Item: 9

**Development and Infrastructure Committee: 6 February 2024.** 

Offshore Wind Power Limited - West of Orkney Wind Farm Applications for Electricity Act Section 36 Consent and Marine Licence.

Report by Corporate Director for Neighbourhood Services and Infrastructure.

# 1. Purpose of Report

To consider the Council's consultation response to the West of Orkney Wind Farm Section 36 Electricity Act and marine licence applications.

# 2. Recommendations

The Committee is invited to note:

# 2.1.

That Offshore Wind Power Limited (the applicant) has submitted applications for consent under Section 36 of the Electricity Act 1989 and marine licences for the construction and operation of the proposed West of Orkney Wind Farm.

# 2.2.

That the West of Orkney Windfarm is proposed to be located 28 kilometres (km) from the west coast of Hoy and 23 km from the north coast of Scotland.

# 2.3.

That the applications for the Section 36 consent and marine licences, referred to at paragraph 2.1 above, are determined by Scottish Ministers/Marine Directorate of the Scottish Government.

# 2.4.

That the proposed development consists of both onshore and offshore components to generate and export power from the proposed offshore windfarm to a new onshore substation at Spittal, Caithness.

# 2.5.

That the consent applications to the Scottish Government, detailed at paragraph 2.1 above, are for the offshore elements of the proposed development.

# 2.6.

That the Council is a statutory consultee for the West of Orkney Wind Farm Section 36 consent and the marine licence applications.

#### It is recommended:

### 2.7.

That the draft consultation response, attached as Appendix 1 to this report, in relation to the applications for consent under Section 36 of the Electricity Act 1989 and marine licences for the construction and operation the proposed West of Orkney Wind Farm, be approved.

# 3. Background

### 3.1.

Offshore Wind Power Limited (the applicant) has submitted applications to the Scottish Government Marine Directorate for consent under Section 36 of the Electricity Act 1989 and for marine licences, under Part 4 of the Marine (Scotland) Act 2010, for the construction and operation of the proposed West of Orkney Wind Farm. This proposed offshore wind farm is located 28 kilometres (km) from the west coast of Hoy and 23 km from the north coast of Scotland.

# 3.2.

The proposed development consists of both onshore and offshore components to generate and export power from the proposed offshore windfarm to a new onshore substation at Spittal, Caithness. The consent applications to the Scottish Government, detailed at section 3.1 above, are for the offshore elements of the proposed development which include:

- Up to 125 Wind Turbine Generators (WTGs) with fixed-bottom foundations.
- Up to five High Voltage Alternating Current (HVAC) Offshore Substation Platforms (OSPs) to transform and export power generated by the WTGs via the inter-array cables and offshore export cables.
- Up to 500 km of inter-array cables installed between the WTGs and OSPs.
- Up to 150 km of interconnector cables installed between the OSPs.
- Up to five offshore export cables from the OSPs to landfalls at Greeny Geo and/or Crosskirk at Caithness, with a total length of up to 320 km (average of 64 km per offshore export cable).

### 3.3.

Planning permission is being sought under the Town and Country Planning (Scotland) Act 1997 for the proposed West of Orkney Wind Farm onshore infrastructure and this is subject to a separate planning application to The Highland Council.

# 4. Consultation Response

### 4.1.

As a relevant planning authority, the Council is a statutory consultee for the West of Orkney Wind Farm Section 36 consent and the marine licence applications.

### 4.2.

The Marine (Scotland) Act 2010 requires that decisions on marine Section 36 consent and marine licence applications be taken in accordance with the National Marine Plan and any relevant regional marine plan in effect. The Orkney Islands Regional Marine Plan (OIRMP) is not currently in effect. The draft plan is with the Scottish Government awaiting sign off for public consultation. In advance of the adoption of OIRMP, the non-statutory Pentland Firth and Orkney Waters Marine Spatial Plan has been adopted by Scottish Ministers as a material consideration in the determination of marine licence and Section 36 consent applications within the Pentland Firth and Orkney Waters area.

### 4.3.

The proposed Council consultation response is attached as Appendix 1 to this report.

#### 4.4.

The principle of the proposed offshore windfarm development is generally supported by national and local planning policy. That said, the draft consultation response highlights key issues that need to be addressed:

- Socio-economic impacts the engagement from the applicant with the Council, local business, economic development interests, local service and training providers should continue as the project progresses to maximise opportunities for local economic development and benefits in Orkney.
- Housing and accommodation availability it is welcomed that the applicant has committed to prepare a Local Accommodation Strategy as part of the proposed programme of mitigation. It is recommended that the applicant liaise with the Council to develop this strategy to ensure that the impact of the proposed development minimises effects on the current already pressured housing system, and this strategy also includes provisions for a long term housing legacy for Orkney's communities. The potential direct effects, and cumulative effects associated with other planned infrastructure construction projects, could be significantly adverse for housing and accommodation availability in Orkney. These effects need to be understood in the context of the current significant shortage of housing in Orkney and high demand for housing for key workers. The applicant should therefore ensure co-ordination with other infrastructure developers working in Orkney at the same time to ensure a joined up and sustainable approach is taken to accommodation requirements for construction workers.
- Commercial Fisheries it is expected by the Council that creelers operating within the Option Area Agreement continue to be engaged by the applicant to mitigate

effects on fishing businesses and associated onshore processing businesses in Orkney.

- Community Benefit it is recommended that the proposed community benefit package, associated governance and implementation strategy should be further developed in line with Council policy and the Scottish Government Good Practice Principles for Community Benefits from Offshore Renewable Energy Developments and in close collaboration with the Council. It is further recommended that a bespoke approach to community benefit be taken forward for Orkney in response to Orkney's circumstances and priorities.
- Habitats Regulations further clarification is required on the proposed off-site measures identified to compensate for any adverse effects on the integrity of three Special Protection Areas to inform decision making on the suitability and feasibility of the proposed measures. The proposed compensation measure is to install a predator proof fence around a small section of coast on one of the larger inhabited islands in Orkney, and to trap and exclude feral cats and rats from within the fenced area. It is considered that supporting the Orkney Native Wildlife Project may be a more relevant, practical and effective means of delivering compensatory measures and that this potential option should be further investigated by the applicant.

# 5. Corporate Governance

This report relates to the Council complying with governance and scrutiny and therefore does not directly support and contribute to improved outcomes for communities as outlined in the Council Plan and the Local Outcomes Improvement Plan.

# 6. Financial Implications

All resources associated with the preparation of the consultation response, attached at Appendix 1 to this report, have been met through staff time and is covered within the existing Development and Marine Planning budgets.

# 7. Legal Aspects

# 7.1.

The planning authority (Orkney Islands Council) is a statutory consultee for the West of Orkney Wind Farm Section 36 consent application under the Electricity Works (EIA) Scotland Regulations 2017.

# 7.2.

The planning authority (Orkney Islands Council) is a statutory consultee for the West of Orkney Wind Farm marine licence applications under the Marine Works (EIA) Scotland Regulations 2017.

# 7.3.

As the delegate for the Orkney Islands marine region under the provisions of the Marine (Scotland) Act 2010, and the Marine Licensing (Consultees) (Scotland) Order

2011, the Council is a statutory consultee for the West of Orkney Wind Farm marine licences.

# 8. Contact Officers

Hayley Green, Corporate Director for Neighbourhood Services and Infrastructure, extension 2301, Email <u>hayley.green@orkney.gov.uk</u>

Roddy Mackay, Head of Planning and Community Protection, extension 2530, Email roddy.mackay@orkney.gov.uk

Susan Shearer, Service Manager (Development and Marine Planning), extension 2533, Email <u>susan.shearer@orkney.gov.uk</u>

James Green, Team Manager (Marine Planning), extension 2516, Email james.green@orkney.gov.uk

# 9. Appendix

Appendix 1: Orkney Islands Council Consultation Response: West of Orkney Wind Farm.

# Orkney Islands Council Consultation Response: Offshore Wind Power Limited - West of Orkney Wind Farm

Applications for Electricity Act Section 36 Consent and Marine Licence.

