nord-Est, dite Convention OSPAR, a été ouverte à la signature à la réunion ministérielle des anciennes Commissions d'Oslo et de Paris, à Paris le 22 septembre 1992. La Convention est entrée en vigueur le 25 mars 1998. La Convention a été ratifiée par l'Allemagne, la Belgique, le Danemark, la Finlande, la France, l'Irlande, l'Islande, le Luxembourg, la Norvège, les Pays-Bas, le Portugal, le Royaume-Uni de Grande Bretagne et d'Irlande du Nord, la Suède et la Suisse et approuvée par l'Union européenne et l'Espagne.

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This report has been edited by Dr. Janos Hennicke, Secretary of OSPAR's Intersessional Correspondence Group on Marine Protected Areas (ICG-MPA), German Federal Agency for Nature Conservation (BfN), Isle of Vilm, 18581 Putbus, Germany, and Dr. Thorsten Werner, Nature and Biodiversity Conservation Union (NABU), c/o BfN.

Chapter 1 (Current Status) was produced by Dr. Janos Hennicke (BfN) and Dr. Thorsten Werner (NABU), Germany. Figures were made by Mirko Hauswirth (BfN) and guidance was provided by Prof. Dr. Henning von Nordheim (Convenor of OSPAR ICG-MPA; BfN). Chapter 2 (Ecological Coherence) was produced by Peter Chaniotis, Joint Nature Conservation Committee (JNCC), United Kingdom, Anne Souquiere, Agence française pour la biodiversité, France and Dr. Tim Schellekens, eCOAST Marine Research, Netherlands. Chapter 3 (Management) was produced by Peter Chaniotis, Laura Cornick and Emma Novak, JNCC, United Kingdom. The report was finalised in collaboration with colleagues from ICG-MPA and the OSPAR Secretariat. All information presented is based on data provided by Contracting Parties.

Cover illustration

The illustration on the front page was created by Mirko Hauswirth (BfN).

Contents

Executive Summary

OSPAR Recommendation 2003/3[1], amended by OSPAR Recommendation 2010/2, on a network of Marine Protected Areas (MPAs) sets out the goal of OSPAR Contracting Parties (CPs) to continue the establishment of the OSPAR Network of MPAs in the North-East Atlantic and to ensure that:

a. *by 2012 it is ecologically coherent, includes sites representative of all biogeographic regions in the OSPAR Maritime Area, and is consistent with the CBD target for effectively conserved marine and coastal ecological regions;*

b. *by 2016 it is well managed (i.e. coherent management measures have been set up and are being implemented for such MPAs that have been designated up to 2010).*

This report aims to summarise the information made available by OSPAR CPs on their respective MPAs nominated to the OSPAR Commission and on this basis assess the progress towards overall status, management and ecological coherence of the OSPAR MPA network.

Since Contracting Parties started nominating MPAs to the OSPAR Network of MPAs in 2005, all 12 CPs bordering the North-East Atlantic have nominated sites to the OSPAR Network of MPAs in their national waters. All Contracting Parties to OSPAR have collectively designated MPAs in Areas Beyond National jurisdiction (ABNJ) of the OSPAR maritime area.

By 1 October 2018, the OSPAR Network of MPAs comprised 496 MPAs, including 7 MPAs collectively designated in ABNJ. The sites have a total surface area of 864,337 km^2 covering 6.4 % of the OSPAR Maritime Area.

Since the last Status Report in 2016, 48 MPAs with a surface area of more than 57,000 km^2 were added to the OSPAR Network of MPAs. The new MPAs were nominated by the United Kingdom (42 MPAs) and Norway (6 MPAs) – increasing the overall covered by OSPAR MPAs of the OSPAR Maritime Area from 5.9 % to 6.4 %. No additional MPAs were nominated in ABNJ.

To date, the majority of designated OSPAR MPAs are located in territorial waters, with an overall coverage of 19.6 %. The area beyond the limits of national Exclusive Economic Zones (EEZ), i.e. the High Seas and the Area and the Extended Continental Shelf (ECS) areas include 8.9 % by sea areas designated within OSPAR MPAs. The lowest coverage of OSPAR MPAs is found in the EEZ area where 2.7 % is designated within OSPAR MPAs.

OSPAR Region II, the Greater North Sea has an MPA coverage of 18.6 %. The Celtic Seas (Region III) and the Wider Atlantic (Region V) have 15.3 % and 8.3 % area designated within OSPAR MPAs, respectively. While coverage of the Bay of Biscay and Iberian Coast (Region IV) is at 5.9 %, the Arctic Waters (Region I) show the lowest coverage with 1.9 % designated within OSPAR MPAs.

With respect to the assessment of the ecological coherence of the OSPAR Network of MPAs, it is important to bear in mind that the Madrid criteria were derived from the "three initial spatial tests" defined at the early stage of the development of the OSPAR MPA network. If the MPA network fails one of these tests then it cannot be considered to be ecologically coherent.

The application of the Madrid Criteria to the OSPAR MPA network as it stood at the end of 2018 illustrates that whilst significant progress has been made in developing the network, it cannot yet be considered to be ecologically coherent.

Since the last Status Report on the OSPAR Network of MPAs in 2016, further work was done on developing an ecologically based assessment (see 2.6) to further explore the principle of MPA network connectivity for OSPAR threatened and/or declining species and habitats. However, additional work is required to develop the way in which to the OSPAR MPA network is assessed for ecological coherence in time for the OSPAR Quality Status Report 2023.

[1] OSPAR Recommendation 2003/3 (OSPAR 03/17/1, Annex 9), amended by OSPAR Recommendation 2010/2 (OSPAR 10/23/1, Annex 7)

The assessment against Madrid Criterion A (a proximity analysis of MPAs as a surrogate for the OSPAR MPA network principle of connectivity) suggests that the OSPAR MPA network is nearing being considered to be well distributed in OSPAR Regions II (North Sea) and III (Celtic Seas), but there remain significant gaps in OSPAR Regions I (Arctic) and V (Wider Atlantic) and a small gap further offshore in OSPAR Region IV (Bay of Biscay and The Iberian Coast). Future work should focus on addressing these geographical gaps where possible.

The assessment against Madrid Criterion B (percentage coverage of MPAs across the Dinter biogeographic provinces) suggests that the target has been exceeded for six of the 19 provinces; all within the continental shelf and slope of the OSPAR Maritime Area and all within the Eastern Atlantic Temperate sub-region. A further three exceed 5 % total surface coverage (the Barents Sea province, one within the Eastern Atlantic Temperate sub-region and the Atlantic deep-sea region) and of these one exceeds 9 % (within the Eastern Atlantic Temperate sub-region). Four provinces have no OSPAR MPAs and a further four have less than 1% surface coverage. These provinces are predominantly to the north of the OSPAR Maritime Area.

The assessment against Madrid Criterion C (protection of OSPAR Threatened and/or Declining species and habitats within OSPAR MPAs) shows that 14 of the 54 OSPAR Threatened and/or Declining habitats and species (where recommendations are in place) are protected within more than one MPA in the OSPAR Region(s) they are considered to be under threat/subject to decline. All OSPAR Threatened and/or Declining invertebrates, three of the nine birds, one of the two reptiles, one of the four marine mammals, one of the 20 fish and five of the 16 habitats are considered sufficiently protected according to the requirements of Madrid criterion C.

Almost 9 out of 10 (86%) of the OSPAR MPAs have either full or partial management information in place which is publicly documented, a 9% increase since the 2016 Status Report. There has also been improvement in the implementation of management measures considered necessary to achieve the conservation objectives of MPAs; implementation has increased from 12% in 2016 to 14% in 2018. There has been a notable increase in partial implementation of management measures; with an increase from 54% in 2016 to 63% in 2018. Progress towards achieving conservation objectives has also taken place since 2016, with an increase in 3%. However, in 2018 a high proportion of 'unknown' responses (28%) to the achievement of conservation objectives still remains; largely due to site-specific data on the ecological status of the protected features of OSPAR MPAs not being available.

Future work should focus on implementing the management measures considered necessary to achieve the conservation objectives of the protected features of OSPAR MPAs. In parallel, there is a need for long-term monitoring programs to be established to evaluate the effectiveness of such management measures in order to conclude with greater confidence on whether the conservation objectives of the protected features of OSPAR MPAs are being achieved. In addition, work should progress on improving methods of evaluating the degree to which the OSPAR MPA network is well-managed to support a more sophisticated assessment as to whether or not the OSPAR MPA network is delivering a genuine conservation benefit to targeted habitats, species and ecological processes.

For OSPAR MPAs in ABNJ, there should be continued effort to further the collective arrangement and cooperate through the Memorandums of Understanding with relevant competent management authorities, so that they can consider appropriate management actions to help deliver the conservation objectives for OSPAR MPAs in ABNJ. Contracting Parties should continue to raise awareness of OSPAR MPAs in ABNJ with relevant stakeholders and interest groups and look to further our scientific understanding of these sites.

Récapitulatif

La Recommandation OSPAR 2003/3, modifiée par la Recommandation OSPAR 2010/2, portant sur un réseau d'aires marines protégées (AMP) détermine l'objectif des Parties contractantes OSPAR s'agissant de poursuivre l'établissement d'un réseau d'AMP OSPAR dans l'Atlantique du Nord-Est et de s'assurer que:

a. d'ici 2012 il est écologiquement cohérent, comporte des sites représentant toutes les régions biogéographiques de la zone maritime OSPAR et qu'il est en cohérence avec la cible de la CDB pour la conservation efficace des régions écologiques marines et côtières;

b. d'ici 2016 il est bien géré (c'est-à-dire des mesures de gestion cohérentes ont été instaurées et mises en vigueur pour les AMP désignées jusqu'en 2010).

Le présent rapport a pour objectif de résumer les informations mises à la disposition des Parties contractantes OSPAR sur leurs AMP respectives désignées à la Commission OSPAR et d'évaluer, sur cette base, les progrès réalisés dans le sens de l'état général, de la gestion et de la cohérence écologique du réseau d'AMP OSPAR.

Les Parties contractantes ont commencé à désigner des AMP pour le réseau d'AMP OSPAR, dès 2005, les 12 Parties contractantes riveraines de l'Atlantique du Nord-Est ont désigné des sites dans leurs eaux nationales à inclure dans le réseau d'AMP OSPAR. Toutes les Parties contractantes OSPAR ont désigné collectivement des AMP dans des zones situées au-delà de la juridiction nationale (ABNJ) de la zone maritime OSPAR.

Au 1er octobre 2018, le réseau d'AMP OSPAR se compose de 496 AMP, comprenant 7 AMP désignées collectivement dans des ABNJ. Ces sites couvrent une superficie totale de 864.337 km^2, à savoir 6,4 % de la zone maritime OSPAR.

Depuis la publication, en 2016, du dernier rapport sur l'état du réseau, 48 AMP, couvrant une superficie de plus de 57.000 km^2 ont été ajoutées au réseau d'AMP OSPAR. Les nouvelles AMP ont été désignées par le Royaume-Uni (42 AMP) et la Norvège (6 AMP) – la superficie totale de la zone maritime OSPAR couverte par les AMP OSPAR passant de 5,9 % à 6,4 %. Aucune AMP supplémentaire dans une ABNJ n'a été désignée.

A ce jour, la majorité des AMP OSPAR désignées se situent dans les eaux territoriales, leur superficie totale correspondant à 19,6 %. La zone située au-delà des limites des Zones économiques exclusives (ZEE), c'est-à-dire les zones de haute mer et du Plateau continental étendu (PCE), comprend 8,9 % de zones désignées dans le cadre des AMP OSPAR. La couverture la plus faible d'AMP OSPAR se trouve dans des ZEE, 2,7 % correspondant à des AMP OSPAR désignées.

Les AMP situées dans la mer du Nord au sens large (Région II) représentent 18,6 % des AMP OSPAR désignées, celles des mers celtiques (Région III) et de l'Atlantique au large (Région V) respectivement 15,3 % et 8,3 %. Celles situées dans le golfe de Gascogne et la côte ibérique (Région IV) représentent 5,9 % alors que celles des eaux arctiques (Région I) représentent 1,9 %, correspondant à la couverture la plus faible.

En ce qui concerne l'évaluation de la cohérence écologique du réseau d'AMP OSPAR, il importe de prendre en compte le fait que les critères de Madrid sont dérivés de « trois tests spatiaux initiaux » définis à un stade précoce de développement du réseau d'AMP OSPAR. Si le réseau d'AMP ne passe pas l'un de ces tests il ne sera donc pas considéré comme écologiquement cohérent.

L'application des critères de Madrid au réseau d'AMP OSPAR, telle qu'il se présente à la fin 2018, révèle que des progrès considérables ont été réalisés dans le développement du réseau mais que celui-ci ne peut pas encore être considéré comme écologiquement cohérent.

Depuis le dernier rapport sur l'état du réseau d'AMP OSPAR, en 2016, le développement d'une évaluation à base écologique a fait l'objet de travaux supplémentaires (voir 2.6) afin d'étudier plus avant le principe de la connectivité du réseau d'AMP pour les espèces et habitats menacés et/ou en déclin OSPAR. Des travaux supplémentaires sont cependant nécessaires afin de développer la méthode d'évaluation de la cohérence écologique du réseau d'AMP OSPAR à temps pour l'élaboration du Bilan de santé 2023.

L'évaluation par rapport au critère de Madrid A (une analyse de proximité d'AMP à titre de substitut pour le principe de connectivité du réseau d'AMP OSPAR) suggère que l'on considère quasiment que le réseau d'AMP OSPAR est bien réparti dans les Régions OSPAR II (mer du Nord au sens large) et III (mers celtiques), mais que les Régions OSPAR I (eaux arctiques) et V (Atlantique au large) présentent de sérieuses lacunes et que la Région OSPAR IV (golfe de Gascogne et côte ibérique) présente de petites lacunes au large. Les travaux futurs devront se focaliser autant que possible sur la question de ces lacunes géographiques.

L'évaluation par rapport au critère de Madrid B (pourcentage de la couverture d'AMP dans l'ensemble des régions biogéographiques de Dinter) suggère que la cible a été dépassée pour six des 19 régions; se situant toutes sur le plateau continental et la pente de la zone maritime OSPAR et dans la sous-région tempérée de l'Atlantique oriental. La surface totale de trois autres est supérieure à 5 % (région de la mer de Barents, une région de la sous-région tempérée de l'Atlantique oriental et la région de haute mer de l'Atlantique) l'une d'entre elles dépassant 9 % (sous-région tempérée de l'Atlantique oriental). Quatre régions ne possèdent pas d'AMP OSPAR et quatre autres ont une superficie inférieure à 1%. Ces régions sont situées principalement au nord de la zone maritime OSPAR.

L'évaluation par rapport au critère de Madrid C (protection des espèces et habitats menacés et/ou en déclin OSPAR dans des AMP OSPAR) révèle que 14 des 54 espèces et habitats menacés et/ou en déclin OSPAR (faisant l'objet de recommandations existantes) sont protégés au sein de plusieurs AMP dans la (les) Région(s) OSPAR où l'on considère qu'ils sont menacés et/ou en déclin. On considère que tous les invertébrés OSPAR menacés et/ou en déclin, trois des neuf oiseaux, l'un des deux reptiles, l'un des quatre mammifères marins, l'un des 20 poissons et cinq des 16 habitats sont suffisamment protégés conformément aux exigences du critère de Madrid C.

On possède des informations, à la disposition du public, sur la gestion complète ou partielle de presque 9 AMP OSPAR sur 10 (86%), ce qui représente une augmentation de 9 % depuis le rapport sur l'état du réseau de 2016. La mise en œuvre de mesures de gestion que l'on considère nécessaires à la réalisation des objectifs de conservation des AMP a également progressé; cette mise en œuvre étant passée de 12 % en 2016 à 14 % en 2018. On a relevé une augmentation notoire de la mise en œuvre partielle de mesures de gestion; cette mise en œuvre étant passée de 54 % en 2016 à 63 % en 2018. Des progrès dans le sens des objectifs de conservation ont également été réalisés depuis 2016, une augmentation de 3 % étant relevée. Une proportion élevée de réponses « aucune information » (28 %) concernant la réalisation des objectifs de conservation subsiste cependant en 2018; ceci est dû principalement au fait que des données propres à un site sur l'état écologique de caractéristiques protégées des AMP OSPAR ne sont pas disponibles.

Les futurs travaux devront se concentrer sur la mise en œuvre de mesures de gestion que l'on considère nécessaires à la réalisation des objectifs de conservation des caractéristiques protégées des AMP OSPAR. Parallèlement, il y a lieu de créer des programmes de surveillance à long terme permettant d'évaluer l'efficacité de ces mesures de gestion afin de conclure avec une plus grande certitude si les objectifs de conservation des caractéristiques protégées des AMP OSPAR sont atteints. Il faudra de plus faire progresser les travaux permettant d'améliorer les méthodes d'évaluation de la mesure dans laquelle le réseau d'AMP OSPAR est bien géré. Il s'agit d'étayer une évaluation plus affinée permettant de déterminer si le réseau d'AMP OSPAR présente des avantages sérieux du point de vue de la conservation des habitats, espèces et processus écologiques ciblés.

Dans le cas des AMP OSPAR situées dans des ABNJ, il faudra poursuivre les efforts pour promouvoir les dispositions collectives et la coopération grâce à des mémorandums d'entente avec les autorités de gestion compétentes. Elles pourront ainsi envisager les mesures de gestion adéquates leur permettant de réaliser les objectifs de conservation des AMP OSPAR situées dans des ABNJ. Les Parties contractantes devront poursuivre la sensibilisation des parties prenantes pertinentes et des groupes de pression au réseau d'AMP OSPAR dans des ABNJ et s'efforcer d'améliorer nos connaissances scientifiques de ces sites.

Background

The Sintra Ministerial Statement, adopted at the meeting of the OSPAR Commission in Sintra, Portugal (22-23 July 1998), included the commitment that the OSPAR Commission will promote the establishment of a network of MPAs to ensure the sustainable use, protection and conservation of marine biological diversity and its ecosystems.

This process has been enhanced by the Bremen Ministerial Statement, adopted at the first Joint Ministerial Meeting of the Helsinki and OSPAR Commissions in Bremen, Germany (25-26 June 2003), as it established the commitment to complete by 2010 a joint network of well-managed MPAs that, together with the Natura 2000 network, is ecologically coherent.

The aims of the OSPAR Network of MPAs have been set out as:

- *to protect, conserve and restore species, habitats and ecological processes which have been adversely affected by human activities;*
- *to prevent degradation of, and damage to, species, habitats and ecological processes, following the precautionary principle; and*
- *to protect and conserve areas that best represent the range of species, habitats and ecological processes in the maritime area.*

OSPAR Recommendation 2003/3 sets out that in the years subsequent to 2005, OSPAR CPs should report by 31 December to the OSPAR Commission on any OSPAR MPAs that they have selected (or deselected) and on any corresponding management plans that they have adopted or substantially amended in that year. In 2006, the OSPAR Biodiversity Committee (BDC) agreed that annual reports on the status of the OSPAR Network of MPAs should be prepared in the period up to 2010.

As the target had not been reached in 2010, the OSPAR Ministerial Meeting in Bergen, Norway (20-24 September 2010) adopted a consolidated version of Recommendation 2003/3 (amended by OSPAR Recommendation 2010/2) including renewed targets, *i.e. to continue the establishment of the OSPAR Network of Marine Protected Areas in the North-East Atlantic and to ensure that:*

a. *by 2012 it is ecologically coherent, includes sites representative of all biogeographic regions in the OSPAR Maritime Area, and is consistent with the CBD target for effectively conserved marine and coastal ecological regions;*

b. *by 2016 it is well managed (i.e. coherent management measures have been set up and are being implemented for such MPAs that have been designated up to 2010).*

OSPAR CPs therefore agreed to continue with the preparation of annual reports with a view to track progress as well as any shortcomings with regards to the targets that have been set by the OSPAR Commission for the OSPAR Network of MPAs.

At the 2013 OSPAR Commission meeting in Gothenburg, Sweden (24-28 June 2013) OSPAR CPs agreed that the Status Report of the OSPAR Network of MPAs will be produced every two years. The deadline for new nominations and for reporting was set to 1 October.

This document presents the 11th Status Report on the OSPAR Network of MPAs taking into account all MPAs that have either been nominated by CPs within their respective national waters or established collectively by the OSPAR Commission in ABNJ of the OSPAR maritime area until 1 October 2018.

Sources of data and information on OSPAR MPAs

The analysis of the OSPAR Network of MPAs is based upon information that has been provided by the Contracting Parties in the process of nominating MPAs to the OSPAR Commission. Data for analyses were gathered from the OSPAR Database of MPAs which is co-administered by the French Agence des Aires Marines Protégées (AAMP) and the German Federal Agency for Nature Conservation (BfN). Data for reporting on the management of OSPAR MPAs were collected through a separate exercise coordinated by the UK. All calculations were made with reference only to the OSPAR Maritime Area as defined in the OSPAR Convention, excluding overseas territories and territories of Contracting Parties in the Baltic and Mediterranean Seas. All figures, tables and maps in this report provide information on the OSPAR Network of MPAs as of 1 October 2018.

1 Status of the OSPAR Network of MPAs

By 1 October 2018, the OSPAR Network of MPAs comprises 496 MPAs (Fig. 1.1) including 486 MPAs situated within national waters of Contracting Parties and 10 MPAs situated in areas beyond the limits of national EEZs with different jurisdictional regimes[2]. In total, OSPAR MPAs cover an area of 864,337 km^2, which equals 6.4 % of the OSPAR Maritime Area. This represents an increase by 57,865 km², or 0.5 %, compared to 2016.

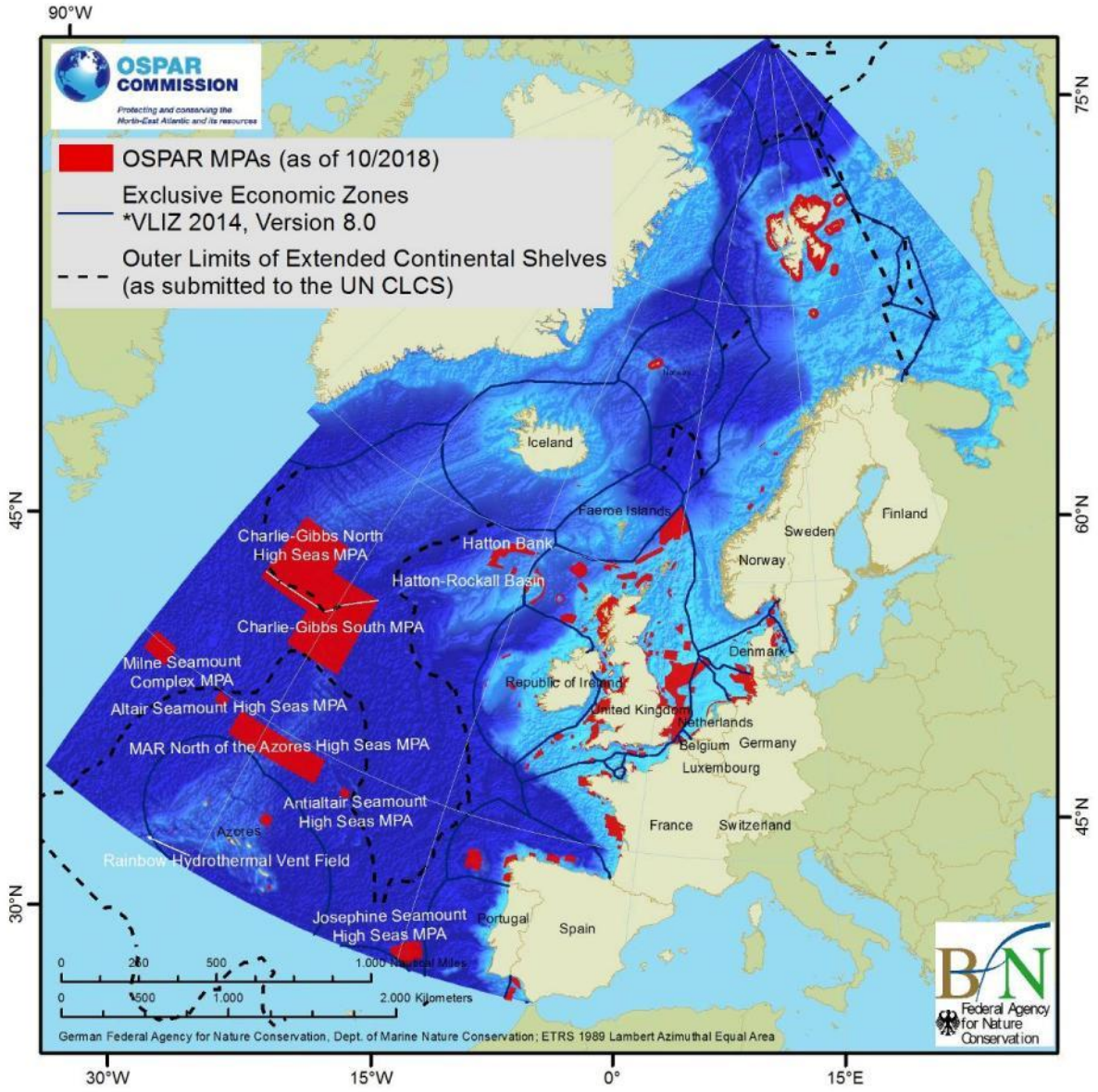

Figure 1.1. *OSPAR Network of MPAs (as of 1 October 2018)*[3].

[2] For further information on the jurisdictional regime of OSPAR MPAs situated in areas beyond the limits of national EEZs of CPs please see section 1.2.3 “Jurisdiction of OSPAR MPAs in areas beyond the limits of national EEZs”.

[3] The boundaries of CPs’ EEZs have been obtained from the open source VLIZ Maritime Boundaries Geodatabase. It is noted, that not all of these boundaries as shown in the map have been officially declared by CPs.

1.1 OSPAR MPAs under National Jurisdiction

1.1.1 Distribution of OSPAR MPAs in the national waters of CPs

From 2005 until 2018, OSPAR CPs have nominated a total of 486 OSPAR MPAs within their respective national waters[4], i.e. territorial waters and EEZs (Fig. 1.2).

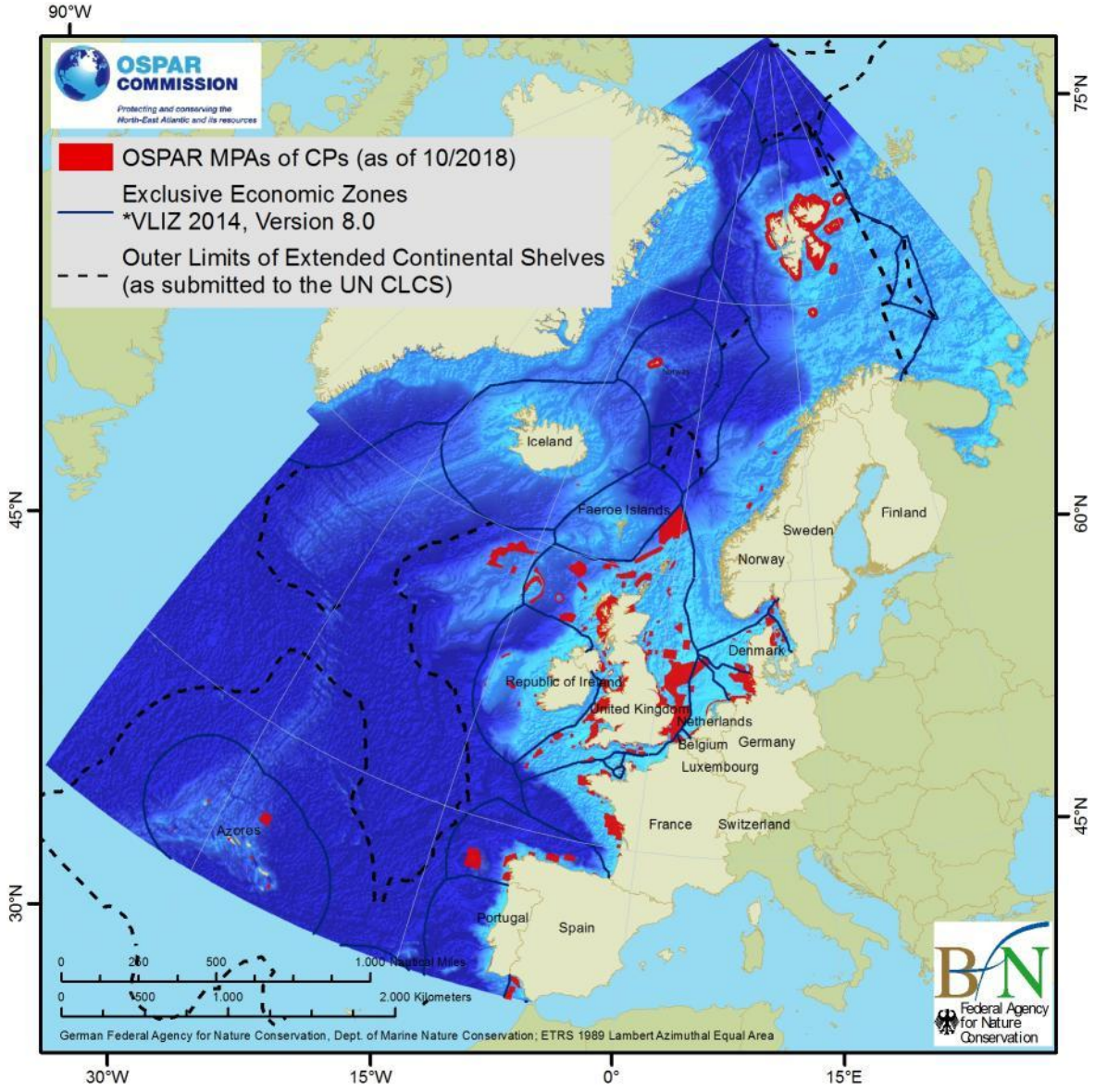

Figure 1.2. *OSPAR MPAs and boundaries of the Exclusive Economic Zones (EEZs) and Extended Continental Shelves (as submitted to UN CLCS) of OSPAR CPs (as of 1 October 2018)*[5].

