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UK Energy Policy: some paradoxes and anomalies

By Ian Fells

1. UK policy is to liberalise the energy market so as to “create competitive markets which will ensure secure, diverse and sustainable supplies of energy at competitive prices”. But left to its own devices the energy market will deliver gas-fired power stations to the exclusion of coal, nuclear or renewables. Clearly the market doesn't deliver what is required.

2. It follows, therefore, to get a balanced energy supply requires regulation, subsidy, and legislation. Paradoxically the “de-regulated market requires “regulation” to make it work as required. “Levelling the playing field” to let the market operate in an unfettered way will never work; particularly where social engineering to deal with the coal industry is included.

The market values the environment at zero and will pour into it whatever waste it can, unless prevented by legislation, taxation or other fiscal instruments. The market will never, of its own accord, protect the environment.

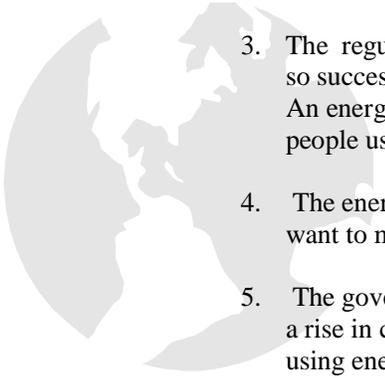
3. The regulator is tasked with driving prices of electricity and gas down and has been so successful that demand has increased, to the delight of the supplying companies. An energy (climate change) tax is now to be instituted to drive prices up and make people use electricity and gas more efficiently. Another paradox!

4. The energy suppliers have no real interest in improving energy efficiency; they want to maximise sales, an important anomaly.

5. The government reduced VAT on domestic fuel so triggering increased fuel use and a rise in carbon emissions of half a million tonnes per year. Another example of using energy policy to achieve social engineering. Most unwise!

6. The government has a difficult commitment to reduce carbon dioxide emissions by 20 per cent. The climate change levy, introduced by the Chancellor last year, made no distinction between electricity generated without producing carbon dioxide and electricity generated by burning fossil, carbon-containing fuels. Since then new renewable electricity has been exempted from the tax but not nuclear or hydro, which supplies 2% of UK electricity without emitting carbon dioxide. Why? Is the government serious about its carbon dioxide commitment? Letting the nuclear industry run down will increase carbon emissions by four million tonnes of carbon per year between now and 2,010, just about the amount it is claimed the levy will save, when applied to the industrial sector. If the government is trying to reduce carbon emissions a carbon tax is what is required. Some Scandinavian countries have such a tax. Carbon trading is now on the agenda but will only be taken up, if at all, by an exclusive “club” of large companies. It will not be for 60 per cent of UK industry, which is SMEs and does not have the skills or expertise to trade.

7. The nuclear industry includes environmental costs in its accounts, de-commissioning, radio-active waste disposal and so on, which increases the cost of nuclear electricity. The gas, coal and or oil-fired stations are not obliged to include the cost of their environmental degradation, which gives them an unfair financial edge over nuclear. What, for that matter, is the cost of global warming to the economy?



8. The market takes no account of future primary energy costs. Gas prices need only rise by a modest percentage before renewable, coal and nuclear generation costs begin to look attractive. But the UK is already be importing natural gas from Russia, Iran and Norway as supplies from the North Sea fail to meet demand. The price of gas has doubled in the last year to the dismay of those intending to build the six new gas fired power stations which have just been licensed.
9. Government strategy for carbon dioxide abatement relies, amongst other measures, on achieving 10 per cent of renewable electricity by 2010, almost a fivefold increase. New hydro-electric sites, the major renewable electricity source, are not available. Simple arithmetic, which seems to be lacking in some of these projections, suggests that wind power, on or offshore cannot possibly fill the gap within the time frame. If all the wind farms in the world were installed on the South Downs, they would only supply 5 per cent of UK electricity. Energy from waste, a very good idea, has little chance of implementation because of public opposition; this is true of wind farms as well. So the prospect of 10 per cent looks bleak. The figure of 10,000MW of CHP by 2010 looks equally bleak, once arithmetic is applied to the projections.
10. No one has, as yet, found a way to get people to take energy efficiency seriously, particularly when energy prices keep going down. Low prices operate against the installation of more efficient equipment as the industry requires a one, or at the most, two years payback period. Low prices also discourage investment in renewables. The energy tax may improve matters for IPPC registered companies, they can expect 80 per cent rebates, by what of the others? And what of the domestic sectors?
11. Without a reduction in the use of cars (not the anticipated increase of 40 per cent over the next two decades), efforts to reduce carbon dioxide levels will be negated by an increase in transport emissions. Transport should be part of an energy plan and not hived off as a separate problem.
12. The split in responsibilities for energy supply, use and efficient operation, between DETR and DTI is not helpful. Perhaps the Department of Energy should be revived.

The way ahead

Government already intervenes massively in the energy market but pretends that its policy is market-led. The market can be very powerful, within a strategic framework, but the government should come clean, admit a framework with legislation, regulation and incentives is necessary and produce a coherent energy strategy, embracing the market as a powerful tool where appropriate.

One thing is very clear: meeting in 2010 its twenty per cent carbon dioxide reduction commitment, will not be achieved by the policies currently in place and the shortfall could be considerable.

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