

### PROJECT DISCOVERY

### OPTIONS FOR DELIVERING SECURE AND SUSTAINABLE ENERGY SUPPLIES

#### **RESPONSE BY E.ON UK**

### **SUMMARY**

- We support the EU ETS as an efficient driver of low carbon investment across the EU. However, to be effective it needs to provide a reliable firm trajectory in the CO<sub>2</sub> emissions cap out to at least 2030. Regrettably COP 15 has not provided the international basis for such an approach.
- In the absence of a reliable long-term CO<sub>2</sub> emissions cap, we agree there is a case for considering in the UK additional incentives to support low carbon generation investment, given the UK's specific climate change targets, which go further than EU-wide commitments, and the urgent need to replace a large volume of closing capacity with low carbon generation to support delivery of those targets.
- Of the options available, our current view is that an obligation on suppliers to contract for low carbon electricity most effectively combines the ability to incentivise investment with a market oriented, technology neutral approach, without significantly distorting the existing EU ETS and competition in EU wholesale markets.
- We do not believe a need has yet been demonstrated for changes in the market framework to incentivise electricity peaking or other capacity per se. The role of a more active demand side response needs to be explored first as a means of addressing the impact on demand for other generation caused by large volumes of variable wind generation. Interconnectors also have a role in mitigating these effects and in ensuring that the UK's capacity requirements can be met. Technological options such as electricity storage should be encouraged.
- We do not believe there is evidence of a need for intervention in the gas market to deliver gas storage or other options to support secure gas supplies.
- There is also no evidence in our view to suggest that radical interventions such as a single buyer model are required or are more efficient than market oriented options. Historical experience within the UK suggests the reverse. They are also largely incompatible with liberalised EU energy markets which the UK Government and Ofgem have advocated for the last 20 years and on which the UK will increasingly rely to secure access to gas.
- We were somewhat surprised that, given Ofgem's active support for liberalised EU
  markets, the analysis in Project Discovery takes such a UK-centred view and sees the
  development of an EU wide energy market as more of a threat than an opportunity.
- Interdependence with international markets presents opportunities for the UK rather than a major risk. Liberalisation of the EU gas market and the UK's access to diverse sources of imported and domestic gas enhance the UK's ability to secure access to gas, although the investment necessary to address gas quality constraints in the UK on imports needs to be addressed more urgently than Ofgem suggests. The EU gas security of supply regulation will also help ensure UK access to gas in emergency conditions. Increased interconnection with other European electricity markets will also deliver security of supply benefits and efficiency savings.



- We would add as a major risk regulatory and political uncertainties arising within the UK
  from increasing pressure to control prices, to implement market investigations and to
  implement more interventionist methods of emissions controls, such as emission
  performance standards, without establishing whether the required investments can be
  delivered.
- We agree that the impact on consumers and on those on low incomes specifically is a major concern. This reinforces the need to ensure that EU and Government policies drive the least cost means of achieving secure energy supplies and reducing greenhouse gas emissions. The effect on low income consumers of the investment required should be addressed through a combination of energy efficiency investment, appropriately structured tariffs, and use of the tax and benefits system.

## Question 1: Do you agree with our assessment of the current arrangements?

- 1. In our view the energy market has so far delivered sufficient investment to maintain security of supply and achieve a substantial reduction in CO<sub>2</sub> emissions over the period since 1990. This market-based approach has almost certainly been much more responsive to the availability of gas for power generation than would have been the case had the CEGB remained in place. Government intervention has also more recently been successful in promoting significant investment in renewables. There has also been very substantial investment in LNG facilities and interconnections with the continent and Norway in anticipation of a decline in UKCS supplies.
- 2. While the market has not stimulated investment in more capital intensive low carbon generation technologies other than renewables, these technologies have not been available to the market until recently. New nuclear only became available as an option following the 2008 White Paper and investment in CCS technologies still requires commercial demonstration.
- 3. We do not see market structure as a problem. Indeed, provided there is sufficient competition at all levels of the value chain, vertically integrated structures and the presence of companies of sufficient scale and wide experience in managing a range of capital intensive investments can help manage investment risks. We are aware of no evidence to support the contention in 3.18 that there is 'a risk that such dynamics could impact the perceived riskiness of generation investments, such that, perversely, investments with stable operating and fuel costs (such as nuclear and wind) could be viewed by the Big 6 suppliers as more risky than investments whose costs vary with volatile global fuel costs.'
- 4. We see two main, related, challenges facing the UK energy market. Both of these relate not to a failure in the market arrangements as such but to the ability of the market to incentivise investment, given the interventions that Governments have made in the market to deliver specific outcomes.
- 5. The first is the impact of large volumes of wind generation on wholesale prices and on the economics of other power generation investments and indeed on further investment in wind itself. Our analysis suggests the high prices needed to remunerate more flexible



