CiP Copenhagen Infrastructure Partners Statkraft	Statkraft and CIP JV Project Office
Consultation link	https://consult.decc.gov.ie/en/consultation/future-framework-public-consultation
Issue date	23 January 2024
Submission deadline	26 February 2024
Response contact details	
References	

Introduction

In 2023, funds managed by CIP acquired 50% of Statkraft A/S's offshore wind portfolio in Ireland. Later in the year, the JV was awarded an ORESS 1 contract through North Irish Sea Array (NISA), a fixed-bottom offshore project. This project is expected to be among the first commercial scale offshore wind projects in Ireland with commercial operations expected to commence in 2028. Statkraft and CIP expect to invest more than 4 billion EUR in the market before 2030.

About Statkraft

As a Norwegian state-owned utility, Statkraft is a dependable partner, committed to playing a leading role in the Irish market. Statkraft is Europe's largest renewable energy company. In Ireland, Statkraft develops, owns, and operates renewable energy and is also involved in power trading. It is at the forefront of developing renewable energy across a broad spectrum of technologies. The company's global ambition is to increase its portfolio of wind power assets. This includes an ambitious pipeline of projects in Ireland.

About CIP

Founded in 2012, Copenhagen Infrastructure Partners P/S (CIP) today is the world's largest dedicated fund manager within greenfield renewable energy investments and a global leader in offshore wind. The funds managed by CIP focus on investments in offshore and onshore wind, solar PV, biomass and energy-from-waste, transmission and distribution, reserve capacity, storage, advanced bioenergy, and Power-to-X. CIP manages 11 funds and has to date raised approximately EUR 25 billion for investments in energy and associated infrastructure from more than 150 international institutional investors.

CIP has more than 400 employees and offices in Copenhagen, London, Hamburg, Utrecht, New York, Tokyo, Singapore, Seoul, Munich, Luxembourg, and Melbourne.

General remarks

Both Statkraft and CIP are members of Wind Energy Ireland (WEI) and broadly support the submission made by WEI to DECC in relation or OREDFP (FF).

While broadly supporting the intent and ambition of the FF the JV is concerned at the limited timeframe which has been provided for the industry to provide detailed feedback on such a strategically important set of proposals.

The JV believes that in setting out the broad aims of the FF publicly, DECC should also commit to publishing a high-level action plan as soon as practicably possible, to set out the immediate priorities in the near term.

The JV therefore welcomes DECC's commitment to review the FF annually, beginning in Q1 2025.

The ORE sector in Ireland is nascent and in many ways is 'laying the track' as it progresses. While this is both necessary and commendable, it is ever more vital that DECC and the industry work in lockstep to design and implement a pathway which establishes a coherent and predictable framework for future deployment.

The FF indicates ambition to deliver 20 GW by 2040 and 37 GW by 2050.

Given that 5 GW of the total ambition is under Phase 1 and 2 policy, it will be important to understand how the Future Framework policies will interact with activities ongoing under earlier phases and ensure that emerging policy will not undermine delivery of this initial 5 GW.

The JV has prepared the following remarks in response to the specific questions.

Question Reponses

1(a). Has this section adequately identified the general key priorities for ORE delivery in Ireland? Are there additional priorities that should be integrated into the holistic, plan-led approach?

Broadly, the JV considers that the key priorities have been identified although each element will need to be developed in detail, and through consultation with the industry.

1(b). Has each key priority been adequately described and considered all relevant components?

As above

1(c). How best should the 2GW of non-grid limited offshore wind capacity be procured?

The JV agrees that the 2GW target has the potential to incentivise developers and is necessary to kick start the longer-term ambition set out by the FF, which envisages considerable export potential through building 'overcapacity'.

The JV believes that energy system integration should be a key priority for the future framework. The progression of energy system integration must be implemented by developing DMAPs for dedicated offshore wind earmarked for both onshore and offshore hydrogen production.

The JV agrees with WEI that 2 suitable development areas (DMAPs) should be identified - on the South, West and East Coasts which are technology agnostic, of sufficient scale (to allow for attrition and future proofing of DMAPs for future development) and are adjacent to locations which would be suitable for the production of green hydrogen.

