Managing risk in renewables

Tom Pemberton of Beale & Company analyses procurement in the burgeoning renewable energy market, warning that recent case law highlights why contracts have to allocate risk appropriately.

KEY POINTS
- The renewable energy sector will continue to be a major focus of investment for the foreseeable future
- Contractors and consultants need to consider the energy market reform and changing government policy in planning their business and tender strategies
- Recent cases including MT Højgaard a/s v E.ON Climate and Renewables UK Robin Rigg East Ltd have highlighted the need to avoid contract pitfalls
- Various procurement models can be used in this sector and it is important that the contract structure allocates risk and responsibility in an appropriate manner

The renewable energy sector continues to provide excellent opportunities for the construction industry, as the government seeks to deliver on the 2020 commitments under the EU Renewables Directive which requires 15% of all the UK’s energy (and therefore in practice 30% of its electricity) to be generated from renewable sources. While there are conflicting views as to whether the UK is on track to achieve this target, there is no doubt that meeting demand in the renewables sector will continue to account for a substantial proportion of total infrastructure investment for the foreseeable future. According to data produced by the construction analyst Barbour ABI’s figures for the Office of National Statistics, £81 billion will be invested in renewable energy projects between now and 2025, representing nearly half of all infrastructure investment.

According to figures published by the Department of Energy and Climate Change, the technologies which received the most investment between 2010 and 2013 were solar (£5.9bn), offshore wind (£7.7bn), onshore wind (£6.9bn) and biomass (£4.7bn). However, future investment is subject to the vagaries of government policy both in relation to the planning and regulatory framework (reflecting the tilting balance between the requirement for new capacity to meet the 2020 targets and the rights of local communities to object to development) and changes in the government support mechanism whereby developers are guaranteed a minimum ‘strike price’ for generated electricity (as is required to secure investment in this sector). This mechanism in itself can be used as a tool of planning policy, as demonstrated by the Prime Minister’s recent speech expressing the view that the UK has ‘had enough’ of onshore windfarms and reiterating that a future Conservative government would phase out subsidies for them.

Energy market reform – changes to the renewable market support mechanism

The renewable market is currently in a transitional period when applicants for new renewable generating capacity are entitled to apply for support either under the established Renewables Obligation (RO) or its ultimate replacement under the Energy Act 2013, the Contracts for Difference (CfD) scheme.

Under the CfD scheme, developers are guaranteed a pre-set ‘strike price’ for the electricity they generate.
If the market price for electricity is lower than the strike price, the developers receive a top-up payment, but if it is higher, they have to pay the difference. Two pots of money have been allocated, a smaller one for established technologies and a bigger one for less established technologies.

The RO will no longer be available for new applicants as from 31 March 2017. However, in the case of large-scale solar farms, DECC announced last year that they would no longer receive subsidies under the RO as from 2015, taking the view that they are not needed as these farms are deploying much faster than expected (although they will still be eligible for support under the CfD scheme) and reflecting local opposition to the proliferation of such farms.

Such vagaries of government policy have made investors and employers wary of large-scale investment. In recent years there have been a number of high profile projects which have been discontinued because of political uncertainty. In March 2014 RES pulled out of a £300m biomass scheme at the Port of Blyth citing ‘insurmountable investment barriers due to uncertain government energy policy.’ Similarly, RWE have shelved two off-shore wind farms (Galloper and Atlantic Array) in the past couple of years. Significant uncertainty has been cast on the Drax biomass conversion project after a Court of Appeal court ruling last year in favour of the government’s decision to deem it ineligible for support under the CfD scheme.

Against this background, contractors, consultants and specialists need to factor into their tender strategies the enhanced risks of renewable energy projects being shelved as a result of policy change and uncertainty, as well as the planning and permitting issues which are common to all infrastructure sectors. That said, given the overwhelming impetus to increase our renewable energy capacity, clearly the sector will continue to offer excellent opportunities to the construction industry for the foreseeable future.

**Contract pitfalls for the unprepared**

A number of widely reported cases of performance failures and defects, including the recent turbine collapse at Scraggagh windfarm in County Tyrone, have highlighted that in a sector where the technology is changing rapidly tenderers need to consider legal and contractual risk carefully. This was highlighted by the recent Technology and Construction Court (TCC) case of *MT Højgaard a/s v E.ON Climate and Renewables UK Robin Rigg East Ltd* [2014] EWHC 1088 (TCC), concerning a contract for the design, fabrication and installation of the foundations for 60 wind turbine generators at the Robin Rigg offshore wind farm in the Solway Firth. The contract required the design of the foundation of the turbines to use the method detailed in DNV-OS-J101 (J101), which was an industry standard. As is fairly usual in relation to such contracts, the contractor agreed to assume full responsibility for design as well as the installation of the structures.