plant operating at low load factors required to maintain security of supply during periods of high demand and low wind output will both be relatively infrequent and unpredictable (as the weather conditions which give rise to a combination of high demand and very low wind output across the UK only occur say two or three times across a number of years). They may also tend to trigger political and regulatory scrutiny.

- 6. In these circumstances investors may conclude, for example, that some existing marginal capacity, probably less efficient gas-fired capacity, may not receive sufficient income to remain economically viable, leading to their closure. While this would then have the effect of restoring price levels and income for the remaining capacity, it would lead to somewhat lower plant margins during periods of peak demand and lower supply security than we are used to.
- 7. We also see a potential loss of income for more capital intensive coal and CCS, nuclear and renewable plants arising from a) a more general downward pressure on wholesale prices arising from a large amount of available capacity when there is significant wind generation and b) periods of very low wholesale prices during periods of low demand and high wind generation, or negative prices arising from the incentive on renewable plant to bid negative prices to secure its ROC income.
- 8. The second challenge relates to uncertainty about the carbon price generated by the EU ETS. Investment in both coal and CCS, nuclear and renewable capacity requires a price of carbon to be factored into wholesale power prices to support the initial investment, although a range of other factors, including relative fuel prices, are of course also relevant. At present there is significant uncertainty about future carbon price levels in the absence of a comprehensive international agreement on reductions in greenhouse gas emissions to succeed the Kyoto Protocol which would trigger a tightening of the EU's own greenhouse gas reduction targets and the EU ETS cap. Furthermore it is unclear to what extent any new agreement will support the reliable firm trajectory in the CO<sub>2</sub> emissions cap out to at least 2030 needed for the EU ETS to incentivise new nuclear and coal and CCS projects effectively.
- 9. Developers are unlikely to commit to these huge capital investments without more clarity about how these will be rewarded over their lifetime. In relation to investment in new coal and CCS, we have already made the point that, to the extent that there will be a requirement to fit further CCS or achieve a specific emissions performance standard by a defined date, Government would need to commit to fund this.
- 10. We agree that it is important to ensure that wholesale prices react sufficiently to periods of market tightness. We would welcome a debate on this issue but are not convinced that adjustments to the cash-out regime for electricity and gas will have a substantial effect. We are concerned, however, that regulatory uncertainty, including the lack of clarity around the effect of the licence condition on 'exploitation of electricity trading and transmission arrangements' provided for in the Energy Bill, will add to concerns that the market may not support investments relying on peak income.



11. On risk governance, we do not assume that the Government will ultimately intervene to maintain security of supply. Indeed such interventions are highly undesirable from a company perspective as such interventions lead to suspension of market rules which may make it difficult for companies to recover their costs. More importantly security of supply problems would lead to a further review of the market framework which would lead to more change and uncertainty. We in fact assume that the Government or the regulator will put in place a market structure which will provide sufficient incentives to ensure that companies making rational investment decisions will make the appropriate investments. The risk is that Governments are, through a variety of sometimes ad hoc interventions, preventing companies from acting in this way.

# **Question 2:** Are there other aspects of the current arrangements which could have a negative impact on secure and sustainable energy supplies, or costs to customers?