The contributions by CPs regarding the number of MPAs, their coverage and distribution in their national waters differ substantially. Table 1.1 shows the number of MPAs per CP and the area coverage.

[4] Refer to Annex I for a list of all OSPAR MPAs nominated until 1 October 2018 and Annex II presenting the evolution of the OSPAR Network of MPAs in the period of 2005-2018.

[5] The boundaries of CPs' EEZs have been obtained from the open source VLIZ Maritime Boundaries Geodatabase. It is noted, that not all of these boundaries as shown in the map have been officially declared by CPs.

Table 1.1. *Number and coverage of OSPAR MPAs in Territorial Waters (TW), the Exclusive Economic Zone (EEZ) and in areas beyond the limits of national EEZs (beyond EEZ), i.e. the High Seas, the Area, and ECS areas (as of 1 October 2018)*[6].

OSPAR Contracting Party	No. of OSPAR MPAs	MPA coverage [km²]			
		TW	EEZ	beyond EEZ	Total
Belgium	2	806	433	n.a.	1,239
Denmark	34	6,960	5,510	n.a.	12,470
France	39	15,822	6,280	n.a.	22,102
Germany	6	9,647	7,921	n.a.	17,595
Iceland	14	90	476	n.a.	566
Ireland	19	1,594	2,542	n.a.	4,135
Netherlands	5	2,434	5,937	n.a.	8,371
Norway	21	84,087	2,667	n.a.	86,754
Portugal	13[7]	1,556	4,656	22	6,234
Spain	15	8,311	19,076	n.a.	27,387
Sweden	10	1,114	1,371	n.a.	2,485
United Kingdom	311[8]	56,088	136,588	17,158	209,835
All Contracting Parties	7[9]	n.a.	n.a.	465,165	465,165
Total	**496**	**188,534**	**193,457**	**482,345**	**864,337**

[6] n.a. = not applicable

[7] Portugal (PT) has nominated a total of 17 MPAs to OSPAR. Four of these MPAs, namely *Altair Seamount HS MPA*, *Antialtair Seamount HS MPA*, *Josephine Seamount HS MPA* and *Mid Atlantic Ridge North of the Azores HS MPA*, occur in an area subject to a submission by PT to the UN CLCS for an ECS. These 4 MPAs have been assigned to all Contracting Parties in terms of number and area coverage (category "beyond EEZ"). One of the 17 MPAs, namely *Rainbow Hydrothermal Vent Field*, occurs on the ECS of PT. This MPA has been assigned to Portugal in terms of number and area coverage (category "beyond EEZ"). The MPA that occurs beyond the EEZ of PT covers 22 km².

[8] The United Kingdom (UK) has nominated a total of 311 MPAs to OSPAR. Two of these MPAs, namely *Hatton Bank SAC* and *Hatton-Rockall Basin*, occur on the ECS of the UK. These 2 MPAs have been assigned to the UK in terms of number and area coverage (category "beyond EEZ"). One of the MPAs, namely *North West Rockall Bank SAC*, occurs partly within the EEZ and partly within the ECS of the UK. This MPA has been assigned to the UK in terms of number and area coverage (partly category "EEZ" and partly category "beyond EEZ"). MPAs that occur beyond the EEZ of the UK cover 17,158 km².

[9] Three OSPAR MPAs, namely *Hatton Bank SAC* (UK), *Hatton-Rockall Basin* (UK) and *Rainbow Hydrothermal Vent Field* (PT), occur on the ECS of a CP. These 3 MPAs have been assigned to the respective CP in terms of number and area coverage.

Further aspects regarding the distribution of OSPAR MPAs across the national waters (territorial waters and EEZ) of CPs are highlighted in Figure 1.3[10], illustrated against the 10% target outlined in Aichi Target 11 of the Convention on Biological Diversity. For each CP[11], the relative coverage (in %) of OSPAR MPAs in its territorial waters, the EEZ and overall in its national waters (blue/red/green, respectively) is shown.

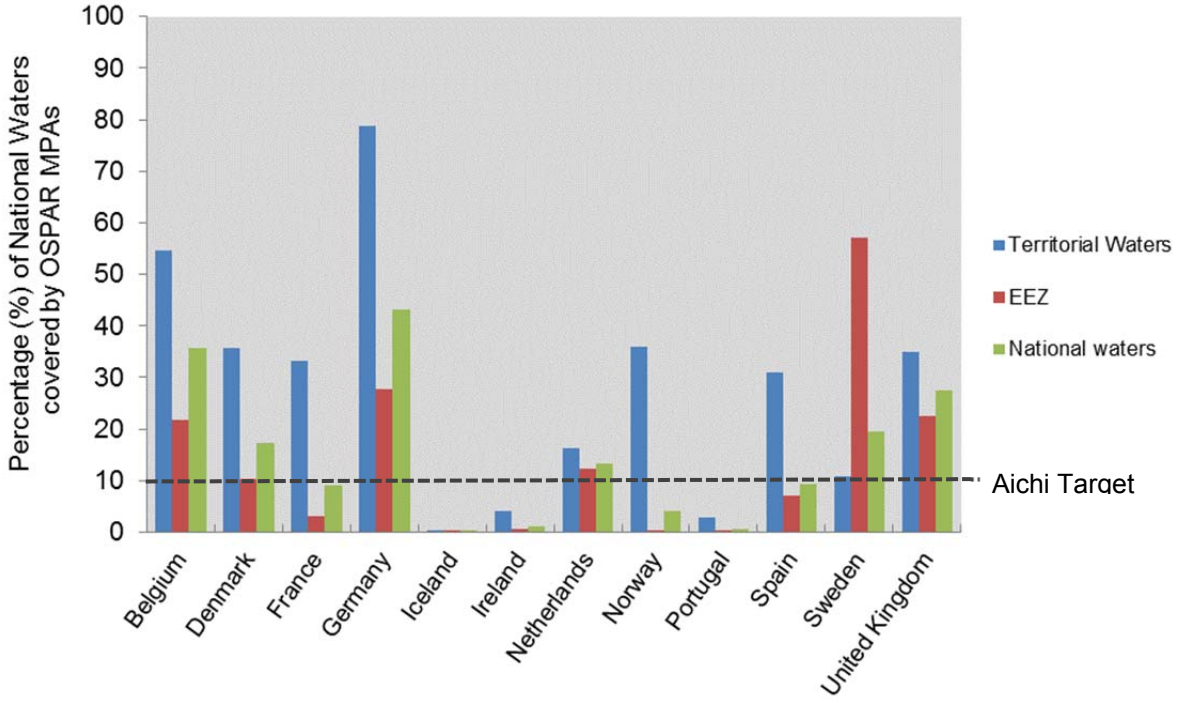

Figure 1.3. *MPA coverage in the national waters of CPs, i.e. territorial waters and EEZ[12] (as of 1 October 2018).*

Overall there is a good coverage of coastal waters with about 19.6 %[13] (188,534 km²) of the territorial waters of OSPAR CPs being designated within OSPAR MPAs. This is mainly a result of extensive MPAs designated in OSPAR Regions II (Greater North Sea) and III (Celtic Seas) and around the Svalbard archipelago in Region I (Arctic Waters). In addition, 8.9 % (482,345 km²) of the area beyond the limits of national EEZs, i.e. the High Seas, the Area and the ECS areas, are currently covered by OSPAR MPAs.

However, as illustrated above, there continues to be differences with respect to the overall distribution of OSPAR MPAs across the OSPAR Maritime Area, with a bias towards near-shore sites. Compared to territorial waters and areas beyond the limits of EEZs, far less MPAs have been designated in the Exclusive Economic Zones, covering 2.7 % (193,457 km²) of all EEZs in the OSPAR Maritime Area.

1.1.2 Distribution of OSPAR MPAs across OSPAR Regions

The distribution of OSPAR MPAs across the five OSPAR Regions, i.e. Arctic Waters (Region I), Greater North Sea (Region II), Celtic Seas (Region III), Bay of Biscay and Iberian Coast (Region IV) and Wider Atlantic (Region V), is shown in figure 1.4.

[10] The area calculations have been made with regards to the OSPAR Maritime Area only, *i.e.* without consideration of the overseas territories of CPs and marine territories of CPs in the Baltic (Denmark, Germany and Sweden) or the Mediterranean (France and Spain).

[11] The area calculations for Denmark have been made for the mainland only, *i.e.* without consideration of the territories of Greenland and the Faroes Islands.

[12] Note that results are based on the boundaries of the EEZ according to the open source VLIZ Maritime Boundaries Geodatabase.

[13] For the calculation of the surface of TW and EEZ areas, the whole marine area of Portugal including Madeira and Azores as well as the Channel Island (UK) were included. Thus, the percentages are not directly comparable to previous Status Reports.

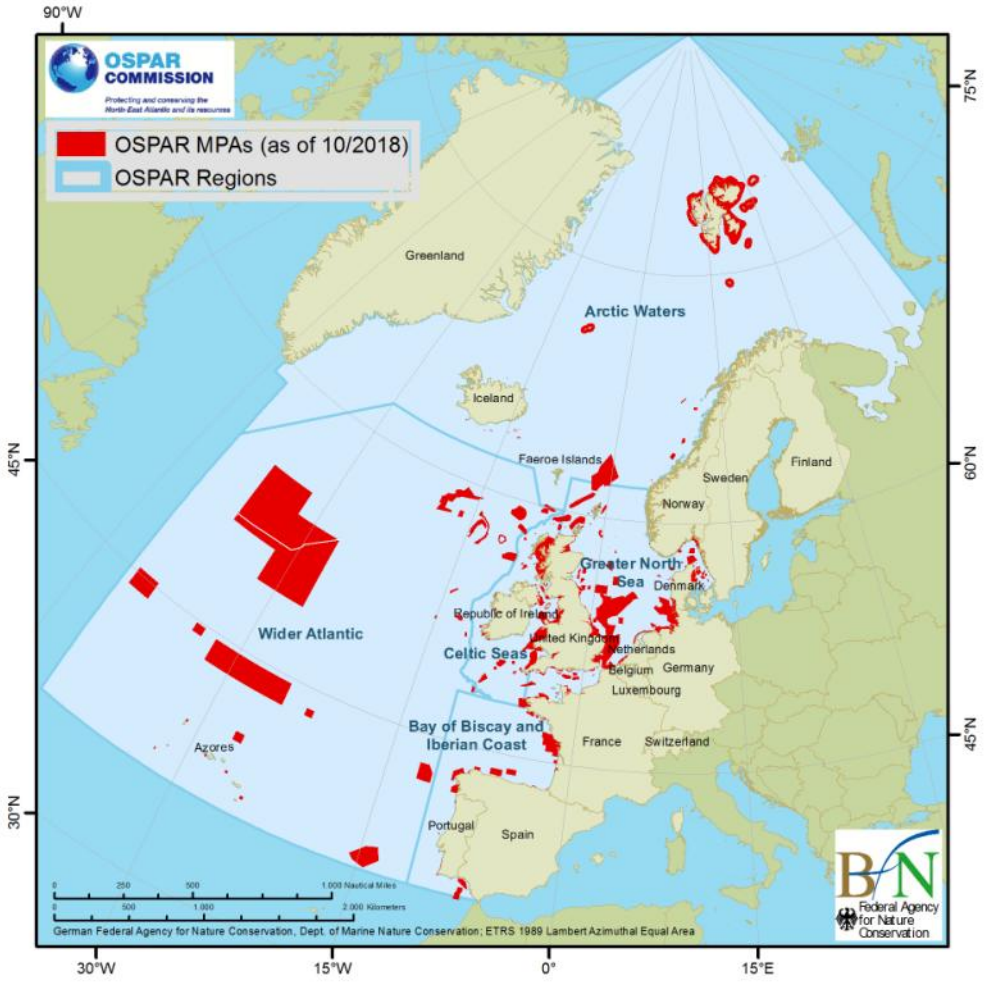

Figure 1.4. *Distribution of OSPAR MPAs across OSPAR Regions (as of 1 October 2018).*

A more detailed picture of OSPAR MPAs across each OSPAR Region is provided in figure 1.5a&b.

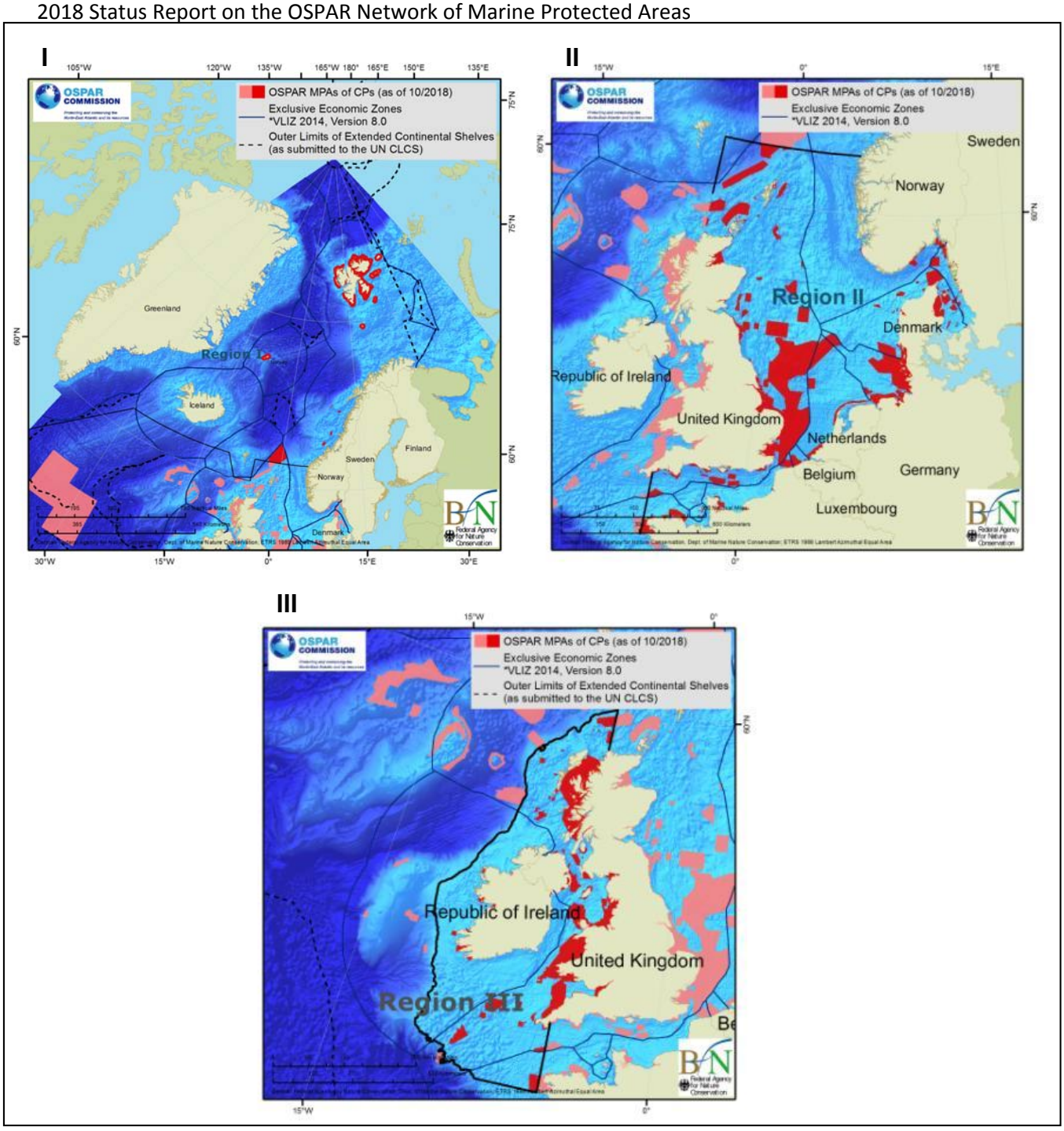

Figure 1.5a. OSPAR MPAs across OSPAR Regions (I – Arctic Waters; II – Greater North Sea; III – Celtic Seas) and boundaries of the Exclusive Economic Zones (EEZs) and Extended Continental Shelves (as submitted to UN CLCS) of OSPAR CPs (as of 1 October 2018).

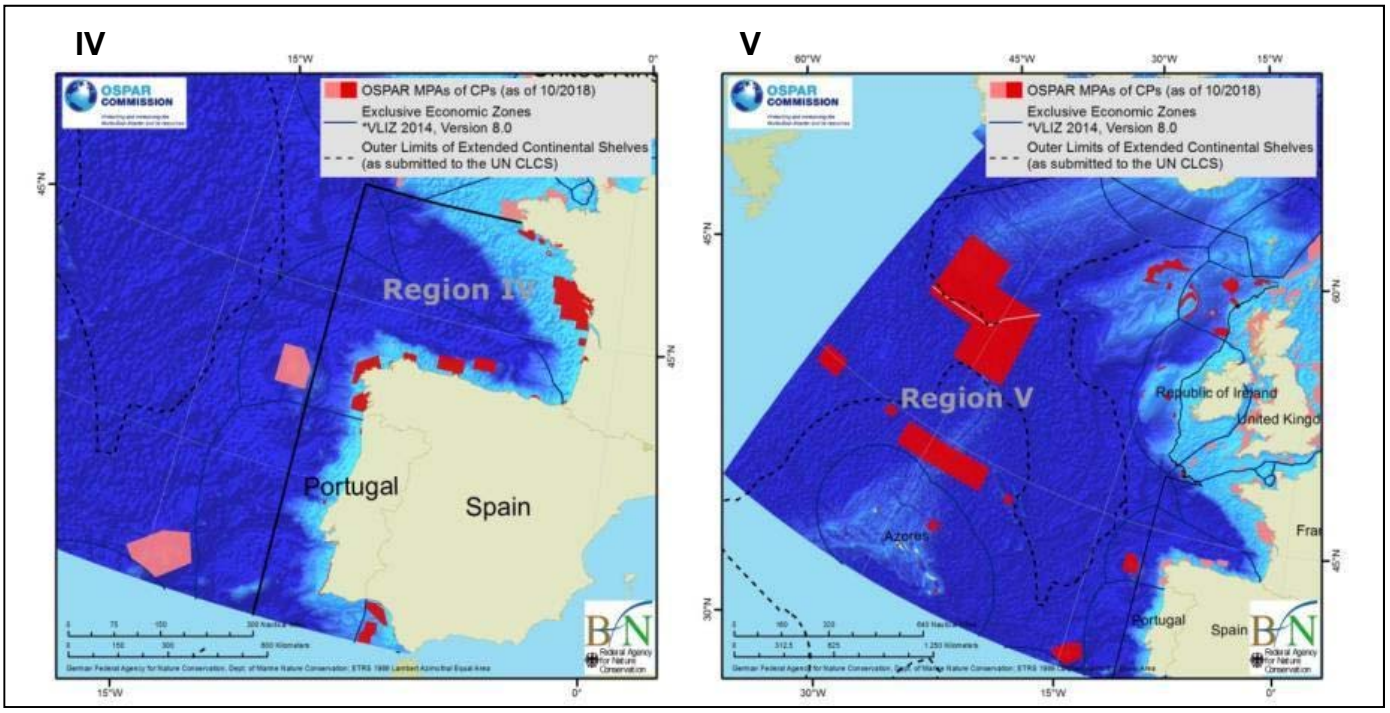

Figure 1.5b. OSPAR MPAs across OSPAR Regions (IV – Bay of Biscay and Iberian Coast; V – Wider Atlantic) and boundaries of the Exclusive Economic Zones (EEZs) and Extended Continental Shelves (as submitted to UN CLCS) of OSPAR CPs (as of 1 October 2018).

The spatial coverage by OSPAR MPAs differs substantially between the OSPAR Regions (Fig. 1.6 and Tab. 1.2).

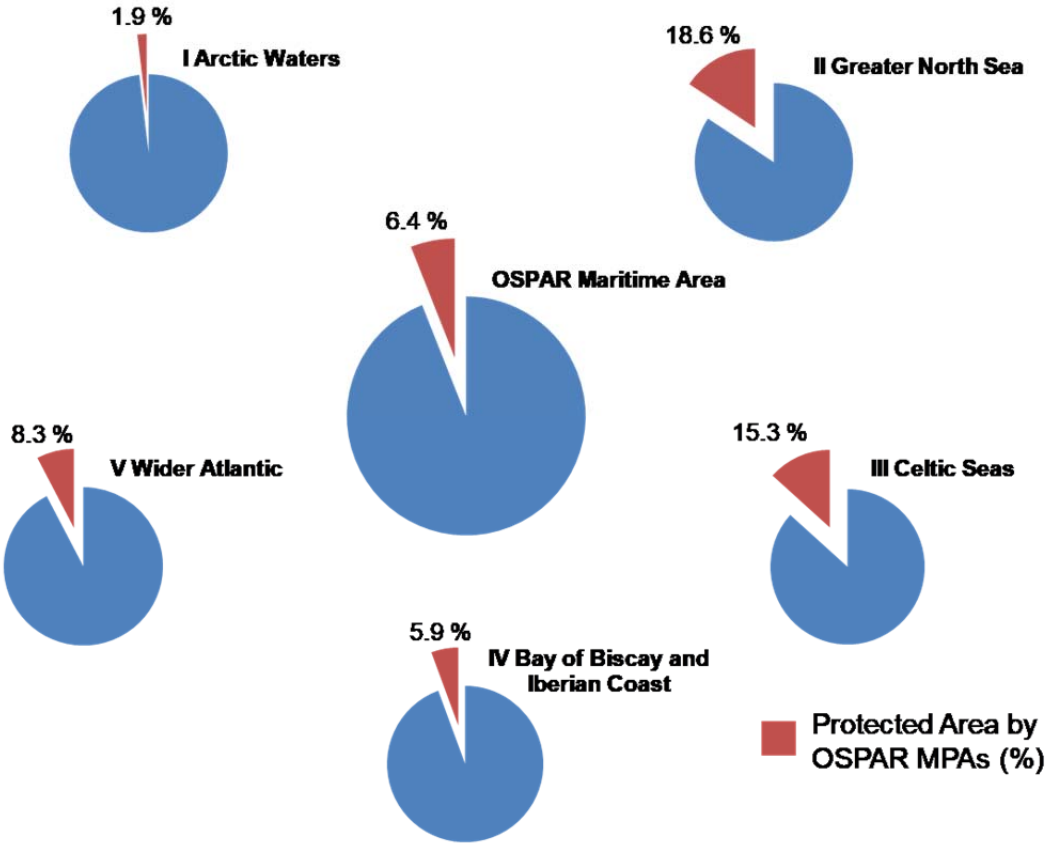

Figure 1.6. *Spatial coverage (%) by OSPAR MPAs of the five OSPAR Regions (as of 1 October 2018).*

The Greater North Sea (OSPAR Region II) has the most bordering Contracting Parties of all OSPAR Regions and all have contributed MPAs to the network. The MPAs nominated by Belgium, Denmark, France, Germany, the Netherlands, Norway, Sweden, and the United Kingdom, cover 18.6 % (142,489 km^2) of the Greater North Sea.

In the Celtic Seas (OSPAR Region III) 15.3 % (56,167 km^2) are protected by OSPAR MPAs, nominated by Ireland, the UK and France. Two OSPAR Regions (II and III) currently achieve the CBD Aichi Target 11[14], i.e. to protect at least 10 % of the coastal and marine areas by 2020. Only Region II achieved the target at the time of the 2016 Status Report on OSPAR MPAs.

In the Wider Atlantic (OSPAR Region V) 8.3 % of the area is covered by OSPAR MPAs (526,530 km^2). This region comprises MPAs nominated by Portugal, Ireland and the UK. While the coverage of this Region by MPAs within national jurisdiction remains low, the collective establishment by all OSPAR CPs of the seven MPAs in ABNJ in 2010 and 2012 as well as the three MPA nominations by Portugal and the United Kingdom in areas that are subject to their respective submission to the UN CLCS for an ECS have substantially increased the area coverage of the MPA network in this Region[15].

The Bay of Biscay and Iberian Coast (OSPAR Region IV) encompass a number of MPAs nominated by its three bordering Contracting Parties of France, Portugal and Spain. Altogether, 5.9 % (32,076 km^2) of this Region are covered by the OSPAR Network of MPAs.

The Arctic Waters (Region I) show the lowest MPA coverage with 1.9 % (107,117 km^2) falling within OSPAR MPAs. This coverage is almost entirely due to the designation of two extensive sites around the Svalbard archipelago, namely *Svalbard West*, *Svalbard East* (Norway), the MPA site *Jan Mayen* (Norway) and the MPA *North-east Faroe-Shetland Channel* (United Kingdom).

Table 1.2. *Absolute (km²) and the relative (%) coverage of the five OSPAR Regions by OSPAR MPAs (as of 1 October 2018).*

OSPAR Region		Total Area	Protected Area by OSPAR MPAs	
		[km²]	[km²]	[%]
I	Arctic Waters	5,529,716	107,117	**1.9**
II	Greater North Sea	766,624	142,489	**18.6**
III	Celtic Seas	366,459	56,167	**15.3**
IV	Bay of Biscay and Iberian Coast	539,153	32,076	**5.9**
V	Wider Atlantic	6,346,159	526,530	**8.3**
OSPAR Maritime Area		13,548,111	864,379	**6.4**

[14] Aichi Target 11 of the Convention of Biological Diversity (CBD) Strategic Plan 2011-2020 (CBD Decision X/2).

[15] Reservation of the Kingdom of Denmark: The area to which the UK nominations is sought to apply falls within the proposed outer limits of the Kingdom of Denmark in relation to the Faroe-Rockall Plateau, which consistent with paragraph 8 of Article 76 of UNCLOS and Article 4 of the Annex II thereto, have been submitted to the UN CLCS, and whose consideration is currently pending.

1.2 OSPAR MPAs in areas beyond the limits of national EEZs

1.2.1 Background

The OSPAR Maritime Area encompasses extensive areas in the Wider Atlantic (OSPAR Region V) and the Arctic Waters (OSPAR Region I) that are beyond the limits of national EEZs, i.e. the High Seas, the Area, and ECS areas. This Area Beyond National Jurisdiction covers approximately 40 % of the OSPAR Maritime Area (see Annex III Figure 1).

In recent years, the protection of the marine environment and biodiversity in ABNJ/in the High Seas has attracted great attention at the global level, in particular in the context of the United Nations General Assembly (UNGA), the legal framework established by the United Nations Convention on the Law of the Sea (UNCLOS) and the Convention on Biological Diversity (CBD). OSPAR has in this context assumed a pioneering role as a regional organisation to protect marine ecosystems and biodiversity in ABNJ/in the High Seas.

Being aware of the shared responsibilities and the need for a collaborative approach in ABNJ/in the High Seas, OSPAR has at the same time aimed at strengthening mutual exchange and cooperation with the various relevant international Competent Authorities responsible for the management of specific human activities in ABNJ, including the North East Atlantic Fisheries Organisation (NEAFC), the International Seabed Authority (ISA), and the International Maritime Organization (IMO). The adoption of the collective arrangement[16] by OSPAR (OSPAR Agreement 2014-09) and NEAFC on cooperation and coordination regarding selected areas in ABNJ in the North-East Atlantic in 2014 represents a significant step forward in this process (see also Chapter 2). The essential aim of the collective arrangement is to become a collective and multilateral *forum* composed of all competent entities addressing the management of human activities in this region.

