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New challenges for nuclear new build financing

Sponsors of new build projects in the EU need to be aware of state aid regulations, and plan carefully to implement a nuclear development strategy that is consistent with them, say **Vincent Zabielski** and **Elina Teplinsky**

Changing times, changing tactics

Tactics used by those who oppose the construction of new nuclear power plants have changed over the years. In 1975, a proposed nuclear plant in Wyhl Germany was cancelled as a direct result of public opposition, which primarily took the form of physical occupation of the work site by local activists [1]. Ten years after Wyhl, a political campaign was successfully waged against the already-completed Shoreham Nuclear Power Plant in Long Island, New York, in the United States. The plant never reached commercial operation, and the US\$6 billion in construction costs were passed on to the ratepayers [2]. Now, 40 years after Whyl, a new state-sponsored tactic to oppose new build is developing, whereby an anti-nuclear member nation of the European Union (EU) may challenge a new-build project in another member nation based on EU regulations limiting state aid to the project, with the implied objective of promoting its own renewables energy policy on an EU-wide basis.

Challenging state support for nuclear power

Historically, nuclear projects have been financed on the balance sheets of large utility companies or with the aid of some form of government support. Such government support can take the form of government financing, tax incentives, loan guarantees, government grants, export credits or favourable nuclear regulatory regimes. Practically speaking, as with most large infrastructure projects, some level of government support is needed for nuclear new build projects.

In recent days, state support for new build nuclear projects is coming under increasing scrutiny in the EU, with countries that are non-nuclear or increasingly anti-nuclear using EU state aid regulations to influence events in other EU member countries that wish to establish or expand their nuclear power portfolio [3]. This new tactic not only targets the financial support of the host country, but is also intended to discourage both debt and equity investment. To minimise the potential obstacles to nuclear new build projects due to the application of EU regulations governing state aid to companies, project sponsors of nuclear new-build projects in the EU should be aware of this new challenge and be prepared to respond by employing appropriate mitigation measures [4].

Understanding European state aid rules

Article 107 of the Treaty on the Functioning of the European Union (TFEU) is intended to ensure that aid granted by a member state or through state resources does not distort competition and trade within the EU by favouring either certain companies or the production of certain goods. The rules are intended to ensure a level playing field in the European market and are not limited to nuclear power or even the energy sector – they apply to almost all forms of commerce. The TFEU, except in very specific and narrowly proscribed circumstances, provides a general prohibition of state aid. The fear is that over time, state aid to industry can develop into a reliance on that state aid, and can stifle innovation and result in industrial 'wards of the state'. Nonetheless, where there is a genuine market failure, and the desired outcome cannot be achieved absent state aid, the TFEU does allow for mechanisms to achieve certain policy objectives by providing aid to cover the gap -- in the market, provided such aid does not adversely affect trading conditions to an extent contrary to the common interest [5]. Such exceptions can include matters of importance to the state, such as the encouragement in the development of infrastructure to meet certain goals regarding renewable energy or climate change commitments [6].

In general, EU state aid requires prior notification of all new aid measures to the Directorate-General (DG) for Competition of the European Commission [7]. The notification triggers a preliminary investigation that has three possible outcomes. The Commission may determine that: (i) there is no state aid; (ii) there is state aid, but the aid is compatible with EU rules; or (iii) there are serious doubts as to the compatibility of the notified measure with EU state aid rules. In the event of the last outcome, the Commission will open an in-depth investigation. At the end of the investigation, the Commission issues a final decision. Member states must wait for the Commission's decision before they can put the state aid into effect. There are three possible types of final decisions resulting from the investigation. A positive decision is a finding that there is no aid, or that the aid is compatible with the internal market. A conditional decision means that the measure is found compatible, but its implementation is subject to the conditions stated in the decision. A negative decision reflects a finding that the state aid is incompatible with EU rules and may not be implemented.