- 12. Ofgem should consider the impact of regulatory and energy policy uncertainty in adding to investment risks.
- 13. As discussed in response to question 1 the future role of the licence condition on 'exploitation of electricity trading and transmission arrangements' in limiting revenue from the wholesale market at times of capacity shortage and Ofgem's desire to exert more influence over the code modification process are particularly relevant.
- 14. The potential ability under the Third Package of National Regulatory Authorities to implement a number of policies directly could also add to investment risk, particularly if there is no clear appeal process and a lack of formal user involvement in the process.
- 15. Unexpected changes to market rules after investment decisions have been taken are particularly damaging to perceptions of risk. The changes to the OFTO regime are an example of this.
- 16. Uncertainty about the specific nature of the Government's CCS retrofit requirements for new coal plant and environmental requirements are also a source of investment risk, including the potential role of plant specific emissions performance standards which raises the issue of whether companies will be able to fund the required investment to either upgrade or replace affected capacity. Until this issue is resolved satisfactorily it will add to investment risks for fossil plant.

# Question 3: Do you agree that the five issues we have highlighted are the most important?

17. We agree with items 1 and 2 and that there is a risk (3) that short term price signals at times of system stress may not fully reflect the value that customers place on supply security which may mean that there are inadequate incentives to make available additional peak energy supplies, not least because these price levels may be suppressed by regulatory intervention.



- 18. We do not see 4 as an issue of the same order. In fact we see interdependence with international markets as presenting opportunities for the UK rather than a risk. Liberalisation of the EU gas market and the UK's access to diverse sources of gas enhance the UK's ability to maintain secure supplies. Risks have been reduced by the gas security of supply regulation and the third package has further opened up the EU gas market. Long term gas purchase contracts and reservation of storage rights may limit the extent to which the UK has complete access to continental gas infrastructure, but this is not unique to the UK and the UK has much better access to a range of gas supplies including LNG than most EU member states. UK gas purchasers also themselves need to make more use of long-term contracts.
- 19. Ofgem considers the impact of differences in gas quality standards between the UK and other markets on gas security of supply. It draws the conclusion that the tighter range of gas quality specification in the UK, in particular regarding the Wobbe index, has a negative effect on gas security of supply in that, in future, continental gas might not be compliant with UK standards and thus no longer available for import to the UK. In this respect, we agree with the concerns identified with regard to gas security of supply.
- 20. However, we do not agree with Ofgem's conclusion that there is no need for any measures to solve the gas specification problem before 2015/16. Quality constraints are already capable of affecting UK access to imported gas. In January 2010 gas import constraints were only avoided through exceptional efforts by Fluxys, the Belgian TSO. During this period, the UK experienced a very high demand for gas coinciding with a reduction in gas imports from Norway caused by technical problems at Norwegian production facilities. The interconnector provided a substantial part of gas imports to the UK, but this was very difficult to maintain because of tight gas specification requirements in the UK. Given the security of supply implications Ofgem should progress discussions with National Grid on the construction of the necessary gas processing facilities at Bacton.
- 21. As discussed in response to question 2, we would add regulatory risk and political uncertainties arising within the UK from increasing pressure to control prices, to implement market investigations and to implement more interventionist methods of emissions controls without establishing whether the required investments can be delivered.
- 22. A further risk is that the supply chain may not respond to the market opportunities arising from increased incentives to build renewables and other low carbon plant available in the UK and globally sufficiently rapidly and that the limited number of suppliers of nuclear and offshore wind plant lead to significant inflation in costs.
- 23. We agree that the impact on consumers and on those on low incomes specifically are a major concern. This reinforces the need to ensure that EU and Government policies drive the least cost means of achieving secure energy supplies and reducing greenhouse gas emissions. The effect on low income consumers of the investment required can be addressed through a combination of energy efficiency investment, appropriate tariff structures, and use of the tax and benefits system.



# Question 4: Do you have any comments on our description of what might happen if no changes are made to the current arrangements?

