

Recommendations on **Energy** for the Liberal Democrat

2015 Election Campaigning

from the Green Lib Dem Policy Group

The Liberal Democrats have done more to put sound environmental policies into practice than any other UK Party. As Green Liberal Democrats we wish to help maintain that status and help the Party exploit it in election campaigning.

To do that we need to alert the general public to the importance of environmental issues and inform them of our policies and achievement in this area.

A significant portion of our vote comes from the environmentally aware. It is therefore important that we give enough prominence to our green credentials, and that we defend ourselves from the efforts to detract from them, whether by the **Green Party** with the intention of taking our votes, or by the well-intentioned.

The student fees fiasco illustrated the importance of publically addressing criticism with reasoned argument and of providing campaigners with the facts they need to counter doorstep criticism. The failure to give a timely explanation why our MPs voted as they did, and what the students gained as a result, not only lost us vast numbers of council seats, it also enabled our opponents to continue to portray us as untrustworthy.

Introduction to our Energy Policy

Combating Climate Change, while maintaining quality of life and the environment, is our overriding principle.

Hence our policy aims are to

- Reduce Carbon dioxide emissions.
- Maintain a secure energy supply.
- Support a sustainable and a healthy economy.
- Target achieving a near Zero Carbon Economy by 2050, with
- Zero Carbon Electricity by 2020 as an intermediate target.

These are part of a set of environmental policies which are the most practical and far reaching of any UK party.

Practical Policy

Only an Environmentally Sustainable Economy can yield a Stronger Economy and a Fairer Society, but transition from our resource hungry, climate changing economy cannot be instantaneous. Hence we must prioritise.

Fighting climate change is more urgent than achieving absolute long term sustainability in other areas. This means, for example, that as we bring on more renewable energy, we use it to replace the use of coal before replacing nuclear energy. This contrasts with the **Green Party** policy which puts eliminating nuclear energy above all else. Germany has found that, despite its investment in renewables, reducing its nuclear contribution has required burning more brown coal – a far more dangerous option than another generation of nuclear reactors.

Achievements

As successive Ministers of State for Energy and Climate Change, Chris Huhne and Ed Davey, have, despite obstruction from Conservative Ministers in the Treasury and other Departments, achieved a record rate of investment in renewables, energy efficiency and the replacement of aging infrastructure.

The Liberal Democrats were the main drivers of the Energy Bill of 2013, which set the framework for the reduction in carbon dioxide emissions from electricity generation and the encouragement of investment in new low carbon generation.

Ed Davey has taken a leading role on energy and climate change matters in the EU Council of Ministers, and Lib Dem Local Councils have led the way in low energy housing, community energy generation and energy efficient urban planning.

Explanation 1

Autumn 2013 Federal Conference Motion F10

Green Growth and Green Jobs (policy paper 109 Transition to a Zero Carbon Britain) http://www.libdems.org.uk/autumn_2013

1 Nuclear Electricity Generation

Why did the Lib Dems give qualified support for including Nuclear Generated Electricity in the energy mix? Does it make Lib Dems less Green?

Greenpeace, Friends of the Earth, the **Green Party** and some of our own members were saying that, by voting to allow nuclear into the energy mix, the Lib Dems were abandoning their Green Principles. Nothing could be further from the truth.

The motives of those who worked for the inclusion of a nuclear option were entirely green, as were the arguments they put forward to members.

A. The Liberal Democrats are still taking the lead in fighting climate change:

- 1. by improving energy efficiency and reducing extravagance and waste;**
- 2. by drastically reducing CO₂ emissions, primarily by replacing fossil fuels use by renewables, but also by using Carbon Capture and Storage and other techniques if they are economic on a suitable scale.**

B. Liberal Democrat policy is still to eliminate nuclear fission reactors.

It is simply that the relative urgency of these two aims has been reassessed in the light of recent evidence on climate change and on nuclear safety

- The Committee on Climate Change has reinforced its message on the urgency of cutting greenhouse gas emissions, and on the very serious risks that rapid climate change is bringing to humanity.
- Germany has shown that by just closing a small fraction its nuclear generation (to satisfy its **Green Party**), instead of continuing to reduce CO₂ emissions, it has had to increase them by stoking up more brown-coal fired generation.