This would need to be aligned with:-

- A streamlined offshore and onshore planning processes to create efficiencies, particularly with regard to facilitating hydrogen offtake which will require proximity to suitable hydrogen storage infrastructure, onshore industrial zones and port infrastructure
- B Strategy for offtake options (considerations for hydrogen as well as grid to enable flexibility), as well as for subsidies
- C Port infrastructure suitable for fixed-bottom, FLOW and hydrogen (and to ensure the OWDT work on ports is aligned with FF work in this regard)
- D Opportunities for alternative route to markets, including interconnection.

Implementing sector coupling in Ireland should focus on how to integrate electricity and gas infrastructure to maximise the potential for ORE. Studies should be conducted to identify how best to optimise the use of new infrastructure. Similar studies have been undertaken in the UK, most recently by the Net Zero Technology Centre (NZTC-Hydrogen-Backbone-Link-Report-3.pdf (netzerotc.com)). To encourage cross-border energy system integration, a common Irish Sea marine offshore energy plan should be developed in coordination with the UK, identifying future common infrastructure which could link Irish energy production with UK market.

In terms of procuring non-grid capacity, The JV would advocate in the case of Hydrogen and interconnection that deployment needs to be prioritised to catalyse the sector, rather than price-based competition. As such it will be likely that bilateral negotiation drives deployment (that offloads some of the initial capex investments in electrolysers. rather than price while the industry is in its infancy (until such time that a market with multiple operational projects has been established).

This would provide clearer insight to cumulatively inform future auction parameters. The reality is that there is very little domestic demand for hydrogen in Ireland and the underpinning policy support infrastructure is early stage. Most production will likely need to be exported or used for other derivatives that again can be exported. The JV notes the economic analysis underpinning the FF suggesting that first mover advantage will be vital to secure access to high demand markets.

1(d). What are your views on the design parameters for the successor scheme to ORESS, what else should/should not be considered?

- The JV would refer to WEI's response:-
- A key principle of the Future Framework is to progress the plan-led approach. The policy statement identifies the components of the plan-led approach in section 1.2.1 and table 2 as DMAP, MAC, Route to Market (ORESS/PPA), Grid offer and Development Permission but it does not describe the sequence of these components. Understanding the pathway sequence and the division of the roles and responsibilities between project developers and State authorities will be key to the implementation of the plan-led approach and will help to determine the level of resources required by developers and State authorities.
- The current sequence under phase 2.1 is not a pathway that industry would support for future plan-led phases.
 While we recognise that it has been designed due to time limitations to deliver the 2030 targets and to reduce pressure on government resources, it is not best practise and has introduced significant risk in terms of the

deliverability, given that MAC and Development Permission come after ORESS award. In addition, given that ORESS is now 5-6 years before Financial Investment Decision (FID)- it forces industry to place bids which assume costs which are predicted at risk. A more appropriate pathway would be to ensure that MAC and Development Permission are in advance of ORESS (or route to market in non-ORESS schemes), as follows:



- We have not included 'Grid offer' in this pathway as it is not clear, in the currently grid constrained system with limited sight of plans for development post 2030, where the interaction will come. For instance: will it guide the location of the DMAPs; or will DMAPs guide the development needs of the grid; or will it be more appropriate to align grid nodes with project areas which may be selected after the DMAP process. This all requires clarification and future strategies such as the Offshore Transmission System Strategy and EirGrid's TES will be key to interacting on and informing this.
- Therefore, WEI recommends that DECC take some time to consider the principles of the plan-led regime to ensure that the pathways, interdependencies, and requirements for them are understood and clearly outlined. We propose that an action be included in the Future Framework to develop the principles of the 'plan-led pathway' in consultation with the industry. This should interact with and shape EirGrid's future grid plans, the Offshore Transmission System Strategy, as_well as other drivers for non-grid connection (e.g. Industrial Strategy, Hydrogen Strategy, National Development Plan, Large Energy Users etc).