- 24. If no changes were made and it was clear that this outcome would remain in place for a long period of time, we broadly agree that some CCGT investment would continue although this might be deferred until a point when it was clearer that the investment would be rewarded by the market in light of the expected level of wind build. Coal and CCS investment would be unlikely to proceed unless the Government specifically offered to fund the excess costs of meeting its expectation that new coal plant should be fully fitted with CCS by 2025 or until international experience of CCS led to a significant reduction in CCS costs, with gas and carbon prices affecting the timing of these outcomes. Nuclear investment might not take place until such time as the EU ETS provided sufficient confidence that the carbon price would provide the required incentives or long-term gas price expectations rose very significantly.
- 25. Renewable investment, particularly the economics of wind, will become more difficult over time. Studies by Pöyry and Redpoint have both highlighted that there could be a significant reduction in the percentage of the baseload price it receives over the medium term. Redpoint for example suggests that this discount could be around 20% by 2030 if the 2020 renewable targets are met, and considerably higher if it is exceeded. At some point renewable investment could be curtailed by the limited extent to which the system could absorb more variable generation sources and the absence of renewable targets driving further intervention to support renewables after 2020.

# Question 5: Do you believe that our policy packages cover a sufficient range of possible policy measures?

- 26. They cover a wide range of options although we question the need to have included the more extreme end of the range on an equal footing with the others. While this was not Ofgem's intention, this has led to the widespread impression in the UK and abroad that Ofgem no longer believes that market based policies are capable of delivering and that a return to central planning is needed.
- 27. The Project Discovery work could have explored a wider range of policy measures to incentivise low carbon investment such as nuclear and CCS plant which we regard as the most immediate issue. It could also have considered how the existing primary driver of low carbon investment the EU ETS could most effectively deliver the policy goals set for it. We regard the EU ETS as an efficient driver of low carbon investment across the EU but to be effective it will have to provide a reliable firm trajectory in the CO<sub>2</sub> emissions cap which extends out to at least 2030.

**Question 6:** Do you have suggestions for variants to these policy packages? **Question 7:** What other policy measures do you believe should be considered, and why?



- 28. In the absence of a reliable long-term carbon cap, we agree there is a case for considering in the UK additional incentives to support low carbon generation investment, given the UK's specific climate change targets, which go further than EU-wide commitments, and the urgent need to replace a large volume of closing capacity with low carbon generation to support delivery of those targets. Of the options available, our current view is that an obligation on suppliers to contract for low carbon generation most effectively combines the ability to incentivise investment with a market oriented, technology neutral approach, without significantly distorting the existing EU ETS and competition in EU wholesale markets.
- 29. We have already highlighted that, as investment in wind generation increases, it is potentially exposed to capturing a decreasing percentage of the baseload power price, a point which was recognised by DECC during the Renewable Energy Strategy consultation during 2008/09. The current market arrangements would incentivise wind generators to bid up to the negative value of the price of a Renewable Obligation Certificate (ROC) in circumstances when there is low demand on the system and high amounts of wind. This will impact not just on wind but also on other generators including nuclear. This issue needs to be addressed as part of the overall suite of measures necessary to address the challenges the energy market is facing.

## **Question 8:** Do you agree with the assessment criteria that we have used to evaluate the policy packages?

30. We agree with the criteria as far as they go but Ofgem appears to be taking an uncharacteristically UK-centred view. The UK is part of a wider European electricity and gas market and the UK position cannot be considered in isolation. The UK is also party to commitments made by the EU on behalf of all Member States in international climate change negotiations. Ofgem should consider the impact of its proposals on the development of more liberalised and integrated EU energy markets, on EU CO<sub>2</sub> emissions and on wider carbon reduction mechanisms particularly the EU ETS.