- While nuclear fission reactors are not sustainable long term, there are considerable reserves of uranium and the amount of waste is minute compared to that from fossil fuels. Reactors can be designed to use thorium, a much more abundant element. The waste from thorium reactors is of lower activity than from uranium and is not of any military utility. (Technically - Fertile but not Fissile)
- Existing and proposed reactor designs and UK operating procedures have been checked for resilience following the Chernobyl and Fukushima events.
- A new generation of nuclear reactors to replace those scheduled to have closed by 2023 (but not Sizewell C which is designed to work until 2035) would increase nuclear waste stockpiles by only 10%.
- Some of the reactors could be of a design that would allow them to be used to destroy use plutonium and other stockpiled military waste, by using it as fuel.
- A Geologist and Professor of Civil Engineering working in the field, gave the GLD Fringe her personal opinion that the designs for engineered underground storage for nuclear waste are safe.
- The strike price negotiated for continuous nuclear electricity is cheaper than for any renewables except intermittent onshore wind and waste incineration. (See doorstep information)
- Nuclear electricity has a higher safety record than renewables. (See doorstep information)

The conclusion of Conference is in effect a decision that -

Because the risk to the population of the UK, and to mankind as a whole, of not cutting CO₂ emissions fast enough, is far greater than the risk associated with delaying our nuclear close down by few years; as more renewable generation and storage becomes available we should use it to displace fossil fuel generation. Only when fossil fuel generation has been reduced to last resort backup should we start to use further renewables and storage, as it becomes available, to reduce nuclear fission generation. Hence we will need new reactors nuclear reactors to replace most of the nuclear fission generation capacity that is due to close by 2023.

2 Shale Gas Does this mean the Lib Dem support fracking as an energy solution?

Green Growth and Jobs did not contain a proposal to ban fracking or other extreme fossil fuel extraction. However the motion, as amended and carried, was hardly support for fracking!

It recognised that Hydraulic fracturing was already being piloted in the UK. It called for limiting even shale gas exploration, until it could be shown that environmental regulations and enforcement are adequate to protect local environmental quality, and that proper methane escape monitoring system can be established. It also gave detailed conditions for exploration; including local authority approval, the right for locals to buy-in, and a commitment to use at least half of the tax from shale gas **exploitation** to fund its own regulation, Carbon Capture & Storage research, and tackling fuel poverty.

One difficulty facing the Policy Working Group was that its policy on gas had to be formulated before Conference had voted on whether to allow new nuclear build. The Policy Paper (and motion on it) had to allow for the greater need there would have been for gas, had Conference turned down the nuclear option.

There was then a separate vote on whether keep the much stricter amended section or to cut out all reference to shale gas extraction, leaving us without a policy on it. A good majority voted to keep these restrictions, which would severely limit the potential for fracking.

Explanation 2

Energy Bill Target setting amendment

Why did so few Lib Dems support the “Tim Yeo” Energy Bill amendment which would have required the setting of a 2030 target for the reduction CO₂ from electricity generation by April 2014, rather than leaving it to a future Parliament.

The principal reason is that a large fraction of the Tory party is against much of the Energy Bill and there was a real danger that, if the amendment were passed, they would wreck the Bill and destroy the environmental gains that had been agreed so far.

Policy Achievements and Development

1 A selection of environmental achievements by communities and by Lib Dems working at local level

A **cooperative in Oxfordshire** now operates a medium-sized windfarm and a 30 acre solar park on behalf of the local community.

On a smaller scale, the **Woolsey Village Hall in Devon** has gone green with a 6 kW wind turbine; a 9 kW array of solar photovoltaic panels and an 8 kW ground-source heat pump: this will more than pay for itself in 10 years.