#### **Orkney Islands Council Consultation Response**

This is the Orkney Islands Council (OIC) response in its capacity as:

- the planning authority; and
- as the delegate for the Orkney Islands marine region under the provisions of the Marine (Scotland) Act 2010/The Marine Licensing (Consultees) (Scotland) Order 2011.

#### Consent applications on which OIC has been consulted by the Scottish Government Marine Directorate - Licensing Operations Team (MD-LOT)

- Section 36 Consent Construction and Operation of Generating Station and Offshore Transmission Infrastructure - West of Orkney Windfarm – West of Hoy, Orkney
- Marine Licence Construction and Operation of Generating Station West of Orkney Windfarm – West of Hoy, Orkney – 00010559
- Marine Licence Construction and Operation of Offshore Transmission Infrastructure – West of Orkney Windfarm – West of Hoy, Orkney – 00010561

#### **Proposed Development**

The West of Orkney Windfarm, located approximately 23 Kilometres ("KM") North of the Caithness coast and 28 KM West of Hoy, Orkney.

The consent applications detailed above are for the offshore elements of the proposed development which include:

- Up to 125 Wind Turbine Generators (WTGs) with fixed-bottom foundations;
- Up to five High Voltage Alternating Current (HVAC) Offshore Substation Platforms (OSPs) to transform and export power generated by the WTGs via the inter-array cables and offshore export cables;
- Up to 500 km of inter-array cables installed between the WTGs and OSPs;
- Up to 150 km of interconnector cables installed between the OSPs; and

• Up to five offshore export cables from the OSPs to landfalls at Greeny Geo and/or Crosskirk at Caithness, with a total length of up to 320 km (average of 64 km per offshore export cable).

#### Planning Policy Context - Overview

Relevant planning policies:

- National Planning Framework 4 (NPF4): Policy 1, 2, 3, 4, 5, 7, 10,11 and 25
- National Planning Framework 4: Annex B National Developments
  Statements of Need
- National Marine Plan (NMP) General Policies
- NMP FISHERIES 1, FISHERIES 2 and FISHERIES 3
- NMP WILDFISH 1
- NMP RENEWABLES 1, RENEWABLES 4, RENEWABLES 5, RENEWABLES 6, RENEWABLES 7, RENEWABLES 8, RENEWABLES 9 and RENEWABLES 10
- NMP REC & TOURISM 2 and REC & TOURISM 5
- NMP TRANSPORT 1, TRANSPORT 3 and TRANSPORT 6
- NMP CABLES 1, CABLES 2 and CABLES 4
- NMP DEFENCE 1
- Pilot Pentland Firth and Orkney Waters Marine Spatial Plan (PFOW MSP) General Policy 1A: Sustainable development
- PFOW MSP General Policy 1B: Supporting sustainable social and economic benefits
- PFOW MSP General Policy 1C: Safeguarding the marine ecosystem
- PFOW MSP General Policy 2: The well-being, quality of life and amenity of coastal communities
- PFOW MSP General Policy 3: Climate change
- PFOW MSP General Policy 4A: Nature conservation designations
- PFOW MSP General Policy 4B: Protected species
- PFOW MSP General Policy 4C: Wider biodiversity
- PFOW MSP General Policy 4D: Landscape and seascape
- PFOW MSP General Policy 4E: Geodiversity
- PFOW MSP General Policy 5A: Water environment
- PFOW MSP General Policy 5B: Coastal processes and flooding
- PFOW MSP General Policy 6: Historic environment
- PFOW MSP General Policy 7: Integrating coastal and marine development
- PFOW MSP General Policy 8A: Noise
- PFOW MSP General Policy 8B: Waste and marine litter

- PFOW MSP General Policy 9: Invasive non-native species
- PFOW MSP Sectoral Policy 1: Commercial fisheries
- PFOW MSP Sectoral Policy 4: Renewable energy generation
- PFOW MSP Sectoral Policy 5: Recreation, sport, leisure and tourism
- PFOW MSP Sectoral Policy 6: Marine transport
- PFOW MSP Sectoral Policy 8: Pipelines, electricity and telecommunications infrastructure
- PFOW MSP Sectoral Policy 10: Defence
- Orkney Local Development Plan (OLDP) Policy 8: Historic Environment & Culture Heritage
- OLDP Policy 9c: Natural Heritage and Landscape
- OLDP Policy 10a: Core Paths and Access

The proposed commercial scale offshore wind development is located in Plan Option area N1 and therefore accords with NMP policy RENEWABLES 1.

The Offshore Planning Statement supporting these consent applications provides a well presented appraisal of the planning policies that are relevant to the environmental and socio-economic effects identified in the Environmental Impact Assessment Report (EIAR). OIC has identified the key policies (non-exhaustive) that are considered most relevant in the Orkney context above and within this consultation response under the appropriate topics.

NPF4 forms part of the development plan. Decisions on planning applications must be made in accordance with the development plan, unless there are material considerations that indicate otherwise. The status of NPF4 in relation to decisions on offshore wind generation station and marine licensable activities below Mean Low Water Springs should be clarified to ensure appropriate implementation of NPF4 in decision making.

NPF4 Annex B, National Developments Statements of Need, describes the developments to be considered as national developments for consent handling purposes. Key national developments include:

1. Energy Innovation Development on the Islands which supports proposed developments in the Outer Hebrides, Shetland and Orkney Island groups, for renewable energy generation, renewable hydrogen production, infrastructure and shipping, and associated opportunities in the supply chain for fabrication, research and development; and

3. Strategic Renewable Electricity Generation and Transmission Infrastructure which supports renewable electricity generation, repowering, and expansion of the electricity grid.

In relation to national development 1. Energy Innovation Development on the Islands, Orkney Islands – Supporting Scapa Flow Future Fuels Hub and Orkney Harbours, class (a) applies to development that is for the delivery of the Future Fuels Hub, new quay in Scapa Flow, and the Orkney Logistics Base at Hatston, which support services for the renewable and marine energy and shipping sectors:

a) New or updated on and/or offshore infrastructure for energy generation from renewables exceeding 50 megawatts capacity;

The Pentland Firth and Orkney Waters Marine Spatial Plan 2016 (PFOW MSP) put in place a planning policy framework in advance of an adopted statutory Orkney Islands Regional Marine Plan to support sustainable decision making on marine use and management. The Plan should be used by the Marine Directorate - Licensing Operations Team (MS-LOT) as a material consideration in the determination of marine licensing and Section 36 consent applications within the Pentland Firth and Orkney Waters area. This consultation response highlights relevant PFOW MSP policies above and under the relevant topics.

The proposed West of Orkney Wind Farm is located within the Orkney Islands Marine Region as designated in the Scottish Marine Regions Order 2015. The various EIAR documents refer to the Scottish Island Marine Area, as identified in the Islands (Scotland) Act 2019 Part 6, to identify the 12 nautical mile limits around the Orkney Islands. In the context of these current consent applications this should instead refer to the Orkney Islands Marine Region. Approximately 45% of the Option Area Agreement (OAA) for the proposed West of Orkney Wind Farm is located within the Orkney Islands Marine Region.

The Delegation of Functions (Regional Marine Plan for the Scottish Marine Region for the Orkney Islands) Direction 2020 delegated regional marine planning functions to Orkney Islands Council (OIC). This established OIC as the delegate and statutory consultee for applications for a marine licence for activities in the Orkney Islands Marine Region under the provisions of the Marine (Scotland) Act 2010/The Marine Licensing (Consultees) (Scotland) Order 2011.