# Question 9: Do you have any comments on our initial assessment of each of the packages?

- 31. Overall we do not believe a requirement has yet been demonstrated for changes to the market framework to incentivise electricity peaking or other capacity *per se*. We should first explore the potential role of a more active demand side response in addressing the effects on demand for generation of increasing wind generation. Interconnectors also have a role in ensuring that the UK's capacity requirements can be met. Technology responses such as electricity storage should be encouraged.
- 32. We see no evidence from the gas market to suggest a need for intervention to deliver gas storage or other gas infrastructure, although there is a requirement for investment in facilities to process imported gas to a UK specification.
- 33. There is no evidence to suggest that radical interventions such as a single buyer model are required or are more efficient than market oriented options. Historical experience



within the UK suggests the reverse. They are also largely incompatible with liberalised EU energy markets which the UK Government and Ofgem have advocated for the last 20 years and on which the UK will increasingly rely to secure access to gas.

Question 10: Do you agree with our summary of the key benefits and key risks of each policy package?

Question 11: Do you have a view on which package is preferable, or alternative policy measures or packages that you would advocate? We are particularly interested in any analysis you may have to support your views.

34. Our views on the individual policy packages are as follows:-

### Package A Targeted Reforms

### Minimum Carbon Price

- 35. An EU wide approach would reduce CO<sub>2</sub> emissions at least cost across the EU, avoiding distorting investment and trade across the EU energy market. The most effective EU action to underpin the carbon price would be to adopt a tighter long-term volume cap in the light of sufficient international progress on a global climate change agreement. Such a cap should extend to at least 2030 to provide certainty over investment timescales.
- 36. In the absence of this, underpinning the carbon price in the EU ETS by adopting a minimum auction price or limiting the supply of allowances are options. While this would have the advantage of ensuring a consistent approach across the EU it would distort the operation of the EU ETS. Government intervention in the emissions trading market to deliver specific price outcomes would also create additional risks. We do not favour this approach and in any case the practicality of delivering it is low.
- 37. Domestic action to underpin the carbon price through a carbon tax is unlikely to reduce the risks associated with low carbon investments given that investors will have limited confidence that there will be reliable political support for setting the carbon tax at the required level over the operating life of the investment.
- 38. Input taxes on primary fuels or CO<sub>2</sub> emissions will also distort trade in electricity across the EU electricity market as generation will be taxed in some countries and not others.

## Improving short term price signals in both the gas and electricity markets

39. We believe the priority here is to ensure that energy markets are able to deliver the peak prices, which will occur during periods of relative capacity shortage, necessary to incentivise the construction of new capacity. Regulators and indeed Government need to accept that these prices are needed. This issue is particularly acute in systems where a large volume of wind generation will reduce the load factors of gas or other plant required to maintain supply security at periods of high demand and low wind output. In these circumstances, the required price levels necessary to reward plant operating on very low load factors will need to be high, as discussed in response to question 1.



- 40. We would welcome a debate on this issue but are not convinced that adjustments to the cash-out regime for electricity and gas will have a substantial effect. We agree that the current electricity cash-out mechanism may dampen peak (system buy prices) and that this may weaken short term price signals. However further adjustments to the electricity cash out arrangements are unlikely to have a significant effect on investment incentives, unless market participants can have confidence that the cash-out regime will be stable as frequent changes in the past have tended to discourage forward contracting. Potential adverse impacts on renewable investments made on the basis of the current regime would also need to be considered, and unless compensated for, this would undermine both past and future investment decisions.
- 41. In gas it is important that market participants are fully incentivised to procure gas to enable them to balance their position in the market. However powerful incentives already exist in the market to achieve this aim through the cash-out regime and other mechanisms and we do not agree that retaining dynamic cash-out prices in an emergency is appropriate because at this point safety is an important consideration and the system operator is best placed to procure and manage the flow of gas until the market can be restored to normal operation. We also do not believe this would have a significant effect on forward contracting given that the probability of emergencies occurring at all is extremely low. Furthermore UK shippers may already be exposed to high short imbalance positions and allowing the cost of imbalances to rise further by unfreezing the cash-out price is likely to expose them to very high risks. This might make sellers unwilling to sell gas to UK shippers.
- 42. We do not see a need for the system operator to operate a daily reserve market which would be a radical change to the existing market arrangements. There is also a risk that the system operator would take a conservative approach and procure too much reserve at the expense of consumers. The balancing mechanism already encourages players to make capacity available to balance their positions. In addition the system operator already has a range of tools which enable it to access reserve efficiently.