At the local government level, three Lib Dem councils are exemplars.

Eastleigh has installed nearly 700 PV panels on ten buildings it owns and has invested a total of £650,000 in Green energy which will generate an income of £2 million over the lifetime of the schemes.

Bristol City Council has invested £6 million in solar panels, biomass boilers and wind turbines, again, making a profit as well as benefiting residents and the environment.

There is huge potential: in Germany one fifth of all electricity is generated renewably and 65% of the generation is owned by individuals or local communities.

London Borough Sutton (Lib Dem 45, Con 9) provided land and worked with the Peabody trust to achieve the Beddington Zero Energy Development, an environmentally friendly housing development in the borough at Hackbridge. It was the first large scale community designed to create zero carbon emissions.

Brighton, the only **Green Party** controlled local authority cannot even organise an effective recycling service

2 National action needed.

Community-Owned Renewable Energy Supply Co-Operatives cannot sell direct to consumers but have to do it through one of the big suppliers: that must change. Policy Paper 109 calls for this, but it was not picked out in the Policy Motion F10. It should be a featured policy.

Eric pickles is threatening to repeal the **Planning & Energy Act** which, among other things, enables local planning authorities to use the so-called 'Merton rule' to require

10% of the energy used in development to be generated on site. This is would be removing one of the ways of achieving our policies. We need to be seen to be resisting this.

Pickles also killed the '**Consequential improvements**' proposal that would have required anyone building a significant extension to improve the energy performance of building, despite this being supported by 90% of those consulted.

We also need to campaign for **carbon reduction targets** to be required in **local development plans**.

We need to encourage **local authorities** to create arm's-length local energy companies to **produce, distribute and sell electricity and heat**, and encourage **bus franchising**

These kinds of actions:-

Help local communities financially

Make essential Green initiatives more acceptable to local people and

Build local support for the individuals and organisations – including political parties – that promote them.

Appendix

Policy Communication

Autumn 2014 Federal Conference

A Stronger Economy in a Fairer Society [Motion F4]

Although this **Manifesto Themes Paper**, to prepare the Liberal Democrat Programme for Government 2015-2020, gave prominence to the intrinsic values of our green policies and attached great importance to reducing greenhouse gas emissions and building our economy on environmentally sustainable foundations; the Conference motion gave a far less central role to sustainability, allowing the environmental purpose to be subsumed by short term economics job creation aspects.

Climate change and other sustainability matters also formed important parts of the President's speech, policy motions F10, F11, F19, and F35, and at least 24 Fringe meetings.

The fight against accelerating climate change and the drive for all aspects environmental sustainability should be central elements of our manifesto and campaign material.

Links http://www.libdems.org.uk/autumn_2013 go to Conference Report (in orange text).

[A Stronger Economy in a Fairer Society.](#)

continued on new page

Autumn 2014 The Pre-Manifesto http://www.libdems.org.uk/policy_paper_121

has a green thread running through it, plus a double page spread with 5 Green Laws on it. The casual reader should note that the green content of the rest of the Pre-Manifesto is much more extensive than this the double page spread outline of promised legislation.

If the Manifesto follows the same format, care will have to be taken to make it clear that there is more environmental policy throughout the document.

Another problem with the format is that we could receive criticism for breaking promises if we have a role in government but do not have enough power to force the 5 green laws into the programme of legislation. It would be better to state the policies and suggest how they could be put into legislation.

The Autumn 2014 Federal Conference motion A stronger Economy and a Fairer Society http://www.libdems.org.uk/f30_a_stronger_economy_and_a_fairer_society endorses the Pre-Manifest, and “welcomes its key commitments”.

The cutting of carbon to enable the “next generation to enjoy long term prosperity” “protected from the threat of runaway climate change” is the only environmental commitment to be ranked key.

There is a short (about 12% of total) section on environmental matters included in the welcomed proposals, including our commitment not to support more runways in the south eastern super-region. A group of senior party members tried to remove this commitment everywhere except at Heathrow. They were defeated by an overwhelming majority.