#### **Socio-economic impacts**

Relevant planning policies:

- NPF4 Policy 25: Community Wealth Building
- NMP GEN 2: Economic Benefits
- NMP GEN 3: Social Benefits
- NMP GEN4: Co-existence
- NMP FISHERIES 1, FISHERIES 2 and FISHERIES 3
- NMP RENEWABLES 9 and RENEWABLES 10
- NMP REC & TOURISM 2, REC & TOURISM 5 and REC & TOURISM 6
- PFOW MSP General Policy 1A: Sustainable development

- PFOW MSP General Policy 1B: Supporting sustainable social and economic benefits
- PFOW MSP General Policy 2: The wellbeing, quality of life and amenity of coastal communities
- PFOW MSP Sectoral Policy 1: Commercial fisheries
- PFOW MSP Sectoral Policy 5: Recreation, sport, leisure and tourism

#### Comments:

It welcomed that:

- the assessment of potential socio-economic effects of the proposed development has been undertaken in consultation with OIC, communities and stakeholders, and with a wide-ranging data collection. This engagement from the applicant (Offshore Wind Power Limited, OWPL) with Orkney Islands Council, local business, economic development interests, local service and training providers should continue as the project progresses to maximise opportunities for local economic development and benefits in Orkney.
- OWPL have earmarked investment to develop the skills of the workforce in Orkney to maximise local job creation.
- OWPL have entered into a partnership with Scottish Government, UHI, and other windfarm developers to promote Science, Technology, Engineering and Mathematics (STEM) careers to school children in The Highland Council and OIC areas as well as other parts of Scotland.
- OWPL has committed to provide a £9.3 million investment to support local port and harbour infrastructure in Orkney and Caithness within the first three years of project development to facilitate local participation in the construction and operational phases.
- OWPL will continue to collaborate and coordinate with other project developers and operators across the north of Scotland to help develop a Local Workforce Strategy.
- OWPL is funding a bespoke programme with the European Marine Energy Centre (EMEC) to support innovation and cost reduction relevant to the proposed development and other ScotWind developments.
- OWPL will deliver a skills programme during the first five years of the project's development to support long term employment opportunities in the wind energy sector.

• OWPL have signed agreements with UHI and the Energy Skills Partnership to deliver a local multi-level programme focussed on STEM development, diverse workforce programme, and student sponsorship programme.

OWPL have committed £33.5 million to fund co-investment with the supply chain to help deliver a step change in Scottish and UK supply chain preparedness. OIC expect this investment to extend to bolster the readiness of local supply chains in Orkney to benefit from the construction and operational phases of development.

Again, the status of NPF4 in relation to decisions on offshore wind generation station and marine licensable activities below Mean Low Water Springs should be clarified to ensure appropriate implementation of NPF4 in decision making.

NPF4 Policy 25: *Community Wealth Building* aims to support local economic development that focuses on community and place benefits as a central and primary consideration – to support local employment and supply chains. This includes improving community resilience, increasing spending within communities, ensuring the use of local supply chains and local job creation. These should be important factors in the determination of the consent applications for this proposed offshore wind farm development. Furthermore, the PFOWMSP General Policy 1B outlines policy provisions to maximise opportunities to support local supply chains and create skilled employment in local communities. It is recommended that these policies be appropriately implemented by MD-LOT to help secure socio-economic benefits for host communities including Orkney.

NPF4 states that new infrastructure will be needed to help to shift industrial activity towards supporting the offshore renewables sector including in Scapa Flow and Hatston, Kirkwall.

It is agreed that job creation and change in employment levels in Orkney will have a moderate (significant, beneficial) effect for the construction and operational phases. It is recommended that the developer should continue to engage with the established Socioeconomic Working Group to uplift employment benefits in Orkney from the estimate low case scenario.

It is agreed that the change in GVA levels in Orkney will have moderate (significant, beneficial) effect for the construction and operational phases. It is recommended that the developer should continue to engage with the established Socio-economic Working Group to uplift GVA benefits in Orkney from the estimate low case scenario.

The commitment by the applicant to develop and implement a proposed Local Workforce Strategy is strongly supported by OIC. This strategy should be taken forward with close engagement with OIC to maximise opportunities for local economic development and benefits in Orkney.

# Change in demand for housing and local services resulting from the proposed development

Due to the significant numbers of construction workers required in Orkney for the West of Orkney Wind Farm construction phase, and their associated temporary housing requirements, there are likely to be significant impacts on the housing market for existing residents and the provision of tourist accommodation. The magnitude of the impact will be influenced by the number of direct and other jobs expected to be created during the construction and operational phases, and the proportion of these jobs that are taken up by workers who already reside in Orkney.

EIAR Volume 1, Chapter 19, Socio-economics, section 19.6.1.3, states that:

- the Low Case scenario for the proposed development predicts an annual need for a local workforce in Orkney amounting to 123 workers during construction.
- A worst case scenario assumes that 10% of these workers would require to be accommodated in private rented housing locally, with the remainder supplied by different types of tourist accommodation.
- The magnitude of impact for housing demand during the construction stage is therefore concluded in the EIAR to be High for Orkney under the worst case scenario.
- The low-case scenario for the proposed development suggests that recruitment of the local workforce during the operational stage could reach up to 16 workers over a 10-year period.
- The EIAR identities an additional demand for 16 dwellings during the operational stage, representing an increase of 2.5% to the predicted total demand for Orkney over the same 10-year period.

EIAR concludes that the change in demand for housing and local services resulting from the proposed development would have a moderate (significant, beneficial) impact. The significance of the potential effects during construction on the housing and local services receptors for the worst case scenario in Orkney has been assessed as the combination of a medium sensitivity receptor (Orkney's housing market) and a high magnitude of impact producing a moderate consequence that is beneficial and significant in EIA terms.

It is unclear how a moderate beneficial effect has been concluded regarding effects on the local housing market and accommodation provision in Orkney. The potential direct effects, and cumulative effects associated with other planned infrastructure construction projects, could be significantly adverse for housing and accommodation availability in Orkney. These effects need to be understood in the context of the current significant shortage of housing in Orkney and high demand for housing for key workers. EIAR Volume 1, Chapter 19 - Socio-economics, Table 19-4, Summary of key datasets and reports identifies Orkney Local Housing Strategy 2017-2022 (drawing from 2016/17 HDNA). It should be noted that this housing strategy is now out of date and a new strategy is currently being prepared by Orkney Islands Council. A public consultation on the new Orkney Housing Strategy is anticipated in early 2024.

In March 2023, OIC commissioned the Orkney Islands Essential Workers Housing Strategy to help identify and address challenges faced by Orkney residents and incoming workers relating to very high housing demand and constrained supply. This strategy has been developed and is referenced within the context of the new Orkney Housing Need and Demand Assessment and emerging Local Housing Strategy that will identify housing requirements across all of Orkney's population.

In October 2023, a new Orkney Islands Council Housing Need and Demand Assessment (HNDA) was appraised by the Scottish Government's Centre of Housing Market Analysis (CHMA), on behalf of the Scottish Government, as being robust and credible. The HNDA outlines the housing market drivers and the significant housing pressure experienced in Orkney including:

- Higher the average population growth Since 2001, the population in Orkney has increased by 17%, compared with 8% across Scotland. This has been driven by high net migration.
- This has resulted in much higher household growth than found on average in Scotland 29% in Orkney compared to 15% Scotland over the last 20 years.
- It is predicated that population and household growth will continue. There is evidence of a higher level of net migration in recent years and in addition, significant temporary migration (i.e. 'supplementary' workforce who live in Orkney on a rotational basis and agency staff), which is not captured in projections – this temporary population adds further housing pressure. There is evidence of migration being constrained due the lack of housing for incoming permanent workers.
- Pressure is evidenced by increasing house prices, and rental prices, and lack of availability of private rented and social rented housing for residents and essential incoming workers. Most recent data from Registers of Scotland shows Orkney house price growth being double the Scottish average (2021/22 and 2022/23).
- There is significant potential for economic growth in Orkney as part of the Islands Growth Deal and from the renewables industry. This has impacts on short-term and longer-term housing needs.

The HNDA shows a range of scenarios and resultant new housing supply requirements over the next 20 years. The Council's emerging housing strategy is adopting the principal scenario which will result in a Housing Supply Target of 103 new houses per annum, on average 92 new houses across tenure over the next 20 years (a total of 1,837 new housing units is required over the next 20 years).