1(e). What frameworks and/or supports are required for alternate routes to market such as CPPAs, Power to X projects, interconnector hybrid projects and export projects?

The Future Framework should be setting out the means to achieving the 2040 and ultimately 2050 targets. This needs to include an explanation of what the generation will be used for, i.e.:

- Domestic consumption X GW
- Industrial processes (such as hydrogen production) Y GW
- And export Z GW

The above should lead to an explanation of the pipeline that will be required to meet these targets. It may also set priorities in terms of, for example, domestic consumption first, followed by industrial processes and export.

It is also important to establish a consideration of the co-location of industrial demand for renewable energy with development of large offshore wind projects. We welcome that this work has been embarked upon within the National Industrial Strategy for Offshore wind, but these will need to dovetail with FF development also.

It will be necessary to establish rules for managing the participation of ORE assets in Offshore Bidding Zones whereby 'domestic' assets may be constrained by cheaper imports (the JV notes action point 19 in the FF in this regard) (For Ireland as a net exporter, it needs its marginal price of energy to be cheaper than the marginal price in other jurisdictions).

The JV would advocate, in the case of Hydrogen, that deployment needs to be prioritised to catalyse the sector, rather than price-based competition. This would provide clearer insight to cumulatively inform future auction parameters. Most production will likely need to be exported or used for other derivatives that again can be exported. The JV notes the economic analysis underpinning the FF suggesting that first mover advantage will be vital to secure access to high demand markets.

1(f). What additional capacities and responsibilities should be held by industry in the context of the plan-led approach?

Developers' 'bread and butter' is the planning application process, so the JV would urge DECC to consider how much of what is typically developer led should it take on itself when the industry is still being established?

In the JV's opinion, it would be preferable for the industry to lead on the EIA process, while Government takes over-arching responsibility for scrutinising applications and ensuring deliverability of the best projects, rather than taking over the environmental assessments themselves.

The JV would note that the introduction of a plan-led approach sooner than had initially been anticipated has dampened industry momentum. To regain this momentum, it will be vital for all possible clarity and predictability be offered – e.g., through close collaboration to establish the DMAP 'pipeline' and timelines for MACs, while simultaneously providing developers with all necessary flexibility to establish technology, route to market and suitable sites.

1(g). How can Government facilitate a more comprehensive and streamlined engagement process with developers to ensure national ORE targets are delivered?

As noted in its introductory remarks, the JV would urge statutory stakeholders such as DECC ABP, NPWS to work in lockstep with developers to provide a 'no surprises' pathway through consenting - driven by regular preapplication engagement whereby the project parameters have been discussed at length with key regulators and stakeholders, and any key outstanding unresolved issues clearly mapped out. This would facilitate a more efficient determination process but obviously requires more resource-intensive engagement earlier on in the process.

2(a). What grid infrastructure should be of particular focus in facilitating the build out of capacity to support ORE generation targets?

The Future Policy Framework outlines long-term ambitions to deliver 20 GW of operational offshore renewable energy by 2040 and 37 GW by 2050, beyond the CAP 23 target of 5 GW offshore wind by the end of 2030.

This will have a transformational effect on the nature of the transmission system as the closure of thermal plants gradually makes way for levels of renewable energy far in excess of domestic demand in Ireland and Northern Ireland.

This creates an exceptional opportunity but also an imperative to ensure that electricity generated by new offshore installations is not heavily constrained due to inability to transmit this power to the locations of high demand.

In this regard, interconnection has a crucial role to play to ensure that the business cases for new offshore generation are not undermined by the prospect of major limitations due to oversupply on the domestic transmission system.

In the National Policy Statement Electricity Interconnection from July 2023, DECC committed to establishing "…anticipated interconnection needs <to be> tested against technical feasibility, financial viability and benefits to the State and people" to include the following as a minimum for consideration:

- a) A second connection to France by the middle of the next decade (2030s)
- b) A connection to Spain, if feasible considering the practical geographical challenges
- c) A connection to Belgium/Netherlands, potentially a hybrid or multi-purpose project.
- d) A further connection to Great Britain potentially a hybrid interconnector, beyond 2030
- e) Any further interconnection required to support export of renewable electricity

While all terrestrial grid reinforcements to the transmission grid have a major role to play the renewable energy transition, the JV would note that there must be a major focus on the build out of interconnection, particularly to facilitate the ambitious targets stated in the Future Policy Framework.

