

28 February 2011

Electricity Market Reform Project
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Dear Sir/Madam

Electricity Market Reform (EMR) consultation response

ICE welcomes the opportunity to respond to the consultation on DECC's proposals for reforming the electricity market. Furthermore, we strongly endorse the objectives to which EMR is directed.

We have repeatedly highlighted the scale and urgency of reform and investment in the UK's electricity market. The importance of the changes required is difficult to understate: we face fundamental challenges in securing supply, decarbonising generation and maintaining competitive prices for domestic and commercial customers. This is captured in the recently published Carbon Plan.

The enormity of the challenge is greater still because of its urgency. With up to a quarter of UK generation capacity due to be retired in the coming decade, and the often-lengthy development timescales for new capacity, there is no time to lose in re-setting the policy framework. But it must be the right framework from the outset: electricity infrastructure costs huge sums to construct and has lifespans measured in decades. But the contribution of a successfully decarbonised system to combating climate change can be our legacy for generations to come.

ICE's expertise in electricity matters issues is vested in its 80,000 individual members, particularly through its expert Energy Panel. Importantly, ICE is guided by its Royal Charter, which obliges us to act for the public good.

ICE's view

In commenting on the EMR proposals, ICE is mindful that its expertise is in engineering, not in economics. We have followed the debate on EMR among economists, operators and politicians and are aware that there is a diversity of opinion among the experts and also that, as is often and justifiably said of proposals for major reform, "the Devil is in the detail". Such is the complexity of the electricity market (even before EMR) that there is much scope for bedevilment.

EMR has huge implications for everyone in the UK and for the civil engineering profession in particular. Whatever the outcome of EMR, it will be the responsibility of many of our members to implement the investments and projects brought forward under any reformed electricity market. As such we have proposed some points which will be fundamental to the success of the reforms. DECC's proposals as outlined refer only to enabling investment input: we think that the process (with others, such as planning reform) must also have regard to the equally important challenges in the practical delivery of this infrastructure.

The market for electricity generation construction operates more slowly than many other markets. There are limited numbers of suppliers for many technologies, major planning and political barriers

to project initiation and information imperfections (including political, planning and supply-side uncertainties), which increase risks. Investors are cautious, and with good reason: unlike fast-moving consumer markets, infrastructure mistakes cannot often be quickly undone and replaced with a better effort.

The Government's role, through EMR and other energy-relevant reforms, is to clarify and reduce risk so that financial investment can be attracted, and so that a massive programme of construction can proceed promptly and efficiently.

There is a role for Government policy in enabling practical and efficient construction, as well as the investment decisions, including measures on:

- the supply chain
The availability and cost of raw materials may prove a major issue for the huge investment programme required. Steel manufacturing (capacity and cost) and ports capacity may prove major barriers to a massive expansion of offshore wind, for example.
- skills and training
Some engineering and construction skills are in ready supply, or can be quickly developed. Others cannot, are already in short supply, in heavy demand internationally, and pose major threats to the prospects of, for example, a major programme of new nuclear build in the UK.
- construction industry capacity
The UK has a finite capacity for delivery of major heavy engineering projects, schemes such as Crossrail and perhaps HS2 will be competing directly for programme delivery resources with the necessary expansion of the energy market, this could lead to over-heating and price escalation.
- phasing and timing.
The recently-published Infrastructure UK cost review (to which ICE made a major contribution) highlighted the stop-start nature of infrastructure development in this country as a major factor in relatively high development costs. Given the massive, largely private sector, investment that must be levered in a short period, we cannot afford to continue in such a manner.

These and other factors pose a significant threat to the successful realisation of a reformed energy market. Yet the current consultation does not cover these aspects, as it focuses on economic and investment enablement, and in quite a theoretical manner. We strongly recommend that Government also examines the other necessary steps for enabling construction of low carbon energy infrastructure to the same level of detail as the current EMR consultation.

ICE will continue to monitor EMR developments in the coming months, including through the submission of written evidence and collaboration with others. We look forward to seeing the outcomes of the consultation. If we can be of further assistance to you, I would be pleased to hear from you and can be contacted via energy@ice.org.uk.

Many thanks for your attention.

Yours faithfully

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