

Energy



DEPARTMENT OF ENTERPRISE, TRADE AND INVESTMENT, NORTHERN IRELAND

RESPONSE TO DECC CONSULTATION ON ELECTRICITY MARKET REFORM

MARCH 2011

Introduction

1. The Department of Enterprise, Trade and Investment, Northern Ireland (DETI) offers the following views and comments in response to the Department of Energy and Climate Change's consultation on the United Kingdom Government's proposals to reform the electricity market in the UK.
2. Under the Northern Ireland Act 1998, DETI is responsible for the development and implementation of energy policy in Northern Ireland¹. Devolution extends to the regulation of gas and electricity by the Northern Ireland Authority for Utility Regulation. Nuclear power was the only aspect of energy policy that was retained as an excepted matter under the control of national government. This makes Northern Ireland unique among the Devolved Administrations.
3. DETI has already responded to HM Treasury's consultation on the carbon price floor, setting out why it would have a significant adverse effect on security of supply in Northern Ireland.
4. The Northern Ireland Executive agreed a new Strategic Energy Framework for Northern Ireland in autumn 2010. Key to the Executive's energy strategy is providing clear and timely signals of the priorities to guide market participants and encourage increased levels of renewable energy, as well as providing the infrastructure needed to improve security of supply and diversity of low carbon energy production. This will support local development of a green economy and aid the growth of general commercial activity.
5. The Executive has set a target to achieve 40% of Northern Ireland's electricity consumption from renewable electricity by 2020. This will be primarily from wind generation but will also involve other forms of renewable technology such as tidal stream and biomass. It is a level of renewable generation that will have a significant impact on the energy mix and use in Northern Ireland.
6. DETI would reiterate its concern that it was informed of the detail of the proposals only via Minister Hendry's letter of 9 December 2010. The EMR package is likely to have significantly different consequences in Northern Ireland than is intended in the objectives of the project. Early discussion would have provided for a more considered analysis of the potential impact of the UK Government's plans on Northern Ireland government policy across energy, the economy and social welfare.
7. Both the DECC and HMT consultation documents are focused on how to ensure that the United Kingdom's national energy and climate goals are met. This involves addressing the problems that affect the electricity market in Great Britain to deliver low carbon generation, for example, the role of nuclear energy in providing a reliable and more diverse and secure energy generation and fuel mix. They seek to address a different set of problems than those that exist in Northern Ireland – the package of measures set out in EMR should therefore be reconfigured so that they minimise any negative impact on energy policy in Northern Ireland.

¹ The Electricity (Northern Ireland) Order 1992, as amended by The Energy (NI) Order 2003 and the Electricity (Single Wholesale Market) (NI) Order 2007 places a principle objective and a general duty on the Department to protect the interests of consumers and the need to secure that all reasonable demands in Northern Ireland or Ireland for electricity are met.

Key Points of EMR package and Their Impact on Northern Ireland

8. The EMR package represents a very significant level of reform, affecting all aspects of the UK market, including Northern Ireland. The timetable given for the significant level of reform is too hasty to enable proper and full consideration of all the issues raised by HMT on the carbon floor price and by DECC on the other elements of the EMR package. There should be a further period of significant consultation on the White Paper with a
9. The EMR package betrays significant optimism bias on behalf of DECC and Treasury Ministers that the package of far-reaching reforms can be delivered simultaneously and in a short time-scale. DECC Ministers should not under-estimate the very real possibility that there will be considerable problems in implementation of this package and that the plan to include renewables incentivisation in the changes will, and already is, affecting deployment.