Recent new-build challenges based on state aid arguments

The EU rules governing procurement and state support of industry provide an effective platform for EU member states that are opposed to new nuclear to challenge nuclear power projects elsewhere in the EU. Anti-nuclear interests are targeting government support for new-build nuclear as comprising illegal 'state aid' under Article 107 of the TFEU. As a result, EU member states that wish to add new nuclear generation to their energy portfolio now face the threat of having to deal not only with their domestic constituencies, but also with extraterritorial anti-nuclear interests that wish to block the expansion of nuclear power in the EU. These new challenges are troubling because they may constitute a threat not only to the energy security of the host country, but, in the authors' view, arguably also to the state's sovereignty.

Take, for example, the Hinkley Point C project in the UK. The EU approved the contract for difference (CfD) rate structure and underlying government guarantees for the project as permissible state aid in an official Commission decision dated 8 October 2014. Under the CfD scheme, if wholesale electricity prices rise above an agreed 'strike price', payments from the generator will be returned to consumers. If wholesale prices fall below the strike price, the generator will receive a payment for the difference between the strike price and the market price. Despite the fact that the European Commission approved the proposed rate structure, Austria nevertheless announced its intention in April 2015 to take legal action to block what it deemed to be 'illegal' state aid [8]. Austria alleged that the Hinkley Point C project, which is a little over one thousand miles away from Vienna, is receiving illegal state aid from the UK in the form of a high strike price in the CfD pricing scheme. Mr Andrae Rupprechter, the Austrian Environment Minister, told the German business daily Wirtschaftsblatt that the intention of Austria's challenge to Hinkley Point C project was to: (i) discourage the use of nuclear energy in Europe; and (ii) "scare off" potential investors [9]. Mr Rupprechter went on to warn that Austria will fight similar subsidy plans in the European Court of Justice, noting that in his view state backing for nuclear power hindered the rollout of renewable energy technology. Early in July, Austria followed through with its threat and, together with an alliance that included Greenpeace and nine German and Austrian renewable energy companies, filed a lawsuit with the European Court of Justice in Luxembourg [10]. This legal challenge was filed despite the fact that the European Commission had already taken a hard look at the Hinkley Point proposal and had found that the CfD pricing mechanism and the underlying UK government guarantee constituted an appropriate and proportionate way for the UK to meet its needs for a source of secure, low-carbon energy [11]. EU member states are able to initiate legal action for alleged infringements of EU law, as all decisions and

Although an argument that EU regulations that were designed to prevent distortions in the

procedural conduct of the Commission are

subject to judicial review.

competitive marketplace should be used as a basis to further one country's renewables agenda seems puzzling, the Hinkley Point C rate structure has become a bit of a cause célèbre for the anti-nuclear movement. What started as an Austrian initiative was joined by those with similar ideology (Greenpeace) and those with an economic interest in the matter (renewables-based utilities). While the Commission decision regarding Hinkley Point was thorough and well-drafted, it's too early to speculate on the potential outcome of any legal challenges. The CfD rate structure is at the heart of the deal to build the Hinkley Point C project, and the project's sponsors may be reluctant to move forward with continued investment if there is even a remote chance that the decision will be overturned. The potential impact on new build nuclear in Europe cannot be underestimated. Whatever the outcome of the legal proceedings, the resolution might take years, require substantial resources, and potentially delay the development of what the UK government has deemed to be a project critical to the country's energy security and national economy.

On the other side of Europe from Hinkley Point C, Hungary has been defending similar challenges [12]. Hungary has four existing VVER-440 reactors at its Paks nuclear power station that account for about one-third of the generation capacity and up to one-half of the electricity generated in that country [13]. The first of the Paks units came on-line in 1982, and the last unit is scheduled to close in 2034 [13]. The Russian-supplied units have been both reliable and economical, and the technology is familiar to the Hungarians. The Hungarian Atomic Energy Authority has specific expertise relating to the Russian reactors, and the domestic training and qualification



and are decommissioned, the Hungarian government proposed the construction of two new nuclear units. In March 2009, the Hungarian Parliament gave preliminary approval to the plan. In February 2015, Russia and Hungary finalised an agreement whereby Rosatom, the Russian state nuclear company, would build two new 1200MWe reactors at the Paks site. The financing deal, whereby Russia provides loans covering 80 per cent of the anticipated project cost, was approved overwhelmingly by the Hungarian Parliament in a 256–29 vote [13]. The choice of Russian reactors makes sense for Hungary because it leverages Hungary's vast experience and confidence with the technology, and would provide reliable generation capacity for the Hungarian people under economically favourable terms and conditions. Hungary, which is a representative democracy and a member of the EU, made a public decision that the deal with the Russian Federation was in its best interests.