By the end of 2018 the OSPAR Network of MPAs comprised 10 MPAs situated in areas beyond the limits of national EEZs, i.e. the High Seas, the Area and ECS areas (see Figure 1.7). It must be noted that the eleventh MPA, *North West Rockall SAC* (SAC - Special Area of Conservation), occurs partly within the EEZ and partly within the ECS of the UK. This MPA has been assigned to the UK national waters category in terms of number and area coverage and is only noted here for comprehensiveness.

The process of the establishment and nomination of MPAs in ABNJ is elaborated in the following sections as well as in Annex I and III.

[16] https://www.ospar.org/about/international-cooperation/collective-arrangement

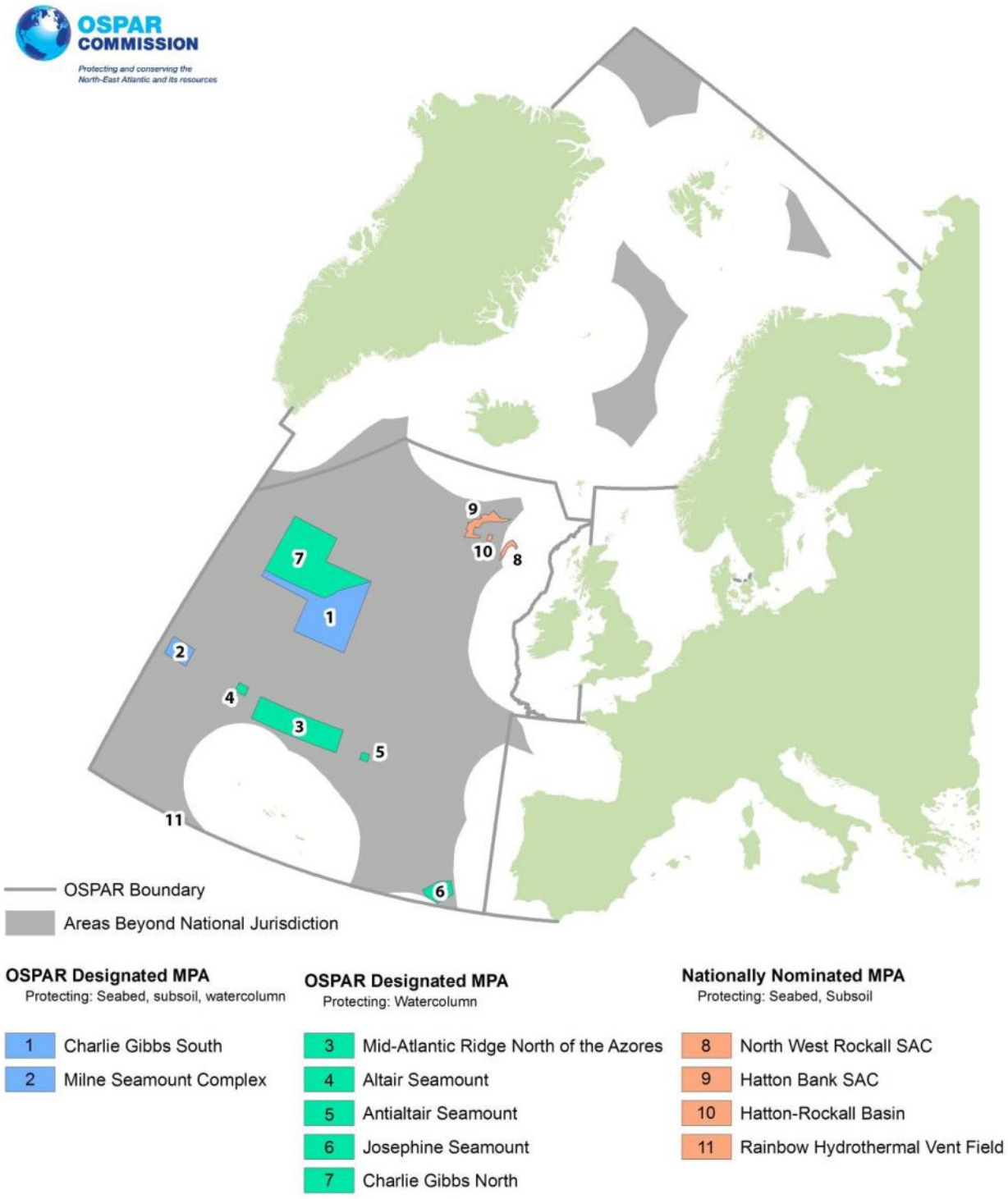

Figure 1.7. *OSPAR MPAs in areas beyond the limits of national EEZs (as of 1 October 2018)* [17]*.The colour category is intended to visualise the jurisdictional groupings of ABJN MPAs as in section 1.2.3. It should be noted that North West Rockall SAC is mainly located in EEZ area and is included in the figure for the sake of comprehensiveness and clarity.*

[17] The boundaries of CPs' EEZs have been obtained from the open source VLIZ Maritime Boundaries Geodatabase. It is noted, that not all of these boundaries as shown in the map have been officially declared by CPs.

1.2.2 Establishment and nomination of OSPAR MPAs in areas beyond the limits of national EEZs

A national OSPAR MPA nominated by Portugal in an area subject to a submission for an ECS

In 2006, and in response to a proposal previously prepared by WWF, Portugal formally nominated the *Rainbow Hydrothermal Vent Field* as an MPA to the OSPAR Network of MPAs. While this MPA has originally been considered to be situated in ABNJ, Portugal considered the site to be situated on its ECS, *i.e.* the natural submerged prolongation of the landmasses of the Azores Archipelago. While the case is still pending, Portugal recognised its obligations under UNCLOS Article 192 to protect and preserve the marine environment, as well as the precautionary principle, and assumed responsibility for protecting the seabed and the sub-soil even prior to the final conclusion of the UN CLCS on the ECS claims by Portugal. It has to be noted that this MPA encompasses only the seabed with no scientific case to extend the MPA to the water column.

OSPAR MPAs established collectively by all CPs in ABNJ/in the High Seas

At the OSPAR Ministerial Meeting in 2010 (20-24 September, Bergen/Norway) six proposals for OSPAR MPAs in ABNJ/in the High Seas were presented for adoption. The historical process of the elaboration of these proposals, including the collation and review of scientific information and data, the preparation of legal feasibility studies and consultations amongst CPs, is presented in Annex III. Taking into account the complex situation regarding the jurisdiction over these areas, the OSPAR Commission finally decided to collectively establish following MPAs in ABNJ/in the High Seas of the North-East Atlantic:

- *Charlie-Gibbs South MPA* 146,032 km²
- *Mid-Atlantic Ridge north of the Azores High Seas MPA* 93,570 km²
- *Milne Seamount Complex MPA* 20,914 km²
- *Josephine Seamount High Seas MPA* 19,363 km²
- *Altair Seamount High Seas MPA* 4,384 km²
- *Antialtair High Seas MPA* 2,807 km²

At the OSPAR Commission Meeting in 2012 (25-29 June 2012; Bonn/Germany) CPs further agreed to collectively establish the following MPA in the High Seas of the OSPAR Maritime Area:

- *Charlie-Gibbs North High Seas MPA* 178,094 km²

National OSPAR MPAs nominated by the United Kingdom in areas subject to a submission for an ECS

In 2011, the United Kingdom nominated *North West Rockall SAC* as an OSPAR MPA, of which parts (covering 181 km²) are extending beyond their EEZ into an area subject to a submission by the UK to the UN CLCS for an ECS. The seabed and subsoil of this site is protected by the UK, while the water column remains unprotected.

In 2012 and 2014, the United Kingdom nominated two more OSPAR MPAs (*Hatton Bank SAC* and *Hatton-Rockall Basin MPA*, respectively) entirely located in an area subject to a submission by the UK to the UN CLCS for an ECS[18]. The seabed and subsoil of these sites are protected by the UK, while the water column remains unprotected.

1.2.3 Jurisdiction of OSPAR MPAs in areas beyond the limits of national EEZs

The 10 OSPAR MPAs nominated until 1 October 2018 in areas beyond the limits of national EEZs of CPs, i.e. the High Seas, the Area, and ECS areas, can be grouped into different categories with regards to their jurisdictional regime:

1) Charlie-Gibbs South MPA and ***Milne Seamount Complex MPA***

These two MPAs are situated entirely in ABNJ. The seabed, the subsoil and the water column are protected collectively by all OSPAR CPs.

2) Mid-Atlantic Ridge north of the Azores High Seas MPA, Altair Seamount High Seas MPA, Antialtair High Seas MPA and ***Josephine Seamount Complex High Seas MPA***

These four MPAs are situated within an area subject to a submission by Portugal to the UN CLCS for an ECS. Portugal has expressed the intention to assume the responsibility to take measures for the protection of the seabed and the subsoil within these areas. Upon invitation by Portugal, the OSPAR Commission agreed to collectively protect the water column of these MPAs.

3) Charlie-Gibbs North High Seas MPA

This MPA is partly situated within an area subject to a submission by Iceland to the UN CLCS for an ECS. The water column is protected collectively by all CPs. The seabed and the subsoil remain unprotected.

4) Rainbow Hydrothermal Vent Field, Hatton Bank SAC and ***Hatton-Rockall Basin***

These MPAs are situated within areas subject to a submission by a CP to the UN CLCS for an ECS. The seabed and subsoil of these sites are protected by the respective CP, while the water column remains unprotected.

[18] Reservation of the Kingdom of Denmark: The area to which the UK nominations is sought to apply falls within the proposed outer limits of the Kingdom of Denmark in relation to the Faroe-Rockall Plateau, which consistent with paragraph 8 of Article 76 of UNCLOS and Article 4 of the Annex II thereto, have been submitted to the UN CLCS, and whose consideration is currently pending.

2 Ecological coherence of the OSPAR MPA network

2.1 Background

At the 2010 OSPAR Ministerial Meeting in Bergen, Norway, OSPAR Ministers committed to ensuring that by 2012[19] the OSPAR Network of Marine Protected Areas (MPAs) is ecologically coherent, includes sites representative of all biogeographic regions in the OSPAR Maritime Area, and is consistent with the Convention on Biological Diversity target for effectively conserved marine and coastal ecological regions.

The 2013 assessment of ecological coherence[20] was undertaken based on the OSPAR MPA network as it stood at the end of 2012. This showed some positive signs but concluded that the network was not yet ecologically coherent, and that further network development was required.

OSPAR (2006)[21] recommends that an assessment of MPA ecological coherence should be centred around five key principles: **'features', 'representativity', 'connectivity', 'resilience' and 'management'** (Box 1). Please note that work on assessing management progress is reported in Chapter 3 of this report. Since the 2013 assessment, the Intersessional Correspondence Group on Marine Protected Areas (ICG-MPA) have had in place a task group on ecological coherence (comprising representatives from UK, France, Germany and the Netherlands) to further develop criteria to assess ecological coherence.

Box 1 – OSPAR principles for assessing the ecological coherence of MPA networks

Features – MPAs should be designated in areas that best represent the range of habitats, species and ecological processes in the OSPAR Maritime Area. Proportions of features that should be protected by the MPA network may be higher for particularly threatened and/or declining features.

Representativity – MPAs should protect examples of the same features across their known biogeographical extent to reflect known sub-types. EUNIS Level 3 habitats are stated as a potentially useful way of characterising the OSPAR Maritime Area for the purposes of including biogeographic variation in the network.

Connectivity – In the absence of dispersal data, connectivity may be approximated by ensuring the MPA network is well distributed geographically. Where scientific understanding is further developed, the MPA network should reflect locations where a specific path between identified places is known (e.g. critical areas of a life cycle for a given species).

Resilience – Replication of features in separate MPAs in each biogeographic area is desirable where possible. The appropriate size of a site should be determined by the purpose of the site and be sufficiently large enough to maintain the integrity of the feature(s) for which it is selected.

Management (reported in Chapter 3) – OSPAR MPAs should be managed to ensure the protection of the features for which they were selected and to support the functioning of an ecologically coherent network.

[19] OSPAR Recommendation 2010/02 amending 2003/03 on a network of Marine Protected Areas - http://www.ospar.org/documents?d=32867

[20] Johnson *et al* (2013) - http://www.ospar.org/documents?d=7346

[21] OSPAR Recommendation 2006/03 on developing an ecologically coherent network of Marine Protected Areas - http://jncc.defra.gov.uk/pdf/06-03e_Guidance%20ecol%20coherence%20MPA%20network.pdf

The 'Madrid Criteria' were developed by the ICG-MPA task group on ecological coherence as an evolution of the three initial spatial tests defined in 2008[22]. The Madrid Criteria were designed to reflect the key network principles outlined in OSPAR (2006) whilst acknowledging limitations of data concerning OSPAR MPAs and target species and habitats. Box 2 lists the Madrid Criteria used for the current assessment of ecological coherence and the underlying OSPAR network principle(s) each one relates to.

Box 2 – The 'Madrid Criteria' for assessing the ecological coherence of the OSPAR MPA network

A: OSPAR MPAs are geographically well-distributed, with a maximum distance of up to 250km for nearshore/coastline, 500km for offshore and 1000km for the high seas areas between MPAs – links to OSPAR (2006) network principle of **connectivity**.

B: OSPAR MPAs, in combination with other relevant spatial measures as deemed appropriate, cover at least 10% in area of all Dinter biogeographic provinces – links to OSPAR (2006) network principle of **representativity**.

C: OSPAR MPAs represent all EUNIS Level 3 habitat classes and OSPAR threatened and/or declining (OSPAR T&D) species and habitats for which MPAs are considered appropriate more than once in all relevant Dinter biogeographic provinces a given feature is present – links to OSPAR (2006) network principles of **features** and **resilience**.

2.2 Summary of results

Application of the Madrid Criteria to the OSPAR MPA network as it stood at the end of 2018 illustrates that progress has been made in developing the network, but it cannot yet be considered to be ecologically coherent across the OSPAR Maritime Area.

The assessment against Madrid Criterion A (a proximity analysis of MPAs as a surrogate for the OSPAR MPA network principle of connectivity) suggests that the OSPAR MPA network is well distributed network in OSPAR Regions II (North Sea) and III (Celtic Seas); however, considerable gaps remain in OSPAR Regions I (Arctic) and V (Wider Atlantic) and a small gap further offshore in OSPAR Region IV (Bay of Biscay and The Iberian Coast). Future work should consider addressing these geographical gaps.

The assessment against Madrid Criterion B (percentage coverage of MPAs of at least 10 % of all the Dinter biogeographic provinces) shows that the 10%-target has been exceeded for six of the 19 provinces, and a further one has over 9 % coverage. At the other end of the scale four provinces have no OSPAR MPAs and a further four have less than 1 % surface coverage. These provinces are predominantly to the north of the OSPAR Maritime Area.

The assessment against Madrid Criterion C (protection of OSPAR Threatened and/or Declining species and habitats within OSPAR MPAs) shows that 14 of the 54 OSPAR Threatened and/or Declining habitats and species (where recommendations are in place) are protected within more than one MPA in the OSPAR Region(s) they are considered to be under threat/subject to decline. The 14 features which are considered sufficiently protected are 3 of 3 OSPAR Threatened and/or Declining invertebrates, 3 of 9 birds, 1 of 2 reptiles, 1 of 4 marine mammals, 1 of 20 fish and 5 of 16 habitats.

[22] OSPAR, 2008. Background document on three initial spatial tests used for assessing the ecological coherence of the OSPAR MPA network. OSPAR Commission, Publication number 2007/360. ISBN 978-1-905859-99-3

2.3 Criterion A: Geographical distribution of OSPAR MPAs

2.3.1 Proximity analysis of OSPAR MPAs

Madrid Criterion A shows how geographically well-distributed OSPAR MPAs are based on proximity analyses, with maximum distances set as no more than 250 km between nearshore/coastline OSPAR MPAs (within the territorial waters of Contracting Parties), 500 km for offshore OSPAR MPAs (within the Exclusive Economic Zones of Contracting Parties) and 1000 km for MPAs in Areas Beyond National Jurisdiction within the OSPAR Maritime Area. These figures have been derived from previous work to assess the ecological coherence of the OSPAR MPA network undertaken in 2013[23].

This first criterion is intended as a proxy to the OSPAR MPA network principle of connectivity. In the absence of dispersal data, or information on critical areas for the life cycle of a given species, connectivity may be approximated by ensuring the MPA network is well distributed in space[24].

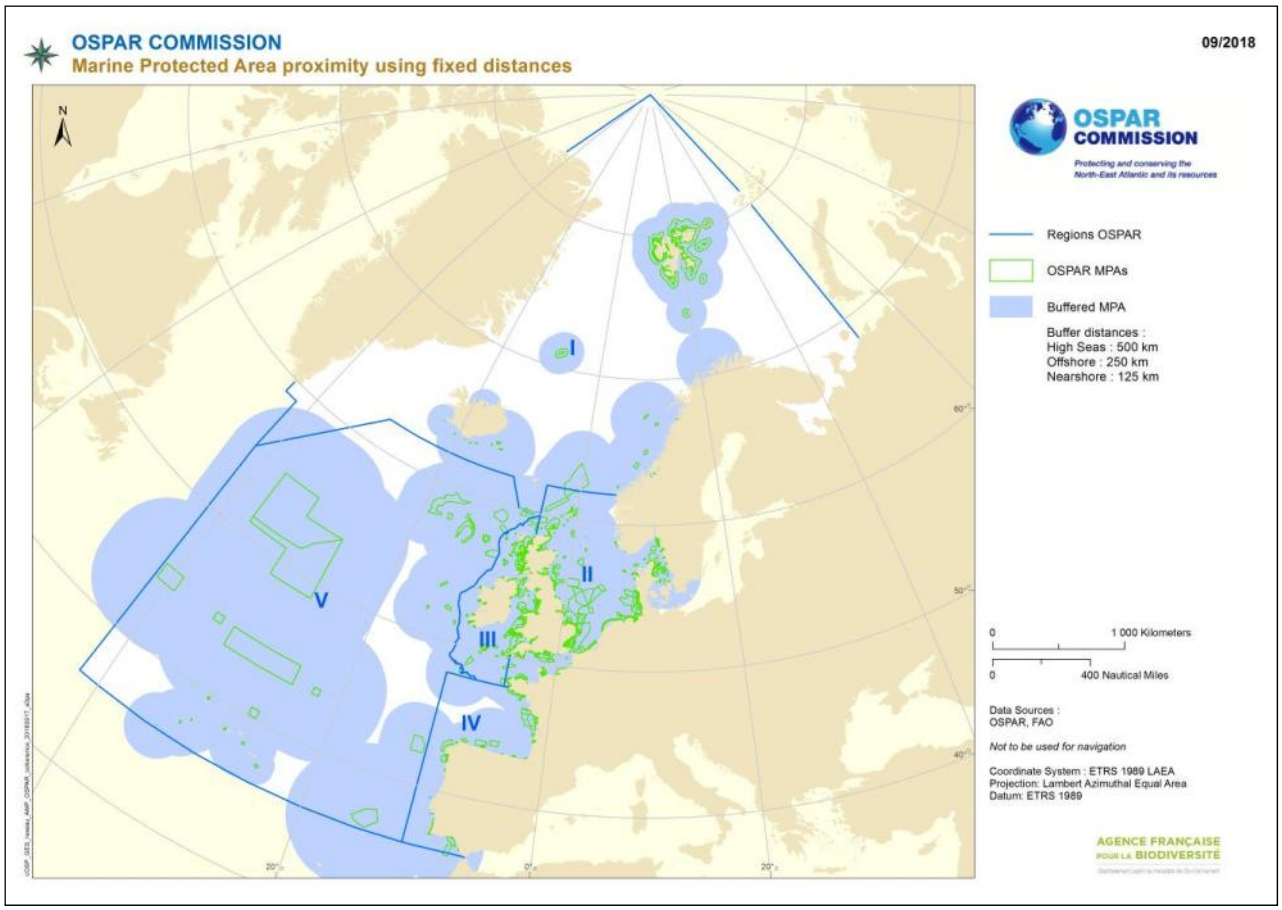

Figure 2.1. *Proximity analysis of OSPAR MPAs as a proxy for the OSPAR MPA network principle of connectivity. White areas indicate gaps in the MPA network according to Madrid Criterion A.*

Figure 2.1 presents the results of the application of Madrid Criterion A to the OSPAR MPA network as it stood at the end of 2018. Key observations from the information provided are that:

- In OSPAR Regions II (North Sea) and III (Celtic Seas) OSPAR MPAs are considered to be geographically well distributed.

[23] Johnson *et al* (2013) - http://www.ospar.org/documents?d=7346

[24] OSPAR Recommendation 2006/03 on developing an ecologically coherent network of Marine Protected Areas - http://jncc.defra.gov.uk/pdf/06-03e_Guidance%20ecol%20coherence%20MPA%20network.pdf

- In OSPAR Region IV (Bay of Biscay and The Iberian Coast) the geographical distribution of OSPAR MPAs has not changed since 2016, and therefore gaps still remain in the northwest of the region.
- In OSPAR Region V (Wider Atlantic), OSPAR MPAs in Areas Beyond National Jurisdiction (ABNJ) have contributed substantially to the network of MPAs. Gaps remain, however, in the southwest, south, north and east of the region.
- In OSPAR Region I (Arctic) there are considerable gaps remaining.

2.4 Criterion B: Coverage of OSPAR MPAs across biogeographic regions

Madrid Criterion B illustrates surface coverage of OSPAR MPAs across Dinter biogeographic provinces according to Dinter[25]. In contrast to the OSPAR Regions (I-V), the Dinter biogeographic provinces account for the ecological variations present in a geographical sense across the OSPAR Maritime Area. A map of the Dinter biogeographic provinces used in the assessment against Madrid Criteria B is provided in Figure 2.2.

The target under Madrid Criterion B is for 10% coverage across each Dinter biogeographic province. This has its foundations in the Convention on Biological Diversity Aichi Target 11, which calls for 10% of coastal and marine areas to be effectively conserved (although this target is not only related to MPA coverage). The results of the assessment against Madrid Criterion B are presented in Table 2.1.

It is important to note that the Dinter biogeographic classification is less detailed in the deep sea and therefore they do not characterise the biogeographic features of OSPAR Region V (Wider Atlantic) and part of Region I (Arctic). In addition, this analysis excludes the three (holo) pelagic regions because they fully overlap with the benthic regions.

[25] Dinter, W. 2001. Biogeography of the OSPAR Maritime Area. German Federal Agency for Nature Conservation, Bonn. 167 pp

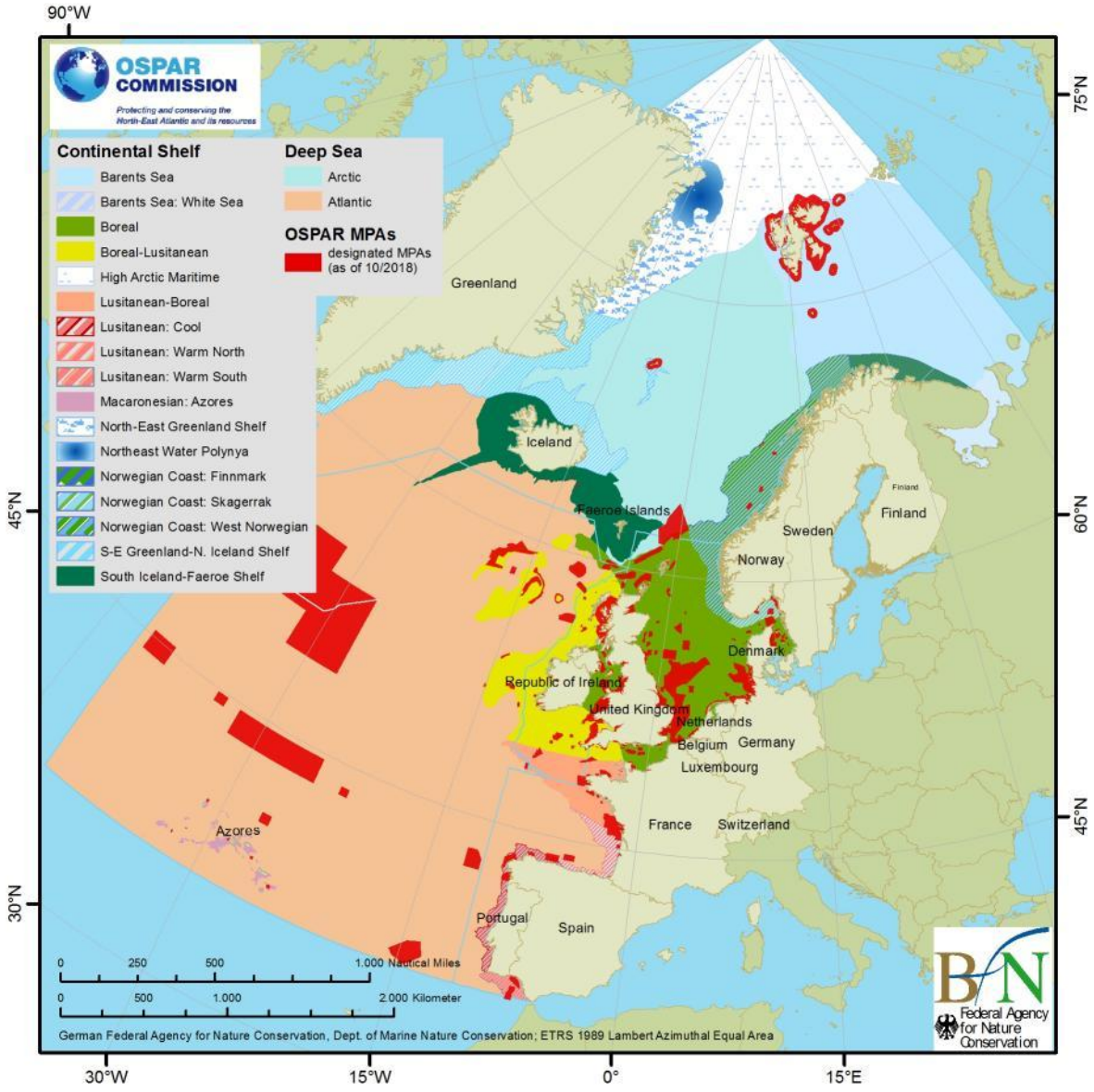

Figure 2.2. *Dinter biogeographic provinces and MPAs in the OSPAR maritime area.*

Table 2.1. *OSPAR MPA total surface area coverage[26] on the continental shelf & continental slope and deep-sea Dinter biogeographic provinces and regions*

Region	Sub-region	Province	Protected area (km²)	Total area (km²)	MPA coverage (%)
Continental shelf and continental slope					
Arctic		North-East Greenland Shelf	0	277,879	0.0
Arctic		Northeast Water Polynya	0	71,845	0.0
Arctic		High Arctic Maritime	11,099	809,874	1.4
Arctic		Barents Sea	67,229	1,158,371	5.8
Arctic		Barents Sea : White Sea	0	86,372	0.0
Arctic		S-E Greenland-N. Iceland Shelf	2,985	425,600	0.7
Atlantic	East Atlantic Temperate	Boreal	158,105	710,185	22.3
Atlantic	East Atlantic Temperate	Boreal-Lusitanean	57,083	455,947	12.5
Atlantic	East Atlantic Temperate	Lusitanean-Boreal	20,624	151,202	13.6
Atlantic	East Atlantic Temperate	Lusitanean : Cool	8,352	49,715	16.8
Atlantic	East Atlantic Temperate	Lusitanean : Warm North	4,287	44,481	9.6
Atlantic	East Atlantic Temperate	Lusitanean : Warm South	4,893	24,081	20.3
Atlantic	East Atlantic Temperate	Macaronesian : Azores	812	22,545	3.6
Atlantic	East Atlantic Temperate	Norwegian Coast : Finnmark	0	67,442	0.0
Atlantic	East Atlantic Temperate	Norwegian Coast : Skagerrak	3,325	23,937	13.9
Atlantic	East Atlantic Temperate	Norwegian Coast : West Norway	2,740	322,339	0.9
Atlantic	East Atlantic Temperate	South Iceland-Faeroe Shelf	566	306,382	0.2
Deep sea					
Arctic			20,772	2,235,011	0.9
Atlantic			498,523	6,995,730	7.2

Table 2.1 presents the results of the application of Madrid Criterion B to the OSPAR MPA network as it stood at the end of 2018. Key observations from the information provided are that:

- The 10 % coverage target has been met for six of the 19 Dinter Biogeographic Provinces/regions in the case of the continental shelf and slope of the OSPAR Maritime Area, all of them within the Eastern Atlantic Temperate sub-region.
- Another one of the 19 Dinter Biogeographic Provinces/regions exceeds 9 % in terms of surface coverage (the Lusitanean : Warm North province within the Eastern Atlantic Temperate sub-region) and another two exceeding 5 % coverage (the Barents Sea province and Atlantic deep-sea region).
- Four of the 19 OSPAR Dinter Biogeographic provinces/regions do not include any OSPAR MPAs (unchanged since 2016) and a further four have less than 1 % surface coverage. These provinces/regions are predominantly in the north of the OSPAR Maritime Area.