Climate Change Levy and Carbon Price Floor

10. The Single Electricity Market (SEM) is a very different market to the BETTA market operating in GB. The SEM is unique in that it operates as a unified pool market across a national border with another Member State. Under the SEM rules, bids into the pool are cost reflective. Any change to CCL and fuel duty could impose a negative effect on the competitiveness of Northern Ireland generators and adversely affect investment and economic growth.
11. In addition, where increased costs, which arise due to the changes in CCL, are fed into wholesale prices within the SEM pool, a perverse outcome would be windfall gains for Republic of Ireland generators who could benefit from increased wholesale prices. These benefits would then be passed on to the Irish State, i.e. state owned ESB is the largest generating company in the SEM.
12. If CCL is applied to Northern Ireland generators their relative position in the SEM merit order will reduce and they will be scheduled less frequently. This will reduce their profitability. Whenever a Northern Ireland generator is the marginal generator, this will set the clearing price in the market and the additional CCL cost will result in higher electricity prices for all customers in both Northern Ireland and the Republic of Ireland.
13. While the SEM operates an unconstrained wholesale market, due to the physical limitations in the transmission network between Northern Ireland and the Republic, existing limited North-South interconnector capacity leads to 'constraint costs' to consumers of some £18m+ per year due to the need to call on less efficient generators in the SEM. These constraint costs will continue to increase if Northern Ireland generators fall further down the dispatch merit order in the SEM due to carbon and fuel duty costs. This position will continue to worsen until the planned second North-South interconnector is approved and built in, say, 2016.
14. The small number of generators owned by international companies and the heavy dependence on fuel oil for backup affects security of supply. The proposed measures would push Northern Ireland generators down the merit order, resulting in reduced returns, which may make it more profitable to locate new investment in power plants in

the Republic of Ireland or elsewhere. Any taxation measures that weaken the competitiveness of Northern Ireland generators and the willingness of international companies with worldwide investment interests to continue to invest in maintaining these plants or in building plant replacements will threaten Northern Ireland's security of supply.

15. HMT officials have pointed out that the Republic of Ireland already has a windfall tax and that this measure would only equalise the imbalance in the SEM. However, it is important to bear in mind that the Irish windfall tax comes to an end next year, whereas the HMT tax will be ongoing.

Capacity Mechanism

16. Discussions with DECC officials appear to indicate that it is not envisaged that the capacity mechanism should apply in Northern Ireland, since Northern Ireland, as part of the Single Electricity Market, already has a capacity mechanism: it would be difficult to imagine how two capacity mechanisms could function in the same location.
17. It would have been helpful for the consultation document to indicate the potential geographical extent of the measure. DETI would welcome written confirmation that DECC does not expect this measure to be extended to Northern Ireland.

Emissions Performance Standard

18. It is not clear if it is proposed that there should be emission performance standards across the UK. DETI understands from DECC officials that the initial thinking is that these should be UK wide. Emissions performance is a devolved matter and it would have been helpful if DECC had consulted Northern Ireland before bringing forward these proposals.
19. Northern Ireland is happy to consider this further matter in conjunction with DECC. However, no announcement, commitment or legislation as to the application of Emissions Performance Standards to Northern Ireland should be made without the express agreement of the Northern Ireland Executive.

Renewable Electricity Incentivisation – FITs with CfD and PFIT

20. The Northern Ireland Renewables Obligation (NIRO) is the renewable electricity incentive mechanism in Northern Ireland. DETI is concerned that the proposals contained in the EMR could impact on the NIRO's future viability and our ability to achieve the Executive's 2020 target. The NIRO is now well understood by those involved in renewable electricity generation and it is delivering and can deliver Northern Ireland's renewable electricity targets. DETI asserts that DECC signals under the EMR package is having and will have significant impact on deployment in Northern Ireland as it introduces a very high level of risk and uncertainty to planned projects which often take significant periods of time to bring to deployment.
21. As an example of the risks to deployment, The Crown Estate has announced (8 March) the launch of a NI leasing round for offshore wind and tidal stream for this year. It is clear that investors will soon be making significant investment decisions that have the potential for significant supply chain benefit to Northern Ireland, but those

decisions are likely to be deemed too risky in the environment that DECC has created: loss of TCE's Northern Ireland leasing round will be a very significant loss to Northern Ireland and to the budding marine renewables industry which the coalition government agreement has stated it supports.

