



EWEA

THE EUROPEAN WIND ENERGY ASSOCIATION



Where's the money coming from?

Financing offshore wind farms

Executive summary

The long-term stable market and regulatory framework challenge

The major challenge increasingly facing the offshore wind industry is regulatory risk, which can refer to unclear or conflicting political support for offshore wind, uncertainty with grid connection regimes, or lack of a long-term stable market and regulatory framework. It is critical that national governments address this risk, not least by working with the European Commission to agree a binding 2030 renewable energy target at the earliest opportunity.

The funding challenge

The European offshore wind energy industry needs to attract between €90 billion and €123 billion (bn) by 2020 to meet its deployment target of 40 GW.

Should regulatory instability prevent the offshore industry from reaching its 40 GW target by 2020, even a conservative assumption of 25 GW would still require between €50 bn and €69 bn over the next seven years.

However, availability of financing now appears less likely to constrain the growth of offshore wind energy than regulatory risk.

Funding is available

Power producers have so far been the main investors in offshore wind using their balance sheets. As the scale of investment grows, new entrants are becoming active in different aspects of project development. Engineering, procurement construction and installation companies (EPCI), wind turbine manufacturers, oil and gas companies and corporate investors are already investing in offshore wind according to their specific strengths and capabilities. Infrastructure funds and institutional investors have already made progress in taking construction risk and enhancing the financing landscape for offshore wind.

Moreover, innovative funding structures are now being used. The role of development banks and Export Credit Agencies (ECAs) has been significant in attracting commercial lenders to the sector. There are now over 30 banks with experience of lending to offshore wind and there are more examples of them lending to projects earlier and taking construction risk.

Risky business?

Despite the challenging funding requirements, both traditional and new investors seem optimistic and willing to continue to invest in offshore wind. According to them, the most important risk factor is not the availability of funding but regulatory instability. Evidently, the high level of uncertainty that comes

with changing regulatory frameworks has slowed down offshore wind energy deployment in many European countries, not least in the two largest markets, the UK and Germany. Nevertheless, as long as Europe ensures a stable framework for offshore wind, the required capital can be channelled into the sector. For this to happen, agreement on a binding 2030 renewable energy target at EU level is crucial.

Looking specifically at construction risks, grid availability risk was considered the greatest concern by industry overall. This is one of the most significant barriers to deployment, particularly in markets where project sponsors are not responsible for grid connection.

Policy recommendations

- **Create a long-term stable and clear market and regulatory framework based in a 2030 binding renewable energy target at EU level**
Regulatory risk relating to support mechanisms is considered the most important challenge to offshore wind deployment.
- **Develop predictable grid connection regimes, with clear allocation of responsibility and de-risked cost recovery mechanisms**
Resolving delays in grid connection and the uncertainty they create for wind farm developers and financiers is fundamental to avoid delays and cost overruns.
- **Maintain so-called shallow grid connection charges as best practice for financing electricity infrastructure**
Why should offshore wind energy become the first power generation technology to pay for grid connection through deep grid connection regimes? Grid development benefits all producers and consumers and its costs and benefits should be socialised.
- **Provide liquidity and credit support**
Multilaterals and Export Credit Agencies are successful in attracting new sources of capital. They should be encouraged to invest and provide liquidity to the sector and in structures that facilitate the entry of new sources of capital to the sector.
- **Engage consumers in an open dialogue on the cost of energy**
With an increased focus on the cost of energy bills for consumers, transparent perception of the cost of support to offshore wind energy and its significant benefits, should be addressed.

Plugging the funding gap

A number of funding models are expected to have a role in funding offshore wind projects in the period to 2020. These are shown opposite, together with recommendations for attracting these forms of capital.

OUTLINE OF FUNDING MODELS

Potential source of funding	Prominence in the sector to date	How the capital can be accessed
Power producer balance sheet	<p>Dominated the European offshore wind sector as the source of finance for construction and operations.</p> <p>Power producers' balance sheets are becoming constrained, limiting their ability to finance new projects.</p>	<p>Power producers could recycle equity investments available on their balance sheet by re-financing existing projects either through debt (project finance bank debt or project bonds) or by selling equity, the majority of which have been minority stakes to date.</p> <p>Alternatively, power producers could seek to construct more projects through joint ventures with other power producers or third party capital or better utilise project finance (see below).</p>
Project finance	<p>Historically project finance has been under-used since power producers run the risk of damaging their credit rating and banks' due diligence process is perceived as time consuming with too much control and influence afforded to lenders. Project finance was considered too expensive and it was overly reliant on the provision of high levels of multi-lateral funding.</p>	<p>Cheaper debt is likely to foster greater demand – increased experience, improved understanding and enhanced appetite should increase competition and lower the cost of debt.</p> <p>Power producers could seek to construct more projects using project finance from clubs of commercial banks, multi-laterals and export credit agencies, so long as they can ensure isolation of the project debt from its corporate credit rating. Power producers would need to engage with ratings agencies in order to protect their credit ratings.</p>
Third party capital (including institutional investors)	<p>Historically third party capital has only been prepared to accept operational risk.</p> <p>However, recently more institutional investors have started taking construction risk under project finance deals with multi-lateral funding as well as working alongside major power producers.</p>	<p>Regulatory risk is the key concern for third party capital: there must be clear and stable regulation with long-term stability in the pricing.</p> <p>The liquidity offered by multi-laterals is a key factor in ensuring sufficient level of debt is in place for the third party capital to meet its target returns.</p> <p>Third party capital may be more attracted to construction risk if investors can accurately assess the risk and price their investment. This requires knowledge transfer from the EPCI providers and developers.</p>
EPCI balance sheet	<p>EPCI providers have contributed equity to the construction of offshore wind farms – Siemens has gone as far as establishing a dedicated Private Equity (PE) arm for such ventures.</p> <p>Like power producers, EPCI providers are becoming constrained.</p>	<p>EPCI providers can seek to recycle balance sheet equity through refinancing debt in existing projects or an outright sale.</p> <p>EPCI providers may continue to invest equity into offshore wind projects. The most likely route is through providing a minority equity contribution under traditional project finance structures.</p> <p>However, the sector is looking increasingly to EPCI providers to reduce or mitigate risk through the provision of full turnkey EPCI wraps and to demonstrate strong balance sheets and successful track records. This will help to attract additional debt and equity to projects by the sponsor.</p> <p>Sponsors are seeking cost reductions through multi-contracts, but lenders are averse to this since it increases contract interface risk. The more EPCI providers can do to limit contract interface risk through tighter definition and control, the better off the project.</p>
Project bonds	<p>Not played any role in European offshore wind energy generation funding to date.</p>	<p>Project bonds are not expected to be a source of construction finance up to 2020.</p> <p>However, there is an expectation in the industry that they could become a source of finance for operations and potentially act as a route for power producers to recycle their balance sheets, through issuing specific bonds for existing projects.</p>

Source: Offshore wind survey 2013



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About EWEA

EWEA is the voice of the wind industry, actively promoting wind power in Europe and worldwide. It has over 600 members from almost 60 countries, including wind turbine manufacturers with a leading share of the world wind power market, plus component suppliers, research institutes, national wind and renewables associations, developers, contractors, electricity providers, finance and insurance companies, and consultants. This combined strength makes EWEA the world's largest and most powerful wind energy network.

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