[26] Area calculations Projection EPSG 3035 (ETRS89 / ETRS-LAEA)

2.5 Criterion C: Representation and replication of marine habitats and species within OSPAR MPAs

Madrid Criterion C assesses the representation and replication of EUNIS Level 3 habitat classes and OSPAR Threatened and/or Declining habitats and species (where MPAs may be considered as part of the underlying recommendation). Although not a requirement, Marine Protected Areas are often listed in Recommendations as measures Contracting Parties should consider in furthering protection of OSPAR threatened and/or declining species and habitats.

Madrid Criterion C reflects the OSPAR (2006)[27] network principles of 'Features' (representing the range of habitats, species and ecological processes across the OSPAR Maritime Area), 'Representativity' (protecting features and EUNIS Level 3 habitats across their known geographic range), and 'Resilience' (protecting features in multiple MPAs).

At present the OSPAR MPA database is deficient in information regarding the protection of EUNIS Level 3 habitat type. There are also gaps regarding the protection of OSPAR T&D features and it has been necessary to use data on OSPAR T&D features considered to be present within MPAs as opposed to justifying the underlying designation. Therefore, a full assessment of Madrid Criterion C has not been possible. The indicative results presented in Tables 2.2 to 2.7 provide an overview of the protection of instances of each OSPAR threatened and/or declining habitat and species. This information also provides a connection to conservation measures reporting against the OSPAR recommendations for threatened and/or declining habitats and species.

The results of the assessment against Madrid Criterion C are presented in Tables 2.2-2.7 per feature group (invertebrates, birds, reptiles, marine mammals, fish and habitats). The three features where recommendations are still pending and the Dog Whelk (*Nucella lapillus*), where no recommendation is currently intended, have been excluded from the analysis as the potential suitability of MPAs as a tool to support their conservation has not been confirmed. The criterion is considered to be met when the feature is protected by more than one MPA in the OSPAR region(s) for which they are listed by OSPAR as being under threat/subject to decline. Features are counted if an MPA covers it in an area where the feature occurs also if it is not under threat and/or in decline in that Region, in such cases the tables can list a value greater than zero and still conclude that protection is not in place. Where a cell is greyed out, this indicates that the feature is not known to occur within that OSPAR region. A bold number indicates the feature is considered to be under threat/subject to decline in that particular region.

[27] OSPAR Recommendation 2006/03 on developing an ecologically coherent network of Marine Protected Areas - http://jncc.defra.gov.uk/pdf/06-03e_Guidance%20ecol%20coherence%20MPA%20network.pdf

Table 2.2. *OSPAR T&D invertebrate protection within MPAs across the OSPAR regions*[28].

OSPAR T&D invertebrate species	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
Arctica islandica **- Ocean quahog**	0	**19**	7	1		**Yes –** There is MPA replication in OSPAR region II where the feature is considered to be under threat/subject to decline
Megabalanus azoricus**- Azorean barnacle** *Recommendation pending*					**3**	**Non-applicable**
Nucella lapillus **- Dog whelk** *No Recommendation intended*	0	**4**	**0**	**6**	0	**Non-applicable**
Ostrea edulis - **Flat oyster**	0	**12**	2	4		**Yes –** There is MPA replication in OSPAR region II where the feature is considered to be under threat/subject to decline
Patella ulyssiponensis aspera - **Azorean limpet**					**3**	**Yes –** There is MPA replication in OSPAR region V where the feature is considered to be under threat/subject to decline

Table 2.3. *OSPAR T&D bird protection within MPAs across the OSPAR regions.*

OSPAR T&D bird species	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
Larus fuscus fucus **- Lesser black-backed gull**	**0**					**No –** There is no MPA protection in OSPAR Region I where it is considered to be under threat/subject to decline.
Pagophila eburnean**- Ivory gull**	**0**					**No –** There is no MPA protection in OSPAR Region I where it is considered to be under threat/subject to decline.
Polysticta stelleri **- Steller's eider**	**0**					**No –** There is no MPA protection in OSPAR Region I where it is considered to be under threat/subject to decline.
Puffinus assimilis baroli**- Little shearwater**					**4**	**Yes –** There is MPA replication in OSPAR Region V where the feature is considered to be under threat/subject to decline
Puffinus mauretanicus**- Balearic**		**5**	**1**	**17**	**0**	**No –** There is no MPA protection in OSPAR

[28] *Megabalanus azoricus* (Azorean barnacle) and *Nucella lapillus* (Dog whelk) not included because recommendations for these species are pending. *Patella ulyssiponensis aspera* – (Azorean limpet) not included because recommendation does not consider the use of MPAs.

shearwater						Region V and no replication in OSPAR Region III where the feature is considered to be under threat/subject to decline.
***Rissa tridactyla* - Black-legged kittiwake**	**0**	**36**	13	15	0	**No –** There is no MPA protection in OSPAR Region I where the feature is considered to be under threat/subject to decline.
***Sterna dougallii* - Roseate tern**		**9**	**2**	**5**	**4**	**Yes –** There is MPA replication in OSPAR Regions where the feature is considered to be under threat/subject to decline
***Uria aalge* - Iberian guillemot** (synonyms: *Uria aalge albionis, Uria aalge ibericus*)				**14**		**Yes –** There is MPA replication in OSPAR Regions where the feature is considered to be under threat/subject to decline
***Uria lomvia* - Thick-billed murre**	**0**	1		1		**No –** There is no MPA protection in OSPAR Region I where the feature is considered to be under threat/subject to decline.

Table 2.4. *OSPAR T&D reptile protection within MPAs across the OSPAR regions*

OSPAR T&D reptile species	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
***Caretta caretta* - Loggerhead turtle**		1	1	**3**	**5**	**Yes –** There is MPA replication in all OSPAR Regions the feature is considered to be under threat/subject to decline.
***Dermochelys coriacea* - Leatherback turtle**	**0**	**0**	**0**	**9**	**10**	**No –** There is no MPA protection in OSPAR Regions I, II & III where the feature is considered to be under threat/subject to decline.

Table 2.5. *OSPAR T&D mammal protection within MPAs across the OSPAR regions.*

OSPAR T&D mammal species	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
***Balaena mysticetus* - Bowhead whale**	**0**					**No –** There is no MPA protection in OSPAR Region I where it is considered to be under threat/subject to decline.
***Balaenoptera musculus* - Blue**	**0**	**0**	**0**	**0**	**5**	**No –** There is no MPA protection in OSPAR

whale						Regions I, II, III and IV where the feature is considered to be under threat/subject to decline.
***Eubalaena glacialis* - Northern right whale**	**0**	**0**	**0**	**0**	**1**	**No –** There is no MPA protection in OSPAR Regions I,II,III & IV, and no replication in OSPAR Region V where the feature is considered to be under threat/subject to decline.
***Phocoena phocoena* - Harbour porpoise**	0	**31**	**6**	10	1	**Yes –** There is MPA replication in all OSPAR Regions the feature is considered to be under threat/subject to decline.

Table 2.6. *OSPAR T&D fish protection within MPAs across the OSPAR regions.*

OSPAR T&D fish species	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
***Acipenser sturio* - Sturgeon**		**0**		**3**		**No –** There is no MPA protection in OSPAR Region II where the feature is considered to be under threat/subject to decline.
***Alosa alosa* - Allis shad**		**11**	**3**	**10**		**Yes –** There is MPA replication in all OSPAR Regions the feature is considered to be under threat/subject to decline.
***Anguilla Anguilla* - European eel**	**0**	**15**	**2**	**6**	1	**No –** There is no MPA protection in OSPAR Region I where the feature is considered to be under threat/subject to decline.
***Centrophorus granulosus* - Gulper shark**				**1**	**8**	**No –** There is no MPA replication in OSPAR Region IV where the feature is considered to be under threat/subject to decline.
***Centrophorus squamosus* - Leafscale gulper shark**	**0**	**0**	**0**	**1**	**8**	**No –** There is no MPA protection in OSPAR Regions I, II & III and no replication in OSPAR Region IV where the feature is considered to be under threat/subject to decline.
***Centroscymnus coelolepis* - Portuguese dogfish**	**0**	**2**	**1**	**2**	**8**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region III where the feature is considered to be under threat/subject to decline.

***Cetorhinus maximus* - Basking shark**	**0**	**1**	**2**[29]	**3**	**2**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region II where the feature is considered to be under threat/subject to decline.
***Coregonus lavaretus oxyrinchus* - Houting** *Recommendation pending*		**0**				**Non-applicable**
***Dipturus batis* - Common Skate**	**0**	**3**	**3**	**2**	**0**	**No –** There is no MPA protection in OSPAR Regions I & V where the feature is considered to be under threat/subject to decline.
***Gadus morhua* – Cod**	0	**12**	**0**	0	0	**No –** There is no MPA protection in OSPAR Region III where the feature is considered to be under threat/subject to decline.
***Hippocampus guttulatus* - Long-snouted seahorse**		**6**	**0**	**5**	**2**	**No –** There is no MPA protection in OSPAR Region III where the feature is considered to be under threat/subject to decline.
***Hippocampus hippocampus* - Short-snouted seahorse**		**7**	**0**	**5**	**0**	**No –** There is no MPA protection in OSPAR Regions III & V where the feature is considered to be under threat/subject to decline.
***Hoplostethus atlanticus* - Orange roughy**	**0**			1	**8**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region IV where the feature is considered to be under threat/subject to decline.
***Lamna nasus* - Porbeagle**	**0**	**2**	**1**	**1**	**1**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Regions III,IV & V where the feature is considered to be under threat/subject to decline.
***Petromyzon marinus* - Sea lamprey**	**0**	**18**	**7**	**8**		**No –** There is no MPA protection in OSPAR Region I where the feature is considered to be under threat/subject to decline.

[29] In 2018, the UK on behalf of the Isle of Man nominated five Marine Nature Reserves that are considered to afford protection to Basking shark (*Cetorhinus maximus*). Given that the Isle of Man has a relatively small marine area, and the mobile nature of Basking shark, it was decided that these five separate replicates should comprise one additional replicate for the protection of the feature for the purposes of this assessment.

Raja clavata **- Thornback ray**	**0**	**2**	**1**	**2**	**4**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region III the feature is considered to be under threat/subject to decline.
Raja montagui **- Spotted Ray**		**3**	**1**	**2**	**0**	**No –** There is no MPA protection in OSPAR Region V and no replication in OSPAR Region III where the feature is considered to be under threat/subject to decline.
Rostroraja alba **- White skate**		**0**	**0**	**0**	1	**No –** There is no MPA protection in OSPAR Regions II, III & IV and no MPA replication in OSPAR Region V where the feature is considered to be under threat/subject to decline.
Salmo salar **- Salmon**	**0**	**10**	**1**	**6**		**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region III where the feature is considered to be under threat/subject to decline.
Squalus acanthias **- [Northeast Atlantic] spurdog**	**0**	**3**	**1**	**1**	**1**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Regions III,IV & V where the feature is considered to be under threat/subject to decline.
Squatina squatina **- Angel shark**		**1**	**1**	**1**		**No –** There is no MPA replication in OSPAR Regions II,III & IV where the feature is considered to be under threat/subject to decline.
Thunnus thynnus **- Bluefin tuna** *Recommendation pending*				0	**0**	**None-applicable**

Table 2.7. *OSPAR T&D habitat protection within MPAs across the OSPAR regions.*

OSPAR T&D habitats	I - Arctic	II - Greater North Sea	III - Celtic Seas	IV - Bay of Biscay and Iberian coasts	V - Wider Atlantic	Protection in place
Carbonate mounds	0			1	**1**	**No –** There is no MPA replication in OSPAR Region V where the feature is considered to be under threat/subject to decline.
Coral gardens	**1**	**2**	**0**	**1**	**10**	**No –** There is no MPA protection in OSPAR Region III, and no replication in OSPAR Regions I & IV where the feature is

						considered to be under threat/subject to decline.
***Cymodocea* meadows**				**0**		**No –** There is no MPA protection in the OSPAR Region the feature is considered to be under threat/subject to decline.
Deep-sea sponge aggregations	**0**	**5**	**0**	**1**	**10**	**No –** There is no MPA protection in OSPAR Regions I and III, and no replication in OSPAR Region IV where the feature is considered to be under threat/subject to decline.
Intertidal mudflats	**1**	**26**	**16**	**11**		**No –** There is no MPA replication in OSPAR Region I where the feature is considered to be under threat/subject to decline.
Intertidal *Mytilus edulis* beds on mixed and sandy sediments		**14**	**6**	3		**Yes –** There is MPA replication in the OSPAR Regions the feature is considered to be under threat/subject to decline.
Littoral chalk communities		**6**	1			**Yes –** There is MPA replication in the OSPAR Region the feature is considered to be under threat/subject to decline.
***Lophelia pertusa* reefs**	**2**	**1**	**1**	**1**	**13**	**No –** There is no MPA replication in OSPAR Regions II, III & IV where the feature is considered to be under threat/subject to decline.
Maerl beds	0	13	**14**	6	0	**Yes –** There is MPA replication in the OSPAR Region the feature is considered to be under threat/subject to decline.
***Modiolus modiolus* beds**	**0**	**9**	**9**	**0**	**0**	**No –** There is no MPA replication in OSPAR Regions I, IV & V where the feature is considered to be under threat/subject to decline.
Oceanic ridges with hydrothermal vents/fields	0				**4**	**Yes –** There is MPA replication in the OSPAR Region the feature is considered to be under threat/subject to decline.
***Ostrea edulis* beds**		2	**1**	3		**No –** There is no replication in OSPAR Region III where the feature is considered to be under threat/subject to decline.
***Sabellaria spinulosa* reefs**	0	**8**	**0**	2	0	**No –** There is no MPA protection in OSPAR

						Region III where the feature is considered to be under threat/subject to decline.
Seamounts	**0**			**1**	**11**	**No –** There is no MPA protection in OSPAR Region I and no replication in OSPAR Region IV where the feature is considered to be under threat/subject to decline.
Sea-pen and burrowing megafauna communities	1	**13**	**15**	1	4	**Yes –** There is MPA replication in the OSPAR Regions the feature is considered to be under threat/subject to decline.
***Zostera* beds**	**1**	**27**	**21**	**12**		**No –** There is no MPA replication in OSPAR Region I where the feature is considered to be under threat/subject to decline.

Tables 2.2-2.7 present the results of the application of Madrid Criterion C to the OSPAR MPA network as it stood at the end of 2018. Key observations are that:

- 14 of the 54 OSPAR Threatened and/or Declining habitats and species (where recommendations are in place) are protected within more than one MPA in the OSPAR Region(s) they are considered to be under threat/subject to decline
- All OSPAR Threatened and/or Declining invertebrates where recommendations are in place are considered to be adequately represented and replicated within MPAs in the OSPAR regions they are considered to be under threat/subject to decline (Table 2.2).
- Three of the nine bird species listed by OSPAR as threatened and/or declining are considered to be adequately represented and replicated within MPAs in the OSPAR Regions they are considered to be under threat/subject to decline. Five of the other species lack representation and replication in OSPAR Region I where they are considered under threat/subject to decline and *Puffinus mauretanicus* lacks replication in OSPAR Region II (Table 2.3).
- Of the two species of turtle listed by OSPAR as Threatened and/or Declining, *Caretta caretta* is considered to be adequately represented and replicated within the OSPAR MPA network, but protection for *Dermochelys coriacea* is lacking in OSPAR Regions I, II and III (Table 2.4).
- Of the four species of marine mammal listed as threatened and/or declining, only *Phocoena phocoena* is considered to be adequately represented and replicated by the OSPAR MPA network and since 2016 protection measures have increased for the species in OSPAR Regions II & III where the species is considered to be under threat/subject to decline. Further consideration is required across all OSPAR Regions except for *Balaenoptera musculus* in OSPAR Region V where protection is considered to be adequate (Table 2.5).
- Only one of the 20 species of fish listed by OSPAR as threatened and/or declining (with recommendations in place) is considered to be adequately represented and replicated by the OSPAR MPA network. Attention is required across all OSPAR Regions to varying degrees. However, since 2016 *Anguilla Anguilla* and *Cetorhinus maximus* are now considered to be sufficiently replicated in OSPAR Region III where the features are considered to be under threat/subject to decline (Table 2.6).
- Five of the 16 habitats listed by OSPAR as threatened and/or declining are considered to be adequately represented and replicated by the OSPAR MPA network. OSPAR Region I is notably underrepresented. However, since 2016 Coral gardens, Intertidal mudflats and Zostera beds are now protected once in OSPAR Region I where they are considered under threat/subject to decline (Table 2.7).

2.6 Ecologically based assessment

According to the 2016 OSPAR MPA Status Report further work is required to improve the ecological and scientific robustness of the OSPAR eco-coherence assessment methodology. To improve future assessments several recommendations were proposed, including:

- Assessment of the contribution of 'other area-based measures' to the OSPAR MPA network;
- Development of a database on the distribution of OSPAR Threatened and/or Declining species across the OSPAR Maritime Area;
- Improvement of the understanding of the life history traits of OSPAR Threatened and/or Declining species;
- Using case-studies of connectivity to illustrate how the use of life-history trait information in combination with oceanographic modelling products can improve confidence in MPA network connectivity assessments; and

- Using pilot species to illustrate how connectivity analysis could be developed for highly mobile species based on the protection of critical areas to the life histories of these species.

To address these recommendations, an ecologically based assessment[30] was developed taking into consideration nine OSPAR Threatened/Declining (T/D) species. This assessment was then tested against the assessments used in this Status Report, which are based on Madrid Criterion A (proximity analysis of MPAs) and Madrid Criterion C (network principle of resilience). The life history trait based assessment considered dispersal capabilities, distribution and environmental circumstances present that either hamper or help species dispersal (for instance influence of currents, known pathways, habitat preferences etc.).

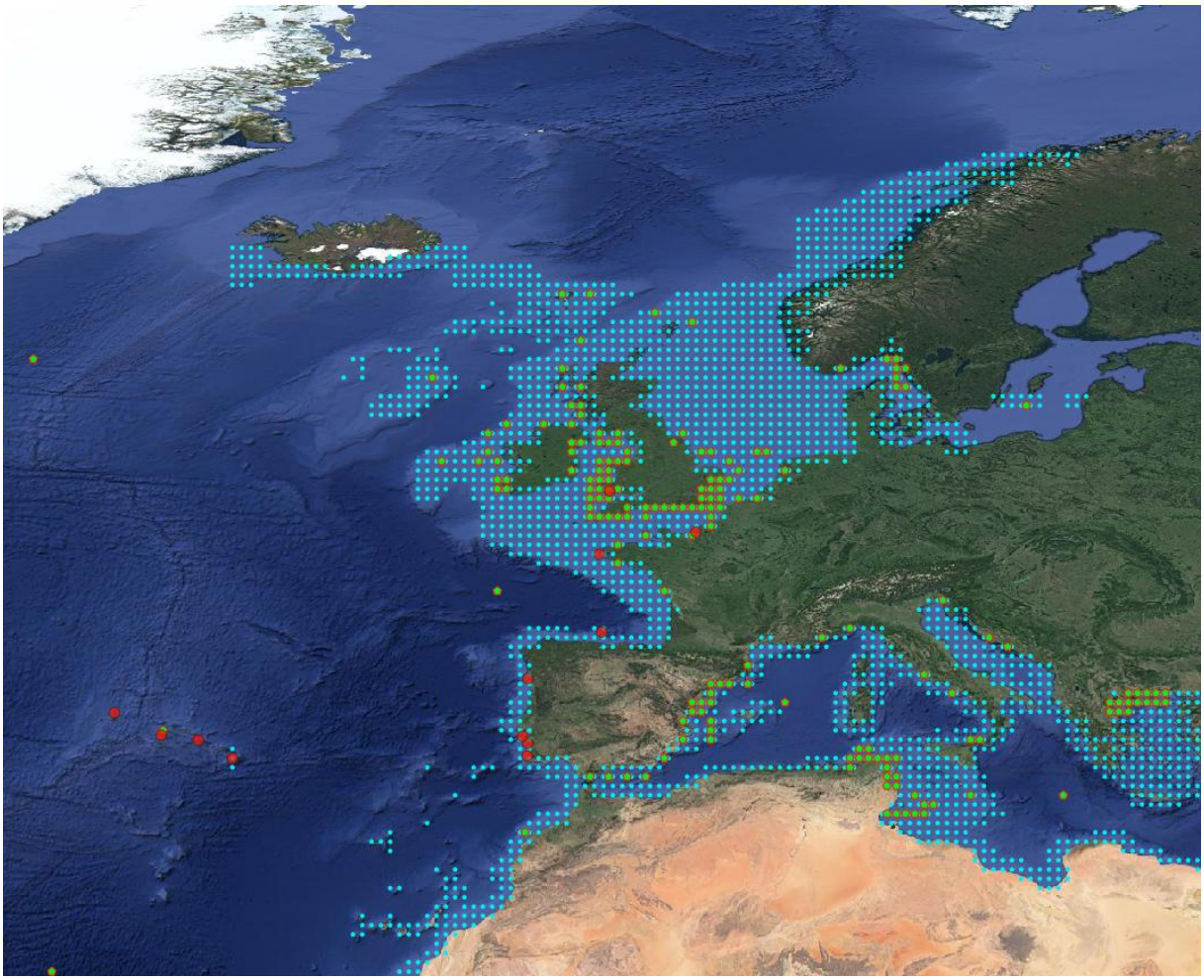

Figure 2.3*: Raja clavata MPAs and distribution. Central points of native range map (blue diamonds) according to http://www.fishbase.org/summary/Raja-clavata.html including points of high occurrences (red-lined green diamonds). Central points of 12 MPAs listed to harbour 'Raja clavata' (red dots).*

A result of comparing the distribution of a species and the distribution of the species' listed MPAs is the apparent disparity between them (for instance Fig. 2.3). From ecological knowledge on the species, a specific MPA-function can be discerned from the location of MPAs. From the selection of features that were studied, three functions of MPAs can be discerned: residences/seasonal occurrence areas, breeding areas and (part of) migration pathways. The MPA-function determines the form or distribution of MPAs needed:

a) Connectivity of MPAs which are 'breeding areas' should not be assessed by the distance between them. Since individuals move from surroundings to a breeding spot where they breed/lay

[30] Schellekens, T., Collins J. and Vanagt T. (2018) **Is assessment of connectivity of MPAs feasible and worth the effort when based on feature-specific biological dispersal distances?** eCOAST report 2018036-1

eggs/reproduce or foster their children and then move away again, there is no connectivity-need for areas of that same function. The importance of connectivity for 'breeding areas' is the connectivity with or for individuals residing in areas not used for that function. These individuals are often migratory in nature and few MPAs are put in place to protect them outside of their breeding areas. This restricts current assessment of connectivity of these MPAs. When MPAs would be put in place that protect these individuals in their residential area, or in other life-stages, the connectivity between those and the breeding areas would become relevant. Another function of MPAs imaginable (not found in the used selection of features) that would suffer from the same restriction in assessment are for instance 'moulting areas'.

b) MPAs which function as part of a 'migration pathways' or stepping stones should be connected to form a chain (distance measure is appropriate for successive MPAs) and not assessed based on the region in which they are located (as is done for Criterion C). One MPA in a certain region may in fact be sufficient for mobile features to follow their migration routes.

c) MPAs which function as 'residences/seasonal occurrence areas' should be connected with each another in a web-like network. Sedentary species or species with low dispersal that reside in the MPAs require evolutionary connectivity (over several generations) between MPAs. Migratory species that (seasonally) forage in the MPAs require ecological connectivity between these MPAs. Distance between MPAs can therefore be a simple measure to assess the need for more MPAs (as is done for Criterion A). Distribution of the species, however, contributes to the assessment of MPAs with this function. The more limited the distribution of a species, the more relevant an assessment of connectivity of the network of MPAs for this particular species becomes, because the protection in MPAs is more essential for the resilience of the species.

Identifying the MPA-function for a species enables to assess which species require further action to improve resilience and connectivity for that species. Distribution of both the species and the MPAs shed light on where these species will benefit from new MPAs to improve connectivity and resilience. In the report[31] this ecologically based assessment for Criteria A and C is shown for the nine selected species, resulting in species-specific recommendations. Given the need for information on life-history and distribution the ecologically based assessment is not yet feasible for all T/D features. Therefore, a complete ecologically based assessment is not yet possible.

A next step in the development of this ecologically based assessment is to compile the known MPA-functions for as many T/D features possible, using distribution of species and knowledge of life-history.
For every feature, the need for new MPAs can be assessed (as a replacement of the current assessment under Madrid Criterion C, resilience) and preferred areas for new MPAs can then be identified using dispersal capabilities of species. Furthermore, combining preferred areas for as many features as possible, assessment of the gaps in the MPA-network is enabled based on species-specific needs. This cannot only replace the current assessment of Criterion A (connectivity) based on a proximity analysis of all MPAs, it prioritises areas of interest based on the number of T/D features potentially benefiting from putting new MPAs in place.

2.7 Conclusions and next steps

Application of the Madrid Criteria to the OSPAR MPA network illustrates that considerable progress has been made in developing the network since the 2013 and 2016 assessments. However, the network cannot yet be considered to be ecologically coherent across the OSPAR Maritime Area (Tab. 2.8).

MPAs within OSPAR Regions II (Greater North Sea) and III (Celtic Seas) are considered to be geographically well distributed, but significant geographical gaps remain within the MPA network in OSPAR Regions I (Arctic) and V

[31] Schellekens, T., Collins J. and Vanagt T. (2018) Is assessment of connectivity of MPAs feasible and worth the effort when based on feature-specific biological dispersal distances? eCOAST report 2018036-1

(Wider Atlantic), and a smaller gap in OSPAR Region IV (Bay of Biscay and Iberian coasts). Six Dinter biogeographic provinces have exceeded the target of 10% MPA coverage, and another one has over 9% coverage. At the other end of the scale, four Dinter Biogeographic provinces do not contain any MPAs and a further four have less than 1% surface coverage. Fourteen of the 54 OSPAR Threatened and/or Declining habitats and species (where recommendations are in place) are protected within more than one MPA in the OSPAR Region(s) they are considered to be under threat/subject to decline. Work moving forward should focus on considering the nomination of further MPAs to OSPAR in Regions I, IV and V and in the more northerly Dinter biogeographic provinces. In addition, further work is required to identify MPAs for OSPAR Threatened and/or Declining habitats and species where MPAs are an appropriate conservation measure.

Table 2.8. *Overview of OSPAR MPA network assessment against Madrid Criteria. Colours indicate progress against Madrid Criteria targets (terracotta-poor/low; yellow-moderate/medium; light blue-good/high).*

	Region I	Region II	Region III	Region IV	Region V
A: OSPAR MPAs are geographically well-distributed, (connectivity)	Considerable gaps	Well distributed	Well distributed	Small gaps	Considerable gaps
B: OSPAR MPAs, cover at least 10% in area of all Dinter biogeographic regions	Arctic and Atlantic temperate Dinter regions have low to moderate coverage (range: 0-5.8%)	Boreal and Norwegian coast Dinter regions have a good coverage (range: 13.9-22.3%)	Boreal and Boreal-lusitanean Dinter regions have good coverage (range: 12.5-22.3%)	Lusitanean Dinter regions have a good coverage (range: 9.6-20.3%)	Atlantic Dinter regions have a moderate coverage (range: 3.6-7.2%)
C_a: OSPAR MPAs represent all EUNIS Level 3 habitat classes	Insufficient information in database	Insufficient information in database	Insufficient information in database	Insufficient information in database	Insufficient information in database
C_b: OSPAR MPAs represent OSPAR listed features where threatened	4% 0/5 bird species 0/3 mammals 0/11 fish 1/7 habitats	74% 3/3 invertebrates 3/3 birds 0/1 reptiles 1/3 mammals 13/19 fish 8/9 habitats	38% 0/1 invertebrate 1/2 birds 1/3 mammals 5/17 fish 6/11 habitats	63% 2/2 invertebrates 3/3 birds 2/2 reptiles 0/2 mammals 12/18 fish 3/8 habitats	66% 2/2 invertebrates 2/3 birds 3/4 mammals 7/13 fish 5/7 habitats

In addition, work is also required to improve the ecological and scientific robustness of the OSPAR eco-coherence assessment methodology in time for the next Quality Status Report. Specifically, the following work is recommended to improve the evidence base for future assessments:

- Updating the OSPAR MPA database:
    - with information on the protection of OSPAR Threatened and/or Declining habitats and species; and
    - with information on EUNIS Level 3 habitat protection;
- Building a better understanding of EUNIS level 3 habitat distribution across the OSPAR Maritime Area;
- Extend the approach taken in the ecologically based assessment of MPA network connectivity to identify all ecological functions of individual MPAs in order to compute minimum distances required between MPAs.