Despite the overwhelming support at home in Hungary, opponents to the Paks expansion are mounting challenges based on EU state aid regulations. In April 2014, Greenpeace reported that it had filed a request with the European Commission to investigate whether the planned financing of the Hungary new build project violates EU state aid rules, and in June 2014, the Energiaklub Climate Policy Institute, a Hungarian energy policy interest group that is opposed to the expansion of nuclear energy, filed a submission to the DG for Competition of the European Commission, asking them to investigate the subsidy plan for the Paks expansion, and to take the necessary measures if needed [14]. In an article published on 17 April 2015, the Budapest Telegraph quoted the EU's competition law directorate general as having stated that the EC is "in negotiations with the competent Hungarian authorities about problems related to the project including state aid," but went on to note that the inquiry was at an early stage [15].

For new projects in the UK, Poland, the Czech Republic and Romania, understanding the EU rules regarding state aid, and developing mitigation plans for potential challenges based on those laws, is a primary imperative.

Facing the challenge

Given that challenges to nuclear new build based on state aid arguments are a potential challenge to a potentially successful project, what can be done by a new build project sponsor to mitigate this risk?

Determining the extent to which a particular nuclear new build project may be susceptible to a legal challenge based on state aid is of fundamental importance. There are several actions a project sponsor can take to ensure the project does not run afoul of state aid rules.

The first and most crucial step is providing notification of the proposed aid to the DG for Competition of the European Commission. Member states must wait for the Commission's decision before they can put the state aid into effect. A positive decision by the Commission is more likely if the state aid is the minimum required. Does the state aid last for the life of the project, or does it have a finite term? For example, a member state could limit the state aid to financial support during the construction phase, when external financing is difficult to secure. Once the project reaches commercial operation and is generating revenues, the

government debt could then be re-financed and the state aid would come to an end. In order to execute such a strategy, the overall bankability of the project would need to be incorporated into the business plan from the outset.

Another important consideration is whether the party receiving the state aid will gain an advantage over competitors that do not enjoy the benefits of the aid. If the state aid is tailored to support a specific company or technology at the exclusion of others, the project will be more vulnerable to a negative decision from the Commission, finding that the state aid is incompatible with EU rules and cannot be implemented. If there is an existing technology in a particular state, and the state would prefer to continue using that technology, rather than pursue a sole source, it would be better to have a competitive procurement whereby the bid evaluation criteria awards points for proposals incorporating that particular technology. It is possible that the Commission could issue a positive decision on a sole-sourced project, but that decision would be more vulnerable to legal challenge, than it would have been if the project were competitively bid.

The state aid should be structured in a way that minimises the potential for it to distort competition in that market. The project developer should be ready to answer the question of whether the state aid favours a particular technology over other technologies and, if so, why such aid is necessary. Note that this analysis would include not only nuclear suppliers, but would also look at alternative forms of energy such as wind and solar.

Conclusion

The use of EU state aid regulations to challenge nuclear new build in the EU is a serious challenge to the growth of nuclear energy in Europe. The key take-away is that a member state should notify the DG for Competition of the European Commission of any intended state aid to a nuclear project as early in the process as possible so that the aid can be developed in a way that does not run afoul of the regulations. If a member state provides state aid without prior Commission authorisation, the aid could be considered unlawful and the Commission has the power to prohibit the further granting of aid, and can require that any aid given be repaid with interest back to the state. Sponsors of new nuclear projects in the EU should be prepared to deal with this challenge head-on by carefully planning and implementing a new nuclear development strategy that is entirely consistent with the EU state aid regulations.

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