22. The NIRO works in conjunction with the two Renewables Obligations in Britain. At the time of the establishment of the RO, the NIRO was set at a lower level than in the rest of the UK in recognition of:
- a) the higher level of existing electricity prices in NI, driven especially by the higher level of wholesale prices;
 - b) the special market conditions existing in NI with a lower level of competition, which again is likely to lead to higher prices;
 - c) the relatively greater levels of fuel poverty that exist in NI (three times that of England).

The lower Obligation level has the effect of spreading the cost of the NIRO across the whole of the UK.

23. Earlier this year, DETI, in conjunction with the Northern Ireland Authority for Utility Regulation (NIAUR), undertook analysis of renewable electricity subsidy design to ensure that the NIRO could continue to work alongside the Republic of Ireland's different subsidy mechanism within a Single Electricity Market and to examine options to 2020 for renewable electricity incentivisation. That analysis, which we have shared with the DECC RO team and was available to the DECC EMR team, clearly shows that the interaction between the NIRO and the GB ROs: "leads to a materially lower level of cost to NI consumers (who pay more for energy than their GB counterparts) than alternative approaches".
24. The analysis shows that the discounted cumulative cost to NI consumers to 2020 under the current NIRO regime is projected to be £348m (equal to the buyout price multiplied by the obligation size within the NIRO for all years to 2020). The cost to NI consumers, per unit of electricity consumed, is therefore £3.3/MWh. In contrast, the cost to GB consumers is significantly higher, with the cumulative costs of the RO to 2020 estimated to be around £45/MWh per unit of renewable electricity generated, compared to a cost of £13/MWh in NI, and around £7.8/MWh, per unit of electricity consumption. However, if the cost of electricity is also included in the cost to NI and GB consumers, the analysis shows that, per unit of electricity consumption, NI consumers cumulatively pay around £2/MWh more than GB consumers supporting renewable generation to 2020.
25. However, if the NIRO obligation level were equal to GB Obligation levels, NI consumer costs are 143% higher compared to a scenario where NI retains its concessionary obligation level to 2020. In this scenario, the subsidy costs recovered from NI and GB consumers by 2020, per unit of electricity demand, are the same if only subsidy cost of renewable generation is considered. Although the costs to GB consumers of the RO are lower, when NI's renewables obligation is increased to a comparable level to GB, the fall in GB consumer costs is much smaller in percentage terms (2% reduction from the Base Case) than the increase in NI consumer costs (143% increase from the Base Case). Under the NIRO in its current form, NI consumers are predicted to pay around £1/MWh more than GB consumers by 2020. If the costs of electricity are also included

in costs of an increase NI renewables obligation, the modelling results show that NI consumers pay around £10/MWh more supporting renewable generation in 2020 than GB consumers.

26. It is clear that NIRO would not be an effective renewable electricity incentive mechanism if it operated in isolation from the other GB ROs. If the link between the NIRO and GB ROs was broken, then it is likely that NI would have to move to a FIT mechanism. While the costs of such a feed-in tariff in Northern Ireland are obviously dependent on the tariff rates, assuming those rates are sufficient to incentivise deployment, our analysis shows that the cost to NI consumers under a FIT optimised for Northern Ireland circumstances is significantly greater than the cost to NI consumers under the existing NIRO regime because the total subsidy cost of a NI FIT scheme (and therefore the total cost of funding new-build investment in NI RES-generation) is recovered solely from NI consumers.
27. Our analysis shows that the costs to NI consumers of supporting renewable electricity generation in 2020 under a FIT scheme, relative to the existing NIRO regime, would be expected to be relatively high. The annual cost to NI consumers of supporting renewable generation under a NI-optimised FIT is estimated to be around £45m - £60m more than from the continued operation of the NIRO to 2020. The increase in NI consumer costs is in the range £4-6 per unit of electricity consumption over the current NIRO regime. This would require an additional average increase in annual NI household electricity bills of approximately £25-£30 by 2020 over and above the costs of NI's continued participation in the RO.
28. Northern Ireland is blessed with significant capability to develop renewable electricity and the region punches above its weight in the provision of renewable electricity compared to its size and customer base and has the potential to provide even more. The Executive has agreed a target of 40% renewable electricity by 2020, which equates to almost 2GW installed capacity, and there is potential for much more. While this is small in UK terms, it is almost certainly more than equivalent regions in England will be able to provide. Our understanding of the 15% target under the Renewable Energy Directive is that Northern Ireland's contribution will be needed.
29. However, as shown above, if DECC breaks the link between the ROs and the NIRO, this will increase the cost of renewable electricity generation here to the small number of NI consumers (around 800,000) who already suffer the highest levels of fuel poverty in the UK: Northern Ireland consumers cannot bear the full costs of capturing the greater renewable resource here.
30. The single market structure means the interaction between the support mechanism and market operation needs careful consideration and economic factors, such as the high levels of fuel poverty in Northern Ireland, mean that cost to customers is an important consideration. Under such circumstances, it is likely that the Executive's 40% renewable electricity target would have to be reviewed for affordability. This would be a sad loss to a region which is looking to renewable energy, and the supply chain opportunities for this sector, as a way out of current significant economic challenges of the region and unfortunate for the UK in meeting its EU and carbon targets.