The Essential Workers housing strategy considers the housing needs of:

- keyworkers and other essential workers moving to Orkney permanently;
- agency/interim staff working in Orkney, who are living temporarily in Orkney for work purposes, but who are permanent residents elsewhere;
- students moving to Orkney for study;
- workers required for potential infrastructure construction projects.

The Orkney Islands Essential Workers Housing Strategy estimates that at least 1,359 bedspaces will be required to accommodate construction workers for potential infrastructure projects that may start in the islands from 2024 (pending approvals). These are temporary housing requirements but may have a very significant impact on the housing market for existing residents. In addition to the temporary requirements, the strategy estimates that at least 200 additional long-term jobs will be created for the operational phases, 100 of which are assumed to be filled by new households to Orkney. The infrastructure projects that have informed this assessment include, the Finstown SSEN Interconnector Substation, projects under the Islands Growth Deal and projects under the Orkney Harbours Masterplan (Scapa Deep Water Quay, Hatston Logistics Base and Lyness).

It is welcomed that OWPL have committed to prepare a Local Accommodation Strategy as part of the proposed programme of embedded mitigation (EIAR Volume 1, Chapter 19 - Socio-economics, Table 19-31). It is recommended that the developer liaise with OIC to develop this strategy for temporary construction workers in Orkney for the proposed offshore wind farm development which ensures that the impact of the development minimises effects on the current already pressured housing system, and this strategy also includes provisions for a long term housing legacy for Orkney's communities. Consideration will need to be given to the predicted timing of the construction/operation of other infrastructure projects and the potential for cumulative effects. The developer should ensure co-ordination with other infrastructure developers working in Orkney at the same time to ensure a joined up and sustainable approach is taken to accommodation requirements. It is recommended that a Local Accommodation Strategy for Orkney be secured by MD-LOT via the appropriate consent.

On a related matter, the EIAR Volume 1, Chapter 19 - Socio-economics, section 19.6.1.4 considers the potential effect during construction on tourism bedspaces. Given that the current pressure on the provision of tourist accommodation is very high on Mainland Orkney during the tourist season, it is recommended that measures be put in place to mitigate further pressure from the housing of construction workers in tourist accommodation during the project construction phase.

#### **Commercial fisheries**

The EIAR assessment, Chapter 14 Commercial Fisheries, concludes that the majority of impacts on commercial fishing during construction will be highly localised, short term and not significant. However, potential significant effects on creelers from temporary loss or restricted access to fishing grounds and displacement of fishing effort within the OAA during construction have been identified.

The EIAR concludes that creeling is expected to resume in the Project area following construction. However, it is recognised that some larger vessels may not choose to resume to fish or transit through the OAA due to potential safety risks.

There are up to 125 proposed wind turbine generators and over 500 km of cables laid between wind turbine generator (WTG) foundations, potentially presenting collision and entanglement risks with vessels/creels. It is therefore expected by OIC that the vivier crabber operating within the OAA continues to be engaged to mitigate effects on fishing businesses and associated onshore processing businesses in Orkney. The OWPL commitment to develop cooperation agreements to address construction and operational phase impacts on fishing interests is welcomed.

The mitigation summarised in the Outline Fisheries Management and Mitigation Strategy (FMMS) indicates that it would be appropriate to put resources into research projects for commercially important fish and shellfish species. The FMMS states this is to ensure that research and monitoring resources are aligned with strategic initiatives, such as the Scottish Marine Energy Research (ScotMER) fish and fisheries evidence map. It is recommended that Orkney fishing interests participate in the identification of these research and monitoring priorities including the Orkney Regional Inshore Fisheries Group and the Orkney Fisheries Association. This could, for example, seek to address data gaps on fishing effort and value for Orkney's inshore fishing activities as an update to ScotMap.

The EIAR Volume 1, Chapter 19, Socio-economics, Table 19-39 *Summary of potential effects: Orkney, and section 19.6.1.5 and 19.6.25,* identifies the effect of change in the value of onshore business activity linked to commercial fishing as minor (not significant) for the construction and operational phases. The EIAR socio-economic assessment identifies that landings from the commercial fisheries offshore study area (ICES rectangles 46E5, 46E6, 47E5, 47E6) into Stromness were £1,719,739 in 2022. It is recommended that the OWPL continue to liaise with creel fishing interests to ensure that impacts of the proposed offshore wind farm on processing businesses in Orkney are minimised.

Refer to Fish and Shellfish Ecology comments below regarding potential effects on brown crab.

#### Community benefit package

#### Comments:

National Marine Plan (NMP) Renewables Policy 10 states that Good Practice guidance for community benefit from offshore wind and marine renewable energy development should be followed by developers, where appropriate.

In accordance with the Orkney Islands Council Policy on Community Benefit from Offshore Renewable Energy Developments, the Council will seek to maximise community benefits from new offshore renewable energy generation developments, and to help direct these benefits fairly and equitably into supporting the communities of Orkney.

Orkney Islands Council's policy on community benefit from offshore renewable energy developments is as follows:

- We expect all developers of commercial offshore renewable energy projects in Orkney waters to commit to providing community benefit to Orkney and will seek to enter discussions with developers to achieve this.
- We will seek to ensure the fair and equitable distribution of benefits received as part of any community benefit scheme.
- We expect developers to enact a Community Benefit policy in line with the draft 'Scottish Government Good Practice Principles for Community Benefits from Offshore Renewable Energy Developments' 2018, or any future updated iteration of that document.
- In the absence of a clear position from the Scottish Government on the appropriate level of community benefit from offshore renewable generation, the starting point for determining the level of community benefit which should be delivered is £5,000 per megawatt installed per year index linked (as per onshore developments).
- We do not spatially limit our interest or claim for community benefit payments for Orkney and will seek community benefit from any project in waters adjacent to Orkney, regardless of distance from shore.
- There are numerous ways in which community benefit may be delivered (whether monetary or in-kind), but developers should be able to clearly demonstrate the value of community benefit that has been provided.

The above policy relates to offshore renewable energy generation projects. Location of ancillary onshore infrastructure related to offshore generation is a separate consideration, for which the Council may seek to negotiate separate community

benefit arrangements.

The Council recognises that some offshore renewable generation projects, particularly in the wave and tidal energy sectors, are pre-commercial. The above policy is only applicable to commercial projects.

#### The above policy does not confer support for any proposed development.

It is welcomed that the OWPL propose to establish a Community Benefit Fund (CBF) to commence at first generation and continue for the operational life of the proposed development (30 years). OWPL state in the EIAR that the CBF will be shared across communities in Caithness, Sutherland and Orkney.

OIC recommend that a CBF, associated governance and implementation strategy should be further developed in line with the above OIC policy and the Scottish Government Good Practice Principles for Community Benefits from Offshore Renewable Energy Developments and in close collaboration with OIC, Community Councils and the wider Orkney community. It is recommended that a bespoke approach to community benefit be taken forward for Orkney in response to Orkney's circumstances and priorities. The proposed community benefit package should seek to address the Orkney Community Planning Partnership priorities including:

- <u>Sustainable Development</u> supporting Community Wealth Building and achieving Net Zero by 2030.
- Cost of Living Crisis and tackling the underlying causes of poverty.
- Local Equality so residents in all parts of Orkney have equal opportunities.

The high cost of energy for consumers in Orkney is a significant contributing factor to poverty and economic inequality. The CBF should therefore aim to address these issues.

The Scottish Government Good Practice Principles provide guidance regarding the identification of host communities for the purposes of designing community benefit packages. The guidance states that this process should be undertaken at an early stage to allow communities the opportunity to contribute to discussions and self-identify as a host community, in line with Scottish Government Empowerment policy.

Approximately 45% of the OAA for the proposed West of Orkney Wind Farm is located within the Orkney Islands Marine Region to which Orkney communities have significant economic, governance and cultural connections. The Orkney Islands are therefore a principal host community for the proposed offshore wind farm development and should significantly benefit from the utilisation of the associated natural resources via a commensurate community benefit package.