### Improved Demand Side Response

- 43. We support action to facilitate a demand side response through smart meters and other initiatives as a means of mitigating the impact of increasing volumes of wind, although the extent to which investors can rely on this emerging over long timescales will be subject to some uncertainty (more detail is in our response to the DECC call for evidence on securing low carbon electricity supply).
- 44. A more flexible demand side will also increase stakeholder confidence that peak prices are reflective of competitive market conditions and that energy markets can efficiently meet security of supply goals.
- 45. Interconnectors and electricity storage also have a role in compensating for the impact of variable sources of generation such as wind, which have adverse effects on capital intensive investments such as nuclear and coal and CCS.



46. The potential of flexible demand side response, additional electricity interconnection and storage should be developed as a means of addressing the effects of variable wind generation on incentives for new generating capacity, before considering structural changes to the market arrangements as envisaged in the remaining Ofgem packages.

### **Package B Enhanced Obligations**

Obligations on Suppliers to demonstrate sufficient provisions of capacity or gas supply against a prescribed security standard.

- 47. We do not believe a case has been made by Ofgem for capacity or storage obligations on suppliers. Increased demand side response, further investment in interconnectors and development of storage technologies should be developed first as a response to the effects of large volumes of wind on other investments as discussed above.
- 48. Capacity obligations could also have adverse effects on wholesale market liquidity as assets would be tied up in capacity obligations and would not be able to fully respond to market signals.
- 49. We have discussed above the potential role of a low carbon obligation on suppliers to contract for low carbon electricity given specific UK circumstances.

Obligations on System operator to provide back-up generating capacity or emergency gas.

- 50. Generally we do not favour extending the role of the SO in the UK market as this could ultimately lead to the SO exerting control over the whole market.
- 51. Broadening the role of the SO seems inconsistent with the desire to sharpen market signals. Action by the SO to procure reserve capacity will tend to reduce energy market income for other generation, including for low carbon generation, reducing investment incentives for new plant or leading to early closures.
- 52. We agree that the SO has a potential role under emergency conditions in the gas market.

### Obligations on gas-fired generators to have back-up fuel

53. Investors will provide for back-up fuel if the market incentivises this but obliging CCGTs to carry distillate reserve is not appropriate as it is not economic at many sites (e.g. stack height may need to be raised to disperse emissions) and it also raises local air pollution issues. Burning distillate also adversely affects plant lifetimes so these decisions are best left to operators.

### Centralised Renewables Market

54. In principle we believe renewables should be competing in the market with other generation on a similar basis. We do not favour options which may obscure the costs



- renewables or other technologies incur in balancing the system while other plant has to continue to meet these. These costs should be transparent and met by the relevant plant so the costs of supporting renewables or other technologies are visible.
- 55. As we understand Ofgem's model, a centralised renewables market for wind would also mark a major shift in the way renewables are rewarded in the UK market in terms of their energy income and the economic impact of this is unclear.
- 56. However some features of the model (for example, where renewables are compensated for being instructed to reduce output) may help address issues where there is excess capacity during periods of high wind output and low demand, and should be evaluated with other options for addressing this issue.

### Package C Enhanced Obligations with Renewables Tenders

- 57. The Renewables Obligation (RO) is already actively incentivising investment in renewables and its earlier inefficiencies have been addressed. E.ON sees potential for extending this quota based system more widely through the EU under Article 11 of the 2009 Renewables Directive (2009/28/EC) which allows Member States to join or coordinate national support schemes, delivering significant cost savings.
- 58. Switching to a completely new system is unnecessary and would disrupt investment plans in renewables which assume continued operation of the RO.
- 59. A tender system poses major logistical difficulties in terms of translating accepted bids into actual projects, given that companies may be reluctant to commit resource to securing planning approval for projects which may be unsuccessful in a tender. This may lead to a requirement for accepted bids to be renegotiated after planning permission and firm quotes from suppliers have been obtained.