Impact on Business

31. Northern Ireland electricity costs are generally the highest in the UK and higher than most regions in the EU. The Northern Ireland economy is heavily dependent on the public sector. The Northern Ireland Executive is working to balance the economy by sustaining current economic and manufacturing activity and promoting the expansion of the private sector in line with UK Government policy. The EMR package will reduce the competitiveness of the Northern Ireland economy by the addition of these costs onto already high electricity prices, without any evidence that the package will support the growth of the low carbon generation in Northern Ireland.
32. The imposition on Northern Ireland consumers of costs that are aimed at supporting renewable investment in Great Britain must also be seen in the context of Northern Ireland business and domestic consumers already being asked to bear significant costs of some £1 billion to upgrade the electricity infrastructure in Northern Ireland to support the growth of renewable generation to help meet UK renewable targets.

Impact on Fuel Poverty

33. Fuel poverty levels in Northern Ireland are the highest in the UK. Northern Ireland levels stood at 44% in 2009. This compares to 33% in Scotland in 2009, 16% in England (2008) and 20% in Wales (2008). The EMR proposals are expected to cause an increase in the level of fuel poverty in Northern Ireland. Rising electricity prices due to the increasing cost of imported generator fuels have a significant impact on the ability of government to alleviate fuel poverty. In line with DETI's responsibilities for protecting electricity consumers, the Department works closely with the Department of Social Development (DSD), which has lead responsibility for fuel poverty policy, to ensure that fuel poverty is tackled coherently across government.
34. There are considerable differences in average annual fuel bills across the regions of Northern Ireland and Great Britain, and the percentage of disposable household income this represents. For example, households in Northern Ireland spend more than twice as much of their disposable income on energy than households in London and around 60% more than the UK average. Heat needs are greater because of our latitude and climate and because of the higher proportion of rural households (not sheltered within towns). Household incomes are lower in Northern Ireland and we have higher rates of benefit dependency. Northern Ireland also has a much higher dependence on oil for domestic heating with 70% of homes using oil to heat their homes, thus suffering greater price volatility, unlike the regulated electricity and gas markets in Northern Ireland.

HM Treasury role in respect of renewable electricity incentivisation in Northern Ireland

35. Energy (except nuclear energy), renewable energy and renewable electricity incentivisation are fully devolved matters under the terms of the Northern Ireland Act 1998. The NIRO is not a tax, nor would a feed-in tariff be a tax: if it were a tax, it would not be a devolved matter. DETI discussions with HMT officials have indicated that it is accepted by HMT that neither the NIRO nor any other form of renewables incentivisation are, legally, taxes. For DETI to recognise HMT authority in a fully devolved area such as renewable energy would be to give up a part of the devolved

settlement, and this would involve discussion in terms of the Belfast Agreement and, potentially, primary legislation with the agreement of the Northern Ireland Assembly. DETI suggests that Treasury legal experts should engage with DETI to set out the legal basis for HMT and DECC's claim that Treasury should oversee and constrain NIRO levels or FIT tariff rates, including where the costs associated with these are "socialised" across the UK.