EIAR Volume 1, Chapter 19 - Socio-economics, Table 19-3 states that a Socio-Economic Working Group has been established to facilitate consultation with local stakeholders. It is further stated that over the EIA process, four quarterly consultation meetings were held and it is intended that following successful consent award, the Socio-Economic Working Group (or equivalent) will continue and OWPL will work with the Working Group (or equivalent) to support wider development initiatives such as implementation of the Supply Chain Development Statement (SCDS) and development of a community benefit fund.

EIAR Volume 1, Chapter 19 - Socio-economics, Table 19-31) identifies that short term priorities for the CBF could include supporting existing local initiatives (e.g. through sponsorship), local business grants and support for energy bills. Medium term priorities could include digital connectivity, affordable housing and sustaining communities. Long term priorities include natural capital and community. It is recommended that broad engagement be undertaken with OIC, Community Councils and wider Orkney communities to develop the proposed community benefit package in response to local priorities and needs. This should include the design and agreement of the composition, delivery mechanism and structure of the community benefit package.

OIC expects that an appropriate binding agreement will be established to guarantee the provision of a CBF.

Community benefits from offshore renewables projects are complementary to, but independent from, environmental, supply chain and other socio-economic benefits. OIC notes that, as outlined in the Scottish Government Good Practice Principles, voluntary monetary payments to the community (or a Community Benefit Fund) are not related to the impacts from any planning (or other consent) application. It is therefore expected that the necessary mitigation, and funding of this mitigation, to address effects identified in the development EIA, should be delivered in addition to community benefit.

#### Seascape, Landscape and Visual Impacts

Relevant planning policies:

- NMP GEN 7: Landscape/seascape
- NMP REC & TOURISM 5
- NPF4 Policy 4c: Natural Places
- NPF4 Policy 11e: Energy
- OLDP Policy 9c: Natural Heritage and Landscape
- OLDP Policy 10a: Core Paths and Access
- PFOW MSP General Policy 4D: Landscape and seascape

#### Comments:

The Seascape Landscape and Visual Impact Assessment (SLVIA) identifies:

• No significant effects on the Special Landscape Qualities (SLQ) or integrity of the Hoy and West Mainland National Scenic Area (NSA).

- Significant visual effects would be experienced at visitor destinations; Rackwick Bay and the Old Man of Hoy.
- Significant visual effects would be experienced from the Scrabster to Stromness ferry route.
- Significant effects on seascape / coastal character to parts of the Rora Head and St John's Head Regional Coastal Character Area (RCCA) in Hoy.
- Significant visual effects would be experienced from parts of two core paths in Orkney including the path to the Old Man of Hoy, and the path along Rackwick Beach in Hoy.

The key policy test applied to assessing effects on a National Scenic Area is whether impacts would affect the integrity of the area as a valued landscape. The Hoy and West Mainland National Scenic Area is experienced as an integrated landscape and seascape. The UK Marine Policy Statement (MPS) states that references to seascape should be taken as meaning landscapes with views of the coast or seas, and coasts and the adjacent marine environment with cultural, historical and archaeological links with each other. Seascape can therefore be considered an umbrella term that covers both the visual resource and marine character.

The relationship between land and water, or seascape, are a fundamental part of the Hoy and West Mainland National Scenic Area's special qualities. It is therefore unclear why the area's Special Landscape Quality (SLQ) of 'land and water in constantly changing combinations under the open sky' has been scoped out of the assessment detailed at Table 18-33 of the SLVIA. The SLVIA states that this SLQ has not been assessed because changing skies, combination of water, land, sea and sky, and weather patterns would not be affected by the offshore project. OIC considers that the proposed development will significantly affect the seascape elements of the NSA and that the stated SLQ should be scoped into the SLVIA. The effect of scoping this SLQ out could result in an underestimation of the magnitude of change and level of effect on the SLQs of the NSA.

To inform an assessment under National Marine Plan (GEN7 and para. 4.28), NatureScot will need to advise whether there would be significant effects on the special landscape qualities of the Hoy and West Mainland NSA and whether the integrity of the NSA has been compromised. If it is determined that the integrity of the NSA has been compromised, MD-LOT/ Scottish Ministers will need to determine whether any significant adverse effects on the qualities for which the area has been designated are clearly outweighed by social, environmental or economic benefits of national importance.

It is acknowledged that SLVIA has assessed the worst case scenario which includes the maximum height of the Wind Turbine Generators (WTGS), at approximately 360 metres

to blade tip height, and a maximum number of WTGs (125) sited along the Option Agreement Area's (OAA) perimeter with the greatest density applied to the largest WTGs.

It is welcomed that secondary mitigation will be implemented in the form of an iterative design process during the post-consent development of the array layout, including consideration of key SLVIA receptors and viewpoints. The design objectives, identified in section 18.11 of SLVIA, to reduce the levels of identified effects on important landscape/visitor receptors are supported and should be implemented to minimise landscape, seascape and visual effects.

#### Habitats Regulations – proposed compensation measures

Relevant planning policies:

- NMP GEN 9 Natural Heritage
- NMP GEN 13 Noise
- PFOW MSP General Policy 4A: Nature Conservation Designations
- PFOW MSP General Policy 4C: Wider Biodiversity
- OLDP Policy 9c: Natural Heritage and Landscape

#### Comments:

Off-site compensation measures are proposed by the applicant, without prejudice, to mitigate adverse effects on site integrity for the East Caithness Cliffs, North Caithness Cliffs, Sule Skerry and Sule Stack Special Protection Areas (SPAs), due to likely significant effects on the populations of great black backed gull, guilliemot, kittiwake and puffin that would result in adverse effects on the integrity of the SPAs. Although the HRA Compensation implementation and monitoring plan, section 3.1.1, does not identify a single specific location within Orkney for delivery of the proposed compensation measures, page 33 of the Compensations Measures Plan identifies four potential islands that have been short listed by the applicant for further investigation (post consent) of their potential for delivery of the proposed compensation measures, subject to landowner and legal agreements. The proposed compensation measure is to install a predator proof fence around a small section of coast on one of the larger inhabited islands in Orkney, and to trap and exclude feral cats and rats from within the fenced area. The objective being to reduce predation to boost seabird breeding success, to compensate for those lost as a result of the proposed development.

There are a number of environmental questions that need answers to help inform decision making on the suitability and feasibility of the proposed compensation measure (in addition to consideration of other issues such as archaeology, landscape and

drainage as part of a separate planning process for such a fence or fences<sup>1</sup>). There is reliance in the Compensation Implementation and Monitoring Plan (sections 3.1.3-3.1.5) on future feasibility study, field work, data collection and analysis, which leaves many questions unanswered at this stage, inhibiting the opportunity for informed decision making and significantly reducing confidence that the proposed compensation measures would deliver the intended population benefits to the four seabird species. The questions that need to be answered now, in order to inform decision making, centre around the choice of the location for delivery of the proposed compensation measure and the likelihood of it achieving its intended objective in relation to the three SPAs. There are also concerns that need further consideration around the potential for the measure to have adverse effects on non-target species and habitats:

- The islands short listed to deliver compensation measures are geographically separated from the SPAs by mainland Orkney and/or Hoy and/or the Pentland Firth/North Atlantic. It therefore seems unusual to seek to deliver compensation measures when the affected SPAs are located to the south and west on mainland Scotland and in the North Atlantic. While the Compensation Implementation and Monitoring Scheme report and the Compensation Measures Plan seek to provide some explanation, they rely on UK wide species studies, which, while informative, are not related to the affected SPAs. The documents do not deliver a robust enough justification for the selection of the proposed compensation measures or the short listed islands. This leads to a number of questions that the decision maker will need to be satisfied on: Why choose islands that are geographically remote from the affected SPAs - why are compensation measures not being delivered at or in proximity to the affected SPAs? What is the scientific rationale for choosing the short listed islands in relation to the SPAs? While great black backed gull, guillemot, kittiwake and puffin have been recorded on the short listed islands in the past, are they still present and in sufficient numbers? Do the species breed together in a location that would enable delivery of the compensation measures in one place on one of the short listed islands, or would multiple delivery sites be required? Is predation of breeding colonies by feral cats and/or rats a significant issue for the four seabird species at the short listed islands, or are other factors limiting their populations?
- The Offshore HRA: Report to inform Appropriate Assessment document, page 425, states that "Available tracking data from kittiwakes..., guillemots ... and razorbills ... all show a similar pattern. Birds that breed on the eastern side of the Orkney Islands, do no[t] forage on the west side of the Orkney Islands and vice versa." It would be reasonable to assume that such a pattern is similar in seabirds breeding in other

<sup>&</sup>lt;sup>1</sup> This would be an application for planning permission or, if the works fall within permitted development provisions of Schedule 1 of Part 3 of The Town and Country Planning (General Permitted Development) (Scotland) Order 1992, an application for approval under Regulation 62 of The Conservation (Natural Habitats, &c.) Regulations 1994, including assessment of whether the development would be likely to have a significant effect on a European site.

locations, such as those from the three SPAs, as well as those from the short listed islands.