3 How well-managed are OSPAR MPAs?

3.1 Background

At the 2010 OSPAR Ministerial Meeting in Bergen, Norway, OSPAR Ministers committed to ensuring that by 2016 the OSPAR MPA network is well-managed; namely that coherent management measures have been set up and are being implemented to achieve the conservation objectives of the protected features of OSPAR MPAs.

The OSPAR Intersessional Correspondence Group on Marine Protected Areas (ICG-MPA) developed a questionnaire-based approach to assess the degree to which OSPAR MPAs are considered to be well-managed. Whilst there is no formal agreement on what constitutes 'well managed' in terms of an MPA – the questionnaire poses four key questions that reflect progress around the implementation cycle of an MPA:

- **A – Is MPA management documented?** This question explores whether information concerning the management of an OSPAR MPA has been published. Management in this context is interpreted as establishing the conservation objectives for protected features, documenting known pressures and threats that could affect protected features, listing management actions to address known pressures and threats, and finally showing spatial information on the distribution of protected features within a given OSPAR MPA.
- **B – Are measures to achieve conservation objectives being implemented?** This question explores whether specific management actions have been identified and put into place by site managers by a legal mechanism or other effective means to address known pressures and threats.
- **C – Is monitoring in place to assess if measures are working?** This question explores whether specific monitoring focussed on the ecological status of protected features of OSPAR MPAs has taken place, or as a minimum, having a means of monitoring the compliance of site users with implemented measures.
- **D – Is the MPA moving towards or has it reached its conservation objectives?** This question explores whether information collected on the ecological status of the protected features of OSPAR MPAs show the achievement, or indicate movement towards achieving, a site's conservation objectives.

The UK, on behalf of the *Ad Hoc* Task Group on Management, developed guidance in 2016 for Contracting Parties on how to complete the management questionnaire for OSPAR MPAs to aid consistency in the approach undertaken across Contracting Parties. Contracting Parties were asked to follow this approach in 2016, using the guidance provided, to answer each question with a *Yes*, *Partial*, *No* or *Unknown* response and to provide additional information as supplementary comments to help explain the response for each of their

OSPAR MPAs. The 2016 report is available online and reflects analysis of information on management status received from contracting parties for 448 OSPAR MPAs. Full management information was completed for 326 OSPAR MPAs, with partial information for a further 34. Note, to address some of the recommendations from the ICG-MPA on progressing management of OSPAR MPAs in Areas Beyond National Jurisdiction (ABNJ), the UK and Germany also provided management status information on these in the 2016 assessment.

In 2017 ICG-MPA agreed that management status reporting should be undertaken biennially in time to inform biennial status reports on the OSPAR MPA network and the same approach taken in 2016 was used for 2018 reporting (albeit with some adjustments to the reporting guidance to aid usability by Contracting Parties).

3.2 Results

This section sets out the results of the 2018 OSPAR management status assessment. As of 1st October 2018 there were 496 OSPAR MPAs to report management status for, including 31 new OSPAR MPA nominations submitted in 2017 and 2018. Full management information was received from contracting parties in October 2018 for 407 (82%) of these OSPAR MPAs and partial information was received for 34 (7%). No information was reported for the remaining 53 MPAs (representing 11% of the total). This equates to an overall increase in 9% on full management reporting since the 2016 reporting round, but acknowledging there are still gaps in reported information on which to assess MPA management status across the OSPAR Maritime Area.

Updated information was provided by Contracting Parties for 56% of OSPAR MPAs that were initially reported on for the 2016 data call. Overall, there has been some limited progression from the *no* or *unknown* response categories to the four questions towards *yes* and *partial* responses. The majority of updates however reflect changes or updates to the contextual information provided to support the interpretation of each response category, for example new documentation made publicly available in the support of MPA management. In response to the 2018 data call, no new information has been provided for OSPAR MPAs in Ireland, Netherlands, Portugal, Sweden or Iceland, nor for OSPAR MPAs in ABNJ.

The next section of this chapter provides an overall summary of OSPAR MPA management status across the four questions as a whole and in reference to key trends since the initial data call in 2016. This is then followed by a more detailed review of the responses against each of the four questions. Comparisons have been drawn with the management status reporting in 2016 to pull out any key observations. This chapter closes with key steps regarding ways to progress management of the OSPAR MPA network.

3.3 Summary

Figure 3.1 represents the '2018 OSPAR MPA Management Barometer': an indicator of the extent to which the OSPAR MPA network may be considered to be well-managed. This summary figure provides an overview of 'yes' and 'partial' responses to each of the four questions considered important in determining whether the OSPAR MPA network may be considered to be 'well-managed'.

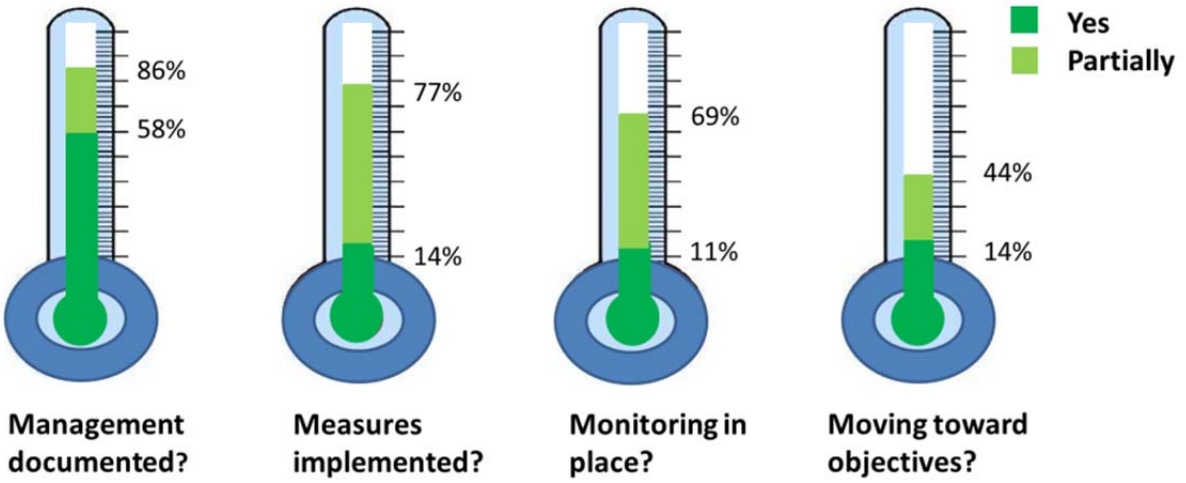

Figure 3.1. *The 2018 OSPAR MPA Management Barometer*

Figure 3.1 shows that the public documentation of management information is now either fully or partially in place for 86% of OSPAR MPAs; an increase in 9% since the 2016 assessment. There has also been an improvement in progress towards the implementation of management measures considered necessary to achieve the conservation objectives of MPAs across the Maritime Area; with yes responses to this question increasing from 12% in 2016 to 14% in 2018. There has been a notable increase in partial responses to this question too; with an increase from 54% in 2016 to 63% in 2018. Partial responses to monitoring programmes have shown a similar trend between 2016 and 2018. However, yes responses have slightly decreased between 2016 and 2018. Movement towards achieving conservation objectives has also taken place in the intervening reporting period, with an increase in 3% since 2016 responding with a yes to this question and an increase in 6% responding with a partial response. However, there still remains in 2018 a high proportion of 'unknown' responses (28%) to the achievement of conservation objectives because site-specific data on the ecological status of the protected features of OSPAR MPAs are not available.

To support a 'well-managed' OSPAR MPA network, work moving forward should continue to focus on the following:

- Implementation of management measures considered necessary to achieve the conservation objectives of the protected features of OSPAR MPAs;
- Establish and maintain long-term monitoring programmes to evaluate the effectiveness of such management measures to enable evidence-based assessments of feature condition and support greater confidence in the assessment of management status;
- Continue to improve methods of evaluating the degree to which the OSPAR MPA network is well-managed to support a more sophisticated assessment that can be fed into the OSPAR Quality Status Report 2023. This assessment should build on sound ecological data to determine whether the OSPAR MPA network is delivering a genuine conservation benefit to targeted habitats, species and ecological processes. It should also build on experience gained of undertaking previous assessments and where appropriate, guidance to Contracting Parties should be updated to usefully reflect lessons learned or changes in approach;
- For OSPAR MPAs in ABNJ, there should be continued effort to further the collective arrangement with competent management authorities such that all management recommendations for OSPAR MPAs in ABNJ might be implemented. In addition, Contracting Parties should continue to raise awareness of OSPAR MPAs in ABNJ with relevant stakeholders and interest groups and look to further our scientific understanding of these sites.

3.4 Question 1: Is MPA management documented?

This question explores whether information concerning the management of an OSPAR MPA has been published. Documenting 'management' in the context of this question refers to the publication of the following information:

- Conservation objectives for the protected features of the site;
- Identifying known pressures and threats to achieving those conservation objectives;
- Listing the actions and measures that may need to be undertaken to address those known pressures and threats; and
- Showing spatial information on the location/distribution of protected features within the site.

If all of this information has been published, a 'yes' response to this question can be given. If conservation objectives and known threats and pressures to achieving those conservation objectives have been published, a 'partial' response can be given; anything less receives a 'no' response. If the status of management information in the public domain is unknown, an 'unknown' response is given. A 'no response' is given where the information has not been reported to OSPAR.

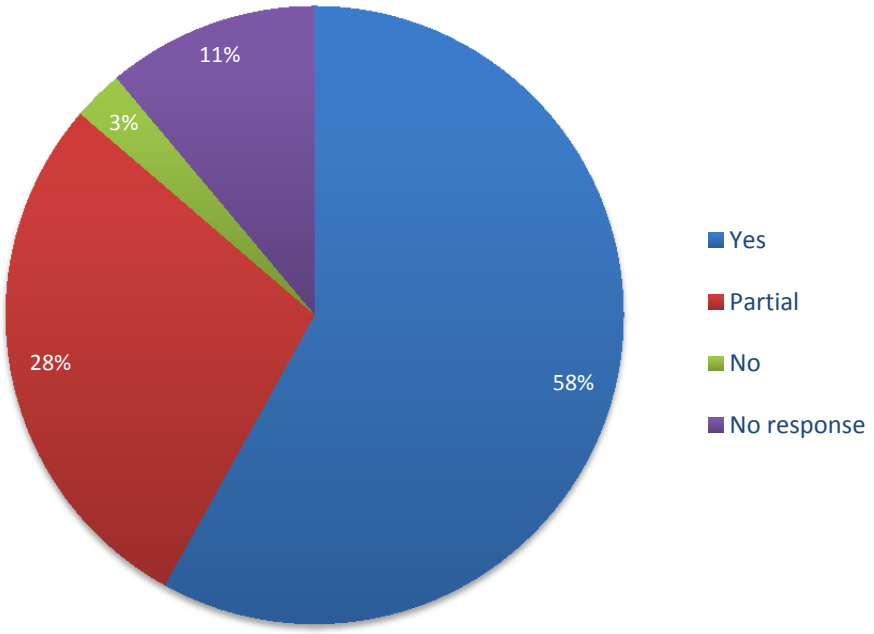

Figure 3.2. *OSPAR 2018 data call results to the question: 'Is the MPA management documented?'*

Figure 3.2 presents the results to the question 'Is the MPA management documented?' for the 496 OSPAR MPAs reported against in the 2018 MPA management data call. Key observations and in reference to the picture in 2016 are as follows:

- The proportion of OSPAR MPAs for which management has been fully documented has decreased by 3% since the 2016 assessment; attributable to new OSPAR MPA nominations since 2017 that are further behind in the MPA management cycle (discounting these new nominations would result in a 1% increase since 2016).
- For the majority of the OSPAR MPAs (58%), management is documented and in the public domain; namely information that includes protected feature conservation objectives, known threats and pressures assessed, actions identified that may be required to address known pressures and/or threats and information on the spatial extent of protected features within OSPAR MPAs.
- For those MPAs where a partial response was received (28%), the main reasons cited were that either conservation objectives are in the process of being revised or work is ongoing to identify the

management actions that may be required to address the known threats and/or pressures to the protected features of OSPAR MPAs. There is an increase of 12% since the 2016 data call in response to this question.

- For OSPAR MPAs where a 'no' response was provided (3%), comments indicated that this was because management plans are still being developed and not yet publicly available. This proportion has not changed since the 2016 data call.
- There were no 'unknown' responses reported to this question in both the 2016 and 2018 data calls.
- The number of OSPAR MPAs for which no responses were provided regarding the provision of management documentation has almost halved since 2016 (11% in 2018, compared with 20% in 2016).

3.5 Question 2: Are measures implemented?

This question explores whether the specific management actions identified by site managers to address known threats and pressures have been put into effect by a legal mechanism or other appropriate means.

If all specific management actions required to address known threats and pressures have been put into effect, a 'yes' response to this question is given. If only some of the specific management actions required have been put in place, a 'partial' response to this question applies. If none of the required specific management actions have been put in place, a 'no' response applies. 'Unknown' applies if the assessor is unsure on the status of management actions or if there are measures in place but it is unclear whether they address known threats and pressures to the protected features of the site. A 'no response' is given where no information has been reported.

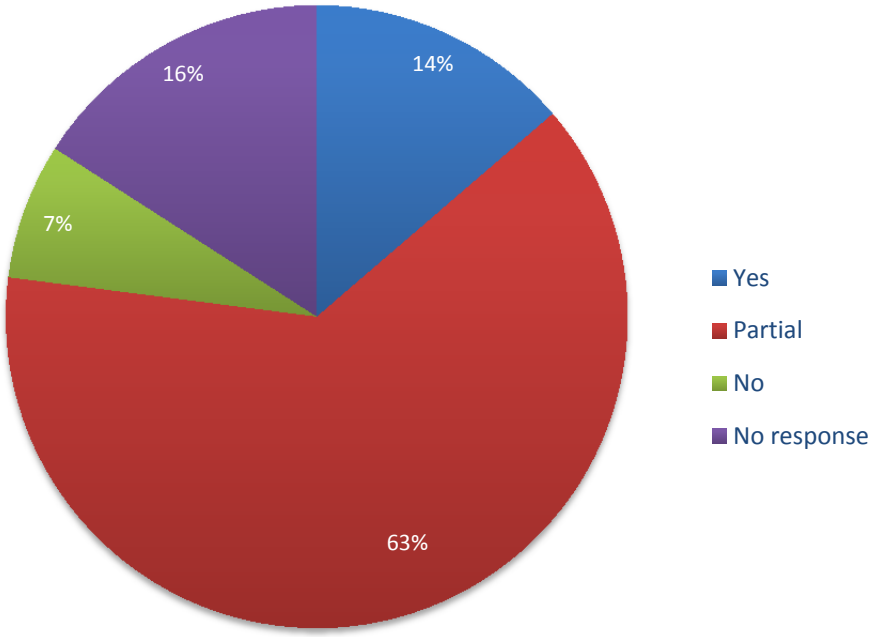

Figure 3.3. *OSPAR 2018 data call results to the question: 'Are the measures to achieve the conservation objectives being implemented?'*

Figure 3.3 presents the results to the question 'Are the measures to achieve the conservation objectives being implemented?' for the 496 OSPAR MPAs reported against in the 2018 MPA management data call. Key observations and in reference to the picture in 2016 are as follows:

- 14% of the OSPAR MPAs are considered to have all the management measures in place considered necessary to achieve the conservation objectives of their protected features. This is a slight increase in comparison to 12% in 2016.
- 63% of OSPAR MPAs have partially implemented management measures because work is ongoing to identify and implement measures for the management of non-licensable activities (particularly in relation to fishing activities). This has increased from 54% since 2016 reflecting progression in the implementation of management measures.
- For the 7% of OSPAR MPAs for which a 'no' response was provided, supporting comments suggest that some actions have been identified although not yet implemented. This is almost the same as the responses to the data call in 2016 (8%).
- There were no 'unknown' responses reported to this question in the 2018 or 2016 data calls.
- The number of OSPAR MPAs for which no information was provided by CPs has notably decreased (16% in 2018 compared to 26% in 2016).

3.6 Question 3: Is monitoring taking place?

This question explores whether specific monitoring has taken place that concentrates on the ecological status of protected features of OSPAR MPAs. Whilst monitoring will ideally focus on ecological monitoring, this question also acknowledges the role that monitoring compliance of site users with implemented measures can play in achieving a site's conservation objectives.

A 'yes' response shows that a regularly implemented monitoring programme is in place that covers all the protected features of an OSPAR MPA. If a monitoring programme only focuses on some of the protected features of an OSPAR MPA or monitoring is only based on site user compliance with implemented measures then a 'partial' response to this question is given. A 'no' response applies when there is no ecological status nor compliance monitoring in place for a given OSPAR MPA. 'Unknown' applies if the assessor is unsure on the status of monitoring for a given OSPAR MPA. A 'no response' is given where no information has been reported.

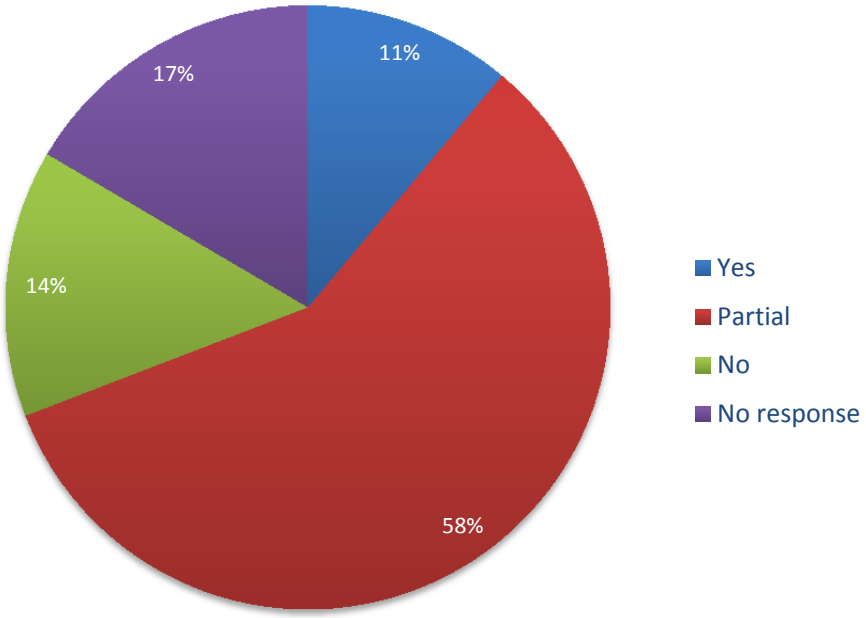

Figure 3.4. *OSPAR 2018 data call results to the question: 'Is monitoring in place to assess if measures are working?'*

Figure 3.4 presents the results to the question 'Is monitoring in place to assess if measures are working?' for the 496 OSPAR MPAs reported against in the 2018 MPA management data call. Key observations and in reference to the picture in 2016 are as follows:

- For 11% of OSPAR MPAs, yes responses were received; suggesting long-term ecological monitoring programmes are in place. This has decreased, albeit slightly, since 2016 (14%). This is not due to new OSPAR MPA nominations since 2017, but more likely a result of improvements in the guidance provided to Contracting Parties in reviewing their previous responses to this question.
- The proportion of OSPAR MPAs that received a partial response to whether monitoring is in place to assess whether management measures are working has increased by 12% to 58% in 2018. This response is predominantly driven by the fact that whilst there are mechanisms in place to monitor the compliance of site users with implemented measures, there is often not a regularly implemented programme to assess the ecological status of all the protected features of OSPAR MPAs. However, many cases noted that baseline ecological condition monitoring surveys have taken place and the on-going ecological condition of some protected features is being monitored. A key message is that resource constraints are cited as a significant barrier to the implementation of regular ecological monitoring programmes.
- 14% of OSPAR MPAs were reported as not yet having any monitoring in place and this is relatively unchanged since 2016 (13%). The reasons provided for there being no monitoring in place were insufficient time to put monitoring in place for recently designated MPAs, there being no dedicated site condition monitoring or the fact that wider MPA monitoring strategies are being developed to address monitoring needs for sites.
- The proportion of no responses to this question has remained similar as in 2016 (13%).
- There were no 'unknown' responses reported to this question based on the 2016 and 2018 data calls.
- The percentage of OSPAR MPAs for which responses were not provided has significantly decreased since 2016, with 17% of sites for which no responses were provided in 2018 compared to 27% in 2016.

3.7 Question 4: Are MPAs moving towards or have they reached their conservation objectives?

This question explores whether information collected on the ecological status of the protected features of OSPAR MPAs shows progress towards achieving a site's conservation objectives.

If the condition of all protected features of a given OSPAR MPA are improving or they have achieved their conservation objectives, then a 'yes' response is given. If some of the protected features of a given OSPAR MPA are improving in their condition or have achieved their conservation objectives whilst others remain static or are declining in their condition, a 'partial' response is appropriate. If available data suggest no indication of improvement in the condition of protected features or that some protected features may be declining in condition, a 'no' response is given. If there are no data available with which to make a judgement on the degree to which the conservation objectives of a given OSPAR MPA are being met then an 'unknown' response is given. A 'no response' is given where no information has been reported.

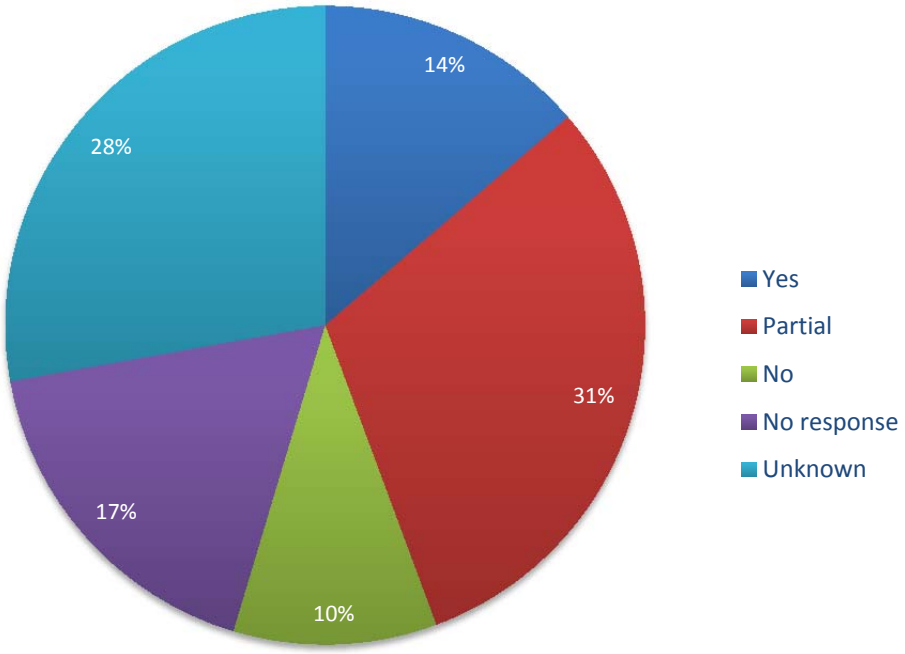

Figure 3.5. *OSPAR 2018 data call results to the question: 'Is the MPA moving towards or has it reached its conservation objectives?'*

Figure 3.5 presents the results to the question 'Is the MPA moving towards or has it reached its conservation objectives?' for the 496 OSPAR MPAs reported against in the 2018 MPA management data call. Key observations and in reference to the picture in 2016 are as follows:

- 14% of OSPAR MPAs are considered to have met their conservation objectives in 2018 compared to 11% in 2016. Responses were either based on outputs of direct site condition monitoring information or because assessments suggest that the protected features of OSPAR MPAs are already in favourable condition.
- Nearly a third of OSPAR MPAs (31%) are considered to be partially achieving their conservation objectives in 2018 compared to 25% in 2016. There are multiple reasons cited for a partial response:
    - Some of the protected features are considered to be meeting their conservation objectives based on the analysis of feature condition monitoring information whilst others are declining or remaining static in their condition;
    - Monitoring information has yet to be analysed for some of the protected features to make a judgement on the degree to which conservation objectives have been met; and
    - There is no direct site condition monitoring information available, but using information on the exposure of a feature to known pressures and/or threats as a proxy suggests all protected features of a given OSPAR MPA are likely to be meeting their conservation objectives.
- The proportion of OSPAR MPAs for which a no response was provided in 2018 (10%) has broadly stayed the same since 2016 (9%). Of the 10% of OSPAR MPAs for which a 'no' response was provided, comments indicated this was attributable to site condition monitoring information suggesting the conservation objectives of all protected features of a given OSPAR MPA are static or declining.
- Nearly one third of the responses (28%) to this question suggested it was 'unknown' as to whether the protected features of OSPAR MPAs are moving towards their conservation objectives which remained the same as in 2016. This conclusion is primarily attributed to no long-term ecological status information being available to make a judgement on the degree to which conservation objectives have been achieved.
- The percentage of OSPAR MPAs for which responses were not provided by CPs to this question has significantly decreased since 2016, with 17% of sites for which no responses were provided in 2018 compared to 27% in 2016.

3.8 OSPAR MPAs in Areas Beyond National Jurisdiction

As part of the OSPAR Convention, fifteen governments and the European Union cooperate to protect the marine environment across the North-East Atlantic, including in those Areas Beyond National Jurisdiction (ABNJ). OSPAR Contracting Parties have a collective responsibility to support the identification of OSPAR MPAs in ABNJ and to report annually to the OSPAR Commission on any specific actions that have been undertaken to implement the management actions identified for those sites.

The 2010 Ministerial Meeting of the OSPAR Commission designated six OSPAR MPAs in ABNJ (listed below) and adopted corresponding Recommendations for the management for each:

- Milne Seamount Complex MPA
- Charlie-Gibbs South MPA
- Altair Seamount High Seas MPA
- Antialtair Seamount High Seas MPA
- Josephine Seamount High Seas MPA
- MAR north of the Azores High Seas MPA

The Decisions designating these OSPAR MPAs came into force on 12th April 2011, as did their accompanying Recommendations. Decision 2012/1 of the OSPAR Convention resulted in the designation of a further OSPAR MPA in ABNJ – Charlie Gibbs North, which came into force on 14th January 2013, together with Recommendation 2012/1 on the management of this MPA.

- Charlie Gibbs North MPA

It is important to note that the OSPAR mandate specifically excludes the adoption of any management measures for the control of fishing, shipping or the extraction of mineral resources from the soil and subsoil of the seabed in ABNJ within the OSPAR Maritime Area; these activities are managed through specific management authorities. Consequently, the OSPAR Commission has sought to collaborate with the competent authorities such as the International Maritime Organisation (IMO), the North East Atlantic Fisheries Commission (NEAFC), the International Commission for the Conservation of Atlantic Tunas (ICCAT) and the International Seabed Authority (ISA).

To date, significant progress has only been made through the OSPAR Collective Arrangement with NEAFC, which was formally established in 2014. This agreement has resulted in the management of fishing activities in several OSPAR MPAs in ABNJ (Figure 3.6).