# Package D Capacity Tenders for all generation capacity, new gas storage and other gas infrastructure

- 60. A central entity is likely to be less responsive to changing market conditions (fuel prices, demand, capital costs) than market participants, and more responsive to varying stakeholder pressures. It seems to us likely either to seek tenders for excessive volumes of capacity on the basis that it would attract criticism for under-provision or to fail to anticipate quickly enough changes in market conditions.
- 61. We agree this approach will tend to stifle innovation and customers will be exposed to the risk of any poor contracting decisions.
- 62. The relationship between capacity tenders and the energy market is unclear. The effect of capacity tenders may be to remove the value of capacity from the energy market, disincentivising any capacity competing in the market without tenders. Alternatively the energy market may still incorporate a capacity element, leading to consumers paying twice.



- 63. There is also a risk that new capacity is rewarded at the expense of existing capacity leading to inefficient investment and premature closure of existing assets.
- 64. We envisage practical problems with seeking tenders for major projects such as nuclear or coal and CCS as projects will be proceeding to different timescales. Competition may therefore be limited. There are problems also in that investors may commit only limited resources to a tender exercise and costs will need to be revised after a tender has been won. Delivery against specific timescales may be difficult if planning problems arise.
- 65. Capacity tenders are inconsistent with EU energy market liberalisation and the development of an integrated competitive EU energy markets. Article 8 (1) of Directive 2009/72/EC on the internal market in electricity allows capacity tenders but only where, on the basis of the authorisation procedure, the generating capacity to be built or the energy efficiency/demand-side management measures to be taken are insufficient to ensure security of supply. There is no evidence to support such a shift at this stage. The primary issue in the UK is whether sufficient low carbon capacity will be built.
- 66. Capacity tenders are also inconsistent with the preferred market coupling approach to interconnector trading.

### Package E Central Energy Buyer

- 67. As discussed in relation to package D, such a single central entity is likely to be less responsive to changing market conditions (fuel prices, demand, capital costs) than diverse market participants, leading to inefficient investment decisions and higher risks of over or under capacity, with adverse effects for consumers either way. Historical evidence in the UK suggests that a single buyer will tend to over provide for capacity, will not respond flexibly to changing market conditions, but will be subject to changing political pressure in its decision-making. We agree that this approach will also stifle innovation.
- 68. A shift to such a mechanism would be highly disruptive and would be perceived adversely by investors.
- 69. Again it is inconsistent with EU energy market liberalisation and the development of an integrated EU energy market. It also appears to be illegal under EU law. Furthermore state aid issues may arise if PPAs (under either this or other options) provided by the network operator are advantageous to the generators who receive them, or restrict competition by closing off a significant part of the market from new entrants.

## Question 12: Do you agree with our assessment of the timing for important investment decisions?

70. The period to 2013 will be important for investment decisions critical to future secure and sustainable energy supplies, and we agree there is an urgent need to address how to incentivise low carbon investments in the absence of achieving an effectively functioning



EU ETS as discussed above, if the UK's CO<sub>2</sub> emission reduction objectives are to be met and the UK is not to become excessively reliant on gas for power generation.

## Question 13: Do you believe that early actions should be considered?

71. There is a need for urgent action to evaluate options thoroughly and then to reach some clear decisions. Government has indicated that it will consult on options arising from its energy market assessment later in 2010 with the aim of reaching a decision on the way forward in the Spring of 2011. If this concludes that primary legislation is required then the Government should commit to implementing this as soon as practical and certainly no later than early in the 2011/12 Parliamentary session. Government and Ofgem need to work more closely together on these issues and Ofgem should consider deferring action of its own until the Government has come to a view, to ensure consistency.

# Question 14: Do you think that the issues are such that policy measures should be considered as a package or should they be considered on a case by case basis?

72. Our response suggests the measures that may be required and those that are not. The Government needs to consider the relationship between the available options and propose a coherent package. This should take account of their effect on existing policy mechanisms both in the UK and the EU. This appears to be the approach taken in the energy market assessment.

E.ON March 2010