Way forward

36. DETI urges DECC to ensure that consideration of the impact in Northern Ireland is now taken into account by all teams working on EMR package. Following the model adopted by the DECC RO team, we urge DECC to involve devolved administrations closely in future discussions on designing mechanisms which will deliver both the UK Government's and the devolved administrations' targets and in shaping the mechanisms and structures that will underpin these, while maintaining the devolved settlements. DETI urges DECC to understand the differential impact of EMR on Northern Ireland and take further time to consider the way forward for the whole of the UK.

Responses to consultation questions

Q1: Do you agree with the Government's assessment of the ability of the current market to support the investment in low-carbon generation needed to meet environmental targets?

DETI does not agree with the UK Government's assessment in terms of its effect on Northern Ireland. DECC has failed to differentiate between GB and NI electricity markets in its analysis. Hence it has not noted that Northern Ireland is unlikely to benefit in any way from the EMR proposals in terms of security of supply, lowering carbon or cost to consumers.

Q2: Do you agree with the Government's assessment of the future risks to the UK's security of electricity supplies?

DECC has failed to differentiate between GB and NI electricity markets. Indeed, its EMR package is likely to increase risk to security of supply in Northern Ireland and significantly increase the cost of fossil-fuelled electricity and renewable electricity here.

Q3: Do you agree with the Government's assessment of the pros and cons of each of the models of Feed-in tariff (FIT)?

No. The analysis has failed to take into account the effect on Northern Ireland of breaking the link between the NIRO and the GB ROs. Northern Ireland acknowledges the right of the UK government in the form of DECC to make what arrangements it sees fit. However, if the overall aim of the policy proposals is to attain "secure, low carbon, affordable electricity" across the whole UK, then this will not be achieved by forcing significant costs onto a small Northern Ireland consumer base.

Q4: Do you agree with the Government's preferred policy of introducing a contract for difference based feed-in tariff (FIT with CFD)?

No. The proposal does not take into account the different circumstances which pertain in Northern Ireland: a different electricity price would require a different strike price here; there are many small-scale generators here and it is difficult to see how the complexities of FITs with CfDs could work for micro and small-scale generators. DECC officials have suggested that those who use agents could continue to use them for CfDs, but CfDs would be a financial transaction, possibly regulated by the Financial Services Authority, and RO agents would be unlikely to be so qualified. We therefore believe that FITs with CfDs would not be suitable for small-scale generation, again having a negative impact in Northern Ireland.

Q5: What do you see as the advantages and disadvantages of transferring risks from the generator or the supplier to the Government?

There seem to be very few advantages for Northern Ireland. If Northern Ireland were to follow the FIT with CfD route, there would need to be separate administration because of the need for a different strike price in Northern Ireland to take account of the higher cost of electricity here. This would be particularly cumbersome in terms of administration, unless the administration could be shared with the GB administration.

Q6: What are the efficient operational decisions that the price signal incentivises?

N/a.

Q7: Do you agree with the Government's assessment of the impact of the different models of FITs on the cost of capital for low-carbon generators?

The FIT proposal will work well for nuclear and CCS without needing to introduce uncertainty and delay into renewables market with 2020 targets so pressing. This consultation is already having a negative effect on deployment prospects in Northern Ireland as witnessed by comments made by consultees on our offshore renewable electricity incentivisation consultation. Clarity is needed on how the FITs mechanism will work across all of the UK.

Q8: What impact do you think the different models of FITs will have on the availability of finance for low-carbon electricity generation investments from both new investors and the existing investor base?

Again, the effect is likely to be very negative in NI.

Q9: What impact do you think the different models of FITs will have on different types of generators?

The FIT proposal will work well for nuclear and CCS without introducing uncertainty and delay into the renewables market with 2020 targets so pressing. In this matter, the DECC proposals are functioning as "enemies of enterprise", referred to in David Cameron's recent speech, for renewable energy generators. As mentioned above, this consultation has already had a negative effect on deployment prospects in Northern Ireland by creating uncertainty for existing and new generators.