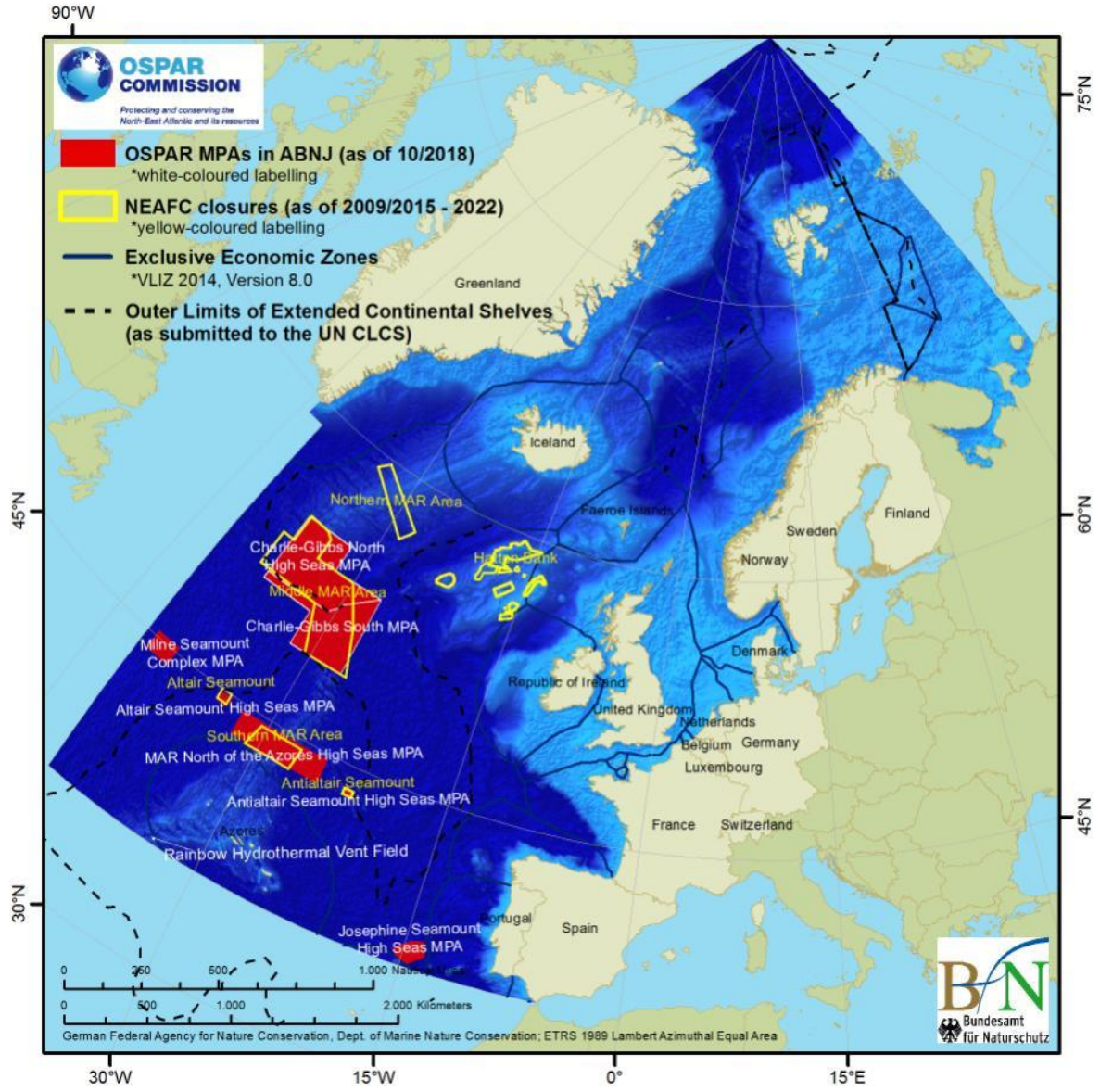

Figure 3.6. *OSPAR MPAs in Areas Beyond National Jurisdiction illustrating closed areas to bottom fishing as implemented by NEAFC.*

For OSPAR Contracting Parties in particular, key management actions in relation to OSPAR MPAs in ABNJ to date have involved the following types of activities:

- **Awareness raising -** *sharing information with relevant authorities, the general public and relevant organisations who may have a stake in a given OSPAR MPA in ABNJ*.
  Key activities include the creation of a website for the Charlie-Gibbs OSPAR MPA (Charlie-gibbs.org) and the integration of OSPAR MPAs in ABNJ into the navigational systems of relevant organisations (e.g. the Military sector).

- **Information building** – *facilitating the collection and sharing of information on the protected features of OSPAR MPAs in ABNJ and activities taking place*.
  Key activities include analysis of fishing activities in MPAs in ABNJ based on Vessel Monitoring System data.

- **Marine science** – *promoting the application of best-practice in terms of scientific research within OSPAR MPAs in ABNJ*.
  Key activities include the production, distribution and promotion of an OSPAR Code of Conduct for Marine Research (OSPAR agreement 2008-1) for those undertaking scientific research in OSPAR MPAs in ABNJ.

- **New developments** – *ensuring the implementation of new activities in an OSPAR MPA in ABNJ is considered in terms of its effects on the protected features of the site.*

Assessing how well-managed OSPAR MPAs in ABNJ are is a special case based on the information provided above. No new information on management status of ABNJs has been provided for this assessment based on no newly reported information since the 2016 data call.

3.9 Conclusions and next steps

The results of the 2018 assessment of the management status of OSPAR MPAs show that whilst there is progress on taking management action and implementing measures to achieve conservation objectives, such actions are largely only partially completed across the OSPAR Maritime Area; a similar picture emerged for the implementation of site condition monitoring for OSPAR MPAs. Consequently, the predominant response to whether OSPAR MPAs are moving towards achieving their conservation objectives is either 'partial' or 'unknown' and only 14% are moving towards or have achieved their conservation objectives because site-specific data on the ecological status of the protected features of OSPAR MPAs are not available.

Overall, there has been an increase in the completion of reporting across Contracting Parties, with a lower percentage of 'no response' to all of the management status questions. There are positive signs towards 'partial' or 'yes' responses to all management status questions since the 2016 assessment. However, there still remains in 2018 a high proportion of 'unknown' responses (28%) to the achievement of conservation objectives because site-specific data on the ecological status of the protected features of OSPAR MPAs are not available.

Work moving forward should focus on the implementation of all management measures which Contracting Parties feel are required to achieve the conservation objectives of the protected features of OSPAR MPAs within national jurisdiction. In parallel, long-term monitoring studies should also be established to evaluate the effectiveness of such management measures in order to state with greater confidence whether the conservation objectives of the protected features of OSPAR MPAs have been achieved. Work should also progress on improving methods of evaluating the degree to which the OSPAR MPA network is well-managed to support a more sophisticated assessment that can be fed into the OSPAR Quality Status Report 2023.

For OSPAR MPAs in ABNJs, efforts should continue to further collective arrangements with competent management authorities, such that all management recommendations for OSPAR MPAs in ABNJs will be implemented. In addition, Contracting Parties should continue to raise awareness of OSPAR MPAs in ABNJs with relevant stakeholders and interest groups and look to further our scientific understanding of these sites.

Annex I – List of OSPAR MPAs

(as of 1 October 2018)

CP	WDPAID	OSPAR MPA	Year of Reporting	Jur.	Area (km²)
ABNJ/High Seas	555512236	Antialtair Seamount High Seas MPA	2010	ABNJ	2807
	555512237	Altair Seamount High Seas MPA	2010	ABNJ	4384
	555512238	Josephine Seamount High Seas MPA	2010	ABNJ	19365
	555512239	Milne Seamount Complex MPA	2010	ABNJ	20914
	555512240	MAR North of the Azores High Seas MPA	2010	ABNJ	93572
	555512241	Charlie-Gibbs South High Seas MPA	2010	ABNJ	146029
	555557228	Charlie-Gibbs North High Seas MPA	2012	ABNJ	178094
Belgium	555557150	SBZ3	2012	TW	57
	555557219	Vlaamse Banken , SBZ 1 and SBZ2	2012	EEZ	433
	555557219	Vlaamse Banken , SBZ 1 and SBZ2	2012	TW	749
Denmark	555556910	Agger Tange, Nissum Bredning, Skibsted Fjord og Agerø	2009	TW	166
	555556912	Ålborg Bugt, østlige del	2009	EEZ	239
	555556912	Ålborg Bugt, østlige del	2009	TW	1542
	555556913	Ålborg Bugt, Randers Fjord og Mariager Fjord	2009	TW	617
	555556916	Anholt og havet nord for	2007	TW	112
	555556980	Ebbel ├©kkerev	2009	TW	1
	555556991	Farvandet nord for Anholt	2007	EEZ	2
	555556991	Farvandet nord for Anholt	2007	TW	348
	555557007	Gilleleje Flak og Tragten	2009	EEZ	22
	555557007	Gilleleje Flak og Tragten	2009	TW	26
	555557011	Gule Rev	2009	EEZ	429
	555557011	Gule Rev	2009	TW	44
	555557018	Havet og kysten mellem Hundested og Rørvig	2009	TW	14
	555557019	Havet omkring Nordre R ├©nner	2007	TW	186
	555557022	Herthas Flak	2007	TW	14
	555557023	Hesselø med omliggende stenrev	2007	EEZ	21
	555557023	Hesselø med omliggende stenrev	2007	TW	20
	555557024	Hirsholmene, havet vest herfor og Ellinge Å's udløb	2009	TW	91
	555557042	Jyske Rev, Lillefiskerbanke	2009	EEZ	242
	555557047	Kims Top og den Kinesiske Mur	2007	EEZ	262
	555557050	Knudegrund	2007	TW	8
	555557051	Kobberhage kystarealer	2009	TW	6
	555557055	Læsø Trindel og Tønneberg Banke	2007	EEZ	8
	555557055	Læsø Trindel og Tønneberg Banke	2007	TW	79
	555557056	Læsø, sydlige del	2007	EEZ	105

Denmark	555557056	Læsø, sydlige del	2007	TW	260
	555557070	Løgstør Bredning, Vejlerne og Bulbjerg	2009	TW	0
	555557071	Lønstrup Rødgrund	2007	TW	93
	555557077	Lysegrund	2007	TW	32
	555557100	Nissum Fjord	2009	TW	0
	555557139	Ringkøbing Fjord og Nymindestrømmen	2009	TW	0
	555557148	Sandbanker ud for Thorsminde	2007	TW	64
	555557149	Sandbanker ud for Thyborøn	2007	TW	64
	555557152	Schultz og Hastens Grund samt Briseis Flak	2007	EEZ	160
	555557152	Schultz og Hastens Grund samt Briseis Flak	2007	TW	49
	555557161	Skagens Gren og Skagerrak	2009	EEZ	1412
	555557161	Skagens Gren og Skagerrak	2009	TW	1285
	555557178	Store Middelgrund	2009	EEZ	21
	555557179	Store Rev	2009	EEZ	109
	555557181	Strandenge på Læsø og havet syd herfor	2007	TW	628
	555557193	Sydlige Nordsø	2007	EEZ	2437
	555557193	Sydlige Nordsø	2007	TW	36
	555557207	Thyborøn Stenvolde	2009	EEZ	42
	555557207	Thyborøn Stenvolde	2009	TW	37
	555557218	Vadehavet med Ribe Å, Tved Å og Varde Å vest for Varde	2009	TW	1137

France	555544124	Iroise	2008	TW	3431
	555544125	Baie de Somme	2006	TW	34
	555544126	Estuaire de la Seine	2007	TW	120
	555544127	Domaine de Beauguillot	2006	TW	5
	555544128	Baie de Saint-Brieuc	2006	TW	11
	555544129	Sept-Iles	2007	TW	4
	555544130	Moëze-Oléron	2007	TW	64
	555544131	Banc d'Arguin	2006	TW	25
	555544132	Baie de l'Aiguillon	2006	TW	25
	555556909	Abers - côtes des Légendes	2012	TW	227
	555556918	Archipel des Glénan	2012	TW	587
	555556920	Au droit de l'étang d'Hourtin-Carcans	2012	EEZ	5
	555556920	Au droit de l'étang d'Hourtin-Carcans	2012	TW	501
	555556922	Baie de Morlaix	2012	TW	266
	555556923	Baie de Seine occidentale	2012	TW	454
	555556925	Bancs des Flandres	2012	EEZ	216
	555556925	Bancs des Flandres	2012	TW	906
	555556926	Bassin d'Arcachon et Cap Ferret	2012	TW	227
	555556931	Belle Île en mer	2012	TW	174
	555556956	Côte Basque rocheuse et extension au Large	2012	TW	78
	555556957	Côte de Granit rose - Sept-Îles	2012	TW	721

a n	555556958	Côte de Granit rose - Sept-Iles	2012	TW	695

	555556989	Falaise du Bessin Occidental	2012	TW	13
	555557009	Golfe du Morbihan, côte Ouest de Rhuys	2012	TW	206
	555557033	Ile de Groix	2012	TW	284
	555557062	Littoral Cauchois	2012	TW	46
	555557079	Marais du Cotentin et du Bessin - Baie des Veys	2012	TW	287
	555557082	Massif dunaire Gavres-Quiberon et zones humides associées	2012	TW	68
	555557117	Panache de la Gironde	2012	EEZ	388
	555557117	Panache de la Gironde	2012	TW	565
	555557118	Panache de la Gironde et plateau rocheux de Cordouan	2012	EEZ	388
	555557118	Panache de la Gironde et plateau rocheux de Cordouan	2012	TW	565
	555557122	Pertuis charentais	2012	EEZ	1385
	555557122	Pertuis charentais	2012	TW	3177
	555557123	Pertuis charentais - Rochebonne	2012	EEZ	4967
	555557123	Pertuis charentais - Rochebonne	2012	TW	3228
	555557125	Plateau rocheux de l'île d'Yeu	2012	TW	120
	555557129	Portion du littoral sableux de la côte Aquitaine	2012	EEZ	5
	555557129	Portion du littoral sableux de la côte Aquitaine	2012	TW	501
	555557135	Récifs et marais arrière-littoraux du Cap Lévi à la Pointe de Saire	2012	TW	154
	555557141	Roches de Penmarc'h	2012	TW	458
	555557153	Secteur de l'île d'Yeu	2012	EEZ	704
	555557153	Secteur de l'île d'Yeu	2012	TW	1752
	555557196	Tatihou - Saint-Vaast-la-Hougue	2012	TW	8
	555557212	Trégor Goëlo	2012	TW	910
	555557229	Estuaire de la Seine	2012	TW	85
	555557232	Trégor Goëlo	2012	TW	912

Germany	555556937	Borkum-Riffgrund	2008	EEZ	625
	555556937	Borkum-Riffgrund	2008	TW	0
	555556969	Doggerbank	2008	EEZ	1696
	555557099	Niedersächsisches Wattenmeer	2006	TW	3458
	555557145	S-H Seabird Protection Area	2005	EEZ	2
	555557145	S-H Seabird Protection Area	2005	TW	1616
	555557146	S-H Wadden sea National Park	2005	EEZ	0
	555557146	S-H Wadden sea National Park	2005	TW	4602
	555557194	Sylt.Aussenr.-Oestl.Dt.Bucht	2008	EEZ	5600
	555557194	Sylt.Aussenr.-Oestl.Dt.Bucht	2008	TW	0

Iceland	555556983	Eldey	2012	TW	14
	555557025	Hornarfjardardjup, coral reef 1	2008	EEZ	8
	555557026	Hornarfjardardjup, coral reef 2	2008	EEZ	37

	555557031	Hverastrytur i Eyjafirdi	2008	TW	0
	555557032	Hverastrytur i Eyjafirdi, north of Arnanesn ├Âfum	2008	TW	1
	555557137	Reynisdjup, coral reef	2008	TW	9
	555557159	Skaftardjup, coral reef 1	2008	EEZ	7
	555557160	Skaftardjup, coral reef 2	2008	EEZ	22
	555557190	Surtsey	2012	TW	66
	555586883	Lónsdjúp	2014	EEZ	77
	555586884	Lónsdjúp-Papagrunn landgrunnskantur	2014	EEZ	78
	555586885	Papagrunn	2014	EEZ	17
	555586886	Rósagarður	2014	EEZ	164
	555586887	Skeiðarárdjúp	2014	EEZ	65

Ireland	555556924	Ballyness Bay	2009	TW	12
	555556930	Belgica Mound Province	2009	EEZ	411
	555556936	Blasket IslandS	2009	TW	227
	555556962	Cummeen Strand/Drumcliff Bay (Sligo Bay)	2009	TW	49
	555556975	Dundalk Bay	2009	TW	52
	555557005	Galway Bay Complex	2009	TW	144
	555557027	Hovland Mound Province	2009	EEZ	1086
	555557044	Kenmare River	2010	TW	433
	555557045	Kilkieran Bay and Islands	2010	TW	213
	555557048	Kingstown Bay	2009	TW	1
	555557078	Malahide Estuary	2009	TW	8
	555557096	Mullet/Blacksod Bay Complex	2009	TW	141
	555557097	Mulroy Bay	2009	TW	32
	555557103	North-West Porcupine Bank	2009	EEZ	715
	555557106	North Dublin Bay	2010	TW	15
	555557140	Roaringwater Bay and Islands	2009	TW	143
	555557168	South-West Porcupine Bank	2009	EEZ	329
	555557210	Tralee Bay and Magharees Peninsula, West To Cloghane	2009	TW	116
	555557211	Tramore Dunes and Backstrand	2009	TW	8

Netherlands	555557049	Klaverbank	2009	EEZ	1240
	555557101	Noordzeekustzone	2009	TW	1416
	555557220	Vlakte van de Raan	2009	TW	199
	555557221	Voordelta	2009	TW	819
	555557231	Doggerbank	2009	EEZ	4698

Norway	156009	Jomfruland	2018	TW	117
	183284	Raet	2018	TW	608
	555556934	Bjørnøya	2009	EEZ	20
	555556934	Bjørnøya	2009	TW	2786

	555556940	Breisunddjupet	2012	EEZ	21
	555556940	Breisunddjupet	2012	TW	44
	555557040	Iverryggen	2005	EEZ	623
	555557041	Jan Mayen	2012	EEZ	77
	555557041	Jan Mayen	2012	TW	4242
	555557052	Korallen	2012	TW	4
	555557142	Røstrevet	2005	EEZ	331
	555557155	Selligrunnen	2005	TW	1
	555557185	Sularevet	2005	EEZ	981
	555557185	Sularevet	2005	TW	12
	555557191	Svalbard East	2009	EEZ	115
	555557191	Svalbard East	2009	TW	55331
	555557192	Svalbard West	2009	EEZ	53
	555557192	Svalbard West	2009	TW	20022
	555557208	Trænarevet	2012	EEZ	445
	555557227	Ytre Hvaler	2010	TW	340
	555560032	Færder	2018	TW	340
	555592852	Saltstraumen	2013	TW	25
	555592853	Tauterryggen	2013	TW	44
	555592854	Framvaren	2013	TW	6
	555625764	Gaulosen	2016	TW	11
	555625765	Jærkysten	2016	TW	143
	555625766	Rødberg	2016	TW	14

Portugal	555556955	Corvo Island	2006	TW	257
	555556963	D. João de Castro seamount	2006	EEZ	354
	555556986	Faial-Pico Channel	2006	TW	240
	555557000	Formigas Bank	2006	TW	524
	555557074	Lucky Strike hydrothermal vent	2006	EEZ	191
	555557084	Menez Gwen hydrothermal vent field	2006	EEZ	95
	555557131	Rainbow hydrothermal vent field	2006	ABNJ	22
	555557154	Sedlo Seamount	2007	EEZ	4016
	555599535	Berlengas	2015	TW	96
	555599536	Lagoas de Santo Andre e Sancha (area maritima)	2015	TW	21
	555599537	Arrabida (area maritima)	2015	TW	53
	555599538	Litoral Norte (area maritima)	2015	TW	74
	555599539	Sudoeste Alentejano e Costa Vicentina (area maritima)	2015	TW	290

Spain	555556982	El Cachucho	2008	EEZ	2395
	555557037	Islas Atlanticas	0	TW	85
	555583112	Espacio marino de la Ria de Mundaka-Cabo de Ogoño	2014	TW	175
	555583113	Espacio marino de los Islotes de Portios - Isla Conejera - Isla de Mouro	2014	TW	15

	555583114	Espacio marino de Cabo Peñas	2014	TW	320
	555583115	Espacio marino de Punta de Candelaira - Ria de Ortigueira - Estaca de Bares	2014	TW	771
	555583116	Espacio marino de la Costa de Ferrolterra – Valdoviño	2014	TW	68
	555583117	Espacio marino de la Costa da Morte	2014	EEZ	533
	555583117	Espacio marino de la Costa da Morte	2014	TW	2627
	555583118	Banco de Galicia	2016	EEZ	10227
	555583119	Espacio marino de las Rias Baixas de Galicia	2014	EEZ	507
	555583119	Espacio marino de las Rias Baixas de Galicia	2014	TW	1713
	555583120	Golfo de Cadiz	2014	EEZ	840
	555583120	Golfo de Cadiz	2014	TW	1477
	555583121	Espacio marino del Tinto y del Odiel	2014	TW	49
	555583122	Espacio marino de la Bahia de Cadiz	2014	TW	36
	555593028	Volcanes del fango del Golfo de Cadiz	2016	EEZ	2433
	555593029	Sistema de cañones submarinos de Avilés	2016	EEZ	2141
	555593029	Sistema de cañones submarinos de Avilés	2016	TW	1247
Sweden	555556939	Bratten	2012	EEZ	1160
	555556939	Bratten	2012	TW	48
	555556997	Fladen	2006	EEZ	8
	555556997	Fladen	2006	TW	96
	555557012	Gullmarsfjorden	2006	TW	114
	555557020	Havstensfjord	2012	TW	19
	555557053	Kosterfjorden-Väderöfjorden	2006	TW	592
	555557054	Kungsbackafjorden	2006	TW	79
	555557059	Lilla Middelgrund	2006	EEZ	89
	555557059	Lilla Middelgrund	2006	TW	89
	555557094	Morups bank	2010	TW	6
	555557102	Nordre älvs estuarium	2006	TW	71
	555557177	Stora Middelgrund och Röde bank	2008	EEZ	114
United Kingdom	555556911	Ailsa Craig	2011	TW	27
	555556914	Alde Ore and Butley Estuaries	2005	TW	11
	555556915	AldeÔÇô-Ore Estuary	2011	TW	11
	555556917	Anton Dohrn Seamount	2012	EEZ	1429
	555556919	Ascrib, Isay and Dunvegan	2005	TW	26
	555556921	Bae Caerfyrddin / Carmarthen Bay	2011	TW	334
	555556927	Bassurelle sandbank	2011	EEZ	67
United Kingdom	555556928	Belfast Lough Open Water	2011	TW	56
	555556929	Belfast Lough	2011	TW	3
	555556932	Benfleet and Southend Marshes	2011	TW	20
	555556933	Berwickshire and North Northumberland Coast	2005	TW	650
	555556935	Blackwater Estuary (Mid-Essex Coast Phase 4)	2011	TW	26

	555556938	Braemar Pockmarks	2018	EEZ	11
	555556941	Breydon Water	2011	TW	5
	555556942	Buchan Ness to Collieston Coast	2011	TW	53
	555556943	Burry Inlet	2011	TW	48
	555556944	Calf of Eday	2011	TW	25
	555556945	Canna and Sanday	2011	TW	54
	555556946	Cape Wrath	2011	TW	58
	555556947	Cardigan Bay / Bae Ceredigion	2005	TW	952
	555556948	Carlingford Lough	2011	TW	5
	555556949	Carmarthen Bay and Estuaries / Bae Caerfyrddin ac Aberoedd	2005	TW	632
	555556950	Chesil and the Fleet	2005	TW	12
	555556951	Chesil Beach and The Fleet	2018	TW	5
	555556952	Chichester and Langstone Harbours	2011	TW	51
	555556953	Colne Estuary (Mid-Essex Coast Phase 2)	2011	TW	12
	555556954	Copinsay	2011	TW	35
	555556959	Croker Carbonate Slabs	2012	EEZ	66
	555556959	Croker Carbonate Slabs	2018	EEZ	3
	555556959	Croker Carbonate Slabs	2018	EEZ	113
	555556960	Cromarty Firth	2011	TW	36
	555556961	Crouch and Roach Estuaries (Mid-Essex Coast Phase 3)	2011	TW	6
	555556964	Darwin Mounds	2008	EEZ	1380
	555556965	Deben Estuary	2011	TW	8
	555556966	Dee Estuary / Aber Dyfrdwy	2008	TW	135
	555556967	Dengie (Mid-Essex Coast Phase 1)	2011	TW	25
	555556968	Dogger Bank	2011	EEZ	12337
	555556971	Dornoch Firth and Loch Fleet	2011	TW	54
	555556972	Dornoch Firth and Morrich More	2005	TW	69
	555556973	Drigg Coast	2005	TW	7
	555556976	East Caithness Cliffs	2011	TW	114
	555556977	East Mingulay	2012	TW	115
	555556978	East Rockall Bank	2012	EEZ	3698
	555556979	East Sanday Coast	2011	TW	13
	555556981	Eileanan agus Sgeiran Lios mór	2005	TW	11
	555556984	Essex Estuaries	2005	TW	383
	555556985	Exe Estuary	2011	TW	19

United Kingdom	555556987	Fair Isle	2011	TW	63
	555556988	Fal and Helford	2005	TW	62
	555556990	Faray and Holm of Faray	2005	TW	7
	555556992	Fetlar	2011	TW	144
	555556993	Firth of Forth	2011	TW	61
	555556994	Firth of Lorn	2005	TW	210

	555556995	Firth of Tay & Eden Estuary	2011	TW	66
	555556996	Firth of Tay & Eden Estuary	2005	TW	151
	555556998	Flamborough Head	2005	TW	62
	555556999	Flannan Isles	2011	TW	58
	555557001	Forth Islands	2011	TW	97
	555557002	Foula	2011	TW	67
	555557003	Foulness (Mid-Essex Coast Phase 5)	2011	TW	97
	555557004	Fowlsheugh	2011	TW	13
	555557006	Gibraltar Point	2011	TW	2
	555557008	Glannau Môn: Cors heli / Anglesey Coast: Saltmarsh	2005	TW	9
	555557010	Gruinart Flats, Islay	2011	TW	10
	555557013	Haig Fras	2008	EEZ	476
	555557014	Haisborough, Hammond and Winterton	2011	EEZ	871
	555557014	Haisborough, Hammond and Winterton	2011	TW	598
	555557015	Hamford Water	2017	TW	26
	555557016	Handa	2011	TW	29
	555557017	Hatton Bank	2012	ABNJ	15722
	555557021	Hermaness, Saxa Vord and Valla Field	2011	TW	52
	555557028	Hoy	2011	TW	88
	555557029	Humber Estuary	2008	TW	336
	555557030	Humber Estuary	2011	TW	337
	555557034	Inner Clyde Estuary	2011	TW	17
	555557035	Inner Dowsing, Race Bank and North Ridge	2011	EEZ	501
	555557035	Inner Dowsing, Race Bank and North Ridge	2011	TW	345
	555557036	Inner Moray Firth	2011	TW	21
	555557038	Isle of May	2005	TW	3
	555557039	Isles of Scilly Complex	2005	TW	267
	555557043	Kenfig / Cynffig	2005	TW	3
	555557046	Killough Bay	2011	TW	1
	555557057	LandÔÇÖs End and Cape Bank	2011	EEZ	0
	555557057	LandÔÇÖs End and Cape Bank	2011	TW	302
	555557058	Larne Lough	2011	TW	3
	555557060	Limestone Coast of South West Wales / Arfordir Calchfaen de Orllewin Cymru	2005	TW	2
	555557061	Lindisfarne	2011	TW	31
	555557063	Liverpool Bay / Bae Lerpwl	2011	EEZ	2
	555557063	Liverpool Bay / Bae Lerpwl	2011	TW	1702
	555557063	Liverpool Bay / Bae Lerpwl	2018	EEZ	303
United Kingdom	555557063	Liverpool Bay / Bae Lerpwl	2018	TW	2226
	555557064	Lizard Point	2011	TW	140
	555557065	Loch Creran	2005	TW	12
	555557066	Loch Laxford	2005	TW	12
	555557067	Loch Moidart and Loch Shiel Woods	2005	TW	3

	555557068	Loch nam Madadh	2005	TW	19
	555557069	Lochs Duich, Long and Alsh Reefs	2005	TW	24
	555557072	Lough Foyle	2011	TW	21
	555557073	Luce Bay and Sands	2005	TW	479
	555557075	Lundy	2005	TW	31
	555557076	Lyme Bay and Torbay	2011	TW	313
	555557080	Margate and Long Sands	2011	EEZ	137
	555557080	Margate and Long Sands	2011	TW	511
	555557081	Marwick Head	2011	TW	5
	555557083	Medway Estuary and Marshes	2011	TW	33
	555557085	Mersey Estuary	2011	TW	40
	555557086	Mingulay and Berneray	2011	TW	69
	555557087	Mòine Mhór	2005	TW	3
	555557088	Monach Islands	2005	TW	33
	555557089	Montrose Basin	2011	TW	8
	555557090	Moray and Nairn Coast	2011	TW	16
	555557091	Moray Firth	2005	TW	1514
	555557092	Morecambe Bay	2005	TW	552
	555557095	Mousa	2005	TW	5
	555557098	Murlough	2005	TW	112
	555557104	North Caithness Cliffs	2011	TW	141
	555557105	North Colonsay and Western Cliffs	2011	TW	24
	555557107	North Norfolk Coast	2011	TW	37
	555557108	North Norfolk Sandbanks and Saturn Reef	2011	EEZ	3609
	555557109	North Rona and Sula Sgeir	2011	TW	67
	555557110	North Rona	2005	TW	5
	555557111	North Uist Machair and Islands	2011	TW	10
	555557112	North West Rockall Bank	2011	ABNJ	179
	555557112	North West Rockall Bank	2011	EEZ	4190
	555557113	Noss	2011	TW	30
	555557114	Outer Ards	2011	TW	11
	555557115	Outer Thames Estuary	2011	EEZ	839
	555557115	Outer Thames Estuary	2011	TW	2955
	555557116	Pagham Harbour	2011	TW	3
	555557119	Papa Stour	2005	TW	21
	555557120	Pembrokeshire Marine / Sir Benfro Forol	2005	EEZ	120
	555557120	Pembrokeshire Marine / Sir Benfro Forol	2005	TW	1251