Policy proposals for the Liberal Democrat 2015 election manifesto

The Green Manifesto <http://www.green-book.org.uk/> is an unofficial publication, by members of the group that produced The Green Book, which puts forward proposals for consideration for inclusion in the Liberal Democrats’ 2015 election manifesto. Although several of the proposals contained here are existing party policy, many are not.

Conclusion

It is important, not only that our green policies get into the final Manifesto, but that they feature prominently in the Campaign

This document includes extracts from material prepared for the 2013 EoE Conference

Steve Bolter November 2014

DATA

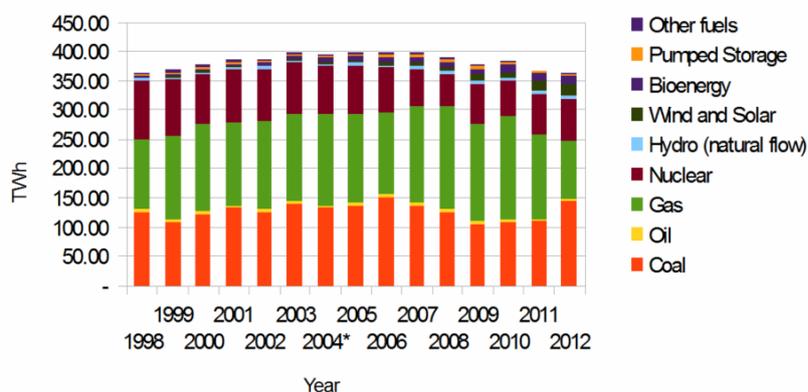
	Strike Prices £/MWh
Nuclear Hinckley C and Sizewell C	£90
Onshore Wind	£90
Nuclear Hinckley C only	£92
Large Solar Photo-Voltaic and Hydro	£100
Dedicated Biomass (with CHP)	£125
Offshore Wind	£140
Wave and Tidal Stream	£305

Death Rate (extraction and use)	/TWh
Nuclear Energy	0.09
Wind Energy	0.15
Solar Photo Voltaic (rooftop)	0.44
Natural Gas	4
Biofuel/Biomass/Peat	12
Coal – USA	15
Oil	36
Coal – world average	161

Nuclear includes mining, Chernobyl, Fukushima and waste.

Electricity Generation by Fuel Source

1998 to 2012



Compare 2012 with 1998.

Total Electricity Same.
 Fossil fuel used Same.
 Gas Down, Coal Up:
hence CO₂ UP !!!
 Total very low carbon generation Same*
 Nuclear down, wind solar bio and other UP

How much better it would have been if we had maintained our nuclear output and used the increase in renewable generation to reduce coal burning rather than reducing nuclear output. (*Assumes “other fuels” are net low carbon)

CARBON INTENSITIES	Average g/kWh	Range g/kWh
Hydro	4	
Wind Offshore	12	
Nuclear	16	
Natural Gas with ccc	155	65 to 245
Coal with ccc	233	98 to 369
Natural Gas	469	
Coal	1000	
in (2013) or	g/kWh t/GWh	g/kWh t/GWh
Mass of carbon dioxide / electrical energy exported, including lifetime CO ₂ from construction and maintenance.		

APPENDIX March 2015

Challenge

In the Spring 2015 edition of the Green Lib Dem journal “Challenge” my paper on Fracking includes explanations of the terms carbon footprint and carbon intensity.

Extracts from this paper will soon be on the GLD website.

This Challenge also has papers on the Water, Cycling, the Circular Economy, and Wave Power and Environmental Challenges in the EU.

The Five Green Laws

These were debated at the Spring 2015 Federal Conference. See Lib Dem Website for the motion as amended.

Update

Look out for an update to this paper later this month.

(More examples of positive Actions by Lib Dem Councillors (or counter examples of failures by non Lib Dem Councils, are welcome, as is information on that bits that need updating.

Steve Bolter 16 March 2015