



# Offshore Renewables and UK Ports

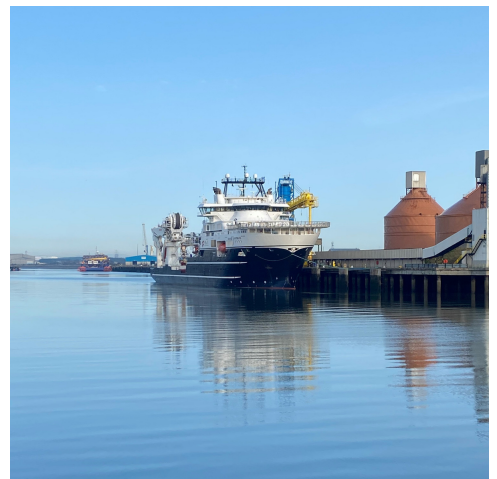
Seizing the Opportunities



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A policy briefing from  
the British Ports  
Association



## Introduction

With UK net-zero and carbon reduction aspirations, many in the maritime sector are fully aware of the potential for renewable energy generation in the UK. The British Isles has huge expanses of territorial waters and already possesses the largest installed capacity of offshore wind in the world with 10GW already in operation off our coasts. The UK is also streaking ahead of its European counterparts, accounting for 42% of all installations in Europe (see figure 1).

The UK Government has recently outlined their ambitions for offshore wind to produce more than enough electricity to power every home in the country by 2030 and has increased its previous 30GW generation target to 40GW, which will be supported by the Crown Estate's Offshore Wind Leasing Round 4. Government aspirations include creating a new target for floating offshore wind to deliver 1GW of energy by 2030. Industry is ready to respond to this ambitious goal. Assisted by ports, the UK added 483 MW of new capacity to the grid from wind energy in 2020, which remained in line with pre-COVID forecasts despite uncertainty brought by the pandemic - signalling the industry's commitment to installation plans. However, progress needs to be rapidly sped up to meet the 2030 targets. This paper outlines how this can be done.

While much of the focus is on offshore wind, the UK also has much potential for wave and tidal energy generation. For all types of renewable energy, our ports can play a critical role in facilitating development. Although, this can be maximised by smart decisions by policymakers to root more of the development in the UK.

“The aim to generate 30% of the UK’s electricity under the Offshore Wind Sector Deal is welcome and ports are keen to play a central role. However, the UK needs to focus further on delivering higher UK Content in new wind farm developments. Unless this becomes a firmer obligation, the UK may well lead the world in offshore wind development but sadly the benefits will continue to be enjoyed largely by our European neighbours and countries further afield. If we grasp this issue now, we can attract more activity to the ports and regions of the UK. This is not just about providing facilities for the mobilisation of wind turbines but for wider renewables supply chain and manufacturing activities which provide long term sustainable jobs.”

Martin Lawlor, Chairman of the BPA

UK ports provide hubs for offshore renewables in terms of assembly, mobilisation, operation, and maintenance but there are also possibilities for a greater role in the construction, manufacturing, engineering and training activities. Unlike some of our competitors, UK ports are wholly independent of government in terms of Government and funding.

Support from the government, including the Offshore Wind Manufacturing Investment support scheme and the more recently announced Investment Programme, is very much welcome. However, they have tended to focus on mobilisation-type projects to roll out wind farm development. This is certainly an important part of renewable development but there is also more potential to expand UK capacity by looking further at additional services and activities which could be provided in the UK.

This would generate more activity, investment and jobs in the UK and ports can and do play a critical role as hubs economic development. Many of our coastal regions are in areas of high deprivation and creating the right conditions for investment in and around ports would very much support the government's levelling-up agenda. In the past 10 years, the UK - tied with Germany - has attracted the most investment into offshore wind in Europe, but we must go further.

This could be achieved by looking at making changes and improvements in the following areas; UK content, a more responsive planning environment, and network capacity. For each of these areas, a holistic view on future growth and demands and a joined-up approach between ports, government, regulators and investors, and other stakeholders will be key.

## UK Content

The Government's Offshore Wind Sector Deal includes an aspiration to increase UK content to 60% by 2030 covering everything from planning, manufacturing, mobilisation, installation and skills development in the delivery of projects. To date, key elements of this supply chain (particularly manufacturing) are largely undertaken in Europe. We are calling for enforced UK content rules that will encourage a greater quantity of work to be undertaken by the UK-based supply chain, which would help realise the wider benefits within Britain.



Government's targets for 60% of a project to be UK-based are simply aspirational. This means that unlike in other countries, consent for developments do not have any requirements and developers will often look at using existing capacity elsewhere such as in Scandinavia and the Continent. Government must mandate UK content in order to deliver on these aspirations. Enhanced UK content does not mean being closed to foreign investment; international interest in the UK is expected as a world leader in this sector. Rather, we must ensure that maximal supply chain benefits are accrued in the UK, in terms of jobs and regional GVA.

## A More Responsive Planning Environment

UK ports are well placed to support the offshore renewables industry but as projects are agreed and rolled out by energy developers, coastal regions will need a fast and flexible planning system to help ports prepare. This will be vital to ensure that UK ports and coastal areas can remain agile and responsive to new opportunities to provide important landside hubs for offshore developments. The ports sector is globally competitive, so we need to make sure that UK ports are in the best possible position.