United Kingdom	555557121	Pen Llyn a`r Sarnau / Lleyn Peninsula and the Sarnau	2005	TW	1442
	555557124	Pisces Reef Complex	2012	EEZ	9
	555557126	Plymouth Sound and Estuaries	2005	TW	57
	555557127	Pobie Bank Reef	2012	EEZ	633
	555557127	Pobie Bank Reef	2012	TW	333

	555557128	Poole Harbour	2018	TW	42
	555557130	Portsmouth Harbour	2011	TW	12
	555557132	Ramsey Bay	2018	TW	97
	555557133	Rathlin Island	2005	TW	31
	555557134	Rathlin Island	2011	TW	31
	555557136	Red Bay	2011	TW	10
	555557138	Ribble and Alt Estuaries	2011	TW	97
	555557143	Rousay	2011	TW	49
	555557144	Rum	2011	TW	360
	555557147	Sanday	2005	TW	110
	555557151	Scanner Pockmark	2018	EEZ	7
	555557156	Severn Estuary	2011	TW	223
	555557157	Severn Estuary / Môr Hafren	2008	TW	722
	555557158	Shell Flat and Lune Deep	2011	TW	106
	555557162	Skerries and Causeway	2012	TW	109
	555557163	Solan Bank Reef	2012	EEZ	846
	555557163	Solan Bank Reef	2012	TW	11
	555557164	Solent and Southampton Water	2011	TW	33
	555557165	Solent Maritime	2005	TW	94
	555557166	Solway Firth	2005	TW	424
	555557167	Sound of Arisaig (Loch Ailort to Loch Ceann Traigh)	2005	TW	46
	555557169	South-East Islay Skerries	2005	TW	15
	555557170	South Uist Machair and Lochs	2011	TW	3
	555557171	South Wight Maritime	2005	TW	196
	555557172	St Abb`s Head to Fast Castle	2011	TW	16
	555557173	St Kilda	2011	TW	281
	555557174	St Kilda	2005	TW	245
	555557175	Stanton Banks	2008	EEZ	818
	555557176	Start Point to Plymouth Sound and Eddystone	2011	TW	341
	555557180	Stour and Orwell Estuaries	2011	TW	31
	555557182	Strangford Lough	2005	TW	149
	555557183	Strangford Lough	2011	TW	147
	555557184	Studland to Portland	2012	TW	332
	555557186	Sule Skerry and Sule Stack	2011	TW	39
	555557187	Sullom Voe	2005	TW	27
	555557188	Sumburgh Head	2011	TW	24
	555557189	Sunart	2005	TW	55

United Kingdom	555557195	Tamar Estuaries Complex	2011	TW	16
	555557197	Teesmouth and Cleveland Coast	2011	TW	6
	555557198	Thames Estuary and Marshes	2011	TW	27
	555557199	Thanet Coast and Sandwich Bay	2011	TW	13
	555557200	Thanet Coast	2005	TW	28
	555557201	The Dee Estuary	2011	TW	111

	555557202	The Maidens	2012	TW	75
	555557203	The Shiant Isles	2011	TW	68
	555557204	The Swale	2011	TW	29
	555557205	The Wash and North Norfolk Coast	2005	TW	1043
	555557206	The Wash	2011	TW	589
	555557209	Traeth Lafan / Lavan Sands, Conway Bay	2011	TW	27
	555557214	Treshnish Isles	2005	TW	19
	555557215	Troup, Pennan and Lion`s Heads	2011	TW	33
	555557216	Tweed Estuary	2005	TW	2
	555557217	Upper Solway Flats and Marshes	2011	TW	382
	555557222	West Westray	2011	TW	34
	555557223	Wight-Barfleur Reef	2012	EEZ	1374
	555557224	Wyville Thomson Ridge	2011	EEZ	1740
	555557225	Y Fenai a Bae Conwy / Menai Strait and Conwy Bay	2005	TW	265
	555557226	Yell Sound Coast	2005	TW	8
	555583005	Aln Estuary	2014	TW	0
	555583006	Beachy Head West	2014	TW	24
	555583007	Blackwater, Crouch, Roach and Colne Estuaries	2014	TW	279
	555583008	Chesil Beach and Stennis Ledges	2014	TW	38
	555583009	Cumbria Coast	2014	TW	18
	555583010	Folkestone Pomerania	2014	TW	34
	555583011	Fylde	2014	TW	261
	555583012	Isles of Scilly	2014	TW	58
	555583013	Kingmere	2014	TW	48
	555583014	Lundy	2014	TW	31
	555583015	Medway Estuary	2014	TW	58
	555583016	Padstow Bay and Surrounds	2014	TW	90
	555583017	Pagham Harbour	2014	TW	3
	555583018	Poole Rocks	2014	TW	4
	555583019	Skerries Bank and Surrounds	2014	TW	250
	555583020	Tamar Estuary	2014	TW	15
	555583021	Thanet Coast	2014	TW	64
	555583022	The Manacles	2014	TW	3
	555583023	Torbay	2014	TW	20
	555583024	Upper Fowey and Pont Pill	2014	TW	2
	555583025	Whitsand and Looe Bay	2014	TW	52
	555583026	South Dorset	2014	EEZ	59

United Kingdom	555583026	South Dorset	2014	TW	134
	555583027	East of Haig Fras	2014	EEZ	400
	555583028	North East of Farnes Deep	2014	EEZ	492
	555583029	South West Deeps (West)	2014	EEZ	1827
	555583030	Swallow Sand	2014	EEZ	4748
	555583031	The Canyons	2014	EEZ	661

	555583032	Clyde Sea Sill	2014	TW	712
	555583033	East Caithness Cliffs	2014	TW	114
	555583034	Fetlar to Haroldswick	2014	TW	215
	555583035	Loch Creran	2014	TW	12
	555583036	Loch Sunart	2014	TW	49
	555583037	Loch Sunart to the Sound of Jura	2014	TW	741
	555583038	Loch Sween	2014	TW	41
	555583039	Lochs Duich, Long and Aish	2014	TW	37
	555583040	Monach Isles	2014	TW	62
	555583041	Mousa to Boddam	2014	TW	13
	555583042	Noss Head	2014	TW	8
	555583043	Papa Westray	2014	TW	33
	555583044	Small Isles	2014	TW	803
	555583045	South Arran	2014	TW	280
	555583046	Upper Loch Fyne and Loch Goil	2014	TW	88
	555583047	Wester Ross	2014	TW	599
	555583048	Wyre and Rousay Sounds	2014	TW	16
	555583049	Firth of Forth Banks Complex	2014	EEZ	2125
	555583049	Firth of Forth Banks Complex	2014	TW	6
	555583050	North-west Orkney	2014	EEZ	3073
	555583050	North-west Orkney	2014	TW	1298
	555583051	Central Fladen	2014	EEZ	925
	555583052	East of Gannet & Montrose Fields	2014	EEZ	1840
	555583053	Faroe-Shetland Sponge Belt	2014	EEZ	5271
	555583054	Geikie Slide and Hebridean Slope	2014	EEZ	2218
	555583055	Hatton-Rockall Basin	2014	ABNJ	1257
	555583056	North-east Faroe-Shetland Channel	2014	EEZ	23667
	555583057	Norwegian Boundary Sediment Plain	2014	EEZ	164
	555583058	Rosemary Bank Seamount	2014	EEZ	6937
	555583059	The Barra Fan and Hebrides Terrace Seamount	2014	EEZ	4388
	555583060	Turbot Bank	2014	EEZ	251
	555583061	West Shetland Shelf	2014	EEZ	4095
	555583062	Mersey Narrows and North Wirral Foreshore	2014	TW	20
	555583063	Loch Roag Lagoons	2014	TW	0
	555583064	The Vadills	2014	TW	1
	555583065	Sound of Barra	2014	TW	125

United Kingdom	555593952	Glannau Aberdaron and Ynys Enlli / Aberdaron Coast and Bardsey Island	2015	TW	335
	555593953	Grassholm	2015	TW	17
	555593954	North-West of Jones Bank	2016	EEZ	398
	555622017	Allonby Bay	2016	TW	39
	555622018	Bideford to Foreland Point	2016	TW	104
	555622019	Cromer Shoal Chalk Beds	2016	TW	320

	555622020	Coquet to St Mary's	2016	TW	192
	555622021	Dover to Deal	2016	TW	10
	555622022	Dover to Folkestone	2016	TW	20
	555622023	Farnes East	2016	EEZ	589
	555622023	Farnes East	2016	TW	356
	555622024	Fulmar	2016	EEZ	2437
	555622025	Greater Haig Fras	2016	EEZ	0
	555622025	Greater Haig Fras	2016	EEZ	2041
	555622026	Hartland Point to Tintagel	2016	TW	304
	555622027	Holderness Inshore	2016	TW	309
	555622028	Mounts Bay	2016	TW	12
	555622029	Newquay and The Gannel	2016	TW	9
	555622030	Offshore Brighton	2016	EEZ	862
	555622031	Offshore Overfalls	2016	EEZ	455
	555622031	Offshore Overfalls	2016	TW	140
	555622032	Runnel Stone (Land's End)	2016	TW	20
	555622033	Runswick Bay	2016	TW	68
	555622034	The Needles	2016	TW	11
	555622035	The Swale Estuary	2016	TW	53
	555622036	Utopia	2016	TW	3
	555622037	West of Walney	2016	EEZ	80
	555622037	West of Walney	2016	TW	308
	555622038	Western Channel	2016	EEZ	1614
	555624860	North Anglesey Marine / Gogledd Mon Forol	2017	EEZ	1979
	555624860	North Anglesey Marine / Gogledd Mon Forol	2017	TW	1270
	555624861	West Wales Marine / Gorllewin Cymru Forol	2017	EEZ	1883
	555624861	West Wales Marine / Gorllewin Cymru Forol	2017	TW	5487
	555624862	Anglesey Terns / Morwenoliaid Ynys Mon	2017	TW	1018
	555624863	Northern Cardigan Bay / Gogledd Bae Ceredigion	2017	TW	827
	555624864	Skomer, Skokholm and the Seas off Pembrokeshire / Sgomer, Sgogwm a Moroedd Penfro	2017	EEZ	923
	555624864	Skomer, Skokholm and the Seas off Pembrokeshire / Sgomer, Sgogwm a Moroedd Penfro	2017	TW	740
	555624865	Loch Carron	2017	TW	16
	555624866	Inner Hebrides and the Minches	2017	TW	13801
	555624867	Carlingford Lough	2017	TW	3
	555624868	Outer Belfast Lough	2017	TW	3
United Kingdom	555624869	Rathlin	2017	TW	91
	555624870	Waterfoot	2017	TW	1
	555624871	Bristol Channel Approaches / Dynesfeydd Mor Hafren	2017	EEZ	1481
	555624871	Bristol Channel Approaches / Dynesfeydd Mor Hafren	2017	TW	4367
	555624872	Southern North Sea	2017	EEZ	34175
	555624872	Southern North Sea	2017	TW	2776

	555624873	Northumberland Marine	2017	TW	886
	555624875	Morecambe Bay and Duddon Estuary	2017	TW	610
	555624876	North Channel	2017	EEZ	289
	555624876	North Channel	2017	TW	1315
	555625738	Les Minquiers	2018	EEZ	7
	555625738	Les Minquiers	2018	TW	40
	555625739	Les Ecrehous	2018	TW	15
	555625740	Jersey Coast	2018	TW	87
	555637372	Bae Cemlyn/ Cemlyn Bay	2018	TW	0
	555637373	Coquet Island	2018	TW	0
	555637374	Dungeness, Romney Marsh and Rye Bay	2018	TW	395
	555637375	Dyfi Estuary / Aber Dyfi	2018	TW	17
	555637376	Falmouth Bay to St Austell Bay	2018	TW	259
	555637377	Farne Islands	2018	TW	1
	555637378	Greater Wash	2018	EEZ	237
	555637378	Greater Wash	2018	TW	969
	555637378	Greater Wash	2018	TW	1052
	555637378	Greater Wash	2018	TW	1277
	555637379	Irish Sea Front	2018	EEZ	180
	555637380	Loch of Stenness	2018	TW	8
	555637381	Minsmere-Walberswick	2018	TW	3
	555637382	North Norfolk Coast	2018	TW	32
	555637383	Northumbria Coast	2018	TW	10
	555637384	Obain Loch Euphoirt	2018	TW	3
	555637385	Orfordness-Shingle Street	2018	TW	9
	555637386	Solent & Isle of Wight Lagoons	2018	TW	0
	555637387	South Uist Machair	2018	TW	34
	555637388	Baie ny Carrickey	2018	TW	11
	555637389	Douglas Bay	2018	TW	5
	555637390	Langness	2018	TW	89
	555637391	Laxey Bay	2018	TW	4
	555637392	Little Ness	2018	TW	10
	555637393	Niarbyl Bay	2018	TW	6
	555637394	Port Erin Bay	2018	TW	4
	555637396	Calf and Wart Bank	2018	TW	20
	555637397	West Coast	2018	TW	185

Annex II – Evolution of the OSPAR Network of MPAs

Summary of the gradual development of the OSPAR Network of MPAs as result of the selection and nomination of sites by CPs in the time period 2005– 1 October 2018.

14th Reporting Period of new MPAs (2 October 2017 – 1 October 2018)

Norway submitted three new OSPAR MPAs and the **United Kingdom** further 28 OSPAR MPAs. Concerning national MPAs, **Germany** made an amendment to the OSPAR MPA "LOWER SAXONY WADDEN SEA" with respect to enlarging the MPA by changing its boundaries. There were no changes with respect to other issues, like protected features, etc.

13th Reporting Period of new MPAs (2 October 2016 – 1 October 2017)

Norway submitted three new OSPAR MPAs and the **United Kingdom** submitted its eighth tranche of UK MPAs supplements the UK's previous submissions in 2005, 2008, 2011, 2012 and 2014-2016. The tranche comprises the marine area of fifteen marine protected areas that were established in 2016 and 2017 (four SPAs, six candidate SACs, four Marine Conservation Zones and one Nature Conservation MPA) and two amendments to the boundaries of SPAs previously nominated as OSPAR MPAs.

12th Reporting Period of new MPAs (2 October 2015 – 1 October 2016)

The **United Kingdom** submitted its seventh tranche of marine sites as a further contribution to the OSPAR Network of Marine Protected Areas. This tranche comprised the marine area of 23 Marine Conservation Zones (MCZs) that were designated in 2016, as well as the re-submission of 10 existing Marine Conservation Zones submitted to OSPAR in 2014 as further features were added to these sites in 2016. In addition, **Spain** submitted two new OSPAR MPAs and amended the boundary of one of its previously submitted MPAs, Banco de Galicia. In total, the area of the OSPAR Network of MPAs increased by over 18,000 km².

11th Reporting Period of new MPAs (2 October 2014 – 1 October 2015)

The **United Kingdom** submitted its sixth tranche of marine sites to the OSPAR MPA network of supplementing the UK's previous submissions in 2005, 2008, 2011, 2012 and 2014. The tranche comprised two SPAs and an amendment to an existing OSPAR MPA - Haig Fras SAC that had its site boundary amended in 2015. **Norway** nominated three additional MPAs as components to the OSPAR Network of MPAs and **Portugal** another five. Collectively, these 10 new MPAs cover an area of over 600 km^2.

10th Reporting Period of new MPAs (2 October 2013 – 1 October 2014)

The **United Kingdom** submitted its fifth tranche of sites to the OSPAR Network of MPAs. A total of 61 sites have been reported to the OSPAR Commission, comprising of three additional SACs and one SPA designated under the EC Habitats Directive and EC Birds Directive, as well as 27 MCZs and 30 NCMPAs designated under UK legislation. Altogether, these sites have a total area of 71,153 km^2. **Spain** has nominated a total of 11 SPAs designated under the EC Birds Directive to the OSPAR Commission. These sites protect 17,843 km^2 of Spanish waters. **Iceland** has nominated five MPAs as components to the OSPAR Network of MPAs. Collectively, these MPAs cover an area of about 401 km^2.

9th Reporting Period of new MPAs (1 January 2013 – 1 October 2013)

No new OSPAR MPAs were nominated in the 9th Reporting Period.

8th Reporting Period of new MPAs (1 January 2012 – 31 December 2012)

At the meeting of the OSPAR Commission in 2012 (25-29 June 2012, Bonn/Germany), CPs agreed to establish the *Charlie-Gibbs North High Seas MPA* with the goal of protecting and conserving the biodiversity and ecosystems of the waters superjacent to the seabed in the northern part of the Charlie-Gibbs Fracture Zone. The seabed in the area is subject to a submission by Iceland to the UN CLCS. With the nomination of two MPAs by **Belgium**, all twelve OSPAR CPs have contributed to the OSPAR Network of MPAs. **France** submitted 30 MPAs (8 SPAs and 22 SACs) and the **United Kingdom** submitted its fourth tranche of sites (1 Nature Reserve and 12 SACs) to the OSPAR Network of MPAs. **Norway** nominated four MPAs and **Iceland** two.

7th Reporting Period of new MPAs (1 January 2011 – 31 December 2011)

The **United Kingdom** has submitted its third tranche of sites to the OSPAR Network of MPAs, supplementing UK's previous submissions in 2005 and 2008. A total of 117 sites, 14 SACs and 93 SPAs designated by the United Kingdom under the EC Habitats Directive and EC Birds Directive, that are relevant to the OSPAR Convention have been reported to the OSPAR Commission. The sites have been identified by reference to the OSPAR MPA identification guidelines (OSPAR 2003 Annex 10 Ref A-4.44b(i)). Information on marine habitats and species of interest for each site as well as information on management within these OSPAR MPAs has been provided for inclusion in the OSPAR MPA database.

6th Reporting Period of new MPAs (1 June 2010 – 31 December 2010)

MPA nominations in 2010 – Part II

In the context of the OSPAR Ministerial Meeting 2010 (20-24 September, Bergen/Norway) OSPAR CPs have agreed to collectively establish six MPAs in ABNJ of the North-East Atlantic. These areas, *i.e. Charlie-Gibbs South MPA*, *Milne Seamount Complex MPA*, *Josephine Seamount High Seas MPA*, *Altair Seamount High Seas MPA*, *Antialtair High Seas MPA*, and the *Mid-Atlantic Ridge north of the Azores High Seas MPA*, collectively cover about 285.000 km² within OSPAR Region V.

Portugal has at the same time announced the intention to designate and protect the sea floor and sub-sea floor within the areas of the *Josephine Seamount High Seas MPA*, *Altair Seamount High Seas MPA*, *Antialtair High Seas MPA*, and the *Mid-Atlantic Ridge north of the Azores High Seas MPA*, as components of the OSPAR Network of MPAs. These areas are subject to the submission of Portugal to the UN CLCS regarding the establishment of the outer limits of the Portuguese continental shelf beyond 200 nautical miles from the baselines from which the breadth of the territorial sea is measured, in accordance with Article 76 and Annex II of UNCLOS. In accordance with Articles 76 and 77(3) of UNCLOS, the sovereign rights and the jurisdiction of Portugal are referred to the seabed and subsoil of the areas indicated in the Portuguese submission to the UN CLCS. With its submission Portugal also committed itself to the conservation of living resources and biodiversity in the continental shelf. This duty is concurrent with the protection and conservation of a set of OSPAR priority habitats: seamounts, cold water coral reefs, cold water coral gardens and sponge aggregations.

Denmark has rectified the information presented in the previous Status Report (Publication Number 493/2010) with regards to the MPAs nominated to OSPAR in 2009. The information has been revised accordingly in the relevant section below and taken into account in the analysis of the OSPAR Network of MPAs in the main sections of this report.

5th Reporting Period of new MPAs (1 January 2009 – 31 May 2010)

MPA nominations in 2010 – Part I

Sweden has contributed Natura 2000 sites to be included in the OSPAR Network of MPAs, collectively covering 726 km².

On the west coast bordering Norway, Sweden has established the *Koster-Väderö Archipelago* MPA, covering 606 km² of territorial waters. The area is encompassing the Koster archipelago and the Väderö Islands and the 65 km long and up to 250 m deep Koster-Väderö Trough. Due to the influence by the Atlantic the area hosts a high diversity of biotopes and species. Of the 6000 marine species that have been identified in Kosterhavet, about 200 are found nowhere else in Sweden. In particular there are very rich deep hard bottom habitats with the only known live *Lophelia* reef in Sweden at a depth of 80 m. Also kelp forests, maërl beds and soft corals are found within the MPA. Together with the OSPAR MPA *Ytre Hvaler* nominated by Norway, the area covers an entire ecosystem (see also information below on the MPA nominations by Norway in 2010).

With a view to protect and conserve a coastal bank area representative for the Swedish West coast in the Kattegat, the *Morups bank* MPA (5.67 km²) has been established. This relatively small bank is characterised by rock and stones with rich algae vegetation and rich fauna of polychaete worms, particularly at depths of 20 – 30 meters.

With a view to protect representative offshore banks in the eastern Kattegat, Sweden has nominated *Stora Middelgrund and Röde Bank* (114 km²). These banks still seem to have a rather intact ecological structure, providing potentially important seed areas for a variety of invertebrates associated with hard bottoms and kelp beds, as well as for fishes.

Norway has nominated the *Ytre Hvaler National Park* as an OSPAR MPA, covering 340 km² of the Hvaler-Fredrikstad archipelago, situated in the coastal areas of south eastern Norway. It hosts a rich diversity of species both on land and in the sea while being a popular recreational area. The national park includes terrestrial areas, but for the purpose of designating this area as an OSPAR MPA only the marine part of the national park has been included. The national park borders up to the *Kosterhavet Marine National Park* in Sweden. These national parks were established in close collaboration between the Norwegian and Swedish regional governments. The management of the sites will also be coordinated between Norway and Sweden. Due to the close relationship between the two areas they are now nominated to the OSPAR Network of MPAs as a jointly managed transboundary MPA. For practical reasons separate nomination proformas have been elaborated for the areas from each of the two CPs (see information above on the MPA nominations by Sweden in 2010). Two MPAs previously nominated by Norway, *i. e. Tisler* and *Fjellknausene* are now encompassed in the *Ytre Hvaler National Park*. These two areas therefore have been withdrawn from the OSPAR Network of MPAs as independent components, as they are now covered by the new Ytre Hvaler MPA.

MPA nominations in 2009

Ireland has selected 19 Natura 2000 sites as a contribution to the OSPAR Network of MPAs. For a list of these sites, please see Annex I. The sites have been designated to protect particularly the following species and habitats that OSPAR has identified as being threatened or in decline: intertidal mudflats, *Lophelia pertus*a reefs, maërl beds, *Zostera* beds and Harbour porpoises (*Phocoena phocoena*). The total area covered by these sites is 4,136 km², of which 1,593 km² are in Irish territorial waters and 2,543 km² in the EEZ. The sites are located to the north, south, east and west of Ireland and offshore on the edge of Ireland's inner Continental Shelf and contribute to the network coverage in the Celtic Seas (OSPAR Region III). While no formal management plans have yet been prepared or implemented, management measures are already taken in these sites.

Denmark has decided to nominate all their marine Natura 2000 sites, which so far have not been reported to the OSPAR Commission, as components to the OSPAR Network of MPAs. Altogether 30 new sites have been nominated, while another four sites nominated in 2007 have been expanded. It should be noted that in the course of expanding previously nominated MPAs, names have been changed for two sites, with one of these now encompassing three individual sites nominated in 2007.

The **Netherlands** has nominated five Natura 2000 sites as components of the OSPAR Network of MPAs, together covering approximately 8,400 km² in the Greater North Sea (OSPAR Region II). Three of these sites are situated in the Dutch territorial waters, namely the *Noordzeekustzone* (*ca*. 1400 km²), the *Voordelta* (ca. 900 km²), and the *Vlakte van de Raan* (226 km²). Two sites have been nominated in the Dutch EEZ, namely the *Doggerbank* (4718 km²), and the *Klaverbank* (1,238 km²). All these areas will be designated according to Dutch legislation of the Nature Conservation Act and the Flora and Fauna Act in 2010. The management plan for the *Voordelta* has been finalised and is currently being implemented. Management plans for the other MPAs will be set at the latest three years after their designation in 2010.

Norway has nominated three sites covering a total area of 78,411 km² in the territorial waters around the Svalbard archipelago. The three areas, namely *Svalbard West* (20,033 km²), *Svalbard East* (55,573 km²) and *Bjørnøya* (2,805 km²) consist of the marine parts of four existing nature reserves and seven national parks within the archipelago. They are grouped into three OSPAR MPAs based on an evaluation of geography, biology and legal status of existing environmental protection measures. The major part of these sites is situated within the Barents Sea. The northern parts extend into the High Arctic maritime province. Each of the four nature reserves and seven national parks, from which the three OSPAR MPAs originate, is established by separate national regulations. The degree of protection and restrictions varies between the ten areas. Svalbard and the sea territory out to 12 nm are protected through the Svalbard Environmental Act. Svalbard falls within the perimeter of the Barents Sea management plan. In addition, separate management plans for each of the national parks and nature reserves are, or will be, elaborated. The nomination of these three MPAs by Norway has not only substantially increased the coverage of the OSPAR Network of MPAs in the Arctic Waters (OSPAR Region I) but also more than doubled the total coverage of the network.

4th Reporting Period of new MPAs (1 January 2008 – 31 December 2008)

France has nominated *La Mer d'Iroise*, off the coast of western Brittany, as a component to the OSPAR Network of MPAs. This site is situated in the coastal waters with a total area of 3,431.75 km² extending across the boundaries of OSPAR Region II, the Greater North Sea (1758.43 km²) and OSPAR Region III, the Celtic Seas (1673.32 km²). It has not yet been reported as a Natura 2000 area. No information on management has been reported.

Germany has nominated an additional set of six MPAs[32] to the OSPAR Network of MPAs of which three sites are located in the EEZ, namely the *Dogger Bank* (1,700 km²), the *Borkum Reef Ground* (625 km²) and the *Sylt Outer Reef – Eastern German Bight* (5,600 km²); while the other three sites are situated in territorial waters, namely the *Schleswig-Holstein Wadden Sea National Park and adjacent Coastal Areas* (4,524,55 km²), the *Steingrund* (174,50 km²), and *Helgoland mit Helgoländer Felssockel* (55,09 km²). All of these sites have previously been established as Natura 2000 areas (SCI, SPA) and are located within OSPAR Region II, the Greater North Sea. The total area protected has in 2008 increased by 4,723 km². For the *Schleswig-Holstein Wadden Sea National Park and adjacent Coastal Areas* for which (sectoral) national and an overall trilateral management plan(s) exist; for the OSPAR MPA *Helgoland mit Helgoländer Felssockel* and the SPA within the

[32] It has to be noted that the MPA *Sylt Outer Reef – Eastern German Bight* incorporates and thus supersedes the *SPA Eastern German Bight*, which was nominated to OSPAR during 2005. This (old) smaller site now lies inside the newly designated larger OSPAR MPA, and therefore OSPAR was invited to remove the former from the OSPAR MPA list and database. A similar situation applies with regard to the MPAs nominated in coastal waters. They are either within (*Steingrund*) or extend (*Helgoland mit Helgoländer Felssockel)* the previously nominated *Seabird Protection Area Helgoland* or extend the *Schleswig-Holstein Wadden Sea National Park* (*Schleswig-Holstein Wadden Sea National Park and adjacent Coastal Areas*).

OSPAR MPA *Sylt Outer Reef – Eastern German Bight* ordinances according to national law are implemented. Management plans for the remaining sites are being prepared.

Iceland has nominated its first set of seven MPAs as components to the OSPAR Network of MPAs, of which four sites are located in the EEZ: namely *Hornafjarðardjúp Coral Reef 1* (7.89 km²), *Hornafjarðardjúp Coral Reef 2* (31.27 km²), *Skaftárdjúp Coral Reef 1* (7.36 km²), and *Skaftárdjúp Coral Reef 2* (22.31 km²), while the other three sites are situated in the coastal waters, namely *Eyjafjörður Hydrothermal Vents 1* (0.12 km²), *Eyjafjörður Hydrothermal Vents 2* (0.56 km²), and *Reynisdjúp Coral Reef* (9.45 km²). All of these MPAs are within OSPAR Region I, the Arctic, and together cover an area of about 78.96 km². No information on management has been reported.

Spain has nominated *El Cachucho* (2,349.66 km²), also known as the *Le Danois Bank*, to the OSPAR Network of MPAs. This site is situated in Spain's EEZ about 65 km off the northern coast of the Iberian Peninsula in the Cantabrian Sea. It is located within OSPAR Region IV, the Bay of Biscay and Iberian Coast. This MPA has also been proposed as a site of Special Community Importance (SCI) for the European Network Natura 2000. The relevant authorities are in the process of establishing natural resources and fishing management plans for the area.