The contract also contained warranties that the works would be fit for purpose and that they would have a minimum design life of 20 years. A few years after the installation of the turbines, it was discovered that movement was taking place in the foundations, which was attributable to an error in J101 of which no one had been aware when it was specified. The dispute concerned which party was liable for the error, since as it had turned out that compliance with this standard was incompatible with the obligation to achieve a minimum design life of 20 years.

On the basis that the contractor assumed full responsibility for design, the court held that the developer was entitled to rely on the design life warranty notwithstanding that the contractor was required to design the foundations in accordance with J101. The contractor was accordingly liable for the remedial costs incurred by the developer, which were stated to be in the sum of €26.25 million.

We have not heard the final word on this case, since it is scheduled to go before the Court of Appeal this year, but it is consistent with Commonwealth case law (quoted in the judgment).

It also has parallels with the earlier TCC case of *Costain Ltd v Charles Haswell & Partners Ltd* [2009] EWHC 3140 (TCC), although the issue in this case concerned a consultant’s appointment in which the consultant had parallel obligations to use ‘reasonable skill and care’ in carrying out design, and to ensure that the works, if carried out in accordance with the design, would meet the requirements of the main contract specification.

The court held that the consultant was liable for breach of the latter strict obligation. It was
implicit in the judgment that there is not necessarily any inconsistency between a ‘reasonable skill and care’ obligation and a strict obligation to achieve a particular outcome – one may be in breach of the latter obligation without being breach of the former.

These cases highlight that it is crucial that contractors and consultants tendering for contracts in the renewable energy sector (particularly in relation to technology which is relatively new and untested) fully understand their design obligations and that they negotiate qualifications to them where necessary in order to ensure coverage by relevant professional indemnity insurance, since this will not generally cover strict obligations to achieve particular outcomes.

Choosing the right contract structure
Developers of complex process engineering projects (and their funders) generally prefer their contractors to take all the key design and construction risks under Engineering, Procurement and Construction (EPC) contracts (often referred to as ‘turnkey’ contracts). This remains the norm, for example, in the energy from waste sector.

However, EPC contracting is not generally accepted in the offshore wind industry due to the risks posed by the offshore environment which have proved challenging for the still comparatively young and emerging technology. Here, it is usual to split the works into two or three distinct packages (multi-contracting) with no one contractor taking overall responsibility, although as is apparent from the MT Højgaard case the package contracts themselves may be subject to onerous terms.

The developer may then undertake the coordination and management function itself, or appoint an EPCM contractor (engineering, procurement and construction management) who will take responsibility for the development of the scheme design, and the overall coordination of the design of the project to ensure that the completed works meet the specified performance requirements. The EPCM contractor will also be responsible for the procurement of construction services, plant and equipment, and the management of the construction process generally.

However, the EPCM contractor is not generally responsible for performance failures by the appointed contractors and suppliers so developers will not achieve the ‘single point responsibility’ which is characteristic of EPC contracts.

For projects which present significant challenges from a technical point of view or in relation to managing interfaces with third parties such as regulatory authorities, local communities and other stakeholders, other innovative methods of procurement may be considered. An obvious option would be alliancing where the parties to the contract (including the developer) operate as a unified team in a no blame/claim environment and the payment mechanism is structured accordingly. Alliancing is one of the procurement models advocated in the government’s construction strategy and has been taken up by clients in other sectors (including water and rail).

There has been some evidence of interest in alliancing in the renewables sector (for example SSE entered into an informal alliance with five of its principal contractors and consultants in relation to offshore wind in 2011) but it has not been widely taken up in the renewables sector to date. Given its roots in offshore oil and gas projects where it was successfully used by BP in the 1990s, alliancing would seem to be an obvious option to consider where the project risks are such that a risk and reward sharing approach under a collaborative contract is appropriate.

Conclusion
The renewable energy market will continue to offer outstanding opportunities in the foreseeable future for those geared up to meet its challenges. However, in a sector where government support is critical to secure investor commitment, contractors, consultants and specialists in the sector need to keep their antennae attuned to changes in government policy when planning their business and tender strategies. They should also seek to negotiate contracts providing for a balance of risk and obligation which is appropriate to the nature of the work being carried out, and suitable limitations of liability in respect of key risks.

As a minimum it is critical to ensure that contractual risks and obligations are fully understood so that they can be suitably managed and mitigated, and where relying on designs or specifications provided by a consultant or other third party, it would be prudent to obtain back to back warranties or undertakings from the third party wherever possible. CL