Based on the evidence presented in the above report, it is probable that seabirds breeding on the short listed islands forage away from and do not have connectivity with the three SPAs. As there does not appear to be a clear or direct connection, it is doubtful that the proposed compensation measure would directly benefit the SPA populations. In addition, the Offshore and Intertidal Ornithology Report (Environmental Report chapter 13, section 13.4.5) cites evidence that the effects of climate change are the greatest challenge to seabirds, with other issues such as competition from fisheries for seabird prey species and diseases such as avian influenza also affecting seabird populations.

In light of the above, there are a number of questions that the decision maker will need to be satisfied on: Has it been sufficiently demonstrated that there is a direct connection between the three SPAs and seabirds breeding at the short listed islands? If it is considered that there is a direct connection, would the proposed compensation measures benefit the SPA populations of guillemot, puffin, kittiwake and great black backed gull? For example, while in theory a fenced area might enable greater breeding success by reducing predation within the fenced area (assuming that these species are present at the location and that predation is a limiting factor), how much confidence is there that the proposed measures would be effective and that other factors (such as prey availability, changing temperatures and weather patterns caused by climate change, diseases such as avian influenza, etc) would not continue to limit the populations of the four seabird species? If feral cats and rats are removed, what is the likelihood of other predators moving in to fill the ecological niche, such as skuas and corvids, and how would this be addressed without causing further ecological imbalance? Have adverse effects caused by the fence on the four seabird species been taken into account when assessing the suitability of the proposed measure – for example, the potential for injury and death caused by the collision risk the fence presents to birds, particularly during periods of bad weather and low visibility, and when evading avian predators?

 Separate to consideration of the proposed compensation measures in relation to the SPAs and Habitats Regulations highlighted above, attention needs to be given to the potential for adverse effects on wider biodiversity. The fence element of the proposed compensation measure raises significant concerns.

For example, many coastal locations in Orkney have a thin layer of soil on top of bedrock, overlain with sensitive maritime habitats. Is there sufficient soil depth to bury the lower portion of the fence without disconnecting the soil from the bedrock, which would increase the potential for erosion from wind, spray, precipitation and run off? How would adverse effects on soils and vegetation be minimised during installation, particularly during the excavation that would be required to install fence posts and bury the lower portion of the fence? How would the land be managed on

the inland side of the fence, for example to minimise effects of trampling along the fence line by livestock?

The likely coastal cliff top location(s) significantly increases health and safety risks for personnel and livestock, meaning that human or livestock intervention may not be feasible for management of vegetation within the fence. So how would vegetation on the coastal side of the fence be managed during the lifetime of the fence, such that it does not become rank and adversely affect the species composition of the existing habitats?

The fence also has the potential to prevent passage of protected species such as otter or other important species such as the endemic Orkney vole (a Scottish Biodiversity List species), as well as posing a collision risk for birds during bad weather and low visibility - has this been adequately assessed and mitigated? Although the Compensation Implementation and Monitoring Report (section 3.4.1) recognises the potential for non-target species to be stuck within the fenced area in relation to the potential for stuck animals causing disturbance to nesting birds, there is no consideration of welfare issues that would arise should the stuck animals be left without sufficient supporting shelter, food and access to water.

The potential for displacement effects caused by predators being excluded from an area they would normally forage over also requires to be addressed. Displacement effects could increase predation in the area immediately surrounding the fenced area, which would adversely affect prey species such as breeding birds and small mammals, including the Orkney vole.

Many of these issues identified above are recognised within the documents supporting the EIAR, however there is reliance on answering or addressing them post-consent. This is not considered to be appropriate for compensatory measures associated with adverse effects on site integrity. Sufficient information should be provided now to provide confidence that the proposed compensation measures would deliver the intended benefits in relation to the SPAs, and to enable informed decision making in relation to wider biodiversity. The proposed predator fence(s) would require a formal planning process, which would require the assessment and satisfactory mitigation of potentially significant environmental, landscape, historic environment and socioeconomic effects. This introduces a potential risk to the delivery of the proposed compensation.

However, because of the outstanding questions about the suitability and feasibility of the proposed compensation measures outlined above, if Scottish Ministers consider that off-site compensatory measures are required under the Habitats Regulations to address adverse effects on site integrity of the three SPAs, it is considered that an alternative compensation method should be explored. If compensation cannot be delivered in location(s) more directly connected with the three SPAs, then the suggested alternative measure could be to support the ongoing long term delivery of the Orkney Native Wildlife Project (ONWP) in the control and detection of stoat, an invasive non-native

species in Orkney that predates breeding seabirds (and other species). The ONWP is currently a short term funded project, which could benefit from long term funding to ensure control measures continue towards eradication, and to enable biosecurity stoat detection methods to be refined and deployed to prevent future incursions or the spread of stoats to the ferry linked isles.

The ONWP benefits from currently having an existing operating framework including extensive landowner agreement and engagement across Orkney. As a result, the ONWP includes trapping around the mainland Orkney coastline. Supporting the continued delivery of the ONWP in the long term would therefore benefit the four seabird species over a wider geographical area when compared to the proposed very limited geographical coverage of a small section of the preferred island. ONWP trapping includes the west coast of the Orkney mainland, which is more likely to have some form of connectivity with the three SPAs through overlapping foraging areas. Consequently, the ONWP is more likely to meaningfully contribute to compensating for the population effects on the SPA seabird species caused by the proposed wind farm.

Compared to a static predator fence, ONWP traps are easy to deploy and maintain, have minimal adverse environmental effects and can be easily moved to respond to sightings. Supporting the delivery of the ONWP is therefore considered to potentially be a more practical and effective means of compensating for adverse effects on site integrity for the SPAs in the long term, while having minimal adverse environmental effects (when compared to the proposed measures on the preferred island).

ONWP is also exploring means of bio-security monitoring of vehicles and cargo at harbours in Orkney, to identify presence of stoat in loads coming into Orkney and those going to the ferry linked isles. Supporting the ONWP long term could help develop effective biosecurity measures to prevent future incursions. The ONWP could also benefit wider biodiversity, as stoat predate on a wide range of bird species and the endemic Orkney vole.

As a result of the above, supporting the ONWP has potential to be a more relevant, practical and effective means of delivering compensation for any adverse effects on the integrity of the three SPAs. It is therefore recommended that this potential option be further investigated by the applicant.

#### **Biodiversity Enhancement**

Relevant planning policies:

- NPF4 Policy 3b (Biodiversity)
- NMP GEN 9: Natural heritage
- PFOW MSP General Policy 1A: Sustainable development

Comments:

National Marine Plan, para. 4.40, states that marine planners and other decision makers should act in the way best calculated to further the achievement of sustainable development and use, including the protection and, where appropriate, enhancement of the health of the Scottish marine area. This reflects the statutory duty on Scottish Ministers and public authorities in Marine (Scotland) Act 2010, section 3.

The nature positive design of the development is welcomed, with a high level of embedded mitigation techniques (e.g. cable burial as first choice, landfall avoiding salmonid river, development of piling strategy, blade clearance of 27.05m from MSL, a fisheries management and mitigation strategy etc). However, the marine biodiversity enhancement proposals are relatively minor; installation of storm petrel nesting boxes at Sule Skerry and Sule Stack.

More proportionate provisions of marine enhancement should be expected, particularly within Orkney waters, considering that 45% of the development falls within the Orkney Islands Marine Region. It would be preferable for more ambitious marine biodiversity, natural capital and ecosystem service enhancement to be delivered as part of this proposed development, and for these enhancement provisions to be secured within the appropriate consent.

Potential options which have been utilised elsewhere which are not explored by the applicant include artificial reef creation through reef friendly rock placement/scour protection and cable materials, attachment of reef cages to foundations, marine litter removal projects, and the delivery of off-site restoration projects (e.g. native oyster bed restoration), for example. Often with offshore developments, offsite interventions may deliver greater net gain and be more cost effective, due to the offshore location of the works.

Due to the dynamic and data-poor environment in the marine context, the commitment by the developer for ongoing commercial species monitoring is welcome (see fish and shellfish ecology comments).

#### Marine Archaeology and Cultural Heritage

Relevant planning policies:

- NPF4 Policy 7: Historic assets and places
- NMP GEN 6: Historic Environment
- OLDP Policy 8: Historic Environment & Culture Heritage
- PFOW General Policy 6: Historic Environment

#### Comments:

The matters raised on marine archaeology and culture heritage in this response is only to the parts of the EIA that are relevant to the OIC remit, i.e. relevant matters in the Orkney Islands Marine Region, and the setting of onshore assets in Orkney. All other

relevant historic environment matters are within the remit of MD-LOT and/or The Highland Council.

The methodology is endorsed.

The baseline studies are comprehensive, apart from two omissions:

- Marine cores have not been taken and therefore results from them concerning submerged deposits and paleoenvironmental remains could not be included in the baseline. However, it is stated that this will be done post consent, thus filling the data gap, which is acceptable;
- Figure 16-7 shows SS Navarra (1940) PA, just outwith the OAA, but since the vessel is Position Approximate, presumably the actual location could be within the OAA boundary. This appears to be a Norwegian vessel sunk by U-boat, with crew lost, so of high importance. It is not in SS15 Table 1. Why this omission? The embedded mitigations of analysis of the marine geophysical survey data and the production of a PAD are applicable to this asset.

The potential impacts identified and requiring assessment are considered appropriate, reasonable and proportionate by OIC.

The embedded mitigation measures, which must be adhered to in order to achieve the non-significant residual impacts, including the Outline Management Plan (OMP1) with its Appendix A6 outline of a Written Scheme of Investigation (WSI) and Protocol for Archaeological Discoveries (PAD) are considered to be appropriate. The approach of following the PAD format detailed in the 'Protocols for Archaeological discoveries: Round 3 Offshore Renewables Project' (The Crown Estate and Wessex Archaeology, 2014) is supported. The WSI should follow 'Archaeological Written Schemes of Investigation for Offshore Wind Farm Projects' (The Crown Estate and Wessex Archaeology, 2021).

The assessment of potential effects during construction (including pre-construction), decommissioning, operations and maintenance is supported apart from aspects of long-term changes to the setting of onshore historic environment assets. These concerns are outlined below.

In general, the setting assessments underestimate the contribution of the open seascape to the setting of the assets and of the relationships of assets to the sea, not just to other sites and the landscape. This has led to sometimes underestimating the magnitude of impact. Related to this is a discrepancy in the use of the phrase 'adequately retains integrity', which is used in Table 16-11 criteria for assessing magnitude on setting in relation to medium magnitude of impact, yet is applied in some cases (VP21 Rackwick, Wireline E Point of Buckquoy, Wireline I Hall of Clestrain) where it is stated that the impact is of low magnitude.

It should be noted that impact on the integrity of setting is not always assessed (HONO WHS Bay of Skaill, Wireline F Knowes of Trotty / HONO WHS West Mainland, VP 27 Kitchener Memorial, VP 28 Earl's Palace Birsay) resulting in inconsistent information on which to draw conclusions.

There is a factual error in the baseline description assessment for Skara Brae, which states that when it was built, the village was situated over 1 km from the sea's edge. The scientific evidence so far indicates that the village was built only up to 500m from the sea's edge, and so with the sea and its resources playing an important part in the setting of the village. It is similarly mistaken in stating that views to and from Skara Brae are restricted to its immediate environs, when clearly there are views out from Skara Brae Brae to the open sea. However, this view from Skara Brae itself would not have the WOWF in it, although it would be visible from the centre and north of the Bay of Skaill. It is agreed that this would not have a significant effect on the integrity of the setting of the WHS or its Outstanding Universal Value.

VP 28 Earls Palace Birsay assessment creates some confusion between the visualisation showing WOWF and the statement that it is not visible from the Palace for which no reason is given. However, the WOWF would be visible in the background of the approach views from the east, down to and over the Palace. The effect of this has not been assessed.

Wireline E Birsay carpark and Point of Buckquoy omits an assessment on the approach to the Brough of Birsay, which is the main reason for parking there, and if that significantly affects the views to the Brough, its appreciation, understanding, experience and integrity of setting.

Apart from the potential setting issues outlined, we essentially agree with the assessment of potential cumulative effects, inter-related effects, trans-boundary effects and the Whole Project assessment as they relate to the Orkney Islands Marine Region and the setting of Orkney's onshore assets.

In conclusion, there will be a clearly visible change in the seascape and the setting of sites and monuments on the west coast of Orkney. Whilst this change will be distant, it is counterbalanced by the scale and geographical spread of the proposed development. It seems likely that this will not result in significant impacts on the integrity of the setting of sites and monuments, thus reducing their value. However, addressing the issues outlined above will enable that conclusion to be more robust.

As outlined above, the derogation case and associated compensatory measures may require a planning application, and potentially an EIA, which would include an assessment of any significant effects on the historic environment. Most of the shortlisted islands identified as potentially suitable for anti-predator fencing also contain highly sensitive historic environment assets that must be avoided, and the integrity of their setting may be adversely impacted by the type of fencing proposed.

#### Marine Physical and Coastal Processes

Relevant planning policies:

- NMP GEN 8: Coastal Processes and Flooding
- NMP CABLES 2
- NMP CABLES 4
- PFOW General Policy 5B: Coastal Processes and Flooding

#### Comments:

There are no direct comments to add directly in relation to Chapter 8 – Marine Physical and Coastal Processes.

However, it is agreed that the modelled sedimentation settlement of up to 2 mm across the plume extent from the works is minimal and unlikely to affect long-term physical processes. For comments on sedimentation in relation to biodiversity, refer to Benthic Subtidal and Intertidal Ecology below. As noted in the EIA report however, Marine Licence applications ahead of construction may be required for seabed preparation (e.g. dredging and subsequent disposal and boulder clearance).

It should be noted that where scour protection is used, methods for combining this with biodiversity enhancement techniques (e.g. reef friendly materials) should be considered. See Biodiversity Enhancement for further information.

#### Water and Sediment Quality

Relevant planning policies:

- NMP GEN 10: Invasive and Non-Native Species
- NMP GEN 12: Water Quality and Resource
- NMP GEN 21: Cumulative Impacts
- NMP Cables 1
- NMP Cables 2
- NMP Cables 4
- PFOW MSP General Policy 5A: Water environment

#### Comments:

The following comments only relate to the Orkney Islands Marine Region.

The water and sediment quality offshore study area encompasses a 10 km buffer around the Option Area and 15 km buffer around the export cable corridor. The current

status of SEPA's Aquatic Classification for the area of the project within Orkney's marine region is high.

Whilst the maximum extent of a sediment plume is large, predicted to be 5 km to the east and 4 km to the west due to the flood and ebb, it is agreed that the impacts will be only temporary during the installation phases and should not affect the long-term status of the Aquatic Classification. For impact of the sediment plume on PMF's, please refer to the Benthic Subtidal and Intertidal Ecology section below.

Seabed preparations ahead of construction may require boulder clearance, dredging and excavated material disposed in designated/licensed disposal sites or within the offshore Project area. As noted in Chapter 9, carrying out these activities and disposal of the material could require a separate Marine Licence application to Marine Directorate – Licensing Operations Team (MD-LOT).

#### Benthic Subtidal and Intertidal Ecology

Relevant planning policies:

- NMP GEN 9: Natural heritage
- NMP GEN 10: Invasive and non-native species
- NPF4 Policy 3 Biodiversity
- NPF4 Policy 4 Natural places
- PFOW MSP General Policy 4A: Nature conservation designations
- PFOW MSP General Policy 4B: Protected species
- PFOW MSP General Policy 4C: Wider biodiversity
- PFOW MSP General Policy 9: Invasive and non-native species

#### Comments:

Please note that these comments only relate to impacts within Orkney's 12 nautical mile marine region. The priority marine feature 'Ocean Quahog' is present within the development site and the Orkney Islands Marine Region. The quahog location could fall within the sediment plumes caused by the works (which could be up to 8 km in distance). Whilst ocean quahogs are deemed to be highly sensitive to heavy siltation rate changes due to their short inhalant siphon (FeAST), they are believed to withstand lighter siltation increases of up to 5 cm. It is noted that the predicted additional siltation from the plume will be minimal, with the resettlement of material being modelled as a maximum of 2 mm (EIAR Benthic Subtidal and Intertidal Ecology: *10.6.1.2 Increased suspended sediment concentrations and sediment deposition*).

Whilst one non-native taxon was identified (polchaete *Goniadella gracilis*), due to it already being widespread around the UK and not being invasive, it is agreed that it is not a substantial concern. INNS protocols such as The Great Britain Invasive Non-

native Species Strategy<sup>2</sup> and relevant policies listed above should be adhered to minimise any further introduction or spread. Within the Marine Region, the prevention aspect of the three-stage approach (Prevention, Rapid Response, Control) is particularly important as, in most cases, it would not be possible to control a species once it has been introduced. Within Great Britain, the Non-Native Species Secretariat provides biosecurity advice to prevent the spread of invasive plants and animals in British waters and many of the best practice measures are applicable to the marine environment. Completion of the Environmental Management Plan may identify areas where further action is needed.

Further comments on the development's impact on fish and shellfish species are within the Fish and Shellfish comments below.

#### **Fish and Shellfish Ecology**

Relevant policies:

- NMP GEN 9: Natural heritage
- NMP GEN 13: Noise
- NMP Renewables 9
- NMP Wild Fish 1
- NMP FISHERIES 1, 2 and 3
- PFOW MSP General Policy 4B: Protected species
- PFOW MSP General Policy 4C: Wider biodiversity

#### Comments:

The EIA predicts no significant effects for fish or shellfish receptors. However, crab tagging studies by Coleman and Rodrigues<sup>3</sup> (2017) suggests that the development could be within a brown crab migratory route. Brown crab are thought to migrate throughout the year, and there is the potential for this development to impact these migrations during both the construction phase (e.g. crabs have been shown to decrease likelihood to feed and spend more time immobile when exposed to pile driving noise<sup>4</sup>) and the operational phase (cable protection may present a barrier to movement, see below).

It is acknowledged however that there are significant data gaps surrounding the movements of brown crab. The Fish and Shellfish Summary (EIAR, Chapter 11) states "The potential for monitoring of diadromous fish will be explored post consent, focussing

<sup>&</sup>lt;sup>2</sup> https://www.nonnativespecies.org/assets/Uploads/The-Great-Britain-Invasive-Non-Native-Species-Strategy-2023-to-2030-v2.pdf

<sup>&</sup>lt;sup>3</sup> Coleman, M., and E. Rodrigues. "Orkney brown crab (Cancer pagurus) tagging project." *Orkney Shellfish Res. Proj* 21 (2017)

<sup>&</sup>lt;sup>4</sup> https://ore.exeter.ac.uk/repository/bitstream/handle/10871/36001/CorbettWT.pdf?sequence=1&isAllowed=y

on strategic monitoring opportunities to address the key data gaps identified in the Scottish Marine Energy Research (ScotMER) diadromous fish and fish and fisheries evidence maps." This is welcomed, however brown crab should also be considered for similar monitoring and research due to our poor understanding of their migratory patterns (which may be within the development boundary) and the impacts that the development may have on their movements. MD-LOT should ensure that impacts on brown crab are fully assessed, due to their critical importance to the Orkney fishing industry. Barrier and Electro-Magnetic Field (EMF) effects (further comments below) should be monitored to enhance understanding of potential effects and any appropriate mitigation measures. This will ensure that the development complies with the National Marine Plan Renewables Policy 9 (i.e. *decision makers should support the development of joint research and monitoring programmes for offshore wind and marine renewables energy development*.) See comments in Commercial Fisheries above for further comments on research and monitoring.

11 km is most likely sufficient distance from the North-West Orkney Nature Conservation Marine Protected Area for impacts on the designated species (sand eels) to be minimal. However, within the development area it is noted that the EIAR identifies sand eel and herring to be negatively impacted by the long-term loss of spawning grounds as a result of the development, albeit within a relatively small proportion (7.34 km<sup>2</sup>) of the available habitat in the area. These are assessed within the EIA and the overall consequence found to be minor. It is thought that Atlantic salmon may also migrate through the development area, but there is insufficient data to identify the exact routes that are taken.

The commitment to bury cables where possible is welcome, however it is noted that there is the potential for up to 295 km of cables to require protection at a height of three metres. These stretches will both increase the risk of EMF effects as acknowledged in table 11-17 of EIAR Chapter 11, and may also present a barrier to species movement, particularly for migrating brown crab. The barrier to brown crab migration movements don't appear to have been assessed to the same level as diadromous fish.

It is noted that the noise during the operation phase is unlikely to be audible above ambient noise and therefore unlikely to be a barrier to species movement. However, it should be noted studies have found the operational noise level can indeed alter the behaviour of highly migratory fish species (Espinosa et al., 2014<sup>5</sup>).

It would be preferable for further noise reduction methods to be explored during the construction (piling) phase, with no mention of noise reduction techniques such as bubble curtains in the Piling Strategy. However, it is noted that piling protocols will be refined and agreed in consultation with MD-LOT and NatureScot post-consent, to reflect refined project parameters and to incorporate any new research outputs.

<sup>&</sup>lt;sup>5</sup> Espinosa, V., I. Perez-Arjona, V. Puig, E. Soliveres, P. Ordóñez, P. Poveda Martínez, J. Soriano, and F. de la Gándara. 2014. Effects on bluefin tuna behaviour of offshore wind turbine operational noise. Paper presented at the International Marine Conservation Congress, Glasgow, Scotland, August 14–18, 2014

#### Marine Mammals and Megafauna

Relevant planning policies:

- NMP GEN 9: Natural heritage
- NMP GEN 13: Noise
- PFOW MSP General Policy 4B: Protected Species
- PFOW MSP General Policy 4C: Wider Biodiversity

#### Comments:

Protected species - cetaceans and basking shark:

Although it is noted in the Non-Technical Summary and Marine mammal mitigation protocol documents that licenses would be required from NatureScot for cetaceans, which are European Protected Species, licenses are also likely to be required for basking shark, a protected species in Schedule 5 of the Wildlife and Countryside Act 1981 (as amended). This is due to the unavoidable potential for adverse effects caused by a development of this nature, location and scale. Prior to determination of the application, the applicant should supply evidence to the consenting authority of the advice they have received from NatureScot that licenses could be granted (based on the available information presented in the EIAR) that would allow the development to proceed without breaching the law in relation to European protected species (cetaceans) and other protected species (basking shark).