Q10: How important do you think greater liquidity in the wholesale market is to the effective operation of the FIT with CfD model? What reference price or index should be used?

The reference price would need to be very different in Northern Ireland.

Q11: Should the FIT be paid on availability or output?

If it is paid on availability, it would seem to be overlapping in function with the capacity mechanism.

Q12-18 on emission performance standard:

It is not clear if it is proposed that there should be emission performance standards across the UK. DETI understands from DECC officials that the initial thinking is that this should be UK wide. Emissions performance is a devolved matter and it would have been helpful if DECC had consulted Northern Ireland before bringing forward these proposals.

Northern Ireland is happy to consider this further matter in conjunction with DECC, but no announcement as to the application of Emissions Performance Standards to Northern

Ireland should be made without the express agreement of the relevant Northern Ireland Minister.

Q19 – 25 on capacity mechanism:

Discussions with DECC officials appear to indicate that it is not envisaged that the capacity mechanism should apply in Northern Ireland, since Northern Ireland, as part of the Single Electricity Market, already has a capacity mechanism: it would be difficult to imagine how two capacity mechanisms could function in the same location.

It would have been helpful for the consultation document to indicate the potential geographical extent of the measure. DETI would welcome written confirmation from DECC that DECC does not expect this measure to be extended to Northern Ireland.

Q34: do you agree with the Government's assessment of the risks of delays to planned investments while the preferred package is implemented?

The consultation document shows significant optimism bias in the belief that it is possible to change four aspects of the electricity market at the same time without causing major disruption or without unintended negative consequences. The Coalition Government should take a phased approach, starting with FIT for nuclear power which is very clearly the main purpose of the EMR package.

Reform of renewable electricity incentivisation should not be implemented until 2020, as failure to meet the EU's 2020 target will also have a cost implication through infraction penalties. Reform of the electricity market should also have due regard to the full effects on all regions of the UK.

In Northern Ireland, the first victim of the uncertainty over the introduction of the EMR package could be the planned Crown Estate leasing round of the Northern Ireland territorial waters. In DETI's recent consultation on incentivisation of offshore, stakeholders have already expressed significant concern to DETI about the effect of the EMR package on this leasing round, where deployment is expected around 2016/17.

Q35: do you agree with the principles underpinning the transition of the Renewables Obligation into the new arrangements? Are there other strategies which you think could be used to avoid delays to planned investments?

The best strategy would be for DECC to retain the renewables obligations functioning broadly as at present, or with a fixed price, and move to FIT with CfD for nuclear and CCS only. Otherwise, investment hiatus is inevitable during the transition period – certainty of future ROC prices will be vital for any generators considering the RO during this time. Clear policy statements on grandfathering, obligation levels, additional capacity/phasing and ability (or otherwise) to move from one scheme to another will be important.

Q36: we propose that accreditation under the RO would remain open until 31 March 2017. The Government's ambition is to introduce the new FIT for low-carbon in 2013/14. Which of these options do you favour?

It will be important for those taking investment decisions at present that the RO is kept open as long as possible, because of difficulties in getting planning permission and grid connection agreements.

Northern Ireland is content that the DECC RO team has at all times kept Northern Ireland as informed as possible of proposals and agree with the DECC RO team that a single transition mechanism for the UK is preferable, provided that issues with the FIT proposals and its application in Northern Ireland can be resolved. DETI remains happy to work closely with the DECC RO team on these and all other points.

Q37: some technologies are not currently grandfathered under the RO. Which option?

The decision has been made that certain technologies should not be grandfathered for good reasons. To grandfather these at 2017 goes against this thinking and DETI would agree this risks over or under compensating generators. Banding Reviews for these technologies should continue beyond 2017. There are only a small number of technologies affected and this should not be an onerous task.

Q38: which option for calculating the Obligation post 2017?

It is difficult to give a considered response to this question without having the opportunity to carry out detailed work assessing the impact on Northern Ireland's reduced Obligation level. It would be helpful to be able to consider with DECC how Northern Ireland's reduced obligation level would work under the different scenarios given by DECC.