The **United Kingdom** has nominated a set of eight additional SACs as components to the OSPAR Network of MPAs, all of which have become Natura 2000 sites since 2005. This includes five offshore/EEZ SACs, namely *Braemar Pockmarks* (5.18 km²; OSPAR Region II), *Scanner Pockmarks* (3.35 km²; OSPAR Region II), *Haig Fras* (481.34 km²; OSPAR Region III), *Stanton Banks* (817.87 km²; III) and *Darwin Mounds* (1377.26 km²; OSPAR Region V) and three inshore/coastal waters SACs, namely *Severn Estuary* (721.96 km²; OSPAR Region III), *Dee Estuary* (134.47 km²; OSPAR Region III) and *Humber Estuary* (336.40 km²; OSPAR Region II). For all of these MPAs, management measures, arising from requirements of the Habitats Directive 92/43/EEC, are being developed and taken forward.

3rd Reporting Period of new MPAs (1 January 2007 – 31 December 2007)

In the 2007 reporting period, new MPAs nominated by Denmark, Spain and Portugal increased the number of sites from 87 to 106 with an area increase from 26,619 km² to 38,178 km². At the same time, the United Kingdom withdrew one site previously nominated and recalculated its total area coverage by MPAs.

Denmark reported its first OSPAR MPAs, 18 sites totalling 5,398.66 km². Seven of the 18 sites are within their EEZ. All of these MPAs are Natura 2000 sites with the same boundaries. Please refer to Annex I with regards to their names and further details.

Spain likewise reported its first OSPAR MPA, a conglomerate of four sites under the name *Islas Atlanticas de Galicia*, totalling 85.42 km² in territorial waters. This MPA is a Natura 2000 site, with similar boundaries, but somewhat larger (85.24 km² vs. 71.38 km²).

Portugal reported its eighth and at the same time largest site, the *Sedlo Seamount* with an area of 4,012.53 km², increasing the total area being protected to 5,698.25 km². This MPA is situated within the Portuguese EEZ, but it is not a Natura 2000 site at all. As noted in the 2006 Status Report, of the EU Member States, only Portugal Azores has nominated sites that are not wholly Natura 2000 sites, which was an important development. Of the eight Portuguese sites, four are not Natura 2000 at all, and the remaining four are larger and more extensive than the smaller Natura 2000 sites contained within them.

The **United Kingdom** submitted updated GIS files and provided area calculations for all of its sites, except for its three Northern Ireland MPAs. One site was withdrawn, due to its negligible marine area, reducing the total number of UK sites to 55.

2nd Reporting Period of new MPAs (10 April 2006 – 31 December 2006)

In the 2006 reporting period, new MPAs nominated by Portugal increased the number of sites from 81 to 87, and the total network area increased from 25,426 km^2 to 26,619 km^2.

Portugal reported six additional areas as components of the OSPAR Network of MPAs. These MPAs are situated in the waters surrounding the Azores, of which two sites (*Faial-Pico channel*, *Corvo Island*) are in territorial waters, three in the EEZ (*D. João de Castro Seamount*, *Lucky Strike Hydrothermal Vent Field*, *Menez Gwen Hydrothermal Vent Field*), and one on the ECS (*Rainbow Hydrothermal Vent Field*). This amounts to 497.42 km² in territorial waters, 640.88 km² in Portugal's EEZ, and 22.15 km² on the ECS, totalling 1,160.45 km². Only Portugal has nominated an MPA on the continental shelf beyond the EEZ.

It should be noted that due to the extension of the first year's reporting deadline, most of the MPAs in the initial report were actually put forward in the period between January and April 2006. This meant that the second reporting period was less than a calendar year.

1st Reporting Period of new MPAs (2005 - 9 April 2006)

The 2005 MPA nominations are summarized below in the order they were received.

Portugal: One site, *Formigas/Dollabarat Bank*, within the waters of the Azores, was reported to MASH 2005. It was the first OSPAR MPA nomination. It is a nature reserve with a delimited area of 525.27 km², extending to below 1500 m in depth. Of that, 36.28 km² is also a Natura 2000 site, down to the 200 m isobath.

Norway: Six sites were reported in December 2005. The six sites are: *Selligrunnen* (Nature Reserve), *Røstrevet*, *Sularevet*, *Iverryggen*, *Tisler*, and *Fjellknausene*, the latter five of which have fisheries closures to bottom-tending gear. The six in total cover an area of about 1,905.39 km².

Germany: Two extensive sites were reported in January 2006, and two more in April 2006. The sites are: *Helgoland Seabird Protected Area* (a Natura 2000 SPA), *Schleswig-Holstein Wadden Sea* (National Park and Natura 2000 SCI), *SPA-Eastern German Bight* (Natura 2000 SPA), and *Lower Saxony Wadden Sea National Park* (Natura 2000 SPA and SAC). The sites comprise a total of 11,922.78 km². In all, more than 90% of German coastal waters are also OSPAR MPAs, with large sections of the EEZ waters included as well.

Sweden

Six sites were reported in January 2006: *Koster-Väderö Archipelago* (some enhanced protections including fisheries restrictions), *Gullmarn Fjord* (also with enhanced protections), *Nordre Älv Estuary* (fisheries closures), *Kungsbacka Fjord* (nature reserve), *Fladen*, and *Lilla Middelgrund*. The six sites overlap Natura 2000 sites, and cover a total of 971.77 km². *Fladen* and *Lilla Middelgrund* both have portions extending into the EEZ (37.62 km² and 159.21 km², respectively).

UK: Fifty-six sites were reported as OSPAR MPAs in January 2006. All sites are also Natura SACs. Please refer to Annex I with regards to their names and details.

France: Eight sites were reported in March 2006: *Réserve Naturelle Nationale de la Baie de Somme*, *Réserve Naturelle de l'Estuaire de la Seine*, *Réserve Naturelle Nationale du Domaine de Beauguillot*, *Réserve Naturelle de la Baie de l'Aiguillon*, *Réserve Naturelle de la baie de Saint Brieuc*, *Archipel des Sept îles*, *Réserve Naturelle de Moëze-Oléron*, and *Réserve Naturelle du Banc d'Arguin*. They together cover an area of about 274.53 km².

Annex III – Historical process of the elaboration of proposals for OSPAR MPAs in ABNJ/in the High Seas

Designation of OSPAR MPAs in ABNJ/in the High Seas requires collective agreement and action by the OSPAR Commission. Any proposal for an OSPAR MPA in ABNJ/in the High Seas needs to be considered and eventually agreed by all OSPAR CPs.

In 2003, a map of the OSPAR Maritime Area has been prepared as a spatial planning tool indicating those areas that do not fall under the jurisdiction of any CP and thus would be considered ABNJ (Figure 1). At that time, ABNJ have been determined by the boundaries of the EEZ of CPs at 200 nautical miles from the shoreline.

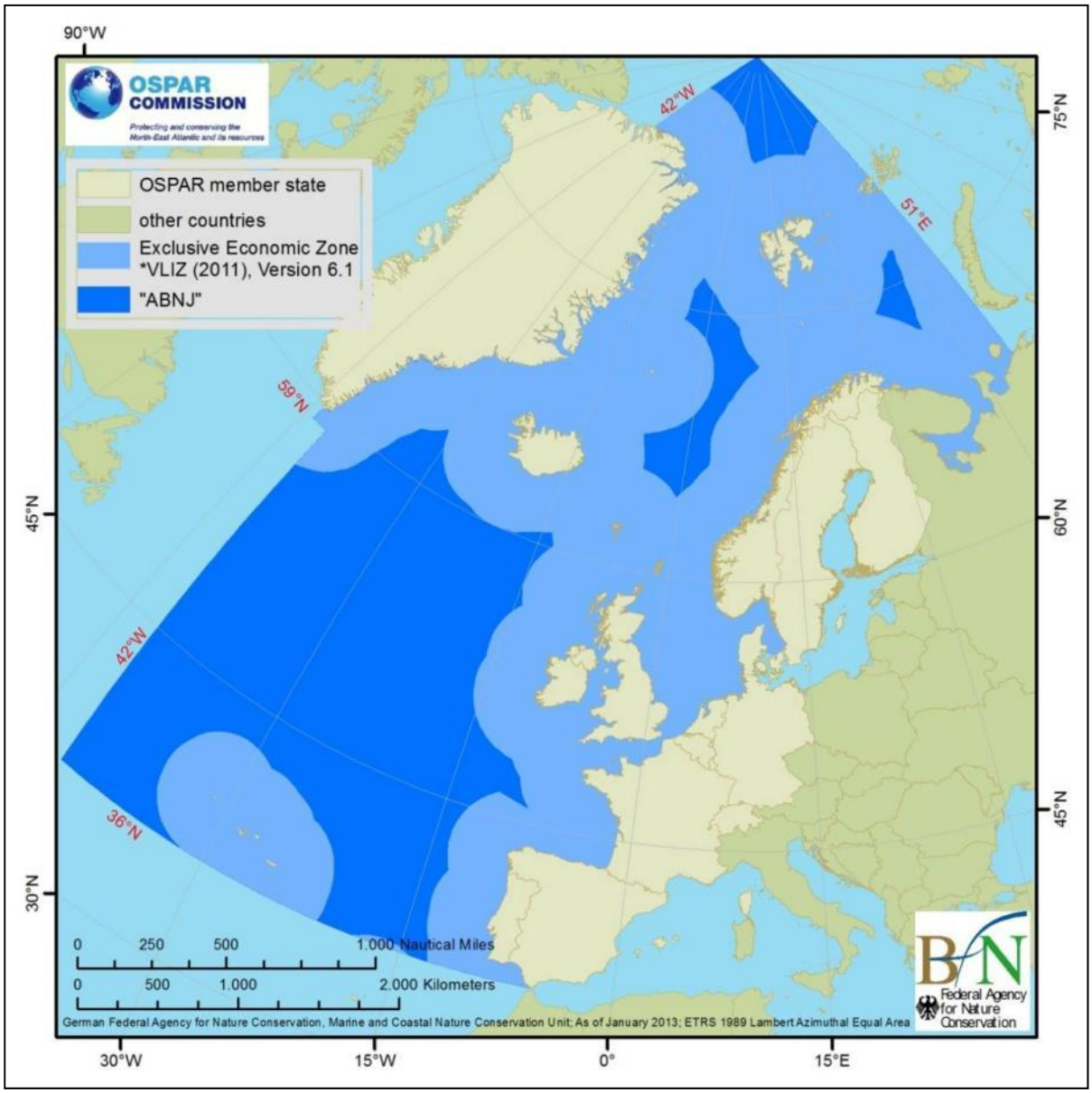

Figure 1. *ABNJ in the OSPAR Maritime Area as defined in 2003*[33].

Over the years, a number of proposals for OSPAR MPAs in ABNJ have been elaborated. The proposals were originally prepared by the Non-Governmental Organisation (NGO) World Wide Fund For Nature (WWF) and the

[33] It has to be noted that since 2003 a number of OSPAR CPs have made submissions to the UN CLCS for an ECS. These submissions have substantially changed the legal situation in the OSPAR Maritime Area (see Figure 3).

University of York[34], subsequently reviewed by the International Council for the Exploration of the Sea (ICES) in 2008 (ICES Advice 2008 Book 1), and gradually finalized by the relevant OSPAR bodies, namely ICG-MPA, BDC, and the Working Group on Marine Protected Areas, Species and Habitats (MASH). As a result, following marine areas have been identified as potential OSPAR MPAs in ABNJ (see Figure 2):

- *Charlie-Gibbs Fracture Zone/Mid-Atlantic Ridge*
- *Reykjanes Ridge*
- *Mid-Atlantic Ridge north of the Azores*
- *Milne Seamount Complex*
- *Altair Seamount*
- *Antialtair Seamount*
- *Josephine Seamount Complex*

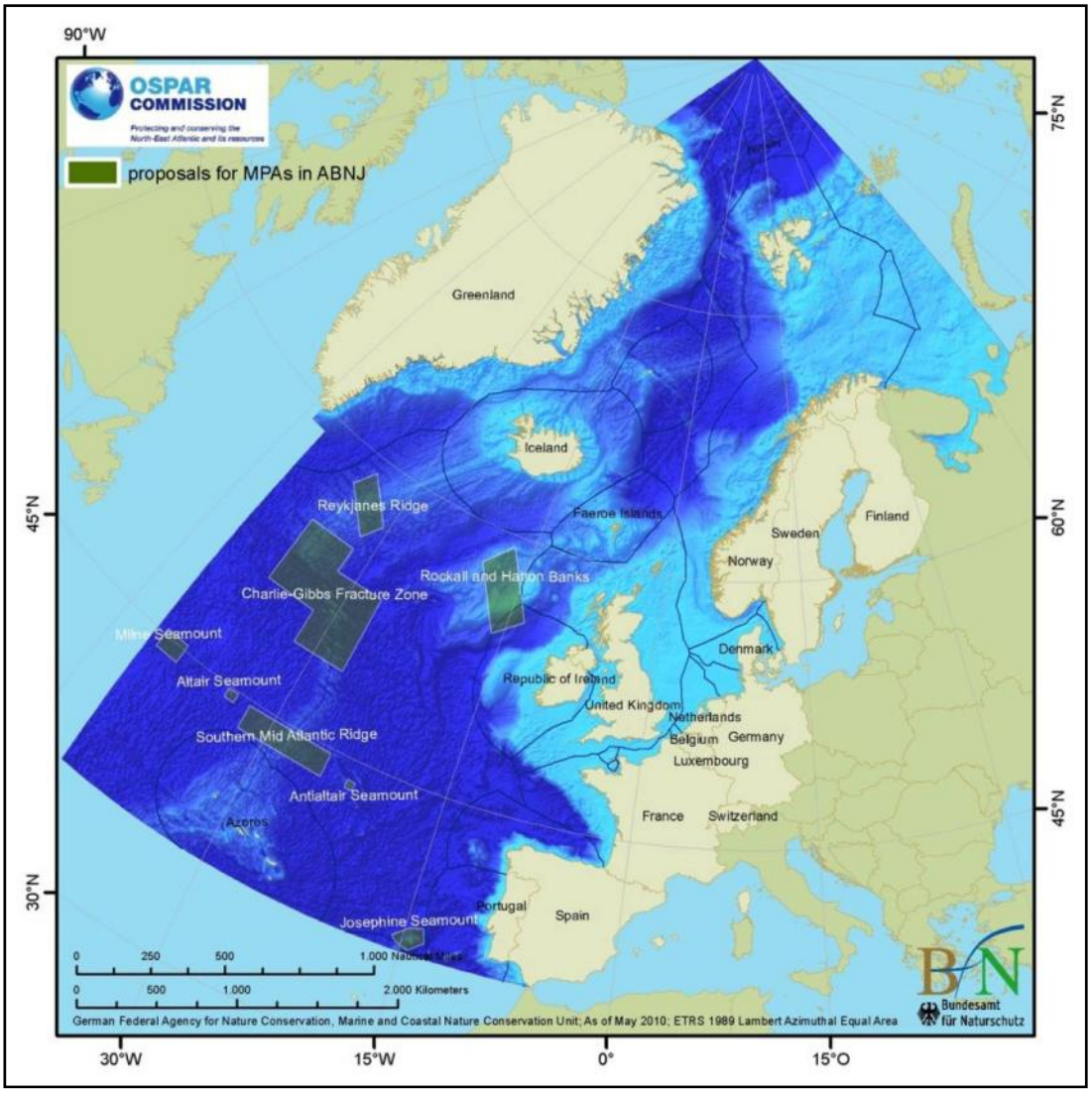

Figure 2. *Marine areas proposed as OSPAR MPAs in ABNJ in 2008.*

Table 3. *Milestones in the elaboration of proposals for OSPAR MPAs in ABNJ until 2010.*

[34] The University of York has elaborated these proposals under a contract (2008-2010) provided by the BfN.

2006	
MASH Working Group March 2007	1st presentation of the nomination proforma for the *Charlie-Gibbs Fracture Zone* as a potential MPA in ABNJ
2008	
OSPAR Commission June 2008	*Charlie-Gibbs Fracture Zone* approved *in principle* as a potential MPA in ABNJ.
MASH Working Group October 2008	1st presentation of nomination proformas for *Reykjanes Ridge*, *Mid-Atlantic Ridge north of the Azores*, *Milne Seamount Complex*, *Altair Seamount*, *Antialtair Seamount*, and *Josephine Seamount Complex* as potential OSPAR MPAs in ABNJ.
	The *Rockall and Hatton Banks* proposal was set aside following concerns brought forward by the UK and Ireland, that the seabed within the proposed area was expected to be subject to submissions for an ECS by a number of States, namely the UK, Ireland, Iceland and Denmark (on behalf of the Faeroe Islands) and that it was not possible to say at this stage which of these four states (if any) may eventually assume sovereign rights over the continental shelf in the proposed area. Furthermore, the proposed sites for *Rockall & Hatton Banks* intruded into Irelands' national EEZ.
2009	
NEAFC Annual Meeting April 2009	NEAFC decided to close five areas on the Mid-Atlantic Ridge to bottom fisheries with a view to protect Vulnerable Marine Ecosystems in ABNJ of the North-East Atlantic (see Figure 3). Pursuant to the competence of NEAFC, this implies that fishing activities by vessels flying the flags of NEAFC CPs or Co-Operating Non-CPs, with fishing gear which is likely to contact the seafloor during the normal course of fishing operations, are prohibited within these areas. As shown in Figure 3, these areas largely overlapped with four of the proposed OSPAR MPAs (*i.e. Charlie-Gibbs Fracture Zone*, *Mid-Atlantic Ridge north of the Azores*, *Altair Seamount*, *Antialtair Seamount*), while the area closure by NEAFC on the *Reykjanes Ridge* was situated next to the proposed MPA by OSPAR. No area has been closed to bottom fisheries by NEAFC in the proposed OSPAR MPAs *Milne Seamount Complex* and *Josephine Seamount Complex*.
OSPAR Commission June 2009	General and specific conservation objectives for the *Charlie-Gibbs Fracture Zone* agreed upon.
	Reykjanes Ridge, *Mid-Atlantic Ridge north of the Azores*, *Milne Seamount Complex*, *Altair Seamount*, *Antialtair Seamount*, and *Josephine Seamount Complex* approved *in principle*[35] as potential MPAs in ABNJ; general and specific conservation objectives for all these areas agreed upon.
OSPAR CPs Any time	A number of OSPAR CPs made submissions to the UN CLCS for an ECS, pursuant to article 76, paragraph 8, of UNCLOS of 10 December 1982[36]. As a consequence, apart from the *Milne Seamount Complex* all other areas proposed as OSPAR MPAs in ABNJ have entirely or partly been encompassed by areas subject to submissions for an ECS (see Figure 3).

A number of OSPAR CPs have already made submissions to the UN CLCS for an ECS. These submissions have substantially changed the legal situation in the OSPAR Maritime Area (see Figure 3).

[35] Until the OSPAR Ministerial Meeting in September 2010 the approval of these MPAs was subject to study reservations from some CPs.

[36] Visit UN CLCS for details of the submissions made in 2009 by the United Kingdom of Great Britain and Northern Ireland, Ireland, Iceland, Denmark, Norway, Portugal, and Spain.

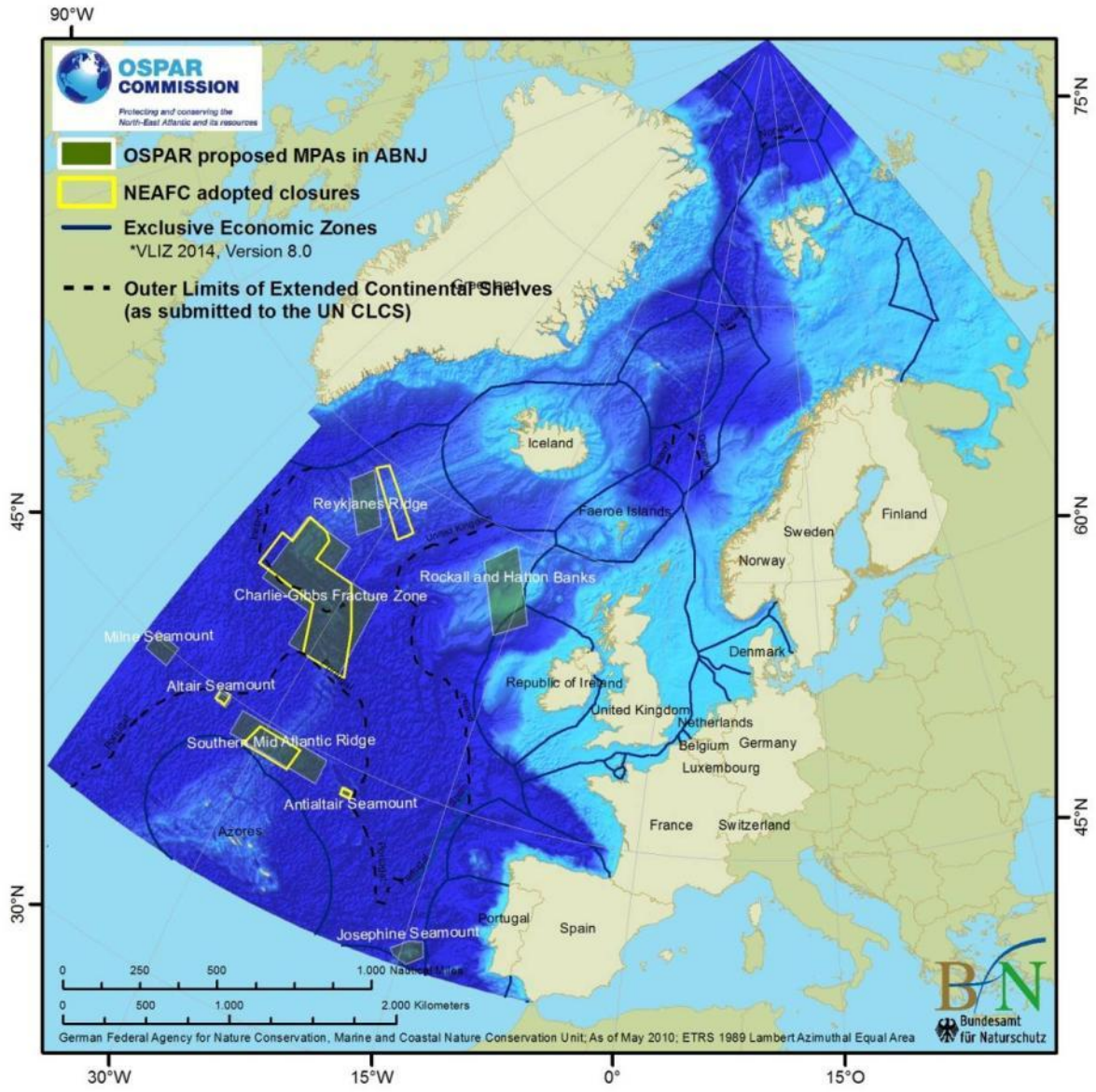

Figure 3. *Submissions of OSPAR CPs to the UN CLCS for an ECS affected the legal situation within the proposed OSPAR MPAs in ABNJ (as of May 2010)*[37].

[37] The boundaries of CPs' EEZs have been obtained from the open source VLIZ Maritime Boundaries Geodatabase. It is noted, that not all of these boundaries as shown in the map have been officially declared by CPs.

Annex IV – List of Abbreviations

ABNJ	Areas Beyond National Jurisdiction
BDC	OSPAR Biodiversity Committee
BfN	German Federal Agency for Nature Conservation
CBD	Convention of Biological Diversity
CP	Contracting Party
ECS	Extended Continental Shelf
EEZ	Exclusive Economic Zone
HELCOM	The Baltic Marine Environment Protection Commission
ICCAT	International Commission for the Conservation of Atlantic Tunas/
ICES	International Council for the Exploration of the Sea
ICG-MPA	OSPAR Intersessional Correspondence Group on Marine Protected Areas
IMO	International Maritime Organization
ISA	International Seabed Authority
IWC	International Whaling Commission
MASH	OSPAR Working Group on Marine Protected Areas, Species and Habitats
MCZ	Marine Conservation Zone
MPA	Marine Protected Area
NAMMCO	North Atlantic Marine Mammal Commission
NASCO	North Atlantic Salmon Conservation Organization
NCMPA	Nature Conservation MPA
NEAFC	North East Atlantic Fisheries Organisation
NGO	Non-Governmental Organisation
OSPAR Convention	Convention for the Protection of the marine Environment of the North-East Atlantic
SAC	Special Area of Conservation
SPA	Special Protection Area
UN CLCS	United Nations Commission on the Limits of the Continental Shelf
UNCLOS	United Nations Convention on the Law of the Sea
UNGA	United Nations General Assembly
VMEs	Vulnerable Marine Ecosystems
WDPAID	World Database of Protected Areas ID
WWF	World Wide Fund For Nature

OSPAR COMMISSION

Protecting and conserving the North-East Atlantic and its resources

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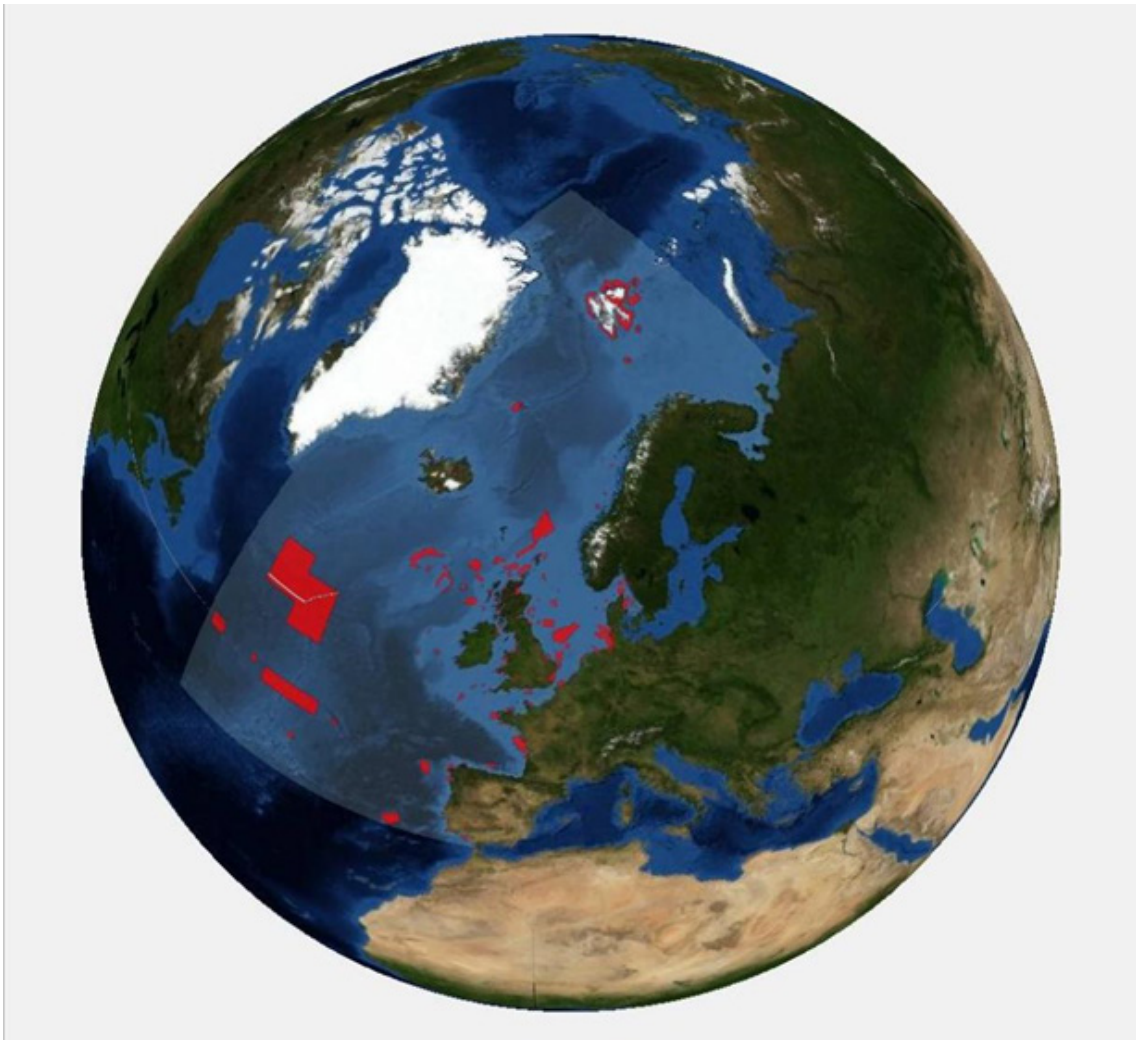

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The Aspect
12 Finsbury Square
London
EC2A 1AS
United Kingdom

t: +44 (0)20 7430 5200
e: secretariat@ospar.org
www.ospar.org

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