CLIFFORD CHANCE

Client briefing
July 2011

Electricity Market Reform White Paper - Increasing Investor Confidence

DECC's new Electricity Reform White Paper marks a milestone in the Government's complex plans to guarantee security of electricity supply, increase renewable electricity generation, whilst keeping electricity affordable. There is still a lot of work to be done by the Government to create a clear and stable investment environment to encourage funds to flow at the scale and pace needed to "keep the lights on". However, potential investors should nevertheless be encouraged that the Government is sending the right signals to the market. This briefing looks at the main proposals in the White Paper.

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Introduction

The Department of Energy and Climate Change (DECC) has published an Electricity Market Reform White Paper[1] setting out the results of its December 2010 consultation exercise. Further detail is given on proposals for:

- a Feed-in Tariff through "contracts for difference" for low carbon generation.
- an Emissions Performance Standard set at 450g/CO_2 /kWh.
- a Capacity Mechanism to ensure security and reliability of electricity supply.

These reforms will be introduced in conjunction with a new Carbon Price Floor mechanism, announced in this year's Budget. The Government intends to introduce legislation in the 2012 / 2013 parliamentary session to implement the proposals described in the White Paper.

DECC has also published the UK Renewable Energy Roadmap. This sets out the Government's approach to building renewable energy generation capacity with a view to achieving its EU 2020 renewables target.

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[1] Planning our electric future: a White Paper for secure, affordable and low-carbon electricity.

Feed-in Tariff

The Government has decided to stick with its original preference to implement a Feed-In Tariff based on "contracts for difference" (FiT CfD) to replace the Renewables Obligation as its primary mechanism to encourage the decarbonisation of electricity generation[2]. The FiT CfD will support all forms of low carbon electricity (including nuclear) and will form a guarantee to generators as to the level of revenue for electricity supplied. This is likely to be funded by a levy on electricity consumers.

Under the FiT CfD, variable payments would be made to generators based on electricity reference prices to ensure the generator obtains the agreed tariff (the Strike Price); however the generator may have to re-imburse part of the tariff if those electricity reference prices rise above the Strike Price. DECC has recognised that the electricity reference price is "a key component of the FiT CfD" and has set out some further tentative proposals as to how this might operate: Intermittent generation technologies, (e.g. wind) would have their market reference price set by reference to the day ahead market and an hourly averaging period.

Conversely, baseload generation (e.g. nuclear) will probably have its market price set by reference to the year-ahead market and a longer averaging period, perhaps averaging summer and winter prices.

A significant amount of work is ongoing on aspects of the FiT CfD and how it would interact with other market reform elements including:

- Whether **different types of contracts for difference** will be needed for different renewable generation technologies (tidal, biomass, wind etc). DECC has announced that the design of the FiT CfD will be tailored according to whether the relevant generation technology is intermittent or baseload. Eventually a FiT CfD for flexible plant (e.g. gas-fired with CCS) may be introduced but this is unlikely to be until the 2020s.

- Whether **auctioning or tendering** will be used to set the level of FiT CfD support (as opposed to Government determination). Whilst auctioning might be adopted in the medium term for particular technologies, DECC has suggested that generation capacity which is commissioned prior to 2020 will probably receive a tariff set through an administrative price-setting process.

- The **Contract duration, payment frequency and mechanisms, and counterparty**. DECC is currently undecided as to who should be the appropriate counterparty for the FiT CfDs, although it has dropped hints in the White Paper that the counterparty will need to be at arm's length from Government and could even be a private sector body; given the Government's intention to create a "robust and credible institutional framework", it is likely that investor confidence would be maximised if a body such as Ofgem were charged with this responsibility.

The Government envisages primary legislation being introduced in 2012 with the first FiT CfDs being signed in early 2014, which should be sufficient for the new build nuclear projects and the UK's Round 3 offshore wind farm projects but there could well be difficulties for projects seeking financial close prior to then. A review of the system in 2016 should provide the Government with an opportunity to make adjustments to the new scheme whilst still in its early days; however any review will create a degree of regulatory risk which is unlikely to suit investors.

Transition to FiT from Renewables Obligation (RO)

Some more detail is now available on the transition process from RO to FiT CfD.

New Projects

Projects commissioned between 2014 and 31 March 2017 will have a one-off choice: accreditation under RO or FiT CfD.

Those commissioned from 1 April 2017 will only be eligible for the FiT CfD[3].

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[2] The alternative was a fixed premium Feed-in Tariff payment.

[3] Where wind farms benefit from the registration phasing provisions of The Renewables Obligation (Amendment) Order 2011, any turbines registered after 31 March 2017 will be eligible for support only under the FiT CfD.

Existing RO Projects
Existing projects within the RO will continue to receive RO support for the full 20 years. The Government has confirmed that support will be fixed (or "grandfathered") at April 2017 for all technologies that do not already benefit from grandfathering. This will avoid any further RO banding reviews. The Government's "vintaging" approach also means that any additional capacity to such generating stations would not be eligible for RO support (but might be eligible for support under the FiT CfD or the Feed-in Tariff available for small scale microgeneration projects).

Emissions Performance Standard
The Government is pressing ahead with its proposals for an Emissions Performance Standard (EPS) despite significant opposition from a number of quarters, including the Select Committee of MPs who described it as "pointless". The Government has refined its proposals since the Consultation paper and they are broadly as follows:

- **Application to single power stations on an annual basis:** the EPS would be a regulatory limit on emissions of CO2 released from a single power station. It would be set on an annual basis so as to provide flexibility for exceedances in particular circumstances. Only plant at or over 50MW will be affected.