Marine and landside planning consents will need to be issued quickly and developer conditions must be kept to a minimum. To attract developers, ports themselves often need to prepare and develop facilities and infrastructure quickly. Inward investors and energy developers look at a number of criteria including location, land values, tax, policy stability, labour, skills, infrastructure, and

transport connectivity but confidence in planning regimes is also a key influence over where projects and investments proceed.

Typically, landside planning processes are fairly efficient and Permitted Development Rights a useful tool that enables ports to develop quickly. However, the industry is keen that these rules are expanded so that different and bigger projects can be included within their scope.

The UK has a very rigorous marine licensing system in comparison with other European nations, despite following very similar rules stemming from European directives. This can mean that marine developments are frequently subject to conditions and costs that our competitors are not. If we want to make the UK more attractive to marine and energy developers, we need to rebalance the planning processes and speed up decisions.

The UK also has a very comprehensive network of marine protection zones that aim to protect certain habitats and species. These sites have a major impact on development, as marine and port projects often need to undergo thorough assessments and monitoring which can halt development entirely.



Marine and estuary protection areas are particularly common in the UK and unlike in other countries where governments have been more strategic in balancing designations (again, operating from the same European legislation) against economic and maritime activity, the UK and devolved administrations have already created conservation within or in close proximity to over 70% of UK port authorities.

A more flexible and dynamic approach to sustainable development and marine management within these areas, as well as a more measured implementation of future environmental designations, is needed to ensure the UK does not miss out on this renewable energy opportunity, as well as producing better outcomes for the marine environment.



## Network Capacity

Ports have traditionally been at the end of centralised transmission and distribution networks. This will change as energy generation becomes more distributed and offshore renewables become a greater part of the UK's generating capacity. Ports will be closer to clean energy generation supporting the installation and maintenance (and decommissioning) of these sites. There is also an opportunity for ports to become energy hubs more broadly, providing clean energy for multiple modes of passenger and freight transport.

The Government has promised 'transformational' change to the UK's energy networks to accommodate ambitious electric vehicle (EV) rollout by 2030. This will necessitate widespread network upgrades and reinforcement as well as smart networks that can efficiently balance network loads.

Port electricity demand is forecast to grow to as much as 250GW in the next 30 years as the maritime sector decarbonises and ports become clean energy hubs (see figure 2). Port energy demand (and management) must be factored into the wider energy planning and investment policy. This should recognise the opportunities presented by ports being located closer to energy generation (or closer to cable landing sites).

# About the BPA



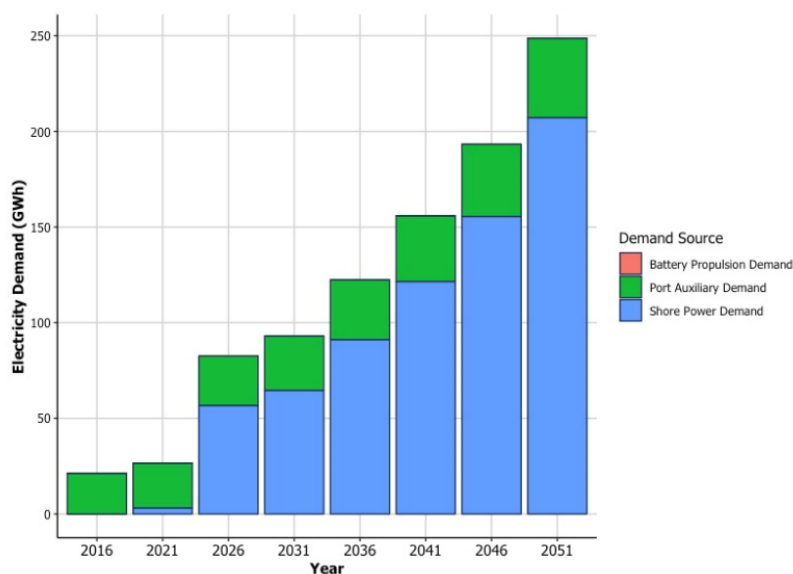
The British Ports Association is the national association for all types of ports, harbours and terminals. BPA membership facilitates 86% of all UK port trade, handles 85% of all vessel movements in the UK and includes all the main offshore and renewable energy hubs.

Figure 1: Grid-connected offshore wind power projects in Europe at the end of 2020

COUNTRY	NUMBER OF WIND FARMS CONNECTED <sup>1</sup>	CUMULATIVE CAPACITY (MW)	NUMBER OF TURBINES CONNECTED	CAPACITY CONNECTED IN 2020 (MW)	NUMBER OF TURBINES CONNECTED IN 2020
UK	40	10,428	2,294	483	69
Germany	29	7,689	1,501	219	32
Netherlands	9	2,611	537	1,493	172
Belgium	11	2,261	399	706	81
Denmark	14	1,703	559	0	0
Sweden	5	192	80	0	0
Finland	3	71	19	0	0
Ireland	1	25	7	0	0
Portugal	1	25	3	17	2
Spain	1	5	1	0	0
Norway	1	2	1	0	0
France	1	2	1	0	0
Total	116	25,014	5,402	2,918	356

Source: Wind Europe

Figure 2: Annual total UK port electricity demand



Source: Frontier Economics for the Department for Transport