Additionally, the JV would note that the pace and scale of ambition in relation to ORE development will necessitate development of non-radial solutions to minimise onshore infrastructure, as well as infrastructure to support exporting surplus power to international markets. Broadly, the JV would assert that it needs to have control over both generation and transmission asset development (understanding that developers must relinquish ownership of transmission assets post energisation) in order to control its cost and manage risk more effectively, before effecting any divestment of transmission infrastructure either as a regulatory obligation or to optimise its commercial position.

With regard to non-radial assets, the JV would note that increasing scale and complexity whereby first mover generation assets are contingent on subsequent assets materialising, there needs to be a robust methodology in place to ensure developers are able to fairly recover costs (or to be able to share costs with subsequent transmission network users).

The JV would also note that a similar issue must be addressed in future development of MPIs whereby connected domestic generating assets may be constrained during periods of net import. The pathway for ensuring asset RTM is not compromised due to increasing interconnectivity is important. Broadly, the JV would assert that the RTM should not be 'polluted' by expecting consumer backed contracts to accommodate power market arbitrage (which should be handled by ancillary markets).

2(b). In relation to National Security/Department of Defence interaction with ORE development, are there any issues you would like to highlight?

N/A

4(a). What structures, measures, and interventions can the State and State agencies implement to assist in the development of a long-term, sustainable skills and workforce pipeline? Provide any recommendations on what the State can do to promote careers in ORE across a range of educational backgrounds and movement from other relevant sectors.

The JV would note the importance of strategic national and regional planning that looks at the skills and workforce requirements of Net-Zero ambitions across multiple industries. Here the JV would note that there should be delineation between the 'National' (identifying common barriers, categorising interventions which benefit from heightened public / private collaboration) and the 'Regional' (which understand and identify specific geographic industries/roles and their own constraints and opportunities (e.g., O & M clusters in remote areas with difficulty in attracting workforce).

This strategic and regional planning should be underpinned by analysis of transition opportunities from other sectors and in this regard the JV would highlight that DECC should draw on the experience and identify best practice from other jurisdictions.

The JV would also note the importance of focussing on sustainability - i.e., skills and roles which will underpin growth industries of the 21st Century rather than those sectors which are unlikely to provide either domestic or exportable opportunities. In O&M, there will be a key requirement to work with other EU jurisdictions where applicable in the development of standardised H&S approaches.

4(b). Are you aware of initiatives in other jurisdictions or at a European level that would be relevant to Ireland's ambition of building a sustainable skills and workforce pipeline for offshore wind?

N/A

4(c). To what extent should an emphasis be placed on multipurpose sites for ORE delivery, including the colocation of devices? What Government structures should be developed to encourage and facilitate progress in this aspect?

See above response to 2a

4(d). How can Government ensure policy is kept in line with evolving technological innovation and developments in ORE devices? What structures and government procedures should be implemented to future-proof the ORE planning process and account for technological shifts?

The JV would urge DECC to keep an open mind / provide for maximum flexibility to ensure the right technological solution for each site. There is a risk that being overly prescriptive / defining technology parameters too narrowly for future auction eligibility prevents the deployment of the generation capacity at the pace and scale required. There must be a balance between promotion of novel and established solutions, with developers being the arbiters of the appropriate technology to deploy.

Finally, the JV would note that policy must account for 'what Government wants to happen'. Over time, if the Government deems that it views ORE as providing the lion's share of power generating capacity, then it is logical to distinguish between technology which is likely subject to weak locational signals and with a lower tendency to hybridisation / lower blending of RTM and to prioritise connectivity for this generation. The JV would also note that a progression to highly anticipatory, temporal, mechanistic and data driven procurement which has a high degree of interaction with network and ancillary energy markets should be prioritised.