- **Level of EPS:** The Government is maintaining its preferred option for the EPS level: 450g CO2 / MWh at baseload. This level would require a 40% reduction in emissions from coal-fired power stations at baseload, effectively requiring carbon capture and storage to be adopted by all new coal-fired power stations. Gas-fired power stations would not be affected although a review of limits at the end of 2015 could bring them within its scope.

- **New capacity and grandfathering:** the EPS would only be applicable to new capacity, and the level of the EPS would be grandfathered (from the date of consent) to apply for the lifetime of the plant. The Government has now stated that it will consider whether grandfathered EPS standards will be removed after the end of 2015 (for new plant consented after that date). Also, where a plant undergoes a significant life extension or upgrade, the EPS would be applied to it based on the applicable EPS at that time; the Government is still considering how this might work.

The Government has proposed that any element of burning / co-firing of biomass should be excluded (or "zero-rated") from the EPS. Proposals to ensure Combined Heat and Power projects are not disadvantaged are still being considered.

Carbon Price Floor
For completeness, the White Paper refers to its Carbon Price Floor proposals although there are no new significant developments on this policy measure. The Carbon Price Floor will establish a minimum price for carbon by making generators pay a special Climate Change Levy in addition to any allowances they have to buy under the EU Emissions Trading Scheme.[4]

Capacity Mechanism
The Capacity Mechanism aims to guarantee adequacy of electricity supply at all times. In its December 2010 consultation paper, the Government had suggested a "targeted mechanism" whereby the Government would set the desired generation mix and then run tendering procedures to ensure that sufficient capacity within that mix was always available. Strong stakeholder concerns have been raised that this could lead to distortion of the electricity market and could even result in ever greater volumes of capacity being withdrawn from the electricity markets if capacity mechanism payments were excessively high.

The Government has gone back to the drawing board, launching a new consultation proposing an alternative variant of a targeted mechanism to meet stakeholders' concerns, and an alternative "market-wide mechanism":

- **Strategic Reserve (targeted mechanism):** this would involve a volume of reliable capacity being procured by a central body whenever a shortfall in the required electricity capability was expected. The capacity would come from a mix of generation sources and other non-generation techniques such as electricity storage and measures designed to reduce demand (demand side response). The new element to the Government's proposal is that this reserve would only be released when electricity prices rise above a certain level (the despatch price).

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4. For further detail see our client briefings: "Energy Market Reforms - A major new consultation package- December 2010" and "Further Changes to UK Renewables Incentives – April 2011".

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- **Capacity Market (market-wide mechanism):** this would again involve a central body determining the required volume, but in this case, the full amount of capacity would be purchased from any provider able to supply it, as long as the capacity is available as required (again this would include other non-generation techniques). This could be structured as a "Reliability Market" whereby the buyer enters into a call-option with the provider to supply electricity at a capped price. If the electricity is not available, compensation at an agreed level is payable. However, other mechanisms, such as auctions and obligations are under consideration.

Representations on these capacity mechanism proposals must be made to DECC by 4 October 2011. A further update to the White Paper will then be made in late 2011 / early 2012.

Ofgem ongoing work

The Government sees increased liquidity in the electricity markets as helping in the effort towards security of supply and the effectiveness of the FiT CfD. Ofgem recently published proposals recommending two reforms to improve liquidity:

- A Mandatory Auction requiring major suppliers to make 10-20% of the generated electricity available into the market; and

- A Mandatory Market Maker provision requiring them to offer continuously both "buy" and "sell" prices.

The Government has confirmed that it is content with the "direction" that Ofgem is taking on these proposals.

UK Renewable Energy Roadmap

DECC has also launched a new Renewable Energy Roadmap, setting out the actions needed to increase renewables deployment, reducing the costs of doing so and ensuring that the UK meets its EU target of 15% of energy produced from renewable sources by 2020. It sets out a range of common cross-cutting actions to address barriers to deployment including removing barriers to grid access and tackling pre-and post- consent delays.

It then looks at 8 renewable technologies[5] and sets out the detailed path to securing specific levels of deployment. It concentrates on collating the ongoing actions in these areas rather than making major new announcements. For example, the offshore wind priorities include:

- Earmarked funding for innovation and developing the supply chain;

- Minimising investment risk through the 2011 RO banding review and the electricity market reforms;

- Ensuring access to finance, for example, through the Green Investment Bank, and limiting uncertainty for investors over the prioritisation of oil & gas exploitation;

- Ensuring the co-ordinated provision of offshore transmission assets; and

- Managing potential delays to consents, for example, by identifying where there are evidence gaps relating to marine conservation.

Final Comments

The process of electricity market reform is clearly a challenge for the Government – following a detailed consultation on Electricity Market Reform measures in December 2010, the resulting White Paper leaves a considerable amount of detail open for consideration or further consultation. However, the proposals form a complicated interrelating web and the Government is continuing to consider how they will all work together. It has to get all elements right to ensure that its objectives of security of supply, a diverse and sustainable energy mix are all met. Better to spend time getting it right now than finding in just a few years time that major chunks of the reformed machinery have to be redrawn which could be disastrous from an investor's perspective, potentially pushing investment to other countries.

The reform package is ambitious and innovative for the UK in many respects. The Government is maintaining its general direction on the reforms and this should encourage industry and investors as to the longer term prospects for supporting electricity infrastructure.

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5 Onshore wind, offshore wind, marine energy, biomass electricity, biomass heat, ground source and air source heat pumps and renewable transport.

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- Regulation, risk assessment and adaptation
- Emissions trading, carbon footprinting and offsetting
- Commercial transactions, funds and supply chain issues
- Renewable energy